

The Development of Problem Based Learning Method Toward Marquee Media with the Concept of HOTS

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ABSTRACT

As we know that learning requires materials to support its activities. This study aims to determine the feasibility of teaching materials in the form of a book entitled Problem Based Learning (PBL) method through Marquee Media. The research method in this study is R&D by Sugiono. The setting of this research was in the Hasyim Asy'ari University. The data was collected by interview and questionnaire. The data was analyzed by using expert review, limited trial, and field trial. This research resulted a textbook that not only is assessed by the expert validators but also given suggestions and input for revision improvements.

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1. INTRODUCTION

The article must be written in English. The introduction should briefly place the study in a broad context and highlight why it is important. It should define the purpose of the work and its significance. The current state of the research field should be reviewed carefully, and key publications cited. Please highlight controversial and diverging hypotheses when necessary. Finally, briefly mention the main aim of the work and highlight the principal conclusions. As far as possible, please keep the introduction comprehensible to scientists outside your particular field of research. References should be cited as (Kamba, 2018) or (Marchlewska et al., 2019) or (Cichocka, 2016; Hidayat & Khalika, 2019; Ikhwan, 2019; Madjid, 2002) or (Miller & Josephs, 2009, p. 12) or Rakhmat (1989). See the end of the document for further details on references. Technical terms should be defined. Symbols, abbreviations, and acronyms should be defined the first time they are used. All tables and figures should be cited in numerical order. The length of the introduction is about 20% of the entire page.

Learning is a process in which activities take place with students and educators as well as learning resources in a good environment. It is held as an effort to improve students' thinking skills, the ability to construct new knowledge, and the ability to master subject matter. Therefore, learning needs to be designed as well as possible and as epic as possible. Recently, the government has experienced online learning. It is because Indonesia is experiencing the Covid 19 pandemic. Online learning is a learning that is done without face-to-face, but through an available platform/ media. All forms of subject matter are distributed online, communication is also carried out online, and tests are also carried out online.

This online learning system is assisted by several applications, such as Google Classroom, Google Meet, Edmodo, Zoom and etc. In online learning, it is also necessary to pay attention to the selection of methods and media to support so that the learning objectives can still be achieved even with the online system. It is because learning requires teaching materials to support learning activities.

Providing a good teaching materials for students is a majority. According to Widodo and Jasmadi in Lestari (2013:1), eaching materials are learning facilities or tools which consist of methods, media, models, learning materials, standards/parameters and evaluation methods that are designed in a structured manner so that learning objectives can be achieved in accordance with existing competency standards. Meanwhile, according to Asrizal, et al (2018), teaching materials are one part of teaching resources which can be interpreted as something that contains learning messages, both specific and general in nature so that it can be utilized for learning purposes. The current situation of Indonesia's education is unstable due to the COVID-19 pandemic, which is quite disturbing for the world's citizens. The education system inevitably changes drastically. Changes in the learning system attract more attention because learning must carry out two-way communication between teachers as educators and students as learners. Meanwhile, in the current situation, learning is not performed directly or face-to-face, but online where educators and students meet in online classes using various applications/platforms. One of the learning supports is teaching materials. Tthe manufacture of teaching materials must be adapted to current conditions where students which are the main focus can understand the material taught through online learning. This is the main work for educators. In addition, educators must also train students to think at a higher level (Hots). It is because students cannot learn directly with their educators, they can only learn online and they will study alone at home without the assistance of educators, so students must be trained to think at a higher level.

This research is important because a textbook must be developed before it is actually used in the learning process. By developing a textbook, we will know how appropriate the textbook can be used in the learning process. In addition, it is effective to train students during online learning by giving them assignments that can develop their thinking through critical thinking. Students can be creative in solving problems and able to collaborate with friends.

