

# The reality of E-counseling services in the light of Digital learning from the point of View of Teachers in Jordan

Abdallah Mahmoud Abdallah Altarawneh<sup>1</sup> · Reem Abdelkareem Awwad Alomoush<sup>2</sup>

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#### Abstract

This study aims to investigate the reality of e-counseling services in the light of digital learning from the perspective of teachers in Jordan. The sample of the study consisted of (348) male and female teachers at Rusaifa Education Directorate in 2021. The scale of the counseling services for this study was created by the researchers, where the validity and reliability of the scale were approved, and the appropriate statistical procedures were used. The study reached some statistical results regarding e-counseling services in the light of digital learning from the perspective of teachers in Jordan. Results revealed that the arithmetic averages of the reality of e-counseling services have an intermediate degree at the overall level, and each dimension has an intermediate degree, too. The prevention dimension took the first place, followed by the social dimension, the moral dimension, the professional dimension, the educational dimension, and lastly, the technical differences at the level of significance ( $\alpha \le 0.05$ ) at the overall level. The level of each dimension of the scale is attributed to the variables of gender and one's years of experience.

Keywords E-counseling services  $\cdot$  Digital learning  $\cdot$  Teachers  $\cdot$  Government Schools

<sup>2</sup> Department of Curriculum and Instruction, Scientific researcher and Part-time Lecturer in Curriculum and Instruction at some Jordanian Universities, faculty of Education, Amman,

Reem Abdelkareem Awwad Alomoush dr.reemrose@yahoo.com
Abdallah Mahmoud Abdallah Altarawneh tarawneh abdullah@yahoo.com

<sup>&</sup>lt;sup>1</sup> Department of Psychological and Educational Counseling, Previous Assistant Professor in world University of Islamic Sciences, faculty of Education, Amman, Jordan

#### 1 Introduction

Teaching nowadays is witnessing a notable shift as using digital learning has been obviously crucial because of the Corona pandemic. This shift occurred as a result of the major conversion of information and communication technology in the educational system (McFarlane, 2019); consequently, digitization has emerged in schools to bridge the gap between face-to-face education and online learning. This, too, provides students with the needed skills and technical expertise, so they can enhance and continue education effectively. Furthermore, using modern technological tools and digital resources helps students to creatively deal with their issues and problems (König et al., 2020). The Corona pandemic is considered a sudden global challenge in the era we live in, as it affects the lives of people and the extent to which they practice various professional activities (Martin, 2018). Therefore, this exceptional situation has contributed to the necessity of making many digital revolution, and they became extremely significant in the last few years. In other words, they greatly affect the social, psychological, and vocational aspects of people's lives (Dores et al., 2020).

The Corona pandemic has obviously affected people's lives all over the world. For example, it led to raising various concerns regarding isolation and restrictions, such as communication obstacles and the radical change in the psychological, emotional, and social environment (Savarese et al., 2020). This has negatively affected children and adolescent students along with their families and therefore contributed to weakening external social support, such as the support of the students' families. This also led to raising the fear of increasing mental health problems for children and adolescents (Fegert et al., 2020).

Regarding the rapid changes and the environment in which we live, innovation forms an urgent need for psychological counseling. Counselors must keep pace with the digital age, work hard, and be committed to success. This contributes to improving students' academic achievements, helping them understand themselves and enhancing their abilities and tendencies, as well as adopting a positive school environment (Dimmitt et al., 2009). Due to the advancement of digital technology and its implications, Crandall et al., (2020) state that counselors are required to use digital tools because such tools help them complete daily tasks and provide various services. In addition, Bain & Swan (2011) state that some of these changes are considered challenges for enhancing technical competence, having positive training, accessing orders, and improving clarity and reliability. In particular, changes are considered a major challenge because digital learning used in the educational counseling profession is accelerating significantly, regardless of anything else.

Concerning counseling services, Anni (2018) argues that information and communication technology has many expected applications, such as electronic discussion forums and having access to the counselees' files and data. Furthermore, there are applications for individual and group counseling that provide special sessions for counselees and retain their information for consideration. Beidoglu et al., (2015) indicated that digital technologies, such as multimedia, websites, among others, are important for improving educational counseling services. Brown (2018) demonstrate that the epidemiological situation, i.e., Covid-19, formed a new situation that requires special dealing techniques that would be used by teachers and counselors. Accordingly, teachers should be trained in schools to systematically deal with this crisis. School counselors will be prepared to use approved counseling programs, use modern theories and techniques, and develop diagnoses, interventions, and group counseling. Consequently, the developmental, academic, social, and emotional needs of students will be fulfilled. All of the beforementioned aspects help in achieving the meant positive change (Pincus et al., 2020).

