



Canva Application Development for Distance Learning on Arabic Language Learning in MTs Thawalib Tanjung Limau Tanah Datar

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Abstract

The Covid-19 pandemic hits the world and also Indonesia. It has affected the learning that can not be done in the class so that the interaction between teachers and students directly could not be done. It leads to a decrease in students' emotional learning abilities. In pandemic situation, Distance learning is the answered to resolve the education system in the world including Indonesia. Education must be able to utilize the applications available to be used as learning media. One of the applications that can be utilized to create learning media is Canva. This study is done in MTs Thawalib Tanjung Limau Tanah Datar to find out the effectiveness and practicality of Canva applications that can be used online in Video format. The method used in this study by following the Borg and Gall R & D (Research and Development) models. This study only comes to the sixth step which at that step focuses only on field trials. The researcher does observation on Arabic language learning materials at-ta'aruf and assessments conducted by the teachers, but they used WA Group and Google Classroom, and the media used internet available. Then, the researcher created the video is developed as a learning medium during distance learning for Arabic language learning. The last, the results of the field trials are the results of content verification on audiovisual learning media using the Canva application for distance learning with an average of 4.66 or in an excellent category with a maximum score of 5.00. While the average field test score on students' responses to learning media using the Canva app for distance learning is 3.78 and the maximum score is 5.00.

Keywords: Arabic Language Learning, Canva Application, Distance Learning

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INTRODUCTION

Distance learning is also called different space learning which steps and learners are not in one real room, but steps and learners are in a platform called cyberspace. The learning process in distance learning uses an application or software such as Zoom or Google Meet (Haqien & Rahman, 2020; Mahayoni, 2020; Hamid, 2020). These applications are called tools to perform video conferences where learning is along synchronously or in real-time. Teachers and students are in their spaces (their homes) while still doing teaching and learning activities (Herliandry et al., 2020; Handarini & Wulandari, 2020; Sadikin & Hamidah, 2020).



Mohammad Imam Farisi, (2021) stated that distance learning has been utilized and realized since the 1800s. Utilization in the academic universities system began in the 1850s. The University of Chicago was the first university in the world to implement a distance learning system. The distance learning system in Indonesia began to be developed for higher education in 1984 until the late 1990s at the Open University (UT). UT is the only state university in Indonesia that implementing a distance learning system.

Nowadays, distance learning has been utilized in the education system in the world including Indonesia. In Indonesia, doing teaching and learning online is very emphasized following orders issued by the Ministry of Religion and the Ministry of Education and Culture that learning in Indonesia is done online or cyberspace (in the network) in elementary school / MI, junior high school / MTs, high school / MA even to the level of universities caused by the Covid-19 pandemic that hit the world and also Indonesia. This pandemic has affected the learning that can not be done in the class so that the interaction between teachers and students directly could not be done. This leads to a decrease in students' emotional learning abilities. In addition, steps also encounter limitations in monitoring students' learning and emotional behaviors. (Mareta et al., 2021). Therefore steps must have a variety of skills so that online learning can be quality such as face-to-face learning, therefore education must be able to utilize the applications available to be used as learning media.

One of the applications that can be utilized to create learning media is Canva. This application is so appropriate for distance learning because the results of this canva can be shared to various social media platforms and also deliver a lesson material (Canva. (n.d.), 2020; Ferry Aristya, Ayatollah Muhammadin Al Fath, Zuniar Kamaluddin Maburri, 2020). Canva is provided for free by its founder, the app already provides several templates that can be utilized to create interactive learning presentations or videos. Canva is an online-based application that provides attractive designs in the form of templates, functions, and various categories provided. With a diverse and interesting design, the teaching and learning process will not be bored (Pelangi, 2020). Using the Canva app, steps can teach learners knowledge, creativity, and skills. It can also be used in all areas of education. Following the exposure in the study, canva application is suitable to be used as a medium of presentation learning or in the form of video (audiovisual) in several subject areas.

Canva application has been widely used as a medium of skills to create certificates, children's learning media and make interesting presentation materials and videos (Purwati, YuliPerdanawanti, 2019; Bakri et al., 2021). Canva application can follow the development of technology without losing the characteristics of any country, can be used as a learning medium, and able to improve student learning outcomes. (Leryan et al., 2018; Cape & Faiza, 2019; Rahmatullah et al., 2020).

