Sustaining Educational Public Relations during Covid-19: A Cross-Sectional Study

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Abstract: Despite the institutional closure during Covid-19, the role of social media in education is undeniable. Higher educational institutions all over the world are sustaining their educational activities through web-based technologies. In this context, the current study highlightshigher education institutions' rolein maintainingacademic PR through virtual conferences. To examine the relevant phenomenon, the researcher randomly selected a sample of *n*= 105 students from Jordan. An extensive number of cited literature also helped to propose a conceptual model for the current investigation. Findings indicated a strong significant relationship between virtual conferences and educational PR during the Covid-19 crisis. Respondents indicated their higher dependence on web-based platforms to contribute to e-conferences and improve learning and working skills. Thus, the researcher emphasized more studies to assess web-based technologies for facilitating the educational process in general and during crises in particular.

Keywords: Social Media; Education, Public Relations; Virtual Conferences; Team Work, Collaboration; Online Participation

I. INTRODUCTION

Web-based communication and learning have gained much appreciation during the past few years.The use of web-based technology performs several functions, including communication, entertainment, information, and education (Oueder & Abousaber, 2018). Especially using web-based technology in the educational activities widely facilitating the students all over the world. There is a common perception that if social media is used in education, it can improve students' academic performance as it also enhances their reading skills and general knowledge (Ali, 2018). In this regard, when educational institutions are closed during the current healthcare emergence, relying on new media is the only available option. Institutions rely on new media for teaching, conferences, meetings, seminars, and workshops to sustain their activities in the best possible way(Alghizzawi & Habes, 2020). Resuming the educational activities and transferring the educational system is a challenging situation for all. Young students are readily adopting web-based platforms for education, yet many of them are uncertain about digital media(Habes, Ali, Publishing, et al., 2020). Web-based communication and education are an existing and reliable source of education today, and any consider it a substitute for formal education. Integrating web-based technology with education is revolutionary for the students and teachers(Greenhow & Lewin, 2016). However, critics argue that the current healthcare crisis is not typical. Covid-19 has also challenged the perceptions and attitudes of the educational professional towards social media. If educational institutions have a robust grip over new media-based education and relevant activities, only they would be able to cope successfully with the current challenges (Alhumaid et al., 2020).

According to (Abdul et al., 2020), the rise of Covid-19 also led to the immediate closure of educational systems worldwide. In this situation, besides e-Learning, preferring e-conferences also become a vital part of educational activities. For (Kamil, 2020) sustaining PR with the learners was the only option to keep them engaged with their educational institutions. Besides academic activities, keeping the students linked with their education is another major challenge for the educational stakeholders.(Schleicher, 2020) also addressed the closure of educational institutions as a significantchallenge but the availability of new media technology as a source to cope with these challenges.

Similarly, in Jordan, educational institutions' closure and switching to new media costs millions of dollars. However, to maintain quality education and activities, Jordanian stakeholders make remarkable efforts (Sindiani et al., 2020). During the Covid-19 outbreak, virtual academic conferences benefit the students, teachers, and educational institutions in Jordan. The more significant increase in web-based technology is

helping students and teachers to share their ideas. Besides, educational institutions are conducting the conferences to entice the students and indulge external institutional entities (Sá et al., 2019).(Abu-Shanab & Al-Dalou', 2016) also consider e-conferences an essential source of sharing education, information, and sustaining PR among individuals and educational institutions in Jordanian scenarios. These conferences increase the e-participation of students and instructors in conferences. Besides, the participants feel more motivated in conducting research, collaboration, teamwork, and participation process(Habes et al, 2020; Tahat et al., 2020).

By keeping in view the importance of web-based technology during Covid-19 (Habes, Alghizzawi, et al., 2020), the current study also highlights the importance of e-conferences for students, instructors, and educational institutions regarding sustaining PR. In the first section, the researcher discussed the significance of e-conferences from the PR perspective. In the second section, the researcher cited *n*= 30 relevant studies witnessing the importance of web-based technology in sustaining educational PR. An extensive number of citations further helped to propose the conceptual model of the current investigation. In the third and fourth sections, the researcher discussed the theoretical support for the present study and methods used in the research. Eventually, in the fifth section, the researcher will analyze the data, discuss the results and make the conclusions accordingly.