#### 2 Literature review

#### 2.1 Digital Learning in Counseling

The history of e-counseling began in the early 1970s. The first online consultation occurred between computers at Stanford University and California, and it was presented at the International Conference on Computer Communication (Obi et al., 2012). However, the most prominent goal of technology in providing the counseling is not intended to replace the traditional face-to-face counseling method, but the goal is integrating information and communication technology into the traditional extension of the diversity in the methods of providing counseling and alleviating some of the problems resulting from traditional counseling (Kolog et al., 2014).

There have been many developments in the field of online counseling and psychotherapy through the Internet. Due to the way in which the Internet has developed since the 1990s, most of the online counseling and therapeutic developments have occurred after this period. For example, the first paid therapy session was recorded in 1995 (Anthony, 2003), and since then, a large number of research papers has been conducted taking into consideration the ones who are seeking support through such means (e.g., Hanley et al., 2017; King et al., 2006), in addition to how therapists and counselors experience such services and evaluate their quality. Special editions of Counseling and Psychotherapy Research journals have been considered necessary to compile papers on this specialized practice in the past. Examples of these journals are British Journals, British Journal of Guidance and Counseling, and Psychotherapy and Counseling Research, and they have produced special editions regarding this topic. Now, there are journal editions that have appeared in the field of cyberpsychology and digital mental health. These journals provide good a space to compare such research (Hanley, 2021).

E-counseling was recognized by professional organizations in response to the expanding use of technology in counseling. The ethical codes were written by the American Psychological Association (APA, 1997), the American Counseling Association (ACA) Committee on Electronic Technology, the American Medical Informatics Association, and the Association of Mental Health Counselors (Centore, 2006.; Centore & Milacci 2008).

During the Corona pandemic, digital learning technology has played an important role in providing psychological and educational counseling services. Education and counseling, using this technology, represent the best option for students to continue their educational life and acquire the ability to collaboratively improve efficient communications (Rahiem, 2020). Digital information technology helps in improving the relations with students who have grown up in a digital environment. Further, it helps students who tend to use electronic communications as a method of learning using digital multimedia means (Abdillah et al., 2020). The results of the study conducted by Dores et al., (2020) revealed that the use of digital information technology is a positive experience as it meets the commitment of counselees and achieves positive results. In addition, counselors with the largest number of functional experience years have maintained their services the most. The ones who have a medium experience showed the most favorable attitudes toward using web-based technologies and interventions.

Fonseca & Osma (2021) stated that providing counseling and mental health services through digital technology is considered a complement to the face-to-face provided services. According to Savitri and Taufiq (2020), they indicated that the level of proficiency in using digital technology for school counselors was medium, where the processing of words is considered the most proficient and positive aspect of efficiency. On the other hand, the least proficient aspect was site development. Additionally, the variables of gender and the period of providing services using technological abilities had major effects. For example, male counselors had higher levels of mastery than female counselors. Moreover, the period of providing services was related to the individual's age. That is, when one has longer experience years, his/her level of technical ability and mastery becomes lower.

Eremie (2014) and Egenti (2018) indicated that teachers' perceptions confirmed that counselors positively afford educational and emotional services. Here, there were no significant differences between male and female teachers based on the variable of years of experience and gender. According to Wilson, Rodda Lubman, Manning, and Yap (2017), using digital communications and information is an urgent necessity as it plays a major role in psychological counseling and the qualitative services it offers. Counselors also face challenges in the digital age such as providing appropriate services for the new generation which is characterized for having a great knowledge regarding the means of communication and advanced technologies. Further, this generation has distinguished values, behaviors, and mentality. All of these changes are caused by the development of the Internet and its various services, smartphones, various media means, and the nature of society (Gading, 2020).

There are many advantages of using modern digital technology in counseling. For example, using digital technology in counseling makes it more accessible, flexible, comfortable, adaptable, and compatible. It also helps in developing the relationship between the counselor and the counselee. In other words, it helps in committing and monitoring the progress of counseling, does not reveal the identity of the counselee, and does not cost much, among other advantages (Feijt et al., 2018). E-counseling also helps counselees who are incapable of leaving the house due to having illnesses or family circumstances. Besides, it helps counselees who suffer from anxiety and phobias. E-counseling allows the contribution of parents who are away from their homes such as those who travel frequently and provides counseling at any time (Poh Li et al., 2013). The results of the study conducted by Oraegbunam (2009) indicate

that counselors' perceptions of using digital technology can be effectively applied in psychological and educational counseling services provided at schools.