The results of the presentation video designed in the Canva application are also very suitable to be used as a learning medium because in the video can add animations provided by Canva and can also add sound that has been provided the results can be developed into audiovisual learning media. Audiovisual can be said to be effective, providing reasoning in observing to add students' understanding (Bylund & Athanasopoulos, 2015; Abna & Nawawi, 2018). In (Becker & Sturm, 2017) that audiovisual has a positive impact on listening skills. From this, there are several advantages that can be obtained from the Canva application, which are as follows: it has an intuitive interface that is easy to use, has thousands of templates and is provided free of charge, and more uniquely, this application does not require installation on a computer, because it is a web-based application. cloud, as well as mobile applications available for Android and iPhone.

After seeing the researchers' explanations about the advantages of Canva application that can be developed into a learning medium, be it audio, visual, and audiovisual, therefore the author conducted a study on Madrasah Tsanawiyah Thawalib Tanjung Limau, which previously the author had conducted field observations. Teachers at the school conduct distance learning by using a social media application, WhatsApp, which only conducts learning with the system of sending lesson materials through class groups, the material is taken in textbooks that are in the form of photos or copies of text and without developing in the form of audiovisual media including Arabic teachers. Whereas if the video editing application is used, the lessons become more fun, many students say that the way the teacher delivers learning materials is less understandable and the learning is not interesting. Therefore, this research was conducted to develop distance learning in Arabic language learning grade 1 Madrasah Tsanawiyah. The Canva application in this case is used as an audiovisual learning medium (in the form of Video).

RESEARCH METHODS

This study uses a development method or known as research and development (R&D) (Sugiyono, 2008). This research was conducted at MTs Thawalib Tanjung Limau which was devoted to class VII in the Arabic language lesson at-ta'aruf material with a total of 40 students. The R&D method is a method used to produce a particular product and to test the effectiveness of the product. Each development study can choose and determine the steps that are most appropriate with the specific conditions it faced in the development process (Ardhana, 2002). Therefore this study chose the development model oriented by Borg and Gall, there are ten steps Borg and Gall (Arifin, 2012). This model is a model that can be used to develop multimedia, namely the incorporation of text, images, and sound (McCormick in (Suyanto, 2003). Understanding each of these steps can be explained in the plan or overview of the Borg and Gall product development as follows:

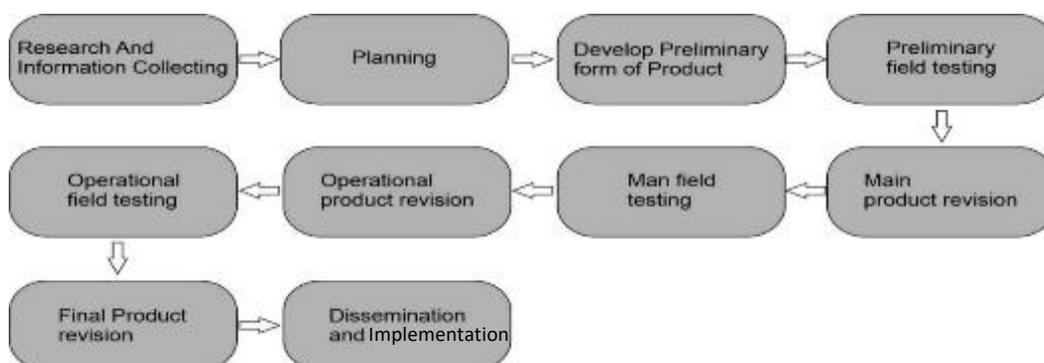


Figure 1. Borg and Gall Model Development Procedure (Bennett et al., 1984)

