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### **COMPILATION STUDY ON GIFTED STUDENTS AND E-LEARNING DURING THE PANDEMIC: LIMITATIONS, STRENGTHS AND WEAKNESSES<sup>1</sup>**

#### **Abstract**

This compilation study aims to review e-learning in the context of gifted students during the period in which distance education started to be conducted in Turkey during the pandemic. The study discusses and offers recommendations on the definitions, positive and negative aspects, and limitations of e-learning by using a deductive method. Families and teachers are responsible for positively channeling the desire and curiosity, which require continuity of the gifted students through technology and the internet. For this reason, the recommendations presented in the study were aimed at this target group. "Document review," one of the qualitative research techniques, is used as a data collection tool in line with the purpose of the research. The information obtained from the document review is analyzed, interpreted and compiled to cover the research's purpose. E-learning, which is an alternative solution for the gifted students to reach knowledge to satisfy their high sense of curiosity and lifelong learning needs, can be defined as the interaction of students with the teacher and other students according to their individual differences and learning pace, and the realization of learning by using the

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opportunities offered by the internet and technology. Based on this definition, utilizing e-learning to support the lifelong learning needed by gifted students can be an important solution during the pandemic process. The students are now able to receive distance education that was made possible by legislative regulations as part of the measures taken due to the Covid-19 pandemic, which has increased its impact throughout the world since the early days of 2019. In this context, mentoring must be provided to all students, including the gifted students, and it should be ensured that they use technology together with the internet and learn on their own. Therefore the study investigates how gifted students can effectively use the e-learning method and access information through distance education, technological resources, and the internet. In addition, the study refers to the advantages and disadvantages of e-learning for gifted students. The study makes recommendations to teachers who will conduct the education process and families in order for them to manage the process positively.

**Keywords:** E-Learning, Gifted children, use of technology, Covid 19 pandemic.

### **PANDEMİ SÜRECİNDE ÜSTÜN ZEKALİ ÖĞRENCİLER VE E-ÖĞRENME ÜZERİNE DERLEME ÇALIŞMASI: SINIRLILIKLAR, GÜÇLÜ YÖNLER VE ZAYIF YÖNLER**

#### **Özet**

Bu derleme çalışmasının amacı, pandemi sürecinde Türkiye'de uzaktan eğitimin uygulanmaya başladığı dönemde e-öğrenmeyi üstün yetenekli öğrenciler bağlamında incelemektir. Çalışmada kullanılan tümdengelim yöntemi ile e-öğrenmenin tanımı, olumlu ve olumsuz yönleri ile sınırlılıkları hakkında tartışmalar yapılmış ve önerilerde bulunulmuştur. Üstün yetenekli öğrencilerin bitmek bilmeyen merak ve ilgilerinin teknoloji ve internet aracılığıyla olumlu yönde kanalize edilmesinden aileler ve öğretmenler sorumludur. Bu nedenle çalışmada sunulan öneriler bu hedef kitleye yönelik olmuştur. Araştırmanın amacı doğrultusunda verilere ulaşmak için nitel araştırma tekniklerinden biri olan "doküman incelemesi" kullanılmıştır. Doküman incelemesinden elde edilen bilgiler, araştırmanın amacını kapsayacak şekilde analiz edilip, yorumlanarak derlenmiştir. Üstün yetenekli öğrencilerin yüksek merak duygusu ve yaşam boyu öğrenme ihtiyaçlarını karşılamak için bilgiye ulaşmalarında alternatif bir çözüm olan e-öğrenme, öğrencilerin bireysel farklılıklarına ve öğrenme hızlarına göre öğretmen ve diğer öğrencilerle etkileşim kurmak, internet ve teknolojinin sunduğu imkanları kullanarak öğrenmenin gerçekleştirilmesini sağlamak olarak tanımlanabilir. Bu tanımdan yola çıkarak üstün yetenekli öğrencilerin ihtiyaç duyduğu yaşam boyu öğrenmeyi desteklemek açısından e-öğrenmeden yararlanmak, pandemi sürecinde önemli bir çözüm olabilir. 2019 yılının ilk günlerinden itibaren tüm dünyada etkisini artıran Covid-19 pandemisi nedeniyle alınan tedbirler kapsamında yasal düzenlemelerin mümkün kıldığı üzere öğrenciler uzaktan eğitim almaktadır. Bu kapsamda üstün yetenekli öğrenciler de dahil olmak üzere tüm öğrencilere mentorluk sağlanmalı, teknolojiyi internet ile birlikte kullanmaları ve kendi kendilerine öğrenmeleri sağlanmalıdır. Dolayısıyla bu çalışma üstün yetenekli öğrencilerin e-öğrenme yöntemini nasıl etkin bir şekilde

