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Digital technology in teaching and learning using DEMATEL

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Abstract

Digital mastering will increase get admission to schooling and knowledge, even as growing mind-sets and skills that set students up for success of their gift and destiny. Social connectivity, pace of communication, multitasking, gaining knowledge of possibilities, automation, data storage, editing, instructors can use extraordinary apps or reliable on line Improve traditional teaching methods for student's Additional engagement resources. Digital school rooms are described by way of the usage of electronic devices or platforms which includes social media, multimedia and cellular telephones to educate college students. Digital equipment and systems are becoming extra imperative to our private and work lives. Digital mastering will increase get admission to schooling and knowledge, even as growing mind-sets and skills that set students up for success of their gift and destiny. Social connectivity, pace of communication, multitasking, gaining knowledge of possibilities, automation, data storage, editing, instructors can use extraordinary apps or reliable on line Improve traditional teaching methods for student's Additional engagement resources. Allowing sufficient time for learning and teaching, enabling learners to develop their knowledge and skills Online digital networks allow educators to share resources and digital tools and services expedite lesson planning. Digital assessment eliminates marking time. DEMATEL (Decision Making Trial and Evaluation Laboratory) They are divided into analysis using the Digital technology in teaching and learning in Course website, Digital camera, Handheld computer, Mobile phone, Internet websites is Evaluation Parameters Digital technology in teaching and learning in the value. Results: Digital technology in teaching and learning. Course website is got the first rank whereas is the Internet websites is having the Lowest rank.

Keywords: Digital technology, Course website, Mobile phone.

1. Introduction

Digital equipment and systems are becoming extra imperative to our private and work lives. Digital mastering will increase get admission to schooling and knowledge, even as growing mind-sets and skills that set students up for success of their gift and destiny. Social connectivity, pace of communication, multitasking, gaining knowledge of possibilities, automation, data storage, editing, instructors can use extraordinary apps or reliable on line Improve traditional teaching methods for student's Additional engagement resources. Virtual course Programs, benchmarking software program and on-line Exams are a total time saver for instructors will help. This precious time will suffer Can be used to work with students. Our findings suggest that students excel without relying on digital technologies. Although VL can improve students' HE goals with additional input, students using SM are less effective. This encourages further work on more diligent use of VL and SM under the HE setting. Coursera is a global online learning platform that provides anyone, anywhere access to online courses and degrees from world-class universities and institutions. Are Coursera Certificates Worth It? Overall, yes. Whether you're looking for a promotion, a career change, or the skills you're learning are highly sought after, a Coursera certification has value and is definitely worth the investment. Coursera partners and course providers are world-class. A digital camera is a digital that creates virtual pics that can be saved on a computer, displayed on a display, and revealed. The velocity at which virtual cameras capture, process and transmit a photograph is incredible. A virtual digital However, it may also be used as an output tool. Digital cameras deliver a whole new degree of entertainment to pictures and feature many blessings, many of which aren't possible with a regular movie digital. Digital cameras are more convenient than movie cameras, and due to the fact that there is no need to purchase and increase film, working costs are decrease. The term handheld computer refers to very small terminals designed for data collection. In recent years, they are commonly used for part and product management using objects such as barcodes and 2D codes. Today's can be divided into people who take delivery of handwriting as enter and people which have small keyboards, touchpads, etc. A mobile tool (or hand-held computer) is a pc small enough to preserve. Works in hand. Mobile gadgets commonly have a flat LCD or OLED display screen, a touchscreen interface, and digital or physical buttons. They may have a bodily keyboard. Go to Settings or Options menu, scroll down the list and take a look at 'About phone', 'About tool' or similar. The tool name and model variety need to be indexed. A cellular tool with touch input and/or QWERTY keyboard A small handheld device with a display screen and Can provide telephone capabilities to customers. Mobile gadgets are interchangeable are used (phones, tablets) record. Source(s): NIST SP 800-one zero one Rev. Underneath Mobile Devices. With virtual technology in education, cutting-edge academic panorama has changed for the higher or for the betterment. Technology in schooling facilitates youngsters modify their gaining knowledge of pace. Students who want extra time can spend greater time on sports till they apprehend, even as college students who need much less aid can

progress. This frees up the instructor to help youngsters who want greater help on an individual level. Teachers can use era to create a greater lively gaining knowledge of and impressive environment. Examples are online polls or questionnaires. Technology creates a dynamic lecture room environment in which textbooks are digitized with embedded hyperlinks and QR codes check direction material. Examples of instructional records generation include using cloud-primarily based gaining knowledge of software, programs, blogs or discussion forums, digital whiteboards, and other interactive online tools for college kids and teachers. Among Benefits of using educational technology is an event for improvement mental and physical health of learners. By using these tools, students can improve their learning and their cognitive skills, which helps improve their academic performance and their physical health. Anything anyone wants to know; Google is the place to go. Not only that, Google now acts as the hub for Google Docs, Google Calendar, Google Drive and many other web services. E-trade website, commercial enterprise website, blog website, portfolio website, event website, private internet site, club internet site, non-earnings internet site Video conferencing is a shape of digital, online assembly wherein two or extra people speak thru a video and audio call in real time. Video conferencing has been round for years, but it won reputation in the course of the 2020 pandemic as school and paintings moved home. Online discussion organizations are located on websites and permit users to interact in a communication with one or greater humans by typing messages. Based on path and tone, I actually have grouped conversations into 4 classes: debate, communicate, discourse, and diatribe. Debate is an aggressive, two-way conversation. The goal is to win a controversy or to persuade a person, inclusive of the alternative player or a third-party audience.