On the contrary, there are some major difficulties in using modern digital technology which are characterized by ethical issues and concerns. Examples of such difficulties are security, privacy, confidentiality, the absence of moral guidance, as well as the counselors' insufficient knowledge of modern technologies. In addition, some counselees are unable to access technology or face some technical problems that hinder its use (Situmorang, 2020.; Dores et al., 2020). The results revealed in Zamani et al., (2010) and Flores (2012) indicate that counselors are uncomfortable with using technology in the educational counseling process. On the contrary, Gading's study (2020) confirmed that counselors are satisfied with the use of digital technology in counseling services. Digital technology is appropriate and useful for the current digital age, but at the same time, it should be noted that the weaknesses found in direct communications between the counselee and the counselor led to causing many problems such as lacking the sense of familiarity and mutual trust and having weak progress in the counseling process. In addition, lacking non-verbal visual communication, facial expressions, and voice tones makes the communication weaker (Poh Li et al., 2013).

Moreover, using digital information and communication technology is important for educational counseling services provided at schools. It can improve the efficiency and management of work requirements idiosyncratically. Digital information technology also reduces costs, provides direct access to individuals, and increases the processes of collaboration, communication, and coordination. The use of digital information also helps in improving communication and working relations with students who have grown up in a digital environment, and it helps students who wish to use electronic communication as a methodology of learning using digital equipment (Abdillah et al., 2020). The results of Emmanuel's (2020) study indicated that teachers' perceptions of e-counseling created a positive self-image and contributed to improving their academic performance, time management skills, and providing appropriate services for students. Košir et al., (2020) stated that teachers reported positive results and attitudes regarding self-efficacy in using digital technology and distance learning.

#### 2.2 Digital Counseling Services

Students need counseling services while they use digital technology during Covid-19. Collaboration through the Internet and modern technological readiness can positively affect students' success and progress. Students in elementary schools, middle schools, and colleges face many difficulties and issues such as mental health problems, nonsensical information, educational problems, and problems related to interviews and confrontation strategies. Facing such difficulties highlights the urgent need for counseling services to emerge (Supriyanto et al., 2020).

School counselors provide remote/online guidance and counseling to students as well as remote psychological assistance services to parents and teachers. Such services have emerged after schools and other educational institutions were closed due to the Covid-19 pandemic. These consultations are usually related to cyberbullying, self-wellbeing, and their activities. These consultations also include ways to achieve stress prevention and ideas to spend time at home. Therefore, it seems that e-counseling is a new phenomenon in the field of counseling, especially at the present time. It is a modern methodology of communication between the counselor and the counselee that takes place in online sessions during a specified period. Such consultations should take place once a week at least. Thus, the counselees can get help in discovering themselves and getting some benefits from their choices regarding their educational and professional needs (Oboh Stephen, 2020; Irwan et al., 2020).

Educational counselors provide psychological counseling services through new innovative strategies to support the counseling services, and e-counseling is considered one of these modern strategies. This indicates a guided professional practice that occurs between a counselor and a counselee when they are parted. Thus, they use electronic technologies to make positive online communications (Petrus & Sudibyo, 2017; Irwan et al., 2020). According to Aini & Mudjiran (2020), e-counseling is defined as one of the skills that implement virtual counseling services or counseling through the Internet. At the same time, the used device in e-counseling needs to be considered as the main limitation is the Internet connection, and the interaction can take place through a website, email, Facebook, video conference, Yahoo messenger, or other forms. Bada (2013) defines e-counseling as a guiding process that takes place through the means of communication technology, such as telephones, the Internet, and teleconferencing. Digital counseling is an effective tool to benefit students in comprehensive self-management and development. Prasetiawan (2016) defines e-mentoring as guiding practices that take place between counselees and counselors through using electronic media to communicate via the Internet.

The abovementioned definitions indicate that online counseling can take many forms, such as Internet-based counseling interventions, online mental health counseling screening and assessment tools, online support groups, individual therapy, group therapy, and self-help programs (Ybarra & Eaton, 2005). Other forms are online forums, bulletin boards, and chat rooms (Fenichel et al., 2002). Individual therapy sessions that are conducted via the Internet can include asynchronous methodologies, such as email and synchronous methodologies, such as web messaging (instant messaging), chat, video, or audio conferences (Kanani & Regehr, 2003).