kullanabileceklerini ve uzaktan eğitim, teknolojik kaynaklar ve internet aracılığıyla bilgiye nasıl erişebileceklerini araştırmaktadır. Ek olarak, çalışma üstün yetenekli öğrenciler için e-öğrenmenin avantaj ve dezavantajlarına değinmektedir. Ayrıca, eğitim sürecini yürütecek öğretmenlere ve ailelere süreci olumlu yönetebilmeleri için önerilerde bulunmaktadır.

**Anahtar kelimeler:** E-Öğrenme, Üstün yetenekli çocuklar, teknoloji kullanımı, Covid 19 pandemisi.

## **METHOD USED IN THE RESEARCH**

This research was created by the method of compiling the data collected by document review, which is one of the qualitative methods. The document analysis method consists of various types of primary or secondary sources that constitute the data set of the research. It can be defined as obtaining, reviewing, querying and analyzing documents (Özkan, 2021). In line with the information obtained from the document review, the data were analyzed and interpreted to cover the purpose of the research and turned into a compilation study.

## **THE IMPORTANCE OF E-LEARNING IN THE COVID-19 PANDEMIC PROCESS**

The lockdown of COVID-19 has caused major disruptions to academic activities (Alsoud and Harasis, 2021). On the other hand, in the process of Covid-19 pandemic, transportation, health, culture, food, tourism, finance, economy etc. Besides many areas, one of the affected areas has been. The main measures taken all over the world in terms of education have been to close the schools and suspend their education. However, as the effects of Covid-19 were understood, it was understood that only interrupting education was not enough, and studies were carried out to conduct education with distance education opportunities (Kurnaz & Serçemeli, 2020).

It should also be said that the fragile population groups of societies are more affected by the pandemic crisis and the pandemic further deepens the current educational inequalities (Yıldız & Vural, 2020). According to TUBITAK research; of people in the 0-24 age range in Turkey is 682 thousand gifted individuals, and this number also constitutes 2 percent of the total population (Ozbay, 2013). It can be said that this percentage of society constitutes a fragile population group. Therefore, considering that the distance education activities carried out during the pandemic process are prepared for the general population and normal students, it may be necessary to prepare technology-based differentiated education plans in order to provide the special education needed by the gifted and talented students who constitute only 2%. At this point, it can be said that the training created according to the individual differences that can be provided by e-learning will be more functional for gifted students.

In a study conducted with gifted and talented students in Malaysia, it was found that the COVID-19 epidemic caused depression, anxiety, and stress in gifted students (Simin et al., 2020). In order to eliminate these psychological problems in students, it may be suggested to include guidance programs that will support psychological well-being to be offered in the e-learning process in the curriculum. The Guidance and Psychological Counseling unit, which is included in the education system and has ultimate goals, such as increasing the well-being of students, should also work to benefit students with the help of technology.

Nowadays, it is evident that it will be challenging to carry out educational activities without using information technology products. Since the students in the target audience are more familiar with the digital world, using appropriate technological tools and equipment in the educational processes can increase students' interest and motivation towards the lessons (Kurnaz & Serçemeli, 2020). Through the technological opportunities offered by e-learning, students can gain the intrinsic motivation required for learning using interactive and technology-based programs that they can enjoy while learning.

The global decision to close educational institutions made sense to maintain social distancing to stop its spread. Some countries immediately switched to online learning as they were already ready to learn online (Mahyoob, 2020). In this study, it has been discussed what can be done to prevent students from being adversely affected by distance education due to the sudden transition of the Covid 19 process. It has been pointed out that guidance services are important in this pandemic process that affects psychological well-being. The use of e-learning was mentioned in the process, which is seen as an alternative learning way for students who are simultaneously away from the school environment.