II.   LITERATURE REVIEW:

2.1 Direct Communication, Increased Participation &Increased Academic Collaboration:

With the more significant expansion in web-based technology, improved communication is inevitable today. People of every age group like to communicate through social media, which has increased online dependency (Baruah, 2012;Tahat et al., 2020). To further validate this argumentation, the researcher analyzed social media usage among the students for educational and communication purposes. The researcher conducted a cross-sectional study and selected *n*= 200 respondents from Assam, India. Results indicated that respondents consider the internet as offering ease of access and communication. For this purpose, they mainly participate in online communication and collaboration. Likewise, (Abu-Shanab & Al-Dalou', 2016)analyzed the extent to which e-participation is common among Jordanian people. The researcher conducted a cross-sectional analysis and selected a sample of *n*= 400 from public universities in Amman, Jordan. Findings revealed that Jordanian students mainly prefer e-participation as an essential part of their academic activities, and they also indicated some limitations to join online workshops and classes. The researchers further concluded that Jordan's government should facilitate the local students to increase e-participation among them. Another study to authenticate the relationship between online communication and increased participation was conducted by (Derani & Naidu, 2016). The researchers examined the use of online media as a source of crisis management to sustain communication and daily activities. The researchers used the case study method and gathered n= 52 Tweets to identify the users' perceptions. Results showed that the global users primarily relied on social media to voice their opinion. Here, Tweets' content also indicated a higher indulgence in online communication and sharing a personalstatement with the users.

Due to briskly improving web-based technology, today's life is high-speed, and communication patterns are convenient. People prefer web-based technology to stay intouch every day to share and receive information (Subramanian, 2017). To further affirm this, the researcher analyzed the literature validating social media's role in facilitating communication, leading to more significant web usage among the users. The researcher cited *n*= 25 relevant studies and concluded that digital technology has largely enabled the communication process. As a result, people rely on web-based communication leading to billions of online communication users every day.

Moreover, (Ali, 2019) scrutinized online media usage, dependency, and its impacts on Pakistan's academic performance. The researcher used a cross-sectional approach and selected a sample of *n*= 200 female respondents from Twin cities. Findings showed that the studentsmainly prefer online media to sustain their educational activities. The respondents are highly dependent on social media which also improves their academic performance.

The traditional educational environment has always been of greater importance. However, social media technology's rise is rapidly replacing formal eLearning and collaboration among students and instructors. Especially for online learning and collaboration, social media plays an essential role in greater web dependency among the students (Aghaee, 2010). Educational institutions prefer to cope with any

potential crisis by sustaining their students' academic activities and relations. As online communication is fast, students find it easy to collaborate and initiate teamwork, especially in the research writing process (Faizi, 2013).

According to (Al-Rahmi et al., 2015), the reason behind increased academic collaboration through online media is the ease of communication. Students consider web-based technology as facilitating communication, which further leads them to plan for teamwork and collaborative efforts. The researcher alsovalidated this phenomenon as they used survey methodto witnesscommunication and increased academic collaboration through online platforms.The data gathered from *n*= 741 students from Malaysia affirmed the study hypotheses. They found that interactivity with the classmates, research supervisors, and other instructors was the main reason behind an increased collaboration through online media resources. Social media provides collaborative engagement and participation for the study participants,improving students' academic performance in Malaysian universities.

Similarly, (Badri et al., 2017) examined digital media to collaborate with peers and instructors for educational purposes. The researchers used structural equation modeling and selected *n*= 34,896 students from Abu Dhabi, United Arab Emirates. Results revealed that collaborative learning and knowledge sharing in social media-based online groups are the two primary reasons for increased online dependency among the students. Using social media for online communication and collaboration also has significant impacts on students' academic performance. Thus, social media mainly facilitates knowledge sharing and transferring between communities all over the world. Educational institutions also encourage their students to sustain learning and collaboration through online communication(Abdul et al., 2020; Habes, Ali, Salloum, et al., 2020). The researcher further assessed online media for an online understanding of the Quran and Hadith in Malaysia. The researcher used Structural Equation Model and selected *n*= 340 participants from the International Islamic University, Malaysia. Results showed that participants prefer online platforms to learn and share Quran and Hadith. Respondents also revealed their greater reliance on social media for communication with their peers and instructors.

H1: There is a positive relationship between direct communication and Increased Participation

H2: There is a positive relationship between direct communication and Increased Academic Collaboration

2.2Persuasion, Increased Participation &Academic Collaboration:

The increased technology usage also indicates technology dependency as an integral part of students' life. Accepting and integrating online technology in education is due to its unique benefits such as online communication, ease of access, ease of availability, and offering brighter prospects to students. Technological development is also due to the best infrastructural development aimed at students' welfare and improving their academic performance (Liu, 2010).