Digital technology in teaching and learning

Digital technologies are effective gear to help getting to know. Key contributing factors consist of their technical traits, i.E. Their capability to document, control, represent and talk information and information. However, the essential contribution of digital technology to the gaining knowledge of system comes, circuitously, themselves assume sure obligations that may result in getting to know [9]. Effective Teaching in Sociology and Effective Teaching in Sociology and Ways of digital technologies affect student learning, especially in sociology, and the meaning, behaviour, and This paper reflects our efforts to synthesize knowledge and identify the necessary knowledge about Shaping Outcomes Structural and cultural contexts digital technologies [10]. Digital technology offers sizable new opportunities to the teacher. This chapter considers key components of constructivist thinking about studying, and gives a few illustrative examples of conditions in which virtual technologies help School teachers are theirs constructive to inform the classroom paintings [6]. Digital gear there are numerous digital tools to be had inside the marketplace. For the functions of this have a look at, digital gear has been divided into three product groups: conventional digital tools (e.G., websites, electronic mail, Microsoft Office, PDFs, immediate messaging), social and interactive digital equipment (e.G., Facebook, Wikis, blogs, Podcasting, simulations, advertising, and scholarship in schooling have addressed academic generation from two perspectives. A broader perspective seems at the overall integration trends associated with generation within the school room. Learning much less because of technology, then educators fail to apply electronic infrastructure, accordingly teaching and studying [1]. Digital technology in secondary mathematics teaching and are an increasing number of infiltrating studying environments. Digital technologies can decorate teaching and gaining knowledge of. Also, the usage of the human-intelligence metaphor this study h-media (probably) people and era. Both make a contribution to the construction of expertise by way of teachers—and college students—with digital technologies. In secondary faculty mathematics lecture rooms, digital technologies are primarily handheld gadgets [2]. Technology, in its broadest feel, involves understanding, introduction, and using equipment and strategies to govern and adjust our environment. This definition includes each antilog technology along in assessment to analogy technologies that are properly integrated into all levels of our schooling device, the instructional capacity of those new virtual technology is starting to be realized [7]. While virtual tools can also support the usage of arithmetic to clear up troubles in real-global contexts, there are no broader hassle-fixing efforts on how this talent may be used, other essential factors of coaching and mastering mathematics, including scholar attitudes to arithmetic to solve problems in real-international contexts or mathematics to convey a crucial view of real-global activities and phenomena Using [8]. In addressing this new cognizance, it's miles recognized that there are many elements, with some boundaries, affecting whether or not and how a trainer can use virtual technology of their study room. This includes their ideals and attitudes towards technology, in addition to their notion of the nature of mathematical knowledge and how it should be found out. For a few teachers, advantageous use of digital era requires a good sized thoughts-set shift [3]. Digital generation that supports the mathematics coaching and studying process outside the lecture room, this study used an exploratory studies approach. A portal and cellular app were designed, with related teaching and gaining knowledge of activities, several math pathway obligations were designed, after which a sequence of pilots had been set up. As a pilot study, this look at involved 520 8th grade students and nine teachers from nine exceptional junior high schools in Semarang, Indonesia [5]. Digital generation in their teaching and trainer-initiated student studying sports. Furthermore, we analysed elements associated with generation use. 410 instructors in our sample, consultant of the country of Bavaria (Germany), reported spending huge time the usage of digital technologies in an average challenge. The effects imply that instructors' primary virtual abilities and era-related teaching abilities are greater vital than digital era sources. Although a sure level of digital era is important in college, our effects advocate that the focus ought to shift from equipping schools with the competencies of teachers to use technologies efficiently [4].

Course website

Quality elements of path internet site First this have a look at conducts an overview of the literature on route internet site excellent to broaden sixteen subscales, which can be used to degree course internet site quality. Second, a fuzzy AHP method is followed to decide the relative weights linking the above standards between high and coffee on line studying enjoy corporations. The consequences revel in companies concerning their evaluation of the exceptional of the course website. The evaluation model and results can offer treasured reference for gadget designers who need to improve path website overall performance [21]. Course websites I used it to create a tremendously simple website to supplement and beautify the school room measurement of the route. Students can also get admission to the internet site to perform the following responsibilities:

(1) study course announcements; (2) studying the curriculum syllabus; (three) download my multimedia shows; (four) view coursework; (five) connect to the textbook companion internet site and take on line practice quizzes; (6) test grades for exams, attendance, and extra credits; (7) send me electronic mail; and (8) a hyperlink to my home web page. During the second one elegance of the semester, I gave a step-via-step demonstration of how college students need to sign up and log in to the internet site [22]. Course Web Acceptance Model (CWAM) and the consequences show an awesome in shape to the information. Course website as a powerful and green learning era. The causal relationships between the constructs considered by CWAM have been properly supported, accounting for 83% of the overall variance in course internet site popularity and use of course websites inside the university context. In this paper, an exploratory have a look at is offered to evaluate the impact of internet site usefulness and ease of use on pupil recognition and use of this era. The cause of this paintings is to become aware of the important elements of direction website usefulness and simplicity of use that impact pupil attractiveness and use of direction websites. The findings of this examine will help teachers understand the crucial elements that lead to the effective and green adoption of route websites. Based on the discussion provided on this section, the following phase checks and validates the path internet site popularity studies model [23].

