

# The Importance of Employing YouTube Videos as a Learning Tool in Education

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## Abstract

YouTube is a website for sharing videos, making it simple for students to create, distribute, and watch educational videos. The purpose of this article was to investigate the experience of teachers in employing YouTube videos within the classrooms, kinds of YouTube videos, advantages of employ YouTube in education and challenging of using YouTube videos in classrooms. This review showed that incorporating YouTube in education has great impacts and benefits on students and teachers. YouTube videos impact learning content creation and assessment, students' attitudes and behaviours, and student educational performance. This study showed that employing YouTube videos in education makes the best use of modern media to spread knowledge and information. It also helps to foster the attitude of productive dialogue among students. There are some challenges facing students and teachers related to incorporating YouTube videos in education including technological problems, lecture preference, awareness, and time.

**Keywords:** YouTube, learning, education, video podcasts, classrooms.

## I. Introduction

Education is a process that helps students become more adept at interacting with their internal and external environments as well as achieving their stated and unstated goals and objectives (Wang et al., 2010). The learning process might be guided or self-directed. It could happen through routine daily activities or through actions taken specifically to further one's education. For this, they make use of many educational tools. A learning resource is described as a tool used for educational purposes in any format, actual or virtual, that: (i) supports or demonstrates one or more concepts from a course or course of study; and (ii) could enhance the student's or teacher's learning experience (Ordu, 2021).

Since its humble beginnings as a tiny business in 2005, YouTube has developed into the world's most popular free video-sharing network. With up to 73% of US adults using it, it is also the most popular social media platform and one of

the most widely used apps (app) on mobile devices (Frag et al., 2020; Burke and Snyder, 2008). More than 2 billion people use YouTube each month, and 91% of them are between the ages of 18 and 29 (Staziaki et al., 2021). Every day, more than a billion hours of video are seen, with tablets and smartphones streaming more than 70% of that total (Staziaki et al., 2021; Prabhu et al., 2021). Given its popularity, YouTube is considered a fantastic educational resource for many users, including university students.

Technology's development has made it easier to divide the tasks involved in producing and consuming knowledge-driven services like education. The learning tools and instructional material are now accessible to students over the Internet, where they can access them at their own pace and in the way that best suits their needs (Abbas, 2022). Although the teacher-led learning scenario and self-driven learning through digital

resources have qualitatively different characteristics, access to better content and instructional quality has given students from less prestigious institutions the chance to better equip themselves. The development of content for various learning purposes and the availability of that content to other students were both made possible by technological advancements (Srinivasacharlu, 2020).

The importance of keeping up with the times has led to a great interest in the variety of teaching techniques. Numerous websites have emerged that have aided in the advancement of the educational and learning process. The most significant of these websites are YouTube, which focuses on displaying and delivering videos. On their personal computers or mobile devices, users can view, upload, download, share, and comment on videos using this free service.

This review study is significant because it will help responsible authorities and specialists the scope of media studies to take into account contemporary technical innovations that have significantly altered how students communicate and engage with one another. Highlighting some of the benefits can help forecast its impacts in the future and how they will affect the quality of education in Palestine, allowing social planners to plan ahead for these changes. In addition, the value of research to society is to understand how YouTube fits into the educational process, how well it satisfies students' needs, wants, and interests, and how to help students succeed by paying attention to and interacting with lessons and those in charge of online learning. Although there are different attempts and successful experiences related to employing YouTube in Education, it has not been highlighted in Palestine. Therefore, this study aims to investigate the experience of teachers in employing YouTube videos within the classrooms, kinds of YouTube videos, advantages of employ YouTube in education and challenging of using YouTube videos in classrooms.

## **2. Literature review**

### **2.1. The overview of YouTube**

YouTube is a website for sharing videos, making it simple for users to create, distribute, and watch some videos. In terms of internet videos, it becomes the most popular resource (Burke and Snyder, 2008). Thousands, if not millions, of entertaining, educational, political, medical, and historical videos from all around the world are hosted on YouTube.

### **2.2 YouTube Videos as an Educational tool**

The internet is no longer merely a place where we save our information; it is instead a platform for the creation of events and knowledge. In light of this, education, which serves as a portal for the growth and construction of human minds, must take advantage of this technology, particularly YouTube, and employ it to the extent that it facilitates our student's learning and increases their proficiency as well as their ability to interact, participate, and contribute to the development of their personalities (Almurashi et al., 2016).

With the emergence of audiographs, video streaming, and webcasting, research on video podcasts in education first emerged in 2002. The use of video podcasts in education was constrained by download times between 2000 and 2005 since high-speed bandwidth was very uncommon (Smith, 2010); hence, there was little research in this area. The use of video podcasts for pleasure and teaching is said to have changed due to two important considerations. First, YouTube, a website created to transmit a variety of video clips, was introduced in February 2005. By the year 2006, YouTube had 100 million daily visitors. Over 3 billion people watched YouTube videos daily as of May 2011 (Henry, 2011). YouTube, which was first used for pleasure, is a free resource for many instructive videos on various topics.