In addition, to understand each of these steps, it can be explained as follows: 1) Research and Data Collection (Research and Information Collection). At this step, surveys and observations are conducted. The purpose of the survey and observation is to analyze the requirements and determine the causative factors of the problem to develop a new model. 2) Planning. Planning means this step is a step of product activities designed to solve problems. The plan in this study is to design an interesting audiovisual-based learning medium. 3) Development of the first form of the product (Develop Preliminary form of Product). At this step, the first product was developed which included preparing materials, procedures, and designing learning media in the Canva application for Arabic learning distance learning, and evaluation tools. The research process is conducted

through product design verification by experts in their fields. The verification results will be used for revising the product design before testing. 4) Preliminary field trials. The next step is the limited trial step. Data obtained from limited trials are then analyzed and evaluated to improve product follow-up applications. To ensure that the activity meets the characteristics of the student, this study tested several students. 5) Revising the test results (Main product revision). Make major revisions to the product based on trial recommendations. If obstacles are found in the implementation process, the activity will be revised. 6) Field trials (Main field testing). After the revision was conducted, a larger test event that is a field trial. The process at this step is to implement the product as a product developed in a wider field and under more practical conditions. 7) Improvement of the product results of field trials (Operational Product Revision). Based on the test recommendations, the product will be used is revised before to resolve the problem that is still not appropriate when the product is applied or the product is ready to be operationalized 8) Field test (Operational field testing) At this step, the number of people who do the test is more than in previous trials. The test is to determine the effectiveness of the product or media obtained after various evaluations and modifications to the previous test results. This test can be expanded to the research population, namely students at madrasah Tsanawiyah level 9) Final Product Revision. At this step, a revised version of the final product is ready to be released and applied in the field. The results of such data can be used as a basis for revising the final product. 10) Dissemination and implementation. The last step of this research model is the distribution of the product. Product distribution is carried out after going through the steps of the quality control process, data analysis technology, and research and development process (R&D).

Based on limited perception, the steps in this study were limited to the sixth step. Due to limited research time, this study eliminates the eighth to tenth steps.

The data collection methods used in this study are as follows: 1) The interview method is used to obtain initial data as the basic material for analysis when determining audiovisual media using the Canva application for distance learning on Arabic language learning. 2) Questionnaires (questionnaires) of product verification have evaluation rules. In this developmental study, questionnaires are used to obtain complete information about the feasibility of products developed by experts as verifications. 3) The tables or observation sheets in this study were conducted to determine the implementation of applied product development. The developed product adopts a form of audiovisual learning media (video).

Analysis of the data obtained to evaluate the effectiveness and practicality of audiovisual learning media (video) using the Canva application for distance learning on Arabic learning. The validity of audiovisual learning media (video) involves the validity of the content and the validity of the structure. To check the validity of the content is used an opinion form validator that has a rating of 5 with a category. Score 5 = Excellent, Score 4 = Good, Score 3 = Enough, Score 2 = Less, Score 1 = Very Less. The validity of audiovisual learning media in the form of video (generating video) using the Canva app for distance learning on Arabic learning is determined by changing the average total score using the following criteria:

Table 1. Criteria for Language Mean Values in Audiovisual Media

Value	Score Interval	Category
5	>4.20	Excellent
4	3.41 - 4.20	Good
3	2.61 - 3.40	Enough
2	1.81 - 2.60	Less
1	≤ 1.80	Very lacking

(Widoyoko, E, 2009)

In this study, the lowest product feasibility was determined to achieve a good category, so that the product is suitable for learning in the classroom.

The usefulness of developed video-based audiovisual learning media is measured by implementing learning tools and media in the classroom. Data on the usefulness of audiovisual learning media in this case in the form of video is obtained through observation and response of learners to the achievements used. Analyze the data obtained to get practical value. Average scores in student observations and responses are converted into Table 2.

Table 2. Audiovisual Media Practicality Criteria

Score Interval	Category
$3.5 \leq Sr < 4.0$	Very practical
$2.5 \leq Sr < 3.5$	Practical
$1.5 \leq Sr < 2.5$	Impractical
$1.0 \leq Sr < 1.5$	Very impractical

(Sadra, 2007)

Description:

Sr= average score

Sr= $\frac{\text{Number of scores of all items}}{\text{many items}}$

In this study, if the minimum average value reached the practical category or was in intervals of $2.5 \leq Sr < 3$, then the audiovisual learning media in the form of the video developed is considered to have practical value.