Today, students mainly prefer web-technology to maintain their educational activities. They are well aware of social media's advantages, which leads them to use it for communication with their peers, instructors, and institutions. Both students and teachers are mainly benefitting through online communication, which keeps them connected and interlinked (Shembilu, 2013).In this regard, (Mei & Yeo, 2014)examined students' increased participation in onlineactivitiesfor educational activities. The researchers employed a case study method and conducted qualitative interviews of students at Monash University, Australia. Respondents expressed their increased online participation as a reason for fast and efficient communication through online media. They also revealed that this increased dependency is not only indulge them in online communication with their peers and instructors. Also, it is causing positive impacts on their academic performance.

Later, (Alabdulkareem, 2015)also investigated the use of online communication among the teachers and students in Saudi educational institutions. The researcher used cross-sectional design and selected a sample of *n*= 200 instructors and students. Results revealed that both students and teachers prefer using online platforms to stay connected with each other for the educational purposes. However, they largely prefer WhatsApp based chats and calls for communication purposes. According to the respondents using WhatsApp for education and communication also improves their performance and also links them with their educational institution. Here (Raut & Patil, 2016) consider online platforms as a largely preferable medium for sustaining educational activities. Students participants in online communication also value its importance as a source of education for them. More than 20 million students avail educational benefits from online communication technologies. As a results, more and more students are upturning every year

to attain maximum educational benefits from the web-based technology.(Mardiana, 2016) also examined why students are convinced to use online media for educational activities. The researcher employed cross-sectional design and select a sample of *n*= 110 university students from Tangerang, Indonesia. Results showed that students' as compared to their teachers, more likely to use social media for their educational activities. They are more familiar with the tactful use of social media for education as it provides them improved opportunities to stay connected with their classmates and instructors.

According to (Faizi et al., 2013), broadband internet availability has also increased the number of internet users worldwide. Students prefer using online platforms to share knowledge and learn new things. The researchers examined the relevant literature witnessing the advantages of social media for educational purposes. Findings revealed that communication, information, education, and entertainment are the four primary social media usage motivations. In this regard, (Henderson et al., 2013) examined the reasons behind increased collaboration through online platforms for educational activities. The researchers employed a literature review approach and found that, despite students' learning aptitude differ and they prefer a formal learning environment, web-based technology motivates students to participate in collaborative learning and research activities. This shows the potential of social media in education and increases teamwork and collaborative work among students.(Ali et al., 2021).

As students communicate with each other, they also interact with their instructors and educational institutions, leading to increased online teamwork for educational aspirations.When students learn and participate in online educational activities, it increases their confidence in cooperation and collaboration. Web-based technologies provide students with an advanced learning environment that keeps them connected and motivate them to teamwork. Here, these technologies are both deliberated learning tools and implemented by instructors worldwide(Johansson, 2015).As noted by (Seifert, 2016), online media provides sustainable learning, collaboration, and engagement environment. Itincreases students' confidence over collaborative activities to avail better opportunities and brighter prospects in the future. The researcher further employed the case study method and discussed different relevant web-based platforms and increased educational collaboration. Results showed that the instructors were initially not much aware of the potential advantages of online communication technologies. However, students adopted technology more rapidly and availed comparatively more benefits regarding collaborative learning and teamwork than their teachers.

Similarly, (Aysun & Sona, 2017)examined web-based technology's influence on collaborative learning and teamwork projects among students Turkish students. The researchers used structural equation modeling and selected a sample of *n*= 231 participants. Results showed that the increased social media usage for education is directly influenced by perceived educational benefits and ease of use. The students find e-participation in academic activities as mostly beneficial,motivating them to depend more on web-based technology.

H3: There is a positive relationship between persuasion and Increased Participation

H4: There is a positive relationship between persuasion and Increased academic collaboration

2.3Ease of Access, Increased Participation &Academic Collaboration:

An increased social media usage depends on factors that motivate students for education, information, communication, and education purposes. Ease of communication and ease of access to data are two primary determinants of students' increased online participants. Which also improves their ICT skills in general(Brändström, 2011). Online media has mostly facilitated the communication and patterns of human communication.The young generation, especially, feels more connected with the external world and uses online technology for information and educational purposes(Mahmood, 2016). The researcher further examined online technology impacts on human communication and selected data from *n*= 50 structured, close-ended questionnaires. Results revealed that respondents prefer social media for educational and informational purposes. They find online information and education as easily accessible, leading to increased internet depdency among the particpnats.