Jackson-Cherry & Erford (2018) mentioned different styles that are adopted by counselors using their experience in crisis management to create a safe learning environment. Thus, counselors collaborate with teachers, parents, and the entire community to design prevention programs in order to deal with crises. In this case, counselors do not provide long counseling programs. Teachers apply different counseling programs in a school environment to provide counseling for the directly affected students. Group counseling helps the ones who have been exposed to these crises. Pincus et al., (2020) noted that school counselors are trained to practice different forms of counseling. An example is a solution-centered therapy which provides a basis to find a safe environment for students. Another example is narration therapy which helps to vent students' feelings in a safe environment, and family systems that help students who suffer when dealing with Coronavirus issues.

Ifdil et al., (2020) stated that counselors also contribute to working in order to improve the psychological state of parents, teachers, and students. This is accom-

plished by reducing high levels of anxiety, tension, stress, and other similar psychological conditions. Furthermore, this is achieved by providing counseling services over the Internet, in addition to distributing prevention flyers, websites, educational clips on YouTube, short educational films, online conversations via WhatsApp groups, and other means of communication. Fairburn & Patel (2017) stated that there are different digital therapies and interventions. These therapies are acceptance and commitment therapy, behavioral activation, mindfulness, and problem-solving techniques, and interventions include self-help programs, video and audio files, and visual images.

The role of the educational counselor appears through helping the counselees to know themselves and their abilities. This is achieved by understanding their points of strength in terms of studying professional and social aspects, which in turn helps in developing their values, healthy habits, and positive attitudes (Aluede & Adubale, 2020). Teachers and school principals assume that the roles of educational counselors appear through their interaction with the counselors. In addition, teachers have an important role in students' understanding of counseling services. Teachers' perspectives of the counselor's responsibilities through their referral roles and consultation with counselors might affect the success and progress of students. Forming teachers' perceptions of counselors begins early through pre-service training programs (Joy et al., 2011; Nyan, 2014) has indicated that there is a moderate and positive relationship between the teacher's perception, resource availability, talent availability, and counseling services in secondary schools. Anni (2018) noted that school counselors, who found that digital technology is easily used, were more likely to perceive that it is positive and beneficial. This benefit paves the way to use digital technology in positive situations.

Schools are currently encountering some problems regarding students who face obstacles as a result of closures. Students face behavioral, social, and professional problems, as well as some different disorders such as anxiety, lack of sleep, and depression. All the above-mentioned factors can negatively affect students' psychological health and academic achievement and cause poor psychological adjustment. This has obliged schools to pay attention to providing e-counseling services for students in an appropriate and useful manner. Talmus (2019) argued that students suffer from loneliness along with some symptoms of depression and having some manifestations of isolation. Rasberry et al., (2020) stated that schools and the counseling services they provide are safe areas for students who are exposed to such problems and disorders. Moreover, counselors are the people who are qualified to work with students and help them to improve their mental health.

#### 3 Problem of the study and questions

Based on the above, it has become necessary to harmonize counseling and educational needs with digital technology as an alternative to traditional counseling. The focus put on innovation in light of the recent rapid changes creates a challenge for counselors in this digital age. This requires hard work and a strong commitment to developing innovation that leads to improving schoolwork. This also can be achieved through improving academic achievement, assisting students to overcome various difficulties to reach positive results, and creating a positive school environment. It is preferable that e-counseling services include ethical aspects that reflect the professionalism of the educational counselor as well as other educational aspects that will focus on and build a distinguished academic school culture. In addition, teachers should be aware of the guiding role that is played by the school counselor in providing his/her services in light of digital learning, and this has become a pressing necessity for all who work in the educational field. Therefore, this study aims to examine the reality of e-counseling services in light of digital learning from the teachers' point of view in Jordan.

## 3.1 Research questions

**RQ1**: What is the reality of e-counseling services in light of digital learning from the point of view of teachers in Jordan?

**RQ2**: Do the degrees of teachers' responses regarding the reality of e-counseling services differ according to gender and their years of experience at the significance level ( $\alpha$ =0.05)?