The dominant feature of the modern world is communication and information technology, which has evolved into managing the world using keyboard shortcuts in order to get closer to a

world that is speeding up continuously and knowledge is being astonishingly increased. The World Wide Web is one of the vehicles for disseminating this technological advancement; it does not, however, summarize its full scope. As the globe advances, the network advances to fulfill our demands for imparting knowledge to others. Increased bandwidth availability is considered the second factor that altered the level of YouTube use in education. According to study on the usage of YouTube in education, high speed internet access in homes and classrooms increased significantly between 2006 and 2010 (Smith, 2010).

Both students and teachers now need to use technology as a tool since it allows for the flexible construction of new forms focused on collaboration and inquiry while also enhancing academic performance. While we observe the teaching staff gaining technological skills and valuing its value and content, they are also broadening the range of activities that can profit from its use. In order to allocate benefits from the increased electronic new resources, educational bodies have started to modify their teaching methods and employ active learning approaches, particularly YouTube channels (Solano et al., 2020).

### **2.3. Kinds of YouTube videos**

Although early versions of YouTube videos started to appear in the form of audiographs (Loomes et al., 2002), video streaming (Foertsch et al., 2002), and webcasting (Reynolds & Mason, 2002). Since 2005, you can classify YouTube videos based on their goal, segmentation, pedagogical approach, and academic focus.

### **2.4. YouTube as an effective communication tool**

One of the most famous and useful free video websites is YouTube, which offers a variety of educational benefits. One of the fundamental tenets of teaching is to engage as many senses as you can so that students can connect what they

are learning to real-world experiences. One of the most crucial tools of the second generation of the internet is YouTube, which serves as a publication platform that allows teachers to undertake graphical projects and share them with students via e-mail or social media so they may access them whenever they want (Al-Atiyat, 2018).

The previous studies defines YouTube as the most famous video sharing site in the world, which enables individuals to share, download, or watch any required videos. The teacher can preview a huge number of clips that are appropriate for the various lessons using a display screen in the classroom or school lab thanks to the Internet's accessibility. As an example, you could upload files, edit them online, comment on them, and make the required changes to them (Al-Atiyat, 2018).

### **2.5. The advantages of employ YouTube in education**

Depending on how it is used, YouTube can be a powerful and inspiring educational tool for students. Its use can be considered a way for students to learn on their own and can be a helpful and practical educational tool for due to the effective content that is provided in it. With high speed internet, everyone may access YouTube as a universe unto themselves and gain knowledge from the videos there. However, YouTube can be used in education as a primary or alternative tool, and it can even be incorporated as an aid in the classroom to help clarify the lessons that are challenging for students to understand. However, the process of using YouTube in education properly is a real challenge for However, the process of using YouTube in education properly is a real challenge for those teachers, managers, or supervisors in educational institutions (Solano et al., 2020; Fadhil et al., 2022).

Many previous studies highlights the importance of incorporating YouTube videos in education (Pratama et al. 2020; Abbas & Qassim, 2020; Solano et al., 2020). The benefits of employ YouTube videos within the classrooms can be summarized as follows:

1. As a forum for pupils to interact and not only watch content, it fosters creativity.
2. YouTube makes the best use of modern media to spread knowledge and information.
3. Helps to foster the attitude of productive dialogue among students.
4. Creates a free educational community in which users may engage, offer feedback, and work on developing and sharing information with their peers.
5. It is suitable for teaching students at various stages and can be utilized for lifelong learning.
6. It is regarded as one of the available free educational resources and a vital factor in finances for schools.
7. the simplicity with which YouTube links can be used in e-learning environments like Moodle and presentations created with Microsoft Power Point.
8. Given that the language of pictures is a worldwide language, it aids in overcoming various challenges, particularly those pertaining to the learning process. Due to the utilization of multiple senses when learning the content, the lesson is presented in a creative way that aids in making the learning material more memorable and long-lasting.
9. It incorporates sound, image, and movement, engaging two senses in the learning process.
10. It focuses on rewriting and presenting the events in an exciting manner that makes them seem realistic and elicits an enthusiastic response from the students.
11. It presents a shared experience, so bridging the disparities in experiences amongst group members.
12. It exceeds parameters set by nature, such as danger, size, and distance. Additionally, it teaches ideas and concepts that are challenging to theoretically express. It also aids in documenting urgent situations.
13. Teaching takes less effort and time than the traditional method because education with movies is more pleasurable and because it keeps track of skills and production experiences that aren't available in the activity room, including plant growth and the development of its components.