The relevant research in this study is the research of Ria Rahmawati, Sukidjo with the title Development of PBL-Based Teaching Materials in Economics Lessons to Improve Social Skills of High School Students. The content of the research is PBL-based teaching materials. It used Dick & Carey with 5 stages. Those are needs analysis, development design, initial product, evaluation, and final product. The results of the feasibility test of problem-based learning teaching materials from 2 material experts in terms of the feasibility of the content was in the very good score category and the linguistic feasibility was also in the very good category score. It can be said that the aspect of problem-based learning-based teaching materials was in the very good score category. Meanwhile, the feasibility test of 2 media experts, in terms of appearance was also in the very good categories. So it can be said that media experts assessed the book assessment was in the very good category of problem-based learning-based teaching materials. For the MANOVA test results after problem-based learning teaching materials are used in learning in the experimental class, it showed that there is a difference with the control class.

The next relevant research is from Edi Purwanto, with the title The Development of Project Based Learning Teaching Materials for PAI in Stai Al-Hikmah Tanjung Balai Learning Media Course. The conclusion of Edi's research is that this study aimed to develop teaching materials based on Project Based Learning (PBL) learning models in PAI learning media courses. The type of research used is research and development with the Analysis Design Development Implementation Evaluation (ADDIE) model which includes Analyze, Design, Development, Impementation, Evaluation. The data collection techniques were interviews and questionnaires. The development results are validated by content experts, design experts and media experts. Furthermore, a trial was conducted by involving 40 students of the Islamic Education Study Program at STAI Al-Hikmah Tanjung Balai in semester VI. The trials included: 1) individual trials, 2) small group trials, 3) field trials. Based on the results of expert validation and trials conducted on product development, it can be concluded that this assessment

product meets the criteria very well and obtains very decent qualifications. The results of the analysis of student response data showed an average percentage of 79.3% which means it was in good qualification.

The third study was from Anisah Anisah, et al. with the title *The Development of HOTS-based Teaching Materials to Improve Students' Mathematical Problem Solving Ability*. It resulted the Higher Order Thinking-based mathematics teaching materials for second semester students of PGSD study program who take Mathematics 1. The teaching materials were the question form of Higher Order Thinking-based teaching materials (modules) as well as the evaluation form to measure mathematical problem solving abilities. The result showed the developed teaching materials meet the valid and it is effective. This type of research is development research by using ADDIE procedure (Analysis, Design, Development, Implementation, Evaluation). The other result of this research is the improvement of students' mathematical problem solving ability after applying Higher Order Thinking-based mathematics teaching materials. In addition, through these teaching materials, students become accustomed to the higher-order thinking so that they are able to solve any given mathematical problem. From this study, it was found that the average increase in students' mathematical problem solving abilities from 57.50 to 87.90. Thus, the development of HOTS-based mathematics learning modules can improve students' mathematical problem solving abilities.

HOTS Thinking in the Social Sciences Problem Based Learning Method by Emy Triasningsih with the results of the PBL learning method, HOTS thinking and social studies learning motivation. This means that the higher the use of PBL learning methods and motivation, the higher the HOTS Social Sciences thinking ability, so that it can provide direction to teachers to use varied learning methods, one of which uses the PBL learning method with the aim that students are better able to think. HOTS and able to solve a problem and build their own knowledge, so they can motivate students to be more active in social studies learning activities.

The development of problem based learning (pbl) learning tools based on higher order thinking skills (hots) for students of class xi science in the great world by Wahyu Anggoro with the following research results *Development of Problem Based Learning Learning Tools based on Higher Order Thinking Skills for students of class XI science*, in the early stages of validation with learning model experts and HOTS, a percentage of 91% was obtained with very good/decent criteria, then in the final validation stage, a percentage of 100% was obtained with very good/decent criteria. Then the results of validation with experts or curriculum experts in the early stages obtained a percentage of 83.3% while in the final stage it got a percentage of 97.3%, this shows that the product has very decent criteria. In the initial and final validation stages by material experts, a percentage of 87% was obtained so that the criteria was very feasible and in the early stages of validation with linguists a percentage was obtained 84.7% and the criteria was very good/appropriate, while in the final stage the percentage was obtained with a value of 95, 8% and has very good/decent criteria.