# 4 Method

## 4.1 Sample

The study community consisted of all teachers working in government schools in Rusaifa, Jordan in the academic year of 2021. Based on the statistics issued by the Ministry of Education, the number of students is (2917). A simple random sample made up of (348) male and female teachers was selected during the academic year of 2021. Thus, the sample constituted (12%) of the study population. The questionnaires were distributed online to the participants. After receiving the responses, the researchers found that the number of the completed answers which are subject to statistical analysis is (339). The retrieved and analyzed questionnaires constituted (97%) of the

fales 1	.06	31.3
		51.5
emales 2	233	68.7
overall 3	39	100.0
ess than 5 years	68	20.1
rom 5–10 1	.47	43.4
fore than 10 1	24	36.6
Overall 3	39	100.0
v rc 1c	rerall 3 ss than 5 years om 5–10 1 ore than 10 1 yerall 3	'erall     339       ss than 5 years     68       om 5–10     147       ore than 10     124       yerall     339

distributed questionnaires to the participants of the study sample. Table 1 shows the distribution of the participants of the study sample according to its variables.

## 4.2 Data Collection Tool

This study aims to investigate the reality of e-counselling services in the light of digital learning from the point of view of teachers in Jordanian public schools. The researchers built the study tool by referring to the theoretical literature and previous related studies conducted on the same subject. The tool in its final form included (67) elements divided into six areas, namely: professional, technical, social, ethical, preventive, and educational. The study tool was designed according to the five options: Fully Agree: 5, Agree: 4, Neutral: 3, Disagree: 2, Totally disagree: 1.

# 5 Measurement instruments

The following indicators were used to detect the validity of the study tool. They are arranged as follows:

## 5.1 Virtual validity

The tool was presented in its initial form to a group of arbitrators from professors working in Jordanian universities. They are specialized and they have experience in the field of psychological and educational counselling measurement. The professors were asked to express their opinions in terms of the extent to which each element belongs to the field that falls under it. Such fields are language, clarity of elements, adding, modifying, or deleting. The researchers depend on the represented standard by an agreement of (80%) or above to keep the element without changes, and if it had a less percentage, it would be deleted or modified. The arbitrators' proposals and the required amendments have been taken into account. The questionnaire included (67) elements that are distributed over six areas in its final form. The researchers believe that the inclusion of such modifications is a piece of evidence to prove the validity of the study tools. It also increases the level of reliability of the results.

## 5.2 Internal consistency

The homogeneity of the study tool was verified internally by using the internal consistency method. The Pearson correlation coefficient was found between each item of the scale, and the total score of the scale where the correlation coefficients were located was between (0.58–0.76). The correlation coefficient of the element was found with the dimension it falls under, and the correlation coefficients were located between (0.62–0.81). All correlation coefficients were statistically significant at the level of significance ( $\alpha \le 0.05$ ), and this indicates the sincerity of the internal consistency of the study tool and increases the reliability of its product.

## 5.3 Confirmatory factor analysis

The procedures for estimating the factorial validity of the scale were performed. Before using the factor analysis, the researchers were keen to assess the appropriateness of the data in terms of the size of the sample. The strength of the correlation between the items of the scale was also verified by examining the correlation matrix. Thus, correlation coefficients that exceed the value of (0.30) were found. It also confirmed the value of the (KMO: Kaiser-Meyer-Olkin) coefficient, which amounted to (0.919). It is higher than (0.60), and this indicates the appropriateness of the strength of the correlation between the items of the scale to perform the factor analysis. Accordingly, a Confirmatory Factor Analysis was used for the answers of the study sample members using the Component Method. Then, orthogonal rotation of the axes by the (Varimax) method for all the expressions constituting the scale in order to provide a better degree of interpretation of the factorial construction extracted before the rotation. The analysis was determined in six factors to reveal whether the sub-scale statements were saturated around those factors. The (Eigen value) was used according to the Kaiser criterion. Consequently, the value of the latent root of the factor exceeds integer one, after adopting (0.30) as a minimum level of significance for the expression's saturation with the factor according to the Guilford criterion. All the elements of the scale reached the significance of factor saturation according to Guilford's criterion of 0.30 and above. By following the numbers of phrases that have reached the acceptable limit of saturation, it appears that the elements from (36-45) have saturated with the first factor. When reviewing these elements, we find that they are related to the ethical dimension. Elements from (12-23)are saturated with the second work, and when they were reviewed, it was found that they are related to the technical dimension. Elements from (1-11) are saturated with the third factor, and when they were reviewed, it was found that they are related to the professional dimension. Elements from (24-35) are saturated with the fourth factor, and when they were reviewed, it was found that they are related to the social dimension. Moreover, the elements from (55-67) are saturated with the fifth factor, and when they were reviewed, it was found that they are related to the educational dimension. Elements from (46-54) are saturated with the sixth factor, and when they were reviewed, it was found that they are related to the preventive dimension. This confirms the validity of the factorial construction of the scale. Table 2 illustrates the