Digital camera

Digital cameras are imageless; They feel mild and shade thru an electronic tool (including a price coupled device (CCD)) and convey as output a laptop document describing a photo organized in a meaningful, pre-described layout the use of 1s and 0s. Often this virtual picture report is saved in the digital camera itself for transfer to a bigger computer [25]. Digital camera. Our technique recovers the position of an opaque item and the scene at the back of the item (however no longer completely obscured), when each the object and the scene are out of doors the camera's line of sight, without the need for controlled or time-various illumination. Such a retrieval is based on the visible penumbra of an opaque item, that is linearly dependent on the hidden scene that can be modelled by optical optics. Visual imaging using cheaper, ubiquitous device can be of sizable price in monitoring dangerous environments, navigating, and detecting hidden enemies [26]. Digital photo forensics, i.e. Supply figuring out the authentic virtual digital and detecting counterfeits. Existing source identity techniques have a look at exclusive processing ranges in a digital camera to obtain clues to differentiate supply cameras, while forgery detection tests for inconsistencies in photo excellent or positive characteristics as evidence of tampering [27].

Handheld computer

Handheld computers are a compact, tremendously inexpensive, incorporated platform for point-of-care clinical reference, patient and facts management, and a conversation device used to enhance their scientific practice. Also, advances in Wi-Fi technology provide physicians with access to Web-primarily based resources, consisting of evidence-primarily based references and Web-primarily based clinical databases, and computer systems in fitness care, and plenty of IT leaders and directors agree that hand-held computer systems will play a good sized function within the future. Health Care [28]. The Portability, social interaction Context sensitivity, connectivity Context sensitivity, connectivity of hand-held computer systems opens up Participatory and Augmented Reality New opportunities for creating simulations, it is a simulation of gamers They play roles in the organization, social It can capture its homes through contacts. Realistic simulations, simulations wherein virtual information are linked to real-international places and environments, are used in fields inclusive of environmental technology [29]. Desktop guidelines have been used, however had been now not totally fine, as there was a few indications that older adults may want to examine smaller textual content sizes on hand-held computer systems than recommended by means of the hints. Therefore, we felt it was crucial to research this similarly and make clear whether handheld computer systems have distinctive requirements additionally have a look at whether or not scrolling is essential while analysing text and which font size to pick out. We do not consider converting the font kind in this situation to make testing simpler; This will be investigated in a future look at [31]. In one examine, studies topics finished a menstrual record out of doors of a scientific putting the use of each paper forms and a handheld pc. Researchers found that records entry and clean-up time become reduced by using 81% with records from hand-held computers compared to records accumulated through paper paperwork. The hand held laptop missed much less records, treated skip patterns higher, and became desired by means of contributors Paperwork (Johannes et al. 2000). Green (2001) Portable Computing Systems Small enough and ethnic Can be used for research It is also quite strong. in lots of far off and urban settings [32].

Mobile phone

Mobile smartphone usage and features Modern telephones have diverse capabilities that had been now not viable years ago: Mobile telephones are not simplest for voice conversation (Ishii, 2006). College students can access the Internet, ship or obtain text messages, take a look at e mail, and video chat with others. Additionally, college students can get right of entry to diverse social networking sites (SNS) from their cell phones. Scholars Body and Ellison (2008) give an explanation for that SNS are on line offerings that permit people to create a profile, create a list of other customers who proportion a reference to the person, and consider a list of connections made by means of others inside the system [35]. Mobile phones are ubiquitous. In most of the advanced international, coverage reaches the populace, and even in far off villages of developing countries, it isn't always unusual to talk to someone on the road on a mobile cell phone. Because of their ubiquity, cell telephones have fuelled the creativity of scientists, using them as thousands and thousands of capability sensors in their environment. Mobile Phones Mobile Phone Datasets, Fourth Edition held in April Closely associated with this convention, an aspect topic has now risen, specifically the evaluation of cell telephone datasets for improvement purposes. For this motive, the telecommunications corporation Orange has proposed a project known as DD, the concept of which is to present get entry to a single dataset from an African u of a to a huge quantity of studies groups round the arena. Their goal is to provide suggestions for improvement based on observations extracted from cellular cell phone datasets [33]. Mobile telephone use is prohibited or unlawful in sure occasions and insure jurisdictions. However, a few humans use their cell phones regardless of diagnosed safety worries, rules and informal restrictions. Drawing capability predictors from the dependency literature, this observe sought to expect use and, especially, complex mobile telephone use from extraversion, vanity, neuroticism, gender, and age. To degree problem use, the

Mobile Phone Problem Use Scale was designed and validated as a reliable self-record tool against the Addiction Potential Scale and normal mobile telephone use levels [34]. To date, cellular smartphone malware has been basically negative and "evidence of idea". However, Trojans along with Vibe, which ship SMS messages to top rate fee numbers, signal a shift in malware motivations. Many count on that cellular telephone malware will begin to observe the tendencies of PC-based totally malware, as customers turn out to be more comfortable downloading and running cell smartphone software program [36].