From the five articles, we conclude that teaching materials are indispensable for the learning process with the aim of obtaining the desired results in accordance with the learning objectives. The similarity of this research with previous research lies in the development of teaching materials. The difference is the development of our research teaching materials with the concept of the HOTS learning pattern.

In this study, the concept of the HOTS learning pattern will be discussed. Higher Order Thinking Skills are started at the kindergarten, elementary until university level. The implementation invites students to apply the 3C, namely Critical Thinking, Creative Thinking and Collaborative Thinking. The reason why the concept of the HOTS learning is applied in this research is because of the learning carried out by lecturers and students in online learning resulted students still can't think at high levels, can't think creatively in solving problems and can't collaborate well with their friends. Based on these factors, the researcher took the title *"The Development of PBL method toward marquee media with the concept of HOTS learning in Online Learning in the Covid 19 Pandemic situation*. The aim of this research is to know the effectiveness of PBL method toward marquee media with the HOTS concept in

online learning and to know the results of material development of how to teach the PBL method through the media marquee with the HOTS concept. The long term goal of this research is to contribute to the learning process that has the HOTS concept to train students to think at a higher level. The method used in this research is the R&D. The urgency of this research is that the students are still given assignments online which can develop their thinking through critical thinking. They can be creative in solving problems. And they are able to collaborate with friends. Because teaching materials are very important for the learning process, so the researcher here conduct a research entitled "The Development of PBL Teaching toward Media Marquee with the concept of HOTS in Online Learning in the Covid 19 Pandemic situation.

2. METHODS

The research method in this study is R&D. It is a research method used to produce certain products and test the effectiveness of these products (Sugiyono, 2012:297). According to Ghufroon (2011), the purpose of R&D in education is to overcome the imbalance between what occurs in educational research and its implementation in the real world and improve the quality of education. With the existence of development research, whether carried out by experts or new researchers, it has more or less influence on the object of research, in this case the students. They can feel the benefits of the products produced from this research. This research develops PBL method teaching materials through marquee media with the concept of HOTS learning patterns so that these teaching materials can be an innovation in education. The development model in this study adapts the 10 steps of Dick & Carey's development model (2005, P.6). These are (1) Identify instructional goals, (2) Conduct instructional analysis, (3) Analyze learners and contexts, (4) Write performance objectives, (5) Develop assessment instruments, (6) Develop instructional strategy, (7) Develop and select instructional materials, (8) Design and conduct formative evaluation of instruction, (9) Revise instruction and (10) Design and conduct summative evaluation. However, these steps were adapted into 5 steps to make it effective. Those are the needs analysis stage, the product design stage, the development stage, the implementation stage, and the evaluation stage.

This textbook trial was conducted to determine the level of validity, attractiveness, effectiveness and practicality of the product developed by the researcher. The textbook trial consisted of 3 stages, namely expert review, limited trial, and field trial. The presence of researchers is very necessary in every activity at the research site because researchers act as planners, data collectors, observers, implementers, and reporting research results. Researchers collaborate with lecturers at Hasyim Asy'ari University Jombang in conducting product trials. The researcher acts as a product development designer and implementer of trials, while the lecturer acts as an evaluator. This is to determine the level of practicality of textbooks during the learning process.

In this study, the trial subjects consisted 3 test subjects. The test subjects selected were: material/content experts, media experts, and students of the Indonesian Language and Literature Education study program in semester 5. The types of data obtained were based on validation and testing which is numerical data (quantitative) and verbal data (qualitative). Numerical data were obtained from the calculation of expert validation questionnaire scores, student response questionnaires and, assessment of student activities and learning outcomes. While the verbal data (qualitative) is in the form of responses, input, and suggestions for improvement from experts, lecturers and students. The data collected through a series of trials can be distinguished according to their functions as follows: (1) data to test product validity in the form of review data from experts; (2) data to determine the attractiveness of the product in the form of data obtained from a limited test; (3) data to determine the effectiveness and practicality of the product in the form of data from field trials. To obtain the expected amount of data, a data collection instrument was used. Product validity data used an instrument in the form of a validation sheet. The product attractiveness data used a student response questionnaire instrument. The product effectiveness data was collected using an assessment sheet to collect data on student learning outcomes and observation sheets to assess student learning activities. The product