## **2.6. Potential challenging of using YouTube videos in classrooms**

Many studies and research presented the most challenges of using YouTube videos in education. Four major categories were used to organize the challenges with using YouTube videos in education: reasons not to use YouTube videos, attitudes toward YouTube videos, behaviors, and effects on academic achievement (Fadhil et al., 2022).

### ***Reasons not to use YouTube videos***

The literature research revealed four areas of challenges: technological problems, lecture preference, awareness, and time. Technical issues, such as large file sizes, slow downloads, lack of a mobile device, display issues, or difficulty getting video podcasts to operate, were major challenges. Students' penchant for lectures presented another important obstacle. Most students just preferred lectures in one study (Chester et al., 2011), and they said that YouTube videos were insufficient to meet their needs. Due to their perception that video podcasts were unrelated to the course's learning objectives, students declined to watch them in two more studies (O'Bannon et al., 2011). In a different study, students said that watching video podcasts from home had more interruptions and was less interesting than attending lectures in person (Foertsch et al., 2002). According to three researchers, pupils missed having the opportunity to ask questions and receive prompt clarification on matters (O'Bannon et al., 2011). Last but not least, Winterbottom (2007) observed that some students watched video podcasts twice as long as they did lectures.

### ***Attitudes toward YouTube videos***

The current literature study found only favorable answers in terms of affective attitudes toward video podcasts, although various issues were raised in terms of cognitive attitudes. According to two studies, students preferred lectures over video podcasts and viewed the latter as at most supplemental teaching tools (Parson et al., 2009).

According to Walls et al. (2010), students preferred fresh, meaningful content and felt that supplemental video podcasts were too repetitive. Finally, Winterbottom (2007) found that students who had only been exposed to YouTube videos yearned for greater in-person interaction.

### ***Influence of YouTube videos on student behavior***

Regarding behaviors and YouTube videos, three issues were previously noticed by the specialists. Student attendance was the first problem. According to the study of Chester et al. (2011), they showed that students who watched videos regularly attended fewer lectures. It's interesting that none of these research explained why missing classes was a problem. There was no proof shown to support the claim that students who viewed video podcasts and skipped lectures would perform worse academically or socially. Second, although the reasons for the limited use were not provided, some previous studies found that viewing of videos were not frequent (Wang et al., 2010). It was reported that students felt they needed to be much more concentrated when using videos rather than listening to traditional lectures, which raised the question of self-discipline (Traphagan et al., 2010).

### ***Influence of YouTube videos on learning performance***

According to certain research, videos did not significantly affect test scores, learning, learning performance, or teacher-student relationships (Hill & Nelson, 2011). None of these studies looked at the reasons why learning was unaffected by videos. On the other hand, different studies confirm that videos have positive impact on the performance and achievements of students (Almurashi, 2016).

### **Conclusion**

This review showed that incorporating YouTube in education has great impacts and benefits on students and teachers. YouTube videos impact

learning content creation and assessment, students' attitudes and behaviours, and student educational performance. This study showed that employing YouTube videos in education makes the best use of modern media to spread knowledge and information. It also helps to foster the attitude of productive dialogue among students. There are some challenges facing students and teachers related to incorporating YouTube videos in education including technological problems, lecture preference, awareness, and time.

### **References**

- [1] Abbas, F. M. (2022). YouTube and its role in developing and documenting e-university education—a survey on a sample of students from the Department of Media-studying Al-Israa University College. *Journal of Positive School Psychology*, 1912-1924.
- [2] Abbas, F., & Ali, Q. T. (2020). Investigating the effectiveness of YouTube as a learning tool among EFL students at Baghdad University. *Arab World English Journal (AWEJ) Special Issue on CALL*, (6).
- [3] Al-Attiyat, Ahlam Falih Hassan, The effect of using YouTube in teaching the correct pronunciation of the English language among kindergarten children in private schools in the capital Amman governorate, (unpublished master's thesis), Middle East University, College of Educational Sciences, 2018.
- [4] Almurashi, W. A. (2016). The effective use of YouTube videos for teaching English language in classrooms as supplementary material at Taibah University in Alula. *International Journal of English Language and Linguistics Research*, 4(3), 32-47.
- [5] Burke, S. C., & Snyder, S. L. (2008). YouTube: An Innovative Learning Resource for College Health Education Courses. *International Electronic Journal of Health Education*, 11, 39-46.
- [6] Burke, S., & Snyder, S. (2008). YouTube: An Innovative Learning Resource for College Health Education Courses.