Internet websites

Internet websites that promote those products. Because customers may not flip to their physicians or pharmacists for statistics regarding the usage of nutritional supplements for weight loss, it's miles imperative that fitness care providers actively interact their patients in an open dialogue about nutritional complement use, benefits, and dangers [39]. Internet utilization in India. For instance, Singh (2001) located that within the United States and Australia, men and women use the Internet exceptionally similarly, but in India, Japan, and China, men use the Internet extra than girls. Although Singh's (2001) look at become performed 10 years ago, this gender divide in Internet use nevertheless exists [40].

Video conferencing

The prototype machine supports multipart "surgical meetings" with outstanding audio and video channels. In addition to faraway control of the video source and motorized cameras, participants can dynamically manipulate the video channel to prioritize picture fine over frame rate if essential because of bandwidth constraints. To enhance the cooperative factor, each player's cursor is seen inside the video picture [42].

2. DEMATEL

The DEMATEL method can Specific problem, pinnip Bound problems, and structural modelling techniques that can contribute to identifying solutions that can work through a hierarchical structure, identifying the interdependence between the components of an organization for a reason, and influencing the fundamental Concept of situational relations and Due to the influence of the elements The chart uses a lot the directional graphs [13]. Built on the basic principle of DEMATEL, it executes Issues by visualization method Analyses and solves. Modelling this structure Approach adopts the form of a driven diagram, which is a causal effect for presenting values of influence between interrelated relationships and factors. By analysing the visual relationship of conditions between systemic Factors, all components a causal group and a The effect is divided into groups. It also provides researchers with Structure between system components Better understanding of the relationship and complexity for troubleshooting computer problems Can find ways [14]. The DEMATEL system is integrated Emergency management together Manage. In the manner proposed, it is not necessary to defuzzify obscure numbers before using the DEMATEL method. Therefore, this method is uncertain of evaluation Will truly reflect the character. Finally, to get the final results from different aspects Twice in each integrated PPA We use DEMATEL, which is ours [15]. Decision Testing and Assessment Laboratory (DEMATEL). The DEMATEL method is a powerful method gathering team knowledge to build a structured model and visualizing the causal relationship of subsystems. But crisp values The ambiguity of the real world Is adequate reflection [16]. DEMATEL explores the interdependence between equity The amount of investment factors and factors and ANP to assess their dependencies Integrates. This section is, first of all, DEMATEL Establishes network relationships through, secondly, for each factor ANP to increase weight compared to Uses. Third, systematic data collection process is provided [17]. The DEMATEL method effectively calculates the consequences between criteria, which efficiently separates the set of complicated elements right into a sender organization and a recipient institution and transforms it right technique to choosing a management gadget Between alternate configurations Explicit Priority Weights come from in addition, the ZOGP model allows companies to make full use of limited resources for planning to implement optimal management systems [18]. DEMATEL methods. This influence and causal Group barriers pro or Source for affected group barriers Can be considered due. Therefore, in order to effectively implement electronic waste management, barriers belonging to a causal or an influential group Should be considered on a priority basis. Therefore, decision makers need to determine obstacles The legal framework is strong Make sure there is controllable in order to minimize impact or influence barriers. Therefore, derived from ISM and DEMATEL methods The results are somewhat consistent. Integrated ISM DEMATEL Results for e-waste management constraints determines not only the structure but also the structure the interactions between these barriers [19]. DEMATEL studies, specific purpose for which DEMATEL is used. categories Factors or Only relationships between criteria The first type of clarification; Second type to identify the main factors in terms of Causal relationships and between them Relationship size; The third type, of criteria Analysis of relationships and attack levels The scale determines the weight by doing [20]. DEMATEL method. Accordingly, the preliminary drawback (cluster one) became about topics including the comparative weights of selection makers in the DEMATEL approach who did now not well bear in mind linking to the team decision making. Obviously, in a group decision-making hassle, regular decision-makers can always trust their factor of view and count on it to be prevalent via other selection-makers. This way that very last evaluation guides must be close to their judgments, and if the very last assessment effects are near their critiques, the choice maker is willing to simply accept it; Otherwise, they may deny it. It is believed that a significant purpose for the aforementioned discrepancies lies in methods based on unstructured comparisons such as DEMATEL [21]. DEMATEL is widely accepted for analysing the overall types. Therefore, this article considers each source as a criterion in decision making. Based on DEMATEL, the significance and level of significance of each piece of evidence can to deal with a mixture of conflicting evidence, it is necessary to expand the DEMATEL method with the source theory for better conclusions. In this article, instead of the comparative criteria provided by the experts in DEMATEL [22], the corresponding propositions between the bodies of sources is changed. The DEMATEL technique used the as well as creating causal relationships between criteria for evaluating the Integrated Multiple Scale Decision Making (MCDM) Outreach Personnel Program. Integrates DEMATEL and a new cluster-weighted system in which DEMATEL system is a company The reason for the complexity between the criteria This is to measure the influence of criteria. Buyukozkan and Ozturkcan integrated ANP and DEMATEL an innovation in terms of

technology Have developed an approach, which is for companies Helps determine important Six Sigma Projects and logistics specifically prioritize these projects Helps to identify in companies [23].