RESULTS AND DISCUSSION

The result of this study is a video. It is an audiovisual learning media that using canva application and containing material about at-ta'aruf in Madrasah Tsanawiyah. The results of the study are in line with the steps of research that have been conducted, namely: (1) Research and Information Collecting, (2) Planning, (3) Develop Preliminary Form Of Product, (4) Preliminary Field Testing, (5) Main Product Revision, (6) Main Field Testing. A more complete description of the research process above is as follows:

1) Research and Information Collecting

At this step, the observations that are done are about the use of media used by students or media that is often used by steps when teaching distance learning on Arabic language learning materials at-ta'aruf and assessments conducted by the teachers.

- a) The media used by teachers are limited to online classrooms in the form of advocacy groups using WhatsApp and Google Classroom applications.
- b) Learning activities are conducted by using the WhatsApp application and Google Classroom, teachers only provide the materials from textbooks or photos of lessons, then explain it by sending messages or using audio recorded by the teacher, and also sent to the class group. Students are less trying to find materials related to the lesson, even though pictures and videos are already widely available on the internet.
- c) The unavailable of audiovisual in learning media.
- d) Lack of teacher knowledge about software that can be developed for learning media.

e) Teachers rarely take training on technology-based learning media.

Based on the problems described above, the researchers are interested in developing canva application for distance learning in Arabic language learning so that learning can be more effective, efficient, and fun, especially learning during the pandemic.

2) Planning

At this step will be collected information about all materials that can be used and utilized to design learning media using canva application which in this case will be created audiovisual learning media (in the form of video) for distance learning on Arabic learning material at-ta'aruf which is expected to solve existing problems. In addition, in this planning take the material in the teaching book grade 1 Madrasah Tsanawiyah Ministry of Religion of the Republic of Indonesia in 2020. The material chosen is CHAPTER 1 about at-ta'aruf which will be developed and designed as audiovisual media in the form of video using the Canva application.

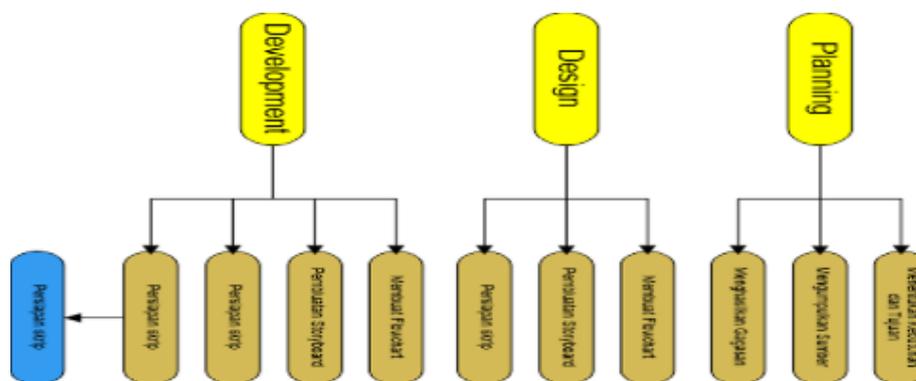


Figure 2. Scheme of Video Media Development Procedure (Alessi & Trollip, 2001)

3) Develop Preliminary Form of Product

At this step, the development of audiovisual media products that include material preparation, preparation of procedures or teaching materials, and evaluation tools. The research process is conducted through verification of audiovisual media product design by experts in their fields. The verification results will be used for revising the product design before testing.

The practitioner will verify the first draft prepared in the next step are made, to get opinions or suggestions before improving the first draft. Suggestion results of this audiovisual media design validity can be seen in the following table:

Table 3. Language Validation Result Suggestions on Canva Application Development for distance learning

No	Advice
1	The intro at the beginning of the video should have an interesting animation
2	Consistency in using fonts and their size
3	The materials used refer to the teaching book
4	Black and white correction of the image in the video
5	Sound on Video should be clearer than back sound

Table 4. Summary of Media Validation Results in Canva Application Development for distance learning

No	Validation Aspects	Average	Category
1	Initial opening view of the video	4.48	Excellent
2	Animation design in video	4.70	Excellent
3	Sound and back sound additions	4.80	Excellent
	Average	4.66	Excellent

The results of content verification on audiovisual learning media use the Canva application for distance learning with an average of 4.66 or in the excellent category. In this study, the minimum qualification of language validation in audiovisual learning media using Canva application for distance learning reached a good category. Validation results show that the development of Canva application for distance learning is suitable for learning media in Madrasah Tsanawiyah grade 1.