### **GIFTEDNESS AND GIFTED STUDENTS**

In order to define the gifted student, first of all, the concept of giftedness should be examined. Giftedness designates the possession and use of untrained and self-expressed natural talents (called extraordinary abilities or gifts) in at least one skill area, to a degree that falls within the age group of at least 10 percent (Gagné, 2004). Giftedness is not a stable feature that invariably conducts to success; it shall be considered as a potential, which needs to be identified and stimulated by the school and family in order to fully develop. Besides, talent that is neglected or not promoted can be fade (Miranda, Araújo and Almeida, 2013).

According to Renzulli, one of the pioneers of the field, a gifted student is a person with a combination of above-average talent, creative thinking, and task responsibility (Renzulli, 1978). Gifted students are children who require differential educational programs and services beyond those provided by the regular school program in order to realize their contribution to self and society (Marland, 1972). Based on its definition, it is thought that the e-learning outcomes to be prepared through technology as an alternative solution proposal to meet the needs of the gifted will be useful in reaching the real potential of the students.

### **AN OVERVIEW OF E-LEARNING**

E-learning is a learning style that emerges through technology to achieve many acquisitions such as creativity, thinking skills, teamwork, and intercultural learning (Yamamoto et al., 2010). This learning style has been considered as an alternative solution for gifted students to reach knowledge to meet their high sense of curiosity and lifelong learning needs.

E-learning has an important potential for the education systems of developing countries that make low-level education investments. To be able to use the potential of e-learning in improving the quality of education; These countries also depend on the determination of a national education policy for themselves and education reform, including the opportunities it brings with technology (Aslan, 2006). Gifted students are valuable resources that countries invest in progress. One of the big steps to becoming a developed country is to reform education for these students.

Stating that modern computers and internet-related technologies are increasingly playing an active role in the education of gifted individuals, Shavinina (2009) pointed out that gifted people need special technologies that can be tailored to their specific needs. In the strategy and implementation plan prepared by MEB (2013) for specially talented students, it was stated that it is necessary to support the education of specially talented individuals who will be able to work in their own universities, factories, laboratories, research, and development units, produce and develop science and technology for development. In this direction, it has been ensured that supporting educational services offered to especially talented individuals with information and communication technologies is among the goals.

With e-learning, individuals learn at their own pace. Through communication tools, individuals interact with instructors or friends and have the opportunity to reconstruct information. E-learning environments, which present up-to-date and accurate information to individuals with visual and audio materials, aim to realize the learning in a shorter time and be implemented the learned information. (Gündüz et al., 2011). This aspect of e-learning will be beneficial for gifted and talented students whose learning speed is higher than normal individuals. Besides, the fact that individuals are in a process appropriate to their own learning speed will help talented students with different interests to achieve success in their areas of interest. Interacting with friends and lecturers can also be seen as a way of keeping the gifted students away from asociality and isolation. Through programs such as Teams, Zoom, WhatsApp, groups can be created, and e-learning classes can be designed, allowing students to interact with each other.

E-learning involves the use of digital vehicles for teaching and learning. It makes use of technological vehicles to enable learners to study anytime and anywhere. It consists of the training, delivery of knowledge, and encourages students to interact with each other, besides exchanging and respecting different points of view. It eases communication and improves the relationships that sustain learning (Arkorful and Abaidoo, 2014). From the perspective of gifted students, online learning is very effective because it gives them the flexibility to find high-quality resources and teachers that may not be available in their local community (Aboud, 2021). For this reason, it is useful to look at the effects of online learning on gifted people, the advantages and disadvantages it provides to their education.

#### **ADVANTAGES OF E-LEARNING**

In the study conducted by Çalışkan (2017), which examines the teachers' views on the use of information technologies in the education of gifted students, the positive and negative aspects of using information technologies in gifted students' education are mentioned. While drawing attention to the points that learning is more manageable, permanent learning is provided and motivating as positive aspects, it has been stated that it may cause distraction as negative aspects. It was noted in the literature that this situation is similar to other computer-aided teaching studies conducted with different learning groups.

According to Cırık (2016), it was stated that gifted students could not get the education they need in the process they were educated in the same environment with normal students in formal education, the number of students in the classroom was high, the teacher was not sufficient in the education of gifted students, and other students were negatively affected when the teacher was given special attention to some students. While many negativities were reported, it was

stated that distance education could create opportunities for the education of gifted people, as supported by the researches.