- International Electronic Journal of Health Education, 11(1), 39–46.
- [7] Chester, A., Buntine, A., Hammond, K., & Atkinson, L. (2011). Podcasting in education: Student attitudes, behaviour and self-efficacy. *Educational Technology & Society*, 14(2), 236–247.
- [8] Fadhil, A., Oleiwi, H., Kareem S., Al Jouani, I., Al-Majidi, J. (2022). YouTube and its role in developing and documenting e-university education—a survey on a sample of students from the Department of Media-studying Al-Israa University College. *Journal of Positive School Psychology*, 1912-1924.
- [9] Faizi, R., El Fkihi, S., Rudneva, M., & El Afia, A. (2018). INVESTIGATING THE IMPACT OF YOUTUBE ON ENHANCING STUDENTS'COMPUTER SKILLS. In *EDULEARN18 Proceedings* (pp. 8396-8400). IATED.
- [10] Farag, M., Bolton, D., & Lawrentschuk, N. (2020). Use of youtube as a resource for surgical education—clarity or confusion. *European urology focus*, 6(3), 445-449.
- [11] Foertsch, J., Moses, G. A., Strikwerda, J. C., & Litzkow, M. J. (2002). Reversing the lecture/homework paradigm using eTeach—— web-based streaming video software. *Journal of Engineering Education*, 91(3), 267–274.
- [12] Henry,A.(2011).YouTubehits3billionviewsp erday,48hoursofvideouploadedper minute. [Web log post]. <<http://www.geek.com/articles/news/youtub e-hits-3billion-views-per-day-48-hours-of-video-uploaded-per-minute-20110526/>>.
- [13] Hill, J. L., & Nelson, A. (2011). New technology, new pedagogy? Employing video podcasts in learning and teaching about exotic ecosystems. *Environmental Education Research*, 17(3), 393–408. doi:10(1080/13504622), 2010, 545873.
- [14] Jackman, W. M., & Roberts, P. (2014). Students' perspectives on YouTube video usage as an e-resource in the university classroom. *Journal of Educational Technology Systems*, 42(3), 273-296.
- [15] Loomes, M., Shafarenko, A., & Loomes, M. (2002). Teaching mathematical explanation through audiographic technology. *Computers & Education*, 38(1– 3), 137–149.
- [16] Nord, J. H., Paliszkievicz, J., & Koohang, A. (2014). Using social technologies for competitive advantage: impact on organizations and higher education. *Journal of computer information systems*, 55(1), 92-104.
- [17] O'Bannon, B. W., Lubke, J. K., Beard, J. L., & Britt, V. G. (2011). Using podcasts to replace lecture: Effects on student achievement. *Computers & Education*, 57(3), 1885–1892. doi:10.1016/j.compedu.2011.04.001.
- [18] Ordu, U. B. A. (2021). The Role of Teaching and Learning Aids/Methods in a Changing World. *Bulgarian Comparative Education Society*.
- [19] Prabhu, V., Lovett, J. T., & Munawar, K. (2021). Role of social and non-social online media: how to properly leverage your internet presence for professional development and research. *Abdominal Radiology*, 46(12), 5513-5520.
- [20] Pratama, S. H. H., Arifin, R. A., & Widianingsih, A. W. S. (2020). The use of youtube as a learning tool in teaching listening skill. *International Journal of Global Operations Research*, 1(3), 123-129.
- [21] Reynolds, P. A., & Mason, R. (2002). On-line video media for continuing professional development in dentistry. *Computers & Education*, 39(1), 65–97. doi:10.1016/S0360-1315(02)00026-X.
- [22] Smith, A. (2010). Home broadband. Pew Internet & American Life Project.<<http://pewinternet.org/Reports/2010/Home-Broadband-2010.aspx>>.
- [23] Solano, L., Cabrera-Solano, P., Ulehlova, E., & Espinoza-Celi, V. (2020, July). Using EFL YouTube videos as supplementary resource for teaching vocabulary: a case study in secondary education. In *Proceedings of the 5th International Conference on Information and Education Innovations* (pp. 40-45).
- [24] Srinivasacharlu, A. (2020). Using YouTube in Colleges of Education. *Shanlax*

- International Journal of Education, 8(2), 21-24.
- [25] Staziaki, P. V., de Oliveira Santo, I. D., Skobodzinski, A. A., Park, L. K., & Bedi, H. S. (2021). How to use YouTube for radiology education. *Current Problems in Diagnostic Radiology*, 50(4), 461-468.
- [26] Traphagan, T., Kusera, J. V., & Kishi, K. (2010). Impact of class lecture webcasting on attendance and learning. *Educational Technology Research and Development*, 58(1), 19–37. doi:10.1007/s11423-009-9128-7.
- [27] Wang, R., Mattick, K., & Dunne, E. (2010). Medical students' perceptions of videolinked lectures and video-streaming. *Research in Learning Technology*, 18(1), 19–27. doi:10.1080/09687761003657622.
- [28] Winterbottom, S. (2007). Virtual lecturing: Delivering lectures using screen casting and podcasting technology. *Planet*, 18, 6–8. <http://www.gees.ac.uk/planet/p18/sw.pdf>.