3. Analysis and Discussion

TABLE 1. Digital technology in teaching and learning

	Course website	Digital camera	Handheld computer	Mobile phone	Internet websites	Sum
Course website	0	2	3	2	2	9
Digital camera	3	0	2	1	1	7
Handheld computer	2	1	0	3	2	8
Mobile phone	1	4	2	0	2	9
Internet websites	2	2	1	1	0	6

Table 1 shows that DEMATEL Decision making trail and evaluation laboratory inDigital technology in teaching and learning with respect to Course website, Digital camera, Handheld computer, Mobile phone, Internet websites.

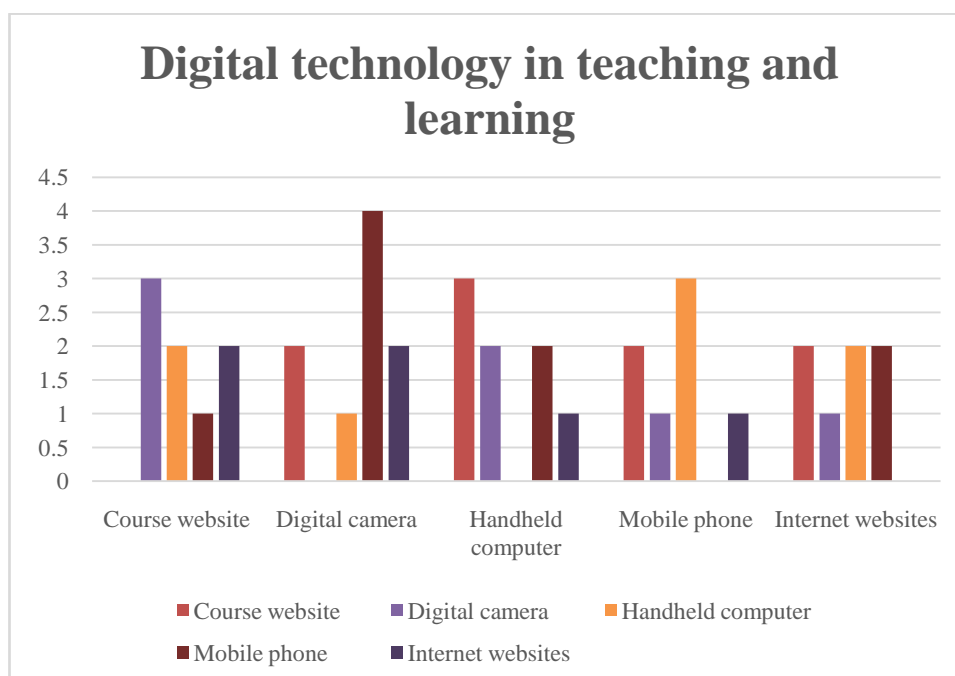


FIGURE 1. Digital technology in teaching and learning

Figure 1 shows that DEMATEL Decision making trail and evaluation laboratory inDigital technology in teaching and learning of Digital technology in teaching and learning with respect to Course website, Digital camera, Handheld computer, Mobile phone, Internet websites. It is the Digital technology in teaching and learning and comparison of Digital technology in teaching and learning is sum of the image.

TABLE 2. Normalization of Direct Relation Matrix

	Course website	Digital camera	Handheld computer	Mobile phone	Internet websites
Course website	0	0.222222	0.333333	0.222222	0.22222222
Digital camera	0.333333	0	0.222222	0.111111	0.11111111
Handheld computer	0.222222	0.111111	0	0.333333	0.22222222
Mobile phone	0.111111	0.444444	0.222222	0	0.22222222
Internet websites	0.222222	0.222222	0.111111	0.111111	0

Table 2 shows that the Normalising of direct relation matrix in Course website, Digital camera, Handheld computer, Mobile phone, Internet websites with respect to Course website, Digital camera, Handheld computer, Mobile phone, Internet websites The diagonal value of all the data set is zero.