Table 2	The values of the la-
tent root	ts and the percentages
of the va	ariance that explain the
factors e	extracted after approxi-
mating t	he axes orthogonally

Factor	Latent root	The explaining percentages of the variance	The explain- ing percentage of the cumula- tive variance
First	19.794	17.614	17.614
Second	17.562	13.972	31.586
Third	8.097	7.012	38.598
Fourth	7.028	6.226	44.824
Fifth	6.546	5.872	50.696
Sixth	3.134	2.692	53.388

values of the latent roots and the percentages of the variance that explain the factors extracted after approximating the axes orthogonally.

As shown in Table 2, the six factors that were extracted exceed the values of their latent roots over integer one. It explains a total of (53.388) of the total variance in the received responses of the study sample. This indicates that the scale statements are saturated on six factors that represent the six dimensions of the scale. This can be considered as an indication of the validity of the scale.

#### 5.3.1 Stability of the study instrument:

In order to verify the stability of the tool, Cronbach's Alpha coefficient of internal consistency was extracted at the level of each dimension as well as at the overall level of the tool. Table 3 below shows the results.

The results presented in Table 3 illustrate that the stability coefficients of the tool dimensions ranged between (0.84-0.91) and (0.92) for the entire tool. Such values are acceptable for the purposes of the current study.

# 6 Procedures of the study

After verifying the validity of the study tool, having it in its last version, and adopting it for the purposes of applying this study, the researchers performed the following procedures:

- Official approvals were obtained from the concerned and competent authorities to facilitate the researcher's task during the field application of the study.
- The study tool was designed online, and a link was sent to the participants of the study sample. The researcher provided an introduction to the tool in order to introduce participants to the study, so they can answer the questions that form the study tool objectively.
- Information was collected and then entered into the Statistical Package for Social Sciences (SPSS) as a prelude to analyzing it and extracting the results of the study.
- Levels were extracted based on the following criterion: (low): less than 2.33, (medium): greater or equal to 2.33, less or equal to 3.66, (high): is greater than

Table 3 Stability coefficients	Dimension	Cronbach's Alpha factor
of the study instrument	Dimension Professional Technical Social Moral Preventive Educational Total	0.84
	Technical	0.87
	Social	0.93
	Moral	0.88
	Preventive	0.89
	Educational	0.91
	Total	0.92

3.66. This order helps in understanding the statistical implications of the reality of e-counseling services in light of digital learning, from the point of view of teachers in public schools.

## 6.1 Data Analysis

"What is the reality of e-counselling services in the light of digital learning from the point of view of teachers in Jordan?

To answer this question, the arithmetic means and standard deviations of the reality of e-counselling services in the light of digital learning were calculated from the teachers' point of view in Jordan. This is based on the level of each dimension of study (professional, technical, social, ethical, preventive, educational) and all dimension altogether. Table 4 below shows the results.

To answer the study questions, statistical treatments were carried out using the Statistical Package for Social Sciences (SPSS) as follows:

- To answer the first question, the arithmetic means and standard deviations were extracted.
- To answer the second question, the Tow -Way Anova test was conducted.
- To check the validity of the internal consistency, the Pearson correlation coefficient was used.
- To verify the factor validity of the scale, Confirmatory Factor Analysis was used through the Component Method then an orthogonal approximation of the axes was calculated using the Varimax method.
- To verify the reliability of the study instrument, Cronbach's alpha and coefficients were used.
- To describe the characteristics of the study sample, frequencies and percentages will be extracted.

# 7 Results

This section presents the findings of the current research in light of the posed questions. The questions aimed to reveal the reality of extension services in light of digital learning from the point of view of teachers working in public schools. It also includes a discussion of the results and their interpretation in light of the research literature. Details are presented as follows:

First: Presentation of the search results:

Results of the first question which is "What is the reality of e-counselling services in the light of digital learning from the point of view of teachers in Jordan?"

To answer this question, the arithmetic means and standard deviations of the reality of e-counselling services in light of digital learning were calculated from the teachers' point of view in Jordan. They were calculated at the level of each dimension

Table 4   Arithmetic means and standard deviations of the reality of e-counselling services in the light of digital learning, ranked in a descending order	Rank	Dimension	Arithmetic average	Standard deviations	Level
	1	Preventive	3.23	1.07	Intermediate
	2	Social	3.22	1.06	Intermediate
	3	Moral	3.20	1.01	Intermediate
	4	Professional	3.19	0.92	Intermediate
	5	Educational	3.18	1.08	Intermediate
	6	Technical	3.15	0.99	Intermediate
	-	Total	3.20	1.05	Intermediate

of the study (professional, technical, social, ethical, preventive, educational) as well as all dimensions altogether. Table 4 shows the results.