Tosun and Özgür (2009), in their study investigating the interaction of student and content in e-learning environments, stated that interactive elements consisting of the application and question-answer activities should be integrated into e-learning systems in order for students to achieve the desired learning. They stated that with interactive lesson content, the student will have the opportunity to question, apply, and test himself/herself what they have learned. It is also reported that thanks to e-learning, the student saves time thanks to the instant feedback they receive. It was emphasized that interactive course contents enriched with animation and voiceovers make the student's interest in the lesson active for a longer time and that the learned information is permanent is another important benefit of student-content interaction. Based on this, it can be thought that more beneficial results can be obtained if content differentiation methods, which are frequently used in the education of gifted students, are integrated into e-learning.

E-learning can improve retention by varying the types of content (pictures, sounds, and text work together), creating coercion that engages the attention (games, quizzes, etc.), providing immediate feedback, encouraging interaction with other e-learners and e-instructors (chat rooms, discussion boards, instant messaging and e-mail all offer effective interaction for e-learners) (Cantoni vd., 2004). Programs such as Okulistik, Socrative, Morpa Campus, Eba Tv, Kahoot !, VoScreen, Qizlet, NearPod can be used in terms of being interactive in e-learning environments.

The role that distance learning can play in the academic growth of gifted students is potentially an important one. For homeschooled students, if an example should be given, distance learning provides a means to introduce advanced studies in subjects outside the expertise of the students' parents or tutors. It also introduces a new curriculum and new styles of teaching and learning. For students whose schools provide slight opportunities for advanced studies or acceleration, distance learning offers a means to enrich their regular curriculum after school or during the summer months (Wallace, 2009). Considering that distance education is carried out during the pandemic process we are in, gifted students can be supported to access information with the help of the e-learning method in order to manage the process well within these possibilities.

It is thought that distance education is an advantage in meeting the desire of gifted students to learn information thanks to technology-based e-learning during the pandemic process. It has become easier for gifted students to find technological solutions for their needs, such as researching in areas of personal interest that are difficult to meet in the normal education process. Finding solutions to students' questions about the lessons was faster thanks to creating interactive e-groups and the teachers' feedback in the lessons they gave distance education. In addition, students find the opportunity to learn on their own by using some technological programs in the areas of their interest. For these reasons, it can be said that e-learning provides many advantages at the point of education of gifted students.

## **DISADVANTAGES OF E-LEARNING**

Gifted students are curious to learn new information. These children, unlike their peers, want to spend their idle time knowing, understanding and researching. Many gifted students show a keen interest in different subjects in fields such as science, technology, history, culture, and arts. In addition, they collect information at the level of expertise by reading books and magazines on these topics. Therefore, these children need educational environments to find the opportunity to research and practice on these issues that they care about and are very interested in (Levent, 2011). E-learning will also be one of the most efficient options to provide students with the environment they need. There are two points to be considered here. While the positive use of e-learning brings students to the right information, negative use of the internet and serving unwanted purposes may cause students to enter illegal sites, download pirated products, and use virtual applications that are not suitable for their age.

While talking about the disadvantages of distance education, Crik (2016) drew attention to the fact that a student who searches in virtual environments with uncontrolled curiosity may lose time and get away from the main subject by accessing a lot of unnecessary and harmful information. He also mentioned that because of the unclear ethical rules in the use of computers, involvement in crimes with virtual content might also be the cause.

According to Hakala et al. (2012), it has been observed that among adolescent computer users, moderate/severe pain and musculoskeletal symptoms, disturbing daily life are common. It has also been found that 2 hours or more daily computer use increases the risk in most anatomical areas. As supporting that, in other research made by Mustafaoğlu et al. (2018), it was reported that using technological devices for inappropriate time, frequency, and different posture poses health risks such as developmental problems, musculoskeletal problems, physical inactivity, obesity, and poor sleep quality. Based on this information, it can be seen among the disadvantages that students' computer use in the e-learning process may lead to some health problems if long-term is.

In his study called *The Dark Side of Using Technology*, Siegle (2017) stated that technology provides opportunities for gifted children to discover advanced content and express their creativity, but it also brings some negativities. In order to advise parents and educators, he stated that they should guide gifted children to avoid the negative consequences of technology such as plagiarism, cyberbullying, viewing inappropriate content, and technology addiction. Based on this information, we can describe these dark sides of e-learning as disadvantages. However, awareness studies and supervised training would be appropriate steps to prevent disadvantages.