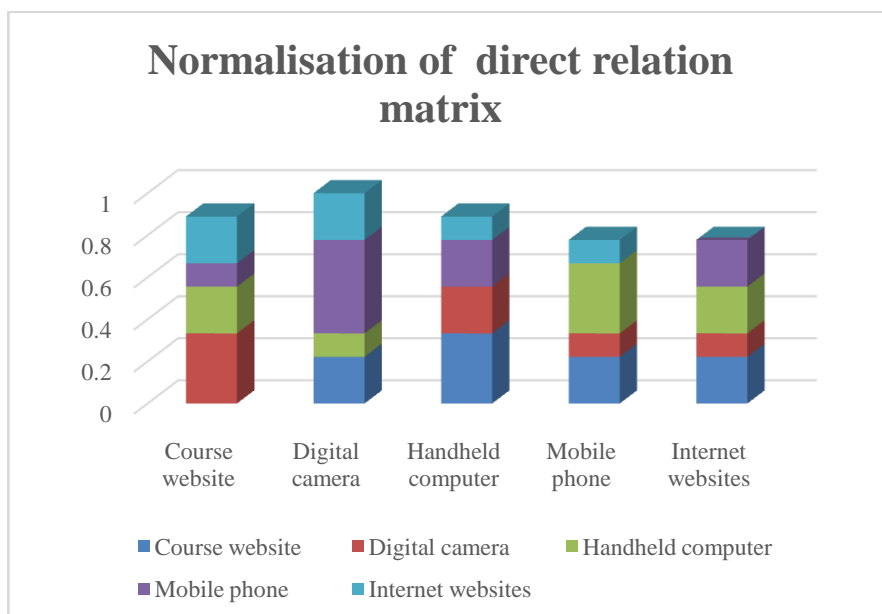


FIGURE 2. Normalisation of Direct Relation Matrix

Figure 2 Shows that chart for Normalising of direct relation matrix Course website, Digital camera, Handheld computer, Mobile phone, Internet websites has Different value.

TABLE 3. Calculate the Total Relation Matrix

	Course website	Digital camera	Handheld computer	Mobile phone	Internet websites
Course website	0	0.22222	0.3333333	0.2222	0.2222
Digital camera	0.33333333	0	0.2222222	0.1111	0.1111
Handheld computer	0.22222222	0.11111	0	0.3333	0.2222
Mobile phone	0.11111111	0.44444	0.2222222	0	0.2222
Internet websites	0.22222222	0.22222	0.1111111	0.1111	0

Table 3Shows theCalculate the total relation matrix in Digital technology in teaching and learning. Course website, Digital camera, Handheld computer, Mobile phone, Internet websites.

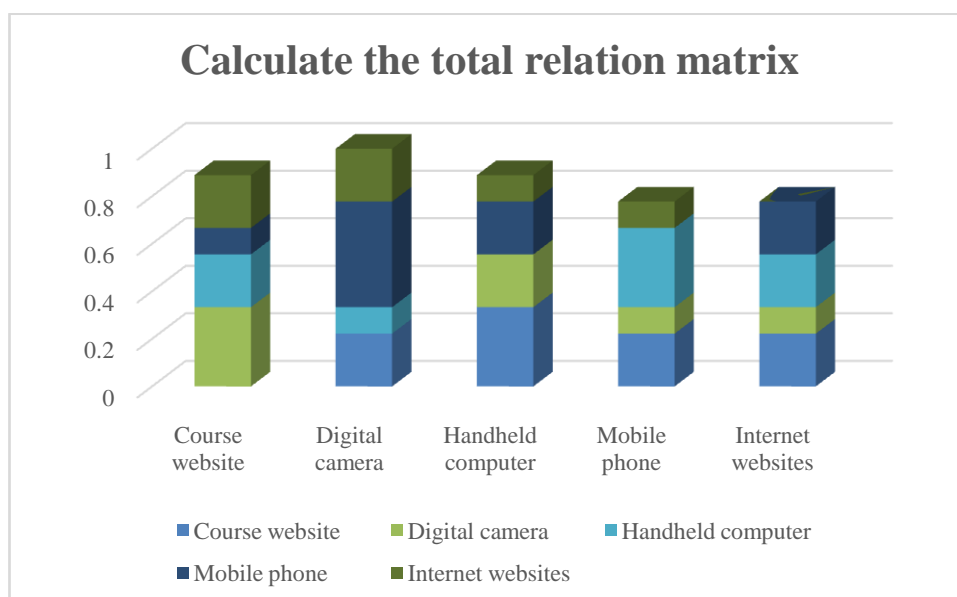


FIGURE 3. Calculate the Total Relation Matrix

Figure 3 shows the Calculate the Total Relation Matrix in Digital technology in teaching and learning Course website, Digital camera, Handheld computer, Mobile phone, Internet websites is Calculate the Value.

TABLE 4. $T= Y(I-Y)^{-1}$, I= Identity matrix

1	0	0	0	0
0	1	0	0	0
0	0	1	0	0
0	0	0	1	0
0	0	0	0	1

Table 4 Shows the $T = Y(I-Y)^{-1}$, I= Identity matrix in Digital technology in teaching and learning. Course website, Digital camera, Handheld computer, Mobile phone, Internet websites is the common Value.

TABLE 5. Y Value

0	0.222222	0.333333	0.222222	0.222222
0.333333	0	0.222222	0.111111	0.111111
0.222222	0.111111	0	0.333333	0.222222
0.111111	0.444444	0.222222	0	0.222222
0.222222	0.222222	0.111111	0.111111	0

Table 5 Shows the Y Value in Digital technology in teaching and learning is Course website, Digital camera, Handheld computer, Mobile phone, Internet websites is the Calculate the total relation matrix Value and Y Value is the same value.