(Apuke & Iyendo, 2018) also analyzed the perceived benefitsof social media usage among the students in Nigeria. The researcher used cross-sectional method and selected a sample of *n*= 306 undergraduate level university students. Findings indicated that students consider online media as an essential source of communication. Respondents frequently prefer web-based technology to stay connected with their instructors and avail educational benefits. Researchers concluded that ease of access is a fundamental reason behind students' online communication dependency,positively affecting their academic performance.

Similarly, (Alghizzawi et al., 2019)investigated the impacts of perceived benefits on technology acceptance and usage among the students. The researchers used the case study method and selected *n*=

410 respondents from the United Arab Emirates. Findings showed that ease of access and knowledge sharing are among the most prominent reasons behind technology acceptance and usage.The respondents also expressed improved academic performance due to online communication technology. Another study to affirm the correlation between web-based technology and ease of access was conducted (Habes, Salloum, et al., 2020). The researchersscrutinized the relationship (Lemoine et al., 2016)between perceived benefits regarding web-based technology among university students in Jordan. The researcher used structural equation modeling to test the conceptual model. Data gathered from n= 360 respondents indicated that ease of access, perceived usefulness and ease of use are the primary determinants of web-based technology usage among the respondents. The researcher further concluded that online communication technology helps studentsdepend more on web-based technology for academic and entertainment purposes.

Online resources offer several opportunities to educational institutions for motivating the students to take part in academic activities. These online platforms reinforce collaborative learning and teamwork for different academic activities. One of the critical motivational features of web-based technology is its "personal knowledge management system that enables students to enhance participation, deep learning, and research. Such problem solving and motivating environments also improves students' sense of belonging with their educational institutions(Mondah & Razmerita, 2014). To validate this, (Gewerc et al., 2014)conducted an exploratory analysis of online technologies for students atthe University of Santiago de Compostela. The researchers selected a sample of *n*= 361 online projects aimed at students' collaboration through online analytics and information extraction tool. Results showed that ease of access and communication profoundly influenced students' engagement in online collaboration. Moreover, the online partnership also motivated students to involve in more team projects to improve their critical and working skills.

According to (Lemoine et al., 2016), the ease of access and to information and communication have greatly influenced students' academic activities. Instructors and institutions encourage their students to use web-based technologies to develop critical learning, knowledge sharing, and teamwork. The researchers further scrutinized the *n*= ten students regarding their online academic participation and coloration. Qualitative data through interviews revealed that students widely rely on online technology for educational purposes. It helps them to share knowledge and collaborate for education purposes, which also improves their academic performance. (Mondah & Razmerita, 2014)also affirmed the impacts of online media on students' learning and educational activities. The researchers investigated the strategies regarding online collaboration among university students in Spain. Data gathered using cross-sectional study design indicated that students prefer online media to enhance their educational experiences and learning skills. It also gives them opportunities regarding teamwork and collaboration, which also leads to improved academic performance.Especially during the Covid-19 outbreak, institutions are resorting to online platforms to respond to the healthcare crisis. They are mobilizing several online media and techniques to sustain the students' educational activities and develop critical thinking through researcher presentations. On the other hand, students feel more enthusiastic about sharing their opinion, learning more, and collaborating. Institutions are also encouraging the students to collaborate more by engaging international institutions and professors, which is another beneficial aspect of web-based technology (OECD, 2020).

H5: There is a positive relationship between ease of access and Increased Participation
H6: There is a positive relationship between ease of access and increased academic collaboration
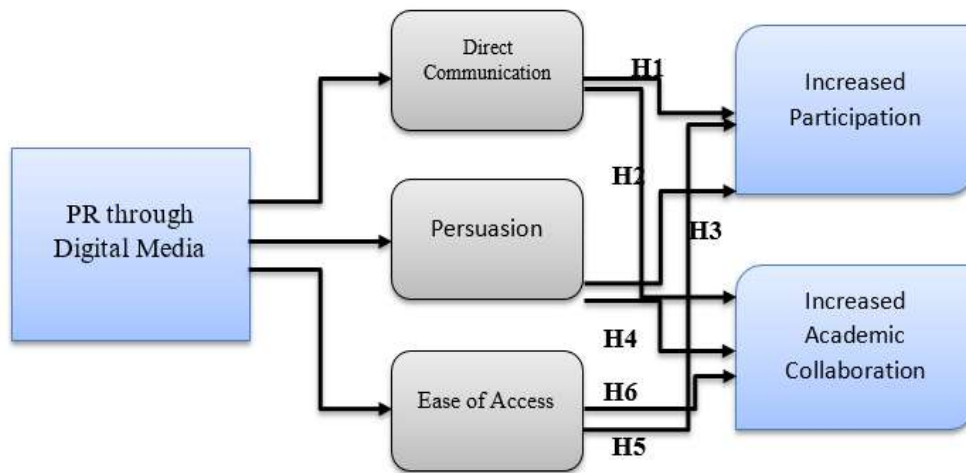
3.1 Research Design:

The current study is based on the cross-sectional design as cross-sectional studies are an essential and preferred research design for the shorter period based investigations. These studies are comparatively less expensive and more generalizable (Salloum,et al., 2019; Salloum,et al., 2019; Zangirolami-Raimundo et al., 2018). For the data gathering purposes, the research utilized a structured questionnaire based on a five-point Likert scale(Hyman & Sierra, 2016). Furthermore, the researcher performed data analysis through Statistical Package for Social Sciences (SPSS) Version 64 bit. According to (Arkkelin, 2014), Statistics Package for Social Sciences (SPSS) facilitates data manipulation, coding, and analysis. It contains many statistical analyses that help the researcher to obtain valid results.

3.2 Study Universe & Sampling:

The population of the current study involves students from the Jordanian Universities. However, to select the designated sample(*n*= 105), the researcher used the random sampling technique to gather data directly from the suitable study respondents.

3.3 Validity & Reliability Analysis:

The researcher conducted the validating analysis of the study instrument to ensure the authentication of outcomes. According to (Taherdoost, 2018), the research instrument can cover the investigation's specified area. As it enables the researcher to "measure what he/she is supposed to measure. Likewise, to authenticate the data instrument, the researcher conducted Intercoder Reliability Analysis. Analyzing the reliability ensures the stability of data analysis and results. Examining the instrument's reliability is crucial as it affirms the consistency of all the constructs in the research tool (Taherdoost, 2018).

IV.   STATISTICAL ANALYSIS AND RESULTS:

4.1 Intercoder Reliability Assessment:

To analyze the research instrument's reliability, the researcher conducted Intercoder Reliability Analysis (Mahmood, 2016). The Cronbach Bach Alpha value of .976 revealed that the researcher instrument is highly reliable and capable of bringing out definitive results. **Table 1** below provides a detailed overview of Intercoder Reliability assessment:

Table 1: Intercoder Reliability Assessment:

H	Relation	*Cronbach Alpha*	Intraclass Correlation Coefficient	Sign	Status
H1	DC>IP	.926	.473	.000	Reliable
H2	DC>IAC	.893	.410	.000	Reliable
H3	PR>IP	.900	.429	.000	Reliable

H4	PR>IAC	.888	.397	.000	Reliable	
H5	EA>IP	.892	.408	.000	Reliable	
H6	EA>IAC	.893	.411	.000	Reliable	

Note:DC stands for Direct Communication, **IP** stands for Increased Participation, **IAC** stands for Increased Academic Collaboration, **PR** stands for persuasion, & **EA** stands for Ease of Access

4.2 Validity of Research Tool:

The researcher also examined the validity of the research instrument to avoid any potential errorsregarding the generalizability of research outcomes (Taherdoost, 2018). In this regard, the Univariate Pearson Correlation of the assessment revealed that the research instrument is firmly valid, and the results will be generalizable. **Table 2** below provides a detailed overview of Univariate Pearson Correlation assessment:

Table 2: Univariate Pearson Correlation:

IV	DV1	DV2	DV3	DV4	DV5	DV6
1.000						
.400**						
.492**	.505**					
.442**	.444**	.607**				
.427**	.540**	.637**	.635**			
.399**	.459**	.545**	.664**	.399**		
.585**	.553**	.574**	.485**	.560**	.468**	.585**

4.3 Demographical Characteristics:

Table 3 below provides an overview of respondents" demographical data. As visible, the majority of respondents were (*n*= 68 or 64.8%) were males and *n*= 37 or 35.2% were females. Similarly, as per age of the respondents, *n*= 42 or 40.0% of participants were 41 or above, *n*= 23 or 21.9% of participants were from 36-40 years old, *n*= 15 or 14.3% were 31-35 years old, *n*= 14 or 13.3% were from 18-25 years old, and *n*= 11 or 10.5% of respondentswere from 26-30 years old. Moreover, regarding the respondents' qualification*, n*= 65 or 61.9% of respondents were doing Post Graduation, *n*= 23 or 21.9% were doing Graduation and, *n*= 17 or 16.2% of respondents were undergraduate students.