Technical problems are not infrequent, and software usability issues often continue to hinder teachers and students. Developing an online lecture requires specialized training and innovative thinking about how a course should be structured when the teacher is not in front of the room, leading the class. Nonverbal communication is diminished considerably in distance learning environments, and greater emphasis is placed on skills such as writing, time management, technology literacy, and independent learning (Wallace, 2009). Thus, it can be suggested to give essay homework that will provide hand and brain cooperation so that the writing skills of the students are not rust. Besides, in the context of e-learning through live lessons, model making,

origami art, or doing experiments that require simple motor skills can be offered as an alternative. Gifted students can actively participate in the process by doing these activities.

With careful development and well design, most of the disadvantages could be overcome, while without proper and informed instructional design, none of the advantages might be achieved (Cantoni et al., 2004).

As a result of the compulsory transition to distance education during the pandemic process, it has become obligatory for students to stay in front of the computer or tablet screens for a long time. It has been argued that during this period of e-learning, students' being on the net for a long time may cause some health problems. In addition, it is predicted that economically disadvantaged families may experience difficulties in acquiring technological equipment. The disadvantages of e-learning may also be that students may encounter negative situations regarding internet use. There are risks such as the use of unwanted sites and malicious software through the internet that allows unlimited access. In addition, long-term using technological devices it was predicted that there might be negative effects on students' use of handwriting and mother tongue. The important thing will be to be aware of the disadvantages and reduce their negative effects. For this reason, some suggestions have been made to minimize the weaknesses.

#### **THE ROLE OF THE TEACHER IN E-LEARNING**

Gündüz et al. (2011) stated that the mobile learning environments mentioned in the study, which aims to get the instructors' opinions about m-learning environments developed with 3g technology, cannot replace the teacher, but can support the system. Based on this, attention should be drawn to the supportive role of teachers in the process. Teachers have historically been supporting students as guides who help solve complex paths. Undoubtedly, trials without a guide can yield positive results in a long time, but a journey with the support of a useful guide will lead to more than one positive impact in a shorter time. Therefore, although technology offers us advanced opportunities, the use of technology alone will be insufficient in e-learning. Teachers' guidance will be necessary in order to overcome these deficiencies and to provide a more qualified education.

It was emphasized that those responsible for education should apply meticulously in the processes of determining, motivating, observing, monitoring and evaluating gifted students, and ensuring that students' potentials should be increased through information technology (Özmen & Kömürlü, 2011).

In the study conducted by Çalışkan (2017), the problems experienced by teachers during the use of information technologies in teaching activities at BİLSEM were examined. According to the study results, it was observed that teachers who did not receive training in informatics had a deficiency in their basic computer skills, guidance, and visual arts teachers did not encounter any problems, and other teachers faced infrastructure and time problems. When looking at other studies in the literature, it has drawn attention that there are different studies that mention the need for teachers to be competent in technology use. It was pointed out that teachers and students should be trained in order to use computers and the internet for pedagogical purposes, and that computers and the internet should be trained for educational purposes (Aslan, 2006). In case the required technological and pedagogical knowledge is insufficient, a teacher who is unaware of educational purposes will inevitably push students to misuse. In parallel with this,

we can say that a teacher who does not know the gifted students enough will not be able to protect his students against the negative effects of the internet world, which offers unlimited access to all kinds of information.

It has been stated that the weight to be given to e-learning programs to be prepared for gifted people is very important and success may not always be possible as a result of ignoring critical factors such as learning methods, skills, personality and supporting systems (Yamamoto et al., 2010). Regarding this, we cannot think that the programs that will be prepared by individuals who are not competent in the preparation of e-learning programs and who do not have much experience in working with gifted students will bring success with certainty. It can be said that an education in which individual differences are taken into consideration and appropriate planning is made in the proper time will be more helpful in achieving success.

In e-learning, the importance of teachers and their guidance to the process are crucial. In the internet world that offers unlimited access to students, it is required that teachers supervise the process in order to prevent harmful uses and unwanted information. In addition to these, it was stated that teachers who will guide e-learning should be competent in both technology use and pedagogical sense.