TABLE 6. I-Y Value

1	-0.222222	-0.333333	-0.222222	-0.222222
-0.333333	1	-0.222222	-0.111111	-0.111111
-0.222222	-0.111111	1	-0.333333	-0.222222
-0.111111	-0.444444	-0.222222	1	-0.222222
-0.222222	-0.222222	-0.111111	-0.111111	1

Table 6 Shows the I-Y Value Digital technology in teaching and learning is Course website, Digital camera, Handheld computer, Mobile phone, Internet websites table 4 $T = Y(I-Y)^{-1}$, I= Identity matrix and table 5 Y Value Subtraction Value.

TABLE 7. (I-Y)-1 Value

2.362834898	1.630696	1.613178	1.396783	1.375143
1.393176093	2.195901	1.322075	1.115984	1.095374
1.420998397	1.45758	2.243817	1.36793	1.280341
1.453972979	1.749199	1.50292	2.166533	1.332894
1.154110373	1.206664	1.068583	0.951111	1.839363

Table 7 Shows the (I-Y)-1 Value Digital technology in teaching and learning is Course website, Digital camera, Handheld computer, Mobile phone, Internet websites Table 6 shown the Minverse Value.

TABLE 8. Total Relation matrix (T)

1.362834898	1.630696	1.613178	1.396783	1.375143
1.393176093	1.195901	1.322075	1.115984	1.095374
1.420998397	1.45758	1.243817	1.36793	1.280341
1.453972979	1.749199	1.50292	1.166533	1.332894
1.154110373	1.206664	1.068583	0.951111	0.839363

Table 8 shows that The Total Relation Matrix the direct relation matrix is multiplied with the inverse of the value that the direct relation matrix is subtracted from the identity matrix.

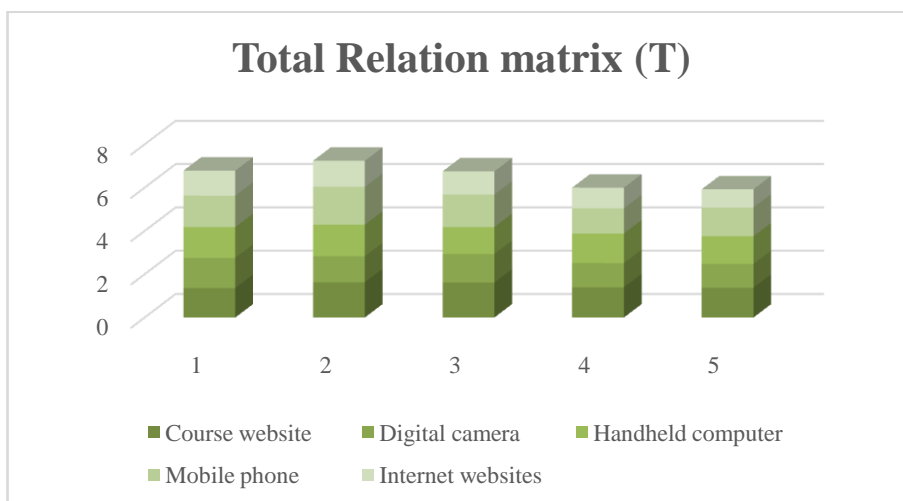


FIGURE 4. Total Relation Matrix (T)

Figure 4 shows The Total Relation Matrix the direct relation matrix is multiplied with the inverse of the value that the direct relation matrix is subtracted from the identity matrix.

TABLE 9. Digital technology in teaching and learning Ri, Ci

	Ri	Ci
Course website	7.378635	6.785093
Digital camera	6.12251	7.240039
Handheld computer	6.770666	6.750572
Mobile phone	7.205519	5.99834
Internet websites	5.219831	5.923117

Table 9 shows the Digital technology in teaching and learning Ri, Ci Value in Course website is showing the Highest Value for Ri and Internet websites is showing the lowest value. Digital camera is showing the Highest Value for Ci and Digital camera is showing the lowest value.

TABLE 10. Calculation of Ri+Ci and Ri-Ci To Get The Cause And Effect

	Ri+Ci	Ri-Ci	Rank	Identity
Course website	14.16373	0.593542	1	cause
Digital camera	13.36255	-1.11753	3	effect
Handheld computer	13.52124	0.020094	2	cause
Mobile phone	13.20386	1.207179	4	cause
Internet websites	11.14295	-0.70329	5	effect

Table 10 shows the Calculation of Ri+Ci and Ri-Ci to Get the Cause and Effect. Course website, Digital camera, Handheld computer, Mobile phone, Internet websites. Course website, Handheld computer, Mobile phone is Showing the highest Value of cause. Digital camera, Internet websites is Showing the lowest Value of effect.