Opinions or suggestions obtained at the validation step will be used as a reference for improving the development of Canva applications that have been developed into video or audiovisual media.

4) Preliminary Field Testing

The next step is the first limited field test. The result data from the limited trial is then analyzed and evaluated to improve audiovisual media further. To ensure that the learning media fulfill the curriculum requirements, this research was tested on several grades 1 students in Madrasah Tsanawiyah. In limited field trials, there is usually not much input so that videos are suitable for use in the learning process in the classroom.



Figure 3. Mufradat introduction view

5) Main Product Revision

The next step is to make revisions based on suggestions on learning media based on trial recommendations. Based on the test results, because there are no obstacles in the learning process in the classroom, there are no revisions in the audiovisual media. In other words, it becomes the last video that can be used for classroom learning (field testing).



Figure 4. Revised Video Scene View

6) Field testing (Main Field Testing)

After the revision, the test was conducted to a larger step, namely the field test. The process at this step is to implement the product as a product developed in a wider area and under more practical conditions. It was conducted in Arabic subjects Grade 1 Madrasah Tsanawiyah. The test aims to find out the usefulness and benefits of developed videos.



Figure 5. Conversations About At-Ta'aruf

In the learning process, there are no obstacles to the operation of learning videos because the size of the video file supports the students' device. Data on the practicality of learning media using Canva application for distance learning is measured by disseminating questionnaires at the end of the learning process. Assessment data is shown in Table 5 below:

Table 5. Student Response to Video (The Use of Canva Application for Distance Learning)

	Aspects asked	Assessment Results	
		Average score	Criteria
1	I love learning to use Video Media	3.96	Good
2	Intro on video is very interesting	3.95	Good
3	The content in the video corresponds to the textbook	3.78	Good
4	I'm very happy because I can add vocabulary	3.85	Good
5	With this video, I understand Arabic learning materials	3.65	Good
6	Abstract vocabulary becomes clear	3.65	Good
7	With this video, I am happier to learn Arabic	3.75	Good
8	The back sound video makes learning even more fun	3.85	Good
9	The image in the video is clear	3.65	Good
10	Animations in videos make learning even more interesting	3.75	Good
	Average	3.78	Good

It was seen from the table above that the average score of students' responses toward learning media using the Canva app for distance learning that has been developed is 3.78 and the highest score is 5.00. Based on the practical criteria that have been described, it can be said that the development of Canva application for distance learning which in this case is in the video is stated to be practical (good) and can be used in Arabic language learning grade 1 Madrasah Tsanawiyah.

CONCLUSION

Based on the analysis and discussion that were explained, the conclusions of this study are: 1) The development of Canva application for distance learning on Arabic language learning in Madrasah Tsanawiyah is stated to have eligibility for utilizing in Arabic subjects, which has a score of 4.66, meaning very good, with a maximum score of 5.00. 2) The development of Canva application for distance learning on Arabic language learning in Madrasah Tsanawiyah is assessed effectively with the results of a good category response that assesses are learners with a score of 3.78, for a maximum score of 5.00.

By referring to research problems and support from the results of this study, the following suggestions can be submitted. 1) This study produced audiovisual media in the video category using the Canva app. To get a good video and design with professional animation, and also it is necessary to improve and redesign the video that has been developed, and it is necessary to test the video in a different class with the experimental class that has similarities in the learning process. (2) Learning media that using Canva application for distance learning in the form of video is very practical and has interesting animations that can be used by students, and other researchers can refer to this video if they want to do development research method in the same process.