Table 5 The results of the binary variance analysis to reveal the differences in the reality of e-counselling services in light of digital learning from the point of view of teachers in Jordan according to the variables of gender and years of experience

Dimension	Source of variance	Sum of squares	Degrees of freedom	Root mean square	Value (P)	Signif- icance level
Professional	Gender	0.028	1	0.028	0.026	0.872
	Experience	5.534	2	2.767	2.527	0.081
	The error	366.823	335	1.095		
	Total	3903.463	339			
Technical	Gender	0.0860	1	0.0860	0.0770	0.7820
	Experience	6.130	2	3.065	2.734	0.0660
	The error	375.600	335	1.121		
	Total	3814.910	339			
Social	Gender	0.0770	1	0.0770	0.068	0.7950
	Experience	3.209	2	1.604	1.404	0.247
	The error	382.779	335	1.143		
	Total	3920.243	339			
Moral	Gender	0.101	1	0.1010	0.0880	0.7670
	Experience	2.973	2	1.486	1.303	0.2730
	The error	382.233	335	1.141		
	Total	3941.560	339			
Preventive	Gender	0.0010	1	0.0010	0.0010	0.9750
	Experience	4.518	2	2.259	1.971	0.1410
	The error	384.014	335	1.146		
	Total	3932.778	339			
Educational	Gender	0.0430	1	0.0430	0.0370	0.8480
	Experience	5.895	2	2.948	2.523	0.0820
	The error	391.406	335	1.168		
	Total	3905.266	339			
Total	Gender	0.0010	1	0.0010	0.0010	0.9790
	Experience	4.664	2	2.332	2.127	0.1210
	The error	367.353	335	1.097		
	Total	3887.002	339			

As shown in Table 4, the arithmetic averages of the reality of e-counselling services in light of digital learning from the point of view of teachers in Jordan and the overall level has an intermediate degree with an arithmetic mean (3.20) and a standard deviation (1.05). As for all dimensions, they all have an intermediate degree. The "preventive" dimension took the first place with a mean of (3.23). The "social" dimension ranked the second with a mean of (3.22). The "ethical" dimension ranked the third with a mean of (3.20). The "professional" dimension came in fourth place with a mean of (3.19). The "educational" dimension came in the fifth rank with an arithmetic average of (3.18). Finally, the "technical" dimension came in the sixth and last place.

The results of the second question which is "Are there statistically significant differences at the significance level ( $\alpha \le 0.05$ ) in the reality of e-counselling services in light of digital learning from the point of view of teachers in Jordan, according to the variables of gender and years of experience?"

To answer this question, the Tow -Way Anova analysis was conducted to show the differences in the reality of e-counselling services in light of digital learning from the point of view of teachers in Jordan. This is based on the variables of gender and years of experience. Table 5 below illustrates this clearly.

The data contained in Table 5 indicates that there are no statistically significant differences at the level of significance ( $\alpha \le 0.05$ ) in the reality of e-counselling services in light of digital learning from the point of view of teachers in Jordan at the overall level. The level of each dimension of the scale is attributed to the variable of gender and the variable of years of experience.

#### 8 Discussion

This study aims to identify the reality of e-counselling services in light of digital learning from the point of view of teachers in Jordan. The results of the first question indicate that the arithmetic averages have a medium degree at the overall level. The results can be attributed to the teachers' insufficient knowledge of what the counsellor offers to students because there is completely confidential of the counsellor's work, and the counsellor might lack mastery of the skills needed to use technological means of communication and to deal with the difficulties that accompany this technology. Furthermore, there is a weak positive interaction of the counselees during digital learning since there is a difference between e-counselling and face-to-face counselling. It is worth mentioning that e-counselling is new to counsellors and counselees in Jordan. It was mentioned by Oboh Stephen (2020) and Irwan et al., (2020) that e-counselling is a new phenomenon in the language of guidance, especially at the present time. It is a modern method of communication between councillors and takes place in online sessions during a specified period (at least once a week) with the aim of helping counselees to discover themselves and make choices regarding their educational, professional, personal, and social needs.