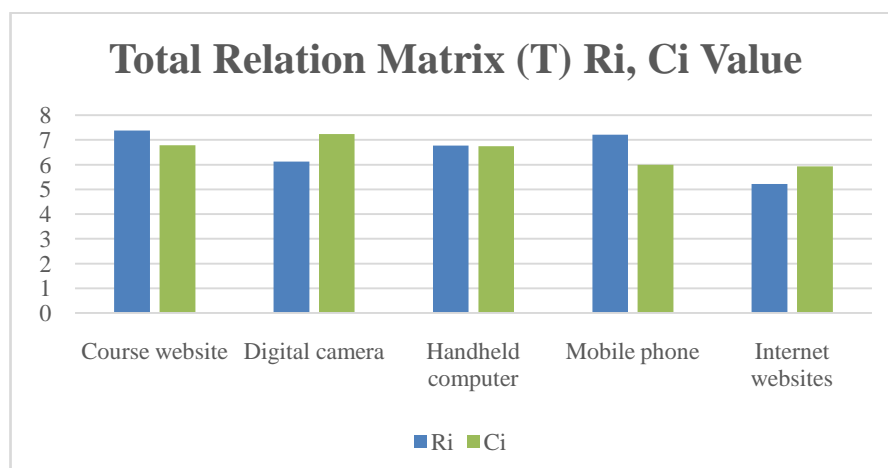


FIGURE 5. Total Relation Matrix (T) Ri, Ci Value

Figure 5 shows the Total Relation Matrix (T) Ri, Ci Value Digital technology in teaching and learning of Course website,

Digital camera, Handheld computer, Mobile phone, Internet websites. Course website showing the highest value for Total Relation Matrix (T) Ri showing the lowest value, Digital camera showing the highest value for Ci Value and Internet websites is showing the lowest value.

TABLE 11. T Matrix Value

1.362835	1.630696	1.613178	1.396783	1.375143
1.393176	1.195901	1.322075	1.115984	1.095374
1.420998	1.45758	1.243817	1.36793	1.280341
1.453973	1.749199	1.50292	1.166533	1.332894
1.15411	1.206664	1.068583	0.951111	0.839363

Table 11 shows the T Matrix Value Calculate the average of the matrix and its threshold value (alpha) **Alpha 1.307886421** If the T matrix value is greater than threshold value then bold it.

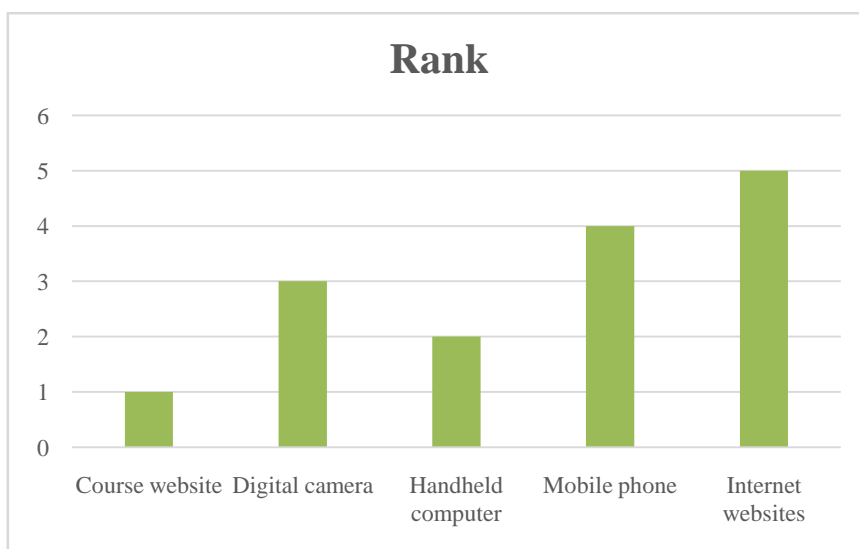


FIGURE 6. Shown the Rank

Figure 6 shows the Rank using the DEMATEL for Digital technology in teaching and learning. Course website is got the first rank whereas is the Internet websites is having the Lowest rank.

4. Conclusion

Digital school rooms are described by way of the usage of electronic devices or platforms which includes social media, multimedia and cellular telephones to educate college students. One of The most superb outcomes of era on students is that it widely supports and enhances the studying method of students. Quality elements of path internet site First this have a look at conducts an overview of the literature on route internet site excellent to broaden sixteen subscales, which can be used to degree course internet site quality. Digital cameras are imageless; They feel mild and shade thru an electronic tool (including a price coupled device (CCD)) and convey as output a laptop document describing a photo organized in a meaningful, pre-described layout the use of 1s and 0s. Often this virtual picture report is saved in the digital camera itself for transfer to a bigger computer Handheld computers are a compact, tremendously inexpensive, incorporated platform for point-of-care clinical reference, patient and facts management, and a conversation device used to enhance their scientific practice. Mobile smartphone usage and features Modern telephones have diverse capabilities that had been now not viable years ago Internet websites that promote those products DEMATEL (Decision Making Trial and Evaluation Laboratory) They are divided into analysis using the Digital technology in teaching and learning in Course website, Digital camera, Handheld computer, Mobile phone, Internet websites is Evaluation Parameters Digital technology in teaching and learning in the value. Digital technology in teaching and learning. Course website is got the first rank whereas is the Internet websites is having the Lowest rank.

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