REFERENCES

- Abna, N., & Nawawi, N. (2018). The Effectiveness of Audiovisual Media in Learning Arabic Language (Qualitative Research of Arabic Literature Students, Faculty of Letters and Arabic Language Education, Faculty of Religion, UMI). *Tamaddun*, 17(2), 40–45. <https://doi.org/10.33096/tamaddun.v17i2.12>
- Alessi, S. M., & Trollip, S. R. (2001). Multimedia for Learning: Methods and Development. *European Journal of Education Studies*, 1(1), 50–56. <http://oapub.org/edu/index.php/ejes/article/view/5/53>
- Bakri, N. F., Simaremare, E. S., Lingga, I. S., Susilowaty, R. A., Farmasi, J., Matematika, F., Alam, P., & Cenderawasih, U. (2021). *Jurnal Ilmiah Pro Guru*, Vol. 7 No. 1, Januari 2021 ISSN: 2442 – 2525, E-ISSN: 2721-7906 PELATIHAN PEMBUATAN MATERI PRESENTASI DAN VIDEO PEMBELAJARAN MENGGUNAKAN APLIKASI CANVA KEPADA GURU DI KOTA MEDAN DAN JAYAPURA SECARA ONLINE *Jurnal Ilmiah Pro*. 7(1), 1–10. <http://journal2.um.ac.id/index.php/jipg/article/view/18777>
- Becker, S. R., & Sturm, J. L. (2017). Effects of audiovisual media on L2 listening comprehension: A preliminary study in French. *CALICO Journal*, 34(2), 147–177. <https://doi.org/10.1558/cj.26754>
- Bennett, N., Borg, W. R., & Gall, M. D. (1984). Educational Research: An Introduction. *British Journal of Educational Studies*, 32(3), 274. <https://doi.org/10.2307/3121583>
- Bylund, E., & Athanasopoulos, P. (2015). Televised Whorf: Cognitive Restructuring in Advanced Foreign Language Learners as a Function of Audiovisual Media Exposure. *The Modern Language Journal*, 99(S1), 123–137. <https://doi.org/10.1111/j.1540-4781.2015.12182.x>
- Canva. (n.d.). (2020). *Canva Untuk Pendidikan*. https://www.canva.com/id_id/pendidikan/
- Ferry Aristya, Ayatullah Muhammadin Al Fath, Zuniar Kamaluddin Mabruhi, N. P. P. (2020). PEMANFAATAN GOOGLE FORM DAN OFFIE 365 UNTUK MENINGKATKAN KUALITAS GURU DALAM PEMBELAJARAN DARING DI SEKOLAH DASAR. *PROSIDING SEMINAR NASIONAL DALAM JARINGAN HASIL PENELITIAN DAN ABDIMAS TAHUN 2020*, 313–319. https://lppm.stkippacitan.ac.id/?page_id=2719
- Hamid, A. (2020). Pemanfaatan Aplikasi Zoom Meeting dalam Proses Pembelajaran di Masa Pandemi Covid-19 Pada Mahasiswa Jurusan Pendidikan IPS FKIP Universitas Tadulako. *Jurnal Pendidikan Ilmu Sosial*, 17(2), 166–174. <http://jurnal.fkip.untad.ac.id/index.php/jurpis/article/view/632>
- Handarini, O. I., & Wulandari, S. S. (2020). Pembelajaran Daring Sebagai Upaya Study From Home (SFH) Selama Pandemi Covid 19. *Jurnal Pendidikan Administrasi Perkantoran (JPAP)*, 8(3), 465–503. <https://journal.unesa.ac.id/index.php/jpap/article/view/8503>
- Haqien, D., & Rahman, A. A. (2020). Pemanfaatan Zoom Meeting untuk Proses Pembelajaran pada Masa Pandemi Covid-19. *SAP (Susunan Artikel Pendidikan)*, 5(1). <https://doi.org/10.30998/sap.v5i1.6511>
- Herliandry, L. D., Nurhasanah, Suban, M. E., & Heru, K. (2020). Transformasi Media Pembelajaran Pada Masa Pandemi Covid-19. *Jurnal Teknologi Pendidikan*, 22(1), 65–70. <http://journal.unj.ac.id/unj/index.php/jtp>
- Leryan, L. P. A., Damringtyas, C. P., Hutomo, M. P., & Printina, B. I. (2018). *the Use of Canva Application As an Innovative Presentation Media Learning History*. 190–203. <https://doi.org/10.24071/snfkip.2018.20>
- Mahayoni, N. M. S. (2020). Penggunaan Aplikasi Zoom Meeting Pada Pembelajaran