#### **RECOMMENDATIONS ON USING E-LEARNING MORE EFFICIENTLY IN THE EDUCATION OF GIFTED STUDENTS**

Students are today more operative and aware of technology capabilities. They are used to interaction and to plug-and-play experiences: they now constitute the digital generation and easily access the whole academic world (different universities are just a click away from one from the other) (Cantoni et al., 2004). Therefore, there is a need for teachers and parents to develop themselves in order to understand the rapidly evolving technology and to guide and direct students. In order to achieve this, awareness studies can be carried out for e-learning through in-service training.

In the study conducted by Özmen and Kömürlü (2011), the relationship between gifted students with information technology was investigated, and some suggestions were made in line with the results obtained based on the literature. To summarize the recommendations; It was mentioned that the people who will work should be made effective and competent with the training on information technologies, and it is important to guide students and motivate students. In addition, emphasizing the importance of values education on the subject, it was pointed out that values should always be kept at the forefront in the process and that students should adopt values in the field of information technologies as well as in all areas of life. Researchers have pointed out that it should not be forgotten that most of the hackers in today's world are gifted.

Based on the information in the aforementioned literature, it should not be forgotten that gifted students can do good work on a platform that offers them unlimited opportunities, such as technology, as well as unintentionally use the knowledge they have learned for malicious purposes. It should be supported to have the necessary moral values and ethical rules to prevent this. Besides, attention should be paid to the need for a control mechanism. Gündüz (2012) emphasized that the audit aims to positively affect the learning of the students who receive education by ensuring that the educational variables work regularly. Considering that this feature, which is spread in general, is also significant on e-learning, which is a specific field, it

can be said that it is necessary to create learning environments with sufficient control to have positive effects on students.

"What Do Gifted Students Expect from the Information Technology Course?" By Öngöz and Aksoy (2015). In the study named, it was concluded that gifted students are most interested in programming and want to improve themselves in programming. In addition, it has been determined that students are interested in game development, animation/cartoon and game preparation, algorithm, 3D modeling, graphic design, and familiarization with current technologies. Based on this, in line with the expectations of gifted students, it can be suggested to give courses that can be offered as e-learning-based special package programs, which are thought to lay the groundwork for a need-oriented process. Also, activities such as game development and graphic preparation, which are expressed as expectations of the students, can be integrated into the system by assigning them as homework at the end of the curriculum courses. For example; After a lesson about endemic plants is taught in the e-learning process, the teacher can give the students homework such as preparing a graphic and reinforcing what they have learned in the lesson. In this way, the student will have the opportunity to learn by doing and living and will make an effort to make learning permanent.

Considering the shortcomings of disadvantaged students in accessing digital tools, it has been reported that these families should be supported in providing digital tools in order to prevent further inequality in education, Çelik (2020). Both parents and teachers should be provided with the necessary knowledge, skills, behavior and competence support to be a guide for the child, and good communication with the student should be ensured (Vatansever Bayraktar, Kadioglu Ates and Afat, 2019). State support may be provided to families whose financial situation is insufficient to purchase technological tools. Infrastructure works can be enriched to provide internet access to villages, towns or areas far from the city center that cannot access the internet. In addition, e-archives can be added to the free library facilities provided by the government. The universities can open all their databases to gifted students to conduct their research. Finally, parents should guide their children in using technology and the internet to access information and cooperate with their teachers.

With this study, in which the limitations, advantages, and disadvantages of distance education lessons and e-learning for gifted students are searched during the pandemic process, the literature was examined, and subheadings were created and discussed. Although it is known that e-learning has some disadvantages, programs and technological tools that can make positive contributions to the learning process were mentioned in order for students to continue to study their lessons most efficiently during the pandemic process. Generally, how gifted students can meet their lifelong learning needs with the use of technology is mentioned. The importance of teachers in the process was emphasized, and it was stated that the student was at the center, and the teacher was the guide in the learning process. In the e-learning process, which is an alternative solution proposal to enable gifted students to access information within the scope of ethical values, families and teachers should act in unity.