Table 3: Descriptive Statistics of Demographical Characteristics:

Variables	Constructs	Frequency	Percentage
Gender	Male	68	64.8%
	Female	37	35.2%
Age	18-25	14	13.3%
	26-30	11	10.5%
	31-35	15	14.3%
	36-40	23	21.9%
	41 or Above	42	40%
Qualification	Undergraduate	17	16.2%
	Graduate	23	21.9%
	Postgraduate	65	61.9%

According to (Alhumaid et al., 2020:Sá et al., 2019), with the rise of Covid-19 and institutional closure, sustaining educational PR through web-based technologies is the only option to continue virtual conferences. In this regard, *n*= 64 or 60.9% of respondents agreed that social media helps to sustain communication due to (*n*= 65 or 61.9% ease of access in general. Similarly, *n*= 69 or 65.7% of respondents agreed that this communication is for educational purposes and n= 68 or 64.7% because social media also helps them regarding the e-learning process.

Moreover, *n*= 70 or 66.6% of individuals agreed that social media sustained academic participation and enabled them (*n*= 69 or 65.7%) to continue their educational activities during the Covid-19 outbreak(Khalid & Ali, 2020). During the current healthcare crisis,n= 71 or 67.6% of students can communicate directly with their instructors and peers, which also motivated them (*n*= 70 or 66.6% to keep on participating in virtual learning activities. That is why n= 70 or 66.6%of respondents are also actively participating in virtual conferences from all over the world.

Table 4: Means, Standard Deviations & Variances of Study Responses:

Variable	Mean	Variance	SD	Maximum	Minimum	Count
Predictor variable*: Digital Media & Educations*						
Sustain communication	2.55	1.134	1.065	4	0	105
Ease of access in general	2.51	1.214	1.102	4	0	105
Communication for education	2.66	1.266	1.125	4	0	105
Facilitates e-learning	2.63	1.332	1.154	4	0	105
Explanatory variables: Direct Communication & Increased Participation						
Sustained academic participation	2.62	.911	.955	4	0	105
Sustained academic activities	2.67	.917	.957	4	0	105
Direct communication through web-based technology	2.75	.919	.959	4	0	105
Direct communication motivated participation	2.59	1.167	1.080	4	0	105
Participate more in virtual conferences		1.102	1.050	4	0	105

According to *n*= 68 or 64.7 participants, social media has increased the prospects for teamwork, leading to increased online teamwork (n= 63 or 60.0%) during the Coivd-19 crisis. That is why, during the closure of educational institutions, n= 70 or 66.6% of collaborating with each other on multidisciplinary research projects have also increased their collaboration with other researchers.

Likewise, *n*= 72 or 68.5% of participants agreed that web-based technologies have facilitated them to participate in virtual conferences and are (*n*= 73 or 69.5%) actively participating in virtual discussions during the Covid-19. For *n*= 71 or 67.6% of respondents, ease of access and exposure to better opportunities even during the Covid-19 primarily motivated them to contribute and share their ideas in e-conferences. As a result, *n*= 72 or 68.5%of participants believe in social media for persuading the students and instructors (*n*= 76 or 72.3%) to participate in international virtual conferences and enhance their academic skills.

Table 5: Means, Standard Deviations & Variances of Study Responses:

Variable	Mean	Variance	SD	Maximum	Minimum	Count
Explanatory variables: Direct Communication & Increased Academic Collaboration:						
Increases teamwork in general	2.55	1.173	1.083	4	0	105
Increased teamwork during Covid-19	2.51	1.271	1.128	4	0	105
Collaborate for multidisciplinary projects	2.68	.952	.976	4	0	105
Interact more for teamwork	2.66	1.112	1.055	4	0	105
Explanatory variables: Persuasion & Increased Participation						
Contribute to the e-conferences in general	2.71	.968	.937	4	0	105
Convinced the participants for the e-conferences	2.71	.988	.975	4	0	105
Persuade international students to collaborate	2.70	.921	.849	4	0	105
Persuade international professors to collaborate	2.78	.940	.884	4	0	105

Regarding the web-based technology's role, *n*= 71 or 67.6% respondents revealed web-based technology convinced them to take part in the virtual conferences. Especially during the Covid-19, *(n*= 70 or 66.7%)their participation level is increased, leading to enhanced collaborative efforts from the international students (70 or 66.7%) and professors (n= 75 or 71.4%).