- Agama Hindu Di Masa Pandemi. *Jurnal Widya Sastra Pendidikan Agama Hindu*, 3(1), 47–53.
<https://www.jurnal.stkipahsingaraja.ac.id/index.php/wspah/article/view/67>
- Mareta, P. R., Arif M, A., & Susanto, S. (2021). The Social Skills of Students in the Pandemic Period (The Case Study in SMAN 1 Kedunggalar, Ngawi District, East Java, Indonesia). *Budapest International Research and Critics in Linguistics and Education (BirLE) Journal*, 4(1), 369–376. <https://doi.org/10.33258/birle.v4i1.1618>
- Mohammad Imam Farisi. (2021). KARAKTER DAN PENGEMBANGANNYA DALAM SISTEM PENDIDIKAN JARAK JAUH. *Jurnal Pendidikan Terbuka Dan Jarak Jauh*, 13. <http://www.jurnal.ut.ac.id/index.php/jptjj/article/view/411>
- Muhammad Suyanto. (2003). *Multimedia Alat untuk Meningkatkan Keunggulan Bersaing*. Penerbit: Andi.
https://books.google.co.id/books?hl=en&lr=&id=3uAMIBpFfoUC&oi=fnd&pg=PA255&ots=Hcifl9EHo&sig=PtDZy-wGZ8WxpTGi9FWKr9aIoil&redir_esc=y#v=onepage&q&f=false
- Pelangi, G. (2020). Pemanfaatan Aplikasi Canva sebagai Media Pembelajaran Bahasa dan Sastra Indonesia Jenjang SMA/MA. *Jurnal Sasindo UNPAM*, 2(8), 79–96.
<http://dx.doi.org/10.32493/sasindo.v8i2.79-96>
- Purwati, YuliPerdanawanti, L. (2019). PELATIHAN DESAIN MENGGUNAKAN APLIKASI CANVA UNTUK ANGGOTA KOMUNITAS IBU PROFESIONAL BANYUMAS RAYA. *JPMM (Jurnal Pengabdian Mitra Masyarakat)*, 1(1), 42–51.
<https://ejournal.amikompurwokerto.ac.id/index.php/jpmm/article/view/821>
- Rahmatullah, R., Inanna, I., & Ampa, A. T. (2020). Media Pembelajaran Audio Visual Berbasis Aplikasi Canva. *Jurnal Pendidikan Ekonomi Undiksha*, 12(2), 317–327.
<https://ejournal.undiksha.ac.id/index.php/JJPE/article/view/30179>
- Sadikin, A., & Hamidah, A. (2020). Pembelajaran Daring di Tengah Wabah Covid-19. *BIODIK*, 6(2), 109–119. <https://doi.org/10.22437/bio.v6i2.9759>
- Sadra, I. W. (2007). Pengembangan Model Pembelajaran Matematika Berwawasan Lingkungan dalam Pelatihan Guru Kelas 1 Sekolah Dasar. *Diseratasi*.
<https://scholar.google.com/scholar?cluster=5352253412164365115&hl=en&oi=scholar>
- Sugiyono. (2008). *Metode penelitian pendidikan: (pendekatan kuantitatif, kualitatif dan R & D)*. Alfabeta.
<https://scholar.google.com/scholar?cluster=10328650190657588078&hl=en&oi=scholar>
- Tanjung, R. E., & Faiza, D. (2019). CANVA SEBAGAI MEDIA PEMBELAJARAN PADA MATA PELAJARAN DASAR LISTRIK DAN ELEKTRONIKA. *Jurnal Vokasional Teknik Elektronika Dan Informatika*, 7(2), 79–85.
<http://ejournal.unp.ac.id/index.php/voteknika/article/view/104261>
- Wayan Ardhana. (2002). *Konsep penelitian pengembangan dalam bidang pendidikan dan pembelajaran*. Universitas Negeri Malang.
https://scholar.google.com/scholar?cluster=10113727944295505425&hl=id&as_sdt=2005&scioldt=0,5s
- Widoyoko, E, P. (2009). Evaluasi Program Pembelajaran. *Yogyakarta: Pustaka Pelajar*, 283.
https://www.academia.edu/download/33381764/Evaluasi_Program_Pembelajaran.pdf
- Zainal Arifin. (2012). *Penelitian pendidikan: metode dan paradigma baru*. Bandung: Remaja Rosda karya.
<https://pdfs.semanticscholar.org/8b11/a752f5f7142f4d5191fb70b0cc916c76752d.pdf>