## KAYNAKLAR

- Alsoud, A.R. and Harasis, A.A. (2021). *The Impact of COVID-19 Pandemic on Student's E-Learning Experience in Jordan. J. Theor. Appl. Electron. Commer. Res.* 2021, 16, 1404–1414.
- Aslan, Ö. (2006). Öğrenmenin Yeni Yolu: E-Öğrenme. *Fırat Üniversitesi Sosyal Bilimler Dergisi*, 16(2), 129.
- Arkorful, V. and Abaidoo, N., (2014). The role of e-learning, the advantages and disadvantages of its adoption in Higher Education. *International Journal of Education and Research*, 2, 12.
- Cantoni, V., vd. (2004), “Perspectives and Challenges in e-Learning: Towards Natural Interaction Paradigms”, *Journal of Visual Languages and Computing*, 15:333-345. Doi number: 10.1016/j.jvlc.2003.10.002.
- Çırık, M. (2016). Uzaktan eğitimin üstün zekâlı öğrencilerin eğitimindeki yeri. *AUAd*, 2(3), 170-187.
- Çalışkan, E. (2017). Özel Yetenekli Öğrencilerin Eğitiminde Bilişim Teknolojilerinin Kullanımına Yönelik Öğretmen Görüşlerinin İncelenmesi. *Gazi Üniversitesi Gazi Eğitim Fakültesi Dergisi*. 37(3): 811 – 833.
- Çelik, Z. (2020, Ağustos). Covid-19 salgınının gölgesinde eğitim: Riskler ve öneriler. (Odak Analiz No. 5). Eğitim-Bir-Sen Stratejik Araştırmalar Merkezi.
- Gagné, F. (2004). Transforming gifts into talents: The DMGT as a developmental theory. *High ability studies*, 15(2), 119-147.
- Gündüz, Ş., Aydemir, O., Işıklar, Ş. (2011). 3G Teknolojisi İle Geliştirilmiş M-Öğrenme Ortamları Hakkında Öğretim Elemanlarının Görüşleri. *Selçuk Üniversitesi Ahmet Keleşoğlu Eğitim Fakültesi Dergisi*, Konya.Sayı:31,s.101-113.
- Gündüz, Y. (2012). Eğitim Örgütlerinde Denetimin Gerekliliği: Kuramsal Bir Çalışma. *Dumlupınar Üniversitesi Sosyal Bilimler Dergisi – Sayı 34*.
- Hakala et al. (2012). Musculoskeletal symptoms and computer use among Finnish adolescents-pain intensity and inconvenience to everyday life: a cross-sectional study. *BMC Musculoskeletal Disorders*. 13:41. Doi:10.1186/1471-2474-13-41.
- Kurnaz, E. & Serçemeli, M. (2020). Covid-19 Pandemi Döneminde Akademisyenlerin Uzaktan Eğitim ve Muhasebe Eğitimine Yönelik Bakış Açılımları Üzerine Bir Araştırma. *USBAD Uluslararası Sosyal Bilimler Akademi Dergisi*, 2(3), 262-288.
- Levent, F. (2011). Üstün Yetenekli Çocukların Hakları El Kitabı Anne Baba ve Öğretmenler İçin. İstanbul: Çocuk Vakfı Yayınları. ISBN: 978-975-552-075-9.
- Mahyoob, M. (2020). Challenges of e-Learning during the COVID-19 Pandemic Experienced by EFL Learners. *Arab World English Journal*, 11 (4) 351-362.
- Marland, S. P., Jr. (1972). Education of the gifted and talented. Report to the Congress of the United States by the U.S. Commissioner of Education. Washington, DC: U.S. Government Printing Office, 1972.