The results of this study go in line with the study conducted by Nyan in 2014, which indicated that there is a medium relation between teachers' perception, availability of resources, availability of talents and counselling services in secondary schools. This

study also matches the study of Poh Li et al., (2013) in which it is indicated that the weakness of direct communication between the counsellor and the counselee leads to a lack of familiarity, mutual trust, and weak development of the guiding relationship. Further, the lack of non-verbal communication leads to a poor communication process. The current study also goes in line with the study done by Joy et al., (2011). The findings of this study indicated that although teachers seem to have a moderate degree of knowledge regarding school counsellors' responsibilities, more effort is needed to systematically inform teachers about the role and responsibilities of school counsellors. The results of this study differed from the results of the studies done by Egenti (2018) and Beidoglu et al., (2015), which indicate that the perception of male and female teachers towards educational counsellors in performing their tasks was high. Additionally, the study conducted by Košir et al., (2020) indicated that teachers reported positive results and attitudes to self-efficiency in using digital technology and distance learning for them and for educational counsellors.

Regarding the level of each dimension, the preventive dimension ranked first. Results may be attributed to the fact that focusing on preventive counselling is the first step to achieve confrontation in terms of avoiding falling into various problems before they occur. The counsellors usually distribute various brochures related to the prevention of the epidemic, brochures on bullying, poor achievement, correct study methods, among other issues. Jackson-Cherry & Erford (2018) mentioned different ways in which counsellors use their crisis management expertise to create a safe learning environment. Counsellors collaborate with teachers, parents, and the community to develop prevention programs to deal with crises. In this case, the counsellors do not provide long mentorship programs, but they usually provide short ones. In the second place came the "social" dimension where the results can be attributed to the weak social communication between the counsellors and the counselees as well as the weakness of the verbal communication mechanism as it was in the past. Fegert et al., (2020) mentioned that there is a negative impact on children and adolescents of students and their families, and that led to weakening external social support such as other families and other support systems, which directed to the fear of increasing problems related to their mental health. The remaining dimensions had less and moderate degrees, arranged as moral, professional, educational, and technical, respectively. These results agreed with Arfasa's study (2018) which indicated that teachers' perceptions of educational and vocational counselling services had a medium degree. Conversely, this study differed from the study of Aluede & Adubale (2020) which indicated that perceptions were high on the dimensions of educational and vocational counselling.

The result of the second question showed that there were no statistically differences at the level of significance ( $\alpha \le 0.05$ ) in the reality of e-counseling services in the light of digital learning from the point of view of teachers in Jordan at the overall level. The level of each dimension of the scale is attributed to the variables of gender and years of experience. This result can be attributed to the fact that teachers live in the same social and educational environment that is characterized by the same conditions, whether they are males or females. The infrastructure and educational conditions in the same schools are very similar, and teachers are adequately informed about their students' conditions in the schools they work for. So, the work of counselors in such circumstances would be almost the same. The study of Beidoglu et al., (2015) stated that there are no significant differences found for teachers' perceptions based on the variables of gender, experience, age, degree, and workplace for educational counselors. The study of Girsang & Saragih (2020) showed that there are no differences between teachers on the degrees of perception of guidance and counseling services. This means that teachers have the same perception of counseling services in their schools.

# 9 Conclusions

E-counseling nowadays has become crucial in terms of communicating with counselees, taking into account the conditions of counselees, especially those who live in remote areas or who suffer from special circumstances. It is preferable to bridge the gap between teachers and counselors by developing teachers' knowledge of the main roles of counselors and the services they provide to counselors through e-counseling in an adequate manner. This can be achieved by creating opportunities for cooperation in counselors' cases in an appropriate manner that preserves the privacy of the counselor and the cases he/she deals with. Developing a good knowledge of students and counselors in using modern technology and communication means in the counseling process is another way to bridge that gap. In addition, this can be achieved by developing innovative and unique strategies and programs to meet the psychological, social, developmental, professional, personal needs of students and to be suitable for this digital age that serves e-counseling in a creative and innovative way. It is important to develop appropriate methods and strategies to overcome the difficulties facing e-counseling and develop appropriate solutions for the problems it might face.

The Ministry of Education must develop the infrastructure to provide modern technological services, update educational platforms continuously, develop e-counseling services in an appropriate manner that meets the requirements of this important period for people around the globe, and activate the role of parents through successful communication with the counselors. This study also recommends conducting future studies on e-counseling in light of digital learning from the perspectives of managers and counselors themselves. In addition, e-counseling may be examined using other variables related to digital learning and students' problems.

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