Besides, *n*= 75 or 71.4% of respondents agreed that ease of access through social media had persuaded them to contribute to virtual conferences. As a result, n= 73 or 69.5% individuals are also taking part in e-conferences, leading to international contributions both from students (*n*= 78 or 74.2%) and preowned professors (*n*= 81 or 77.1%).

Table 6: Means, Standard Deviations & Variances of Study Responses:

Variable	Mean	Variance	SD	Maximum	Minimum	Count
Explanatory variables: Persuasion & Increased Academic Collaboration						
Increased the number of participants in general	2.57	.949	.901	4	0	105
Increased the number of participants during Covid-19	2.63	.880	.774	4	0	105
Increased the number of international students	2.71	.948	.898	4	0	105
Increased the number of international Professors	2.76	.894	.799	4	0	105

Explanatory variables: Ease of Access & Increased Academic Participation						
Increased the number of participants in general	2.70	.960	.922	4	0	105
Increased the number of participants during Covid-19	2.69	1.031	1.064	4	0	105
Increased the number of international students	2.80	.914	.835	4	0	105
Increased the number of international Professors	2.91	.878	.771	4	0	105
Increased the number of participants in general	2.70	.960	.922	4	0	105

Lastly, *n*= 78 or 74.2% of participants expressed their agreement with social media's role to convince conference participants to collaborate more in future projects. 73 or 69.5% of collaborators are also willing to cooperate with the researcher from the other fields. Therefore, n= 75 or 71.4% of respondents also expressed their firm confidence over social media to facilitate the virtual conferences, ensuring PR between institutions, students, instructors, and offering better prospects to all the involved parties.

Table 7: Means, Standard Deviations & Variances of Study Responses:

Variable	Mean	Variance	SD	Maximum	Minimum	Count
Explanatory variables: Ease of Access & Increased Academic Collaboration						
Conference participants to increase collaboration	2.67	.947	.897	4	0	105
To collaborate more with researchers of the other fields	2.68	.904	.817	4	0	105
To collaborate more with researchers of the same field	2.71	.896	.802	4	0	105
Interact and collaborate more	2.67	1.006	1.013	4	0	105

4.4 One-Way Analysis of Variance (ANOVA):

According to (Ostertagová & Ostertag, 2013), One-way Analysis of Variance (ANOVA) helps to examine the differences between the means of group variables. Analysis of Variance (ANOVA) is one of the most preferred statistical tools to interpret the experimental results. In this context, the researcher also conducted a One-way Analysis of Variance (ANOVA) to examine any potential differences regardingresponses based on participants' demographical data. Findings indicated that there are no significant differences based on participants" demographical data. **Table 8** below provides an overview of One-way Analysis of Variance (ANOVA):

Table 8: Test of Homogeneity of Variances:

Variables	Constructs	N	Levene's Statistics	*f*	*Sig.*
Gender	Male	68	10.046	1.560	.000
	Female	37			

|					
Age	18-25	14	4.353		.001
	26-30	11			
	31-35	15		3.120	
	36-40	23			
	41 or Above	42			
Education	Undergraduate	17	2.853	1.560	.000
	Graduate	23			
	Post Graduate	65			

4.5 Regression Analysis:

Linear Regression Analysis greatly facilitates examining the relationship between proposed study variables. It helps identify and characterize the strength of the relationship between the study variables and further affirms their proposed relationship (Schneider et al., 2010). Thus to examine the relationship between study variables and validate the suggested study model, the researcher also employed the Linear Regression Approach. Results indicated a strong, significant relationship between the Independent and all the dependent variables **H1**(β=1.042, *P=.* 000***)**H2**(β=1,352, *P=.* 000***)), **H3**(β=1.354, *P=.* 000***), **H4** (β=1.457, *P=.* 000***), **H5** (β=1.591, *P=.* 000***), **H6** (β=1.435, *P=.* 000***) respectively.