- Miranda, L. C., Araújo, A.M. and Almeida, L. S. (2013). Identification of gifted students by teachers: reliability and validity of the cognitive abilities and learning scale. *Revista de Investigación y Divulgación en Psicología y Logopedia* (2013) 3 (2): 14-18 · ISSN 2174-7571
- MEB (2013). Üstün yetenekli bireyler strateji ve uygulama planı 2013-2017. [http://orgm.meb.gov.tr/meb\\_iys\\_dosyalar/2013\\_10/25043741\\_zelyeteneklibireylerstratejiveuygulamaplan20132017.pdf](http://orgm.meb.gov.tr/meb_iys_dosyalar/2013_10/25043741_zelyeteneklibireylerstratejiveuygulamaplan20132017.pdf) adresinden 08.11.2020 tarihinde erişilmiştir.
- Mustafaoğlu, R., Zirek, E., Yasacı, Z. & Razak Özdiñler, A. (2018). Dijital teknoloji kullanımının çocukların gelişimi ve sağlığı üzerine olumsuz etkileri. *Addicta: The Turkish Journal on Addiction*, 5, 227–247. <http://dx.doi.org/10.15805/addicta.2018.5.2.0051>
- Özbay, Y. (2013). Üstün yetenekli çocuklar ve aileleri. Aile ve Sosyal Politikalar Bakanlığı. 12.11.2020 tarihinde [https://www.ailevecalisma.gov.tr/media/4773/01\\_05\\_uestuen-yetenekli-%C3%A7ocuklar-kitab%C4%B1.pdf](https://www.ailevecalisma.gov.tr/media/4773/01_05_uestuen-yetenekli-%C3%A7ocuklar-kitab%C4%B1.pdf) sitesinden erişim sağlanmıştır.
- Öngöz, S. ve Aksoy, D. A. (2015). Üstün Yetenekli Öğrenciler Bilişim Teknolojileri Dersinden Ne Bekliyorlar? *Journal of Education & Special Education Technology* Vol 1 No 1 (2015), 34-47.
- Özkan, U. B. (2021). *Eğitim bilimleri araştırmaları için doküman inceleme yöntemi*. 4. Baskı. Ankara: Pegem Akademi. 2.
- Özmen ve Kömürlü (2011). Üstün Zekâlı Ve Yetenekli Öğrencilerin Bilişim Teknolojisiyle İlişkisi.
- 5 th International Computer & Instructional Technologies Symposium, 22-24 September 2011, Fırat University, ELAZIĞ- TURKEY.
- Renzulli J. S. (1978). *What makes giftedness?* Phi Delta Kapan. 60,3, 182.
- Tosun, N. ve Özgür, H. (2009). E-Öğrenme Ortamlarında Öğrenci-İçerik Etkileşimi. 3th ICITS – October 07-09 2009 Trabzon, TURKEY ISBN: 978-975-6983-63-8
- Shavinina, L. V. (2009). High intellectual and creative educational multimedia technologies for the gifted. In L. V. Shavinina (Eds.) *International handbook on giftedness* (pp. 1181-1182). Dordrecht: Springer.
- Siegle, D. (2017) The Dark Side of Using Technology. *Gifted Child Today*, 40 (4), pp. 232–235.
- Simin, N., Sa'ari, C. Z., Muhsin, S. B. S., Joli, N. S., & Abidin, M. H. Z. (2020). Depression anxiety stress among gifted and talented students in Malaysia during the Movement Control Order (MCO). *Journal of Critical Reviews*, 7(11). <https://doi.org/10.31838/jcr.07.11.132>
- Vatansever Bayraktar, H., Kadioglu Ates, H. and Afat, N. (2019). An Analysis on the Relationship between Primary School Teachers' Self-Efficacy Beliefs and Attitudes towards Gifted Education. *International Journal of Eurasia Social Sciences* Vol: 10, Issue: 38, pp. (1099-1124).

- Yamamoto, G.T., Demiray, U. ve Kesim, M. (Ed). (2010). Türkiye’de E-Öğrenme: Gelişmeler Ve Uygulamalar. Ankara. <http://todje.anadolu.edu.tr/todje41/news/kitap-1.pdf> adresinden 08.11.2020 tarihinde erişilmiştir. ISBN 978-605-88891-2-5
- Yıldız, ve Vural, (2020). Covid-19 Pandemisi ve Derinleşen Eğitim Eşitsizlikleri. Türk Tabipleri Birliği. Covid-19 Pandemisi Altıncı Ay Değerlendirme Raporu. Erişim adresi: [https://www.ttb.org.tr/kutuphane/covid19-rapor\\_6/covid19-rapor\\_6\\_Part64.pdf](https://www.ttb.org.tr/kutuphane/covid19-rapor_6/covid19-rapor_6_Part64.pdf). Erişim Tarihi 11.10.2020
- Wallace, P. (2009). Distance Learning for Gifted Students: Outcomes for Elementary, Middle, and High School Aged Students. *Journal for the Education of the Gifted*. Vol. 32, No. 3, 2009, pp. 295–320