Table 9: Linear Regression Analysis:

H	Relation	*f*	*t*	*p*	Direction	Decision
H1	DC>IP	114.496	10.700	.000***	Positive	Accepted
H2	DC>IAC	36.998	6.083	.000***	Positive	Accepted
H3	PR>IP	69.021	8.308	.000***	Positive	Accepted
H4	PR>IAC	55/773	7.468	.000***	Positive	Accepted
H5	EA>IP	41.264	6.424	.000***	Positive	Accepted
H6	EA>IAC	50.164	7.608	.000***	Positive	Accepted

Note:DC stands for Direct Communication, **IP** stands for Increased Participation, **IAC** stands for Increased Academic Collaboration, **PR** stands for persuasion, &**EA**stands for Ease of Access
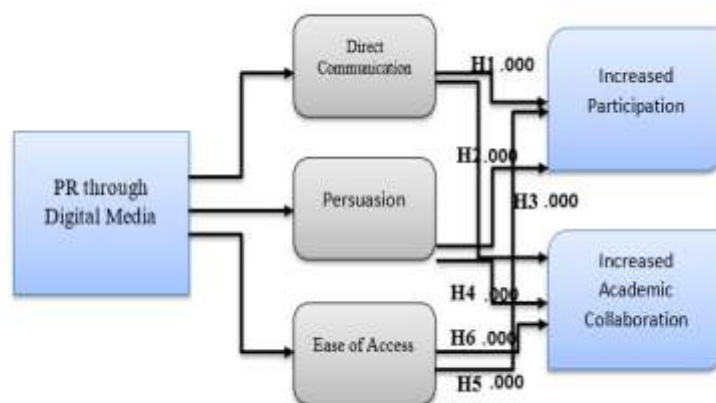
V.   DISCUSSION:

The current study highlighted the importance of e-conferences for sustaining PR during the Covid-19 pandemic. The recent outbreak amplified various economic, psychological, social, and educational challenges, raising many concerns for the policymakers and the stakeholders (Ali, 2020). However,

despite the enormousdifficulties, reliance upon new media proved as a light of hope for educational activities (Duraku & Hoxha, 2020). This also affirms the previous studies empathizing the adoption and integration of technology in the academic arenas(Greenhow & Lewin, 2016).

Besides, el-earning, new media also increased e-participation for web-based conferences and seminars worldwide. Especially in Jordan, web-based educational activities are an integral part of the government crisis management system (Abu-Shanab & Al-Dalou', 2016). The current analysis results are consistent with the study conducted by (Alghizzawi et al., 2019), as they also found web-based technologies as a source of increased e-learning acceptance and participation among students. As noted by (Crescenzi, 2005), web-based technology has long been considered a revolution in every life field. Communication, information and information through online platforms are highly revolutionized and anticipating greater technological achievements in the near future.

Before Covid-19, the worldwide dependence on web-based technology for educational activities was only 15.4%. However, after the Covid-19 outbreak, the educational institutions are bearing much burden regarding adopting web-based educational activities (Alqahtani & Rajkhan, 2020). In this context, (Camilleri, 2020) considers PR during convinced-19 as one of the most many phenomena noted that new media technology provides an ease of communication that fast, effective and contains symmetric interaction between the users. Direct and face to face communication through new media platforms is a significant advantage and substitute forthe real-time meeting during the Covid-19. Today, when Jordan faces lockdown and closure of educational institutions(Habes, Ali, Publishing, et al., 2020), stakeholders are mainly conductinge-conferences to communicate with the students and motivate them for academic enthusiasm, connection, team spirit, and research interest among their students (Limited, 2020). Crisis management during the Covid-19 outbreak emphasized maintaining the relationship between the learners and institutions. For this purpose, relying on a web-based system and encouraging student participants in the e-conferences is a positive, constructive step (Wan, 2020).

VI. CONCLUSION:

According to(PAHO, 2020),great crises need excellent risk management. During the current outbreak, the whole world facesenormous educational challenges (Alhumaid et al., 2020). To engage students in the educational activities and increasing their exposure to research are two significant challenges for the higher educational institutions. In this regard, they were conducting virtual conferences as an efficient step towards achieving the desired academic and professionals goals in Jordan (Habes, Ali, Publishing, et al., 2020). The current study also discussed and highlighted the importance of virtual conferences during Covid-19 to sustain public relations in an educational environment. The higher reliance on new media and increased usage of study respondents also indicated the future of education as positively associated with web-based technology. Especially during crises in the future, we will be able to cope with the educational challenges as wen-based technology enabled us to mitigate the current challenges in a best possible manner.

6.1 Study Contributions & Limitations:

The study is novel as it involves sustaining PR as a pre-requisite in the crisis management system during Covid-19. The researcher also proposed a unique conceptual model, presenting a direct relationship between all the proposed variables. The study model in the current analysis can be utilized for future studies highlighting the role of online media in sustaining PR in different life fields.

6.2 Recommendations for the Future Research:

The researcher suggests more studies to examine the potential of web-based technologies for facilitating the educational process in general and during crises in particular.More reviews to explore the other educational aspects of web-based communication during a crisis. are the need of the day.

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