practicality data used instruments in the form of student response questionnaires and lecturer response questionnaires. The data analysis technique used is descriptive data analysis, namely descriptive analysis and quantitative descriptive analysis. Qualitative descriptive analysis was used to analyze data obtained from notes, suggestions, or comments. Quantitative descriptive analysis was used to analyze data in the form of scores/numbers. The score results obtained from expert validation sheets, lecturer and student response questionnaires.

3. FINDINGS AND DISCUSSION

The most important point in a learning process is teaching materials, one of which is books. The characteristics of learning products developed in this research is teaching materials, namely a book entitled PBL Method through Media Marquee. The developed book has a size of 15.5 x 23 cm, using paper weighing 100 gsm with portrait orientation. This textbook contains learning methods associated with learning media in media marquee. This textbook is the main book for the learning media course contained in the curriculum of the Indonesian Language and Literature Education study program at Hasyim Asy'ari University, Tebuireng Jombang. The purpose of this course is to provide provisions for prospective educators which has an important role and directly interact with students. With the provision of this book, it is hoped that students who will enter the community, especially as educators, are expected to develop this book as teaching material.

Two different experts were asked for an assessment to measure the quality of the PBL Method textbook through the media marquee that was developed (produced). One material is an expert in learning and one graphic design is an expert for visual design. The media feasibility test by media experts was carried out to determine whether the concept of making the PBL method book through Media Marquee was in accordance with media graphic standards, criticism and constructive suggestions. The media suggestion could be material for product improvement. Material testing is carried out to find out whether the concept of the material was incorrectly conveyed, suggestions and input from the results of the testing. At this stage it is very important because it can improve the quality of the product made.

The following is table 1. It resulted the expert validation assessment which shows the average percentage of the feasibility of the developed textbooks which get 83%. It means that the PBL method textbooks through the marquee media developed are quite feasible and can be used with minor revisions. The suggestions and criticisms are also given through minor revisions by expert validators in addition to providing an assessment of textbooks. This expert validation is carried out to measure the theoretical validity of textbooks according to the judgments and opinions of experts before user trials are carried out. The results of expert validation are in the form of assessments, responses, suggestions and input for textbooks developed by researchers. The following is the results of the expert validation assessment (shown in table 1):

Table 1. The result of the expert validation assessment

No	Subject	Score	Maksimum	Percentage (%)
1	Media Validation	50	60	83%
2	Material Expert Validation	73	88	83%
	Total	123	148	83 %
	Average	61,5	74	83 %

The table 2 as the following showed the names of the expert validators and their fields. These validators are asked to provide not only an assessment of textbooks but also suggestions and criticisms through small revisions.

Table 2. The names of the expert validators

No	Name	Expert Area	Expert Validation
1	NY	Learning technology	Textbook display
2	SW	Learning technology	Textbook display

Based on the table 1 above, it can be seen that the average percentage of the feasibility of the developed art textbooks is 83% which means that the book is feasible and can be used with minor revisions. Expert validators provide not only an assessment of the PBL Method textbook through Media Marquee, also provide suggestions and input for revision improvements. From the advice and input of expert validation, it can be concluded as follows:

(1) At the beginning of the book, it is appropriate to give an introductory material so that the reader does not go straight to the point. The introductory material that must be given is about the conceptual about learning media, add summaries and assignments (Material Validation).

(2) It is necessary to improve the use of pictures and illustrations because these are important, and the use of some terms that have ambiguous meanings should be avoided (Material Validation).

(3) The addition of the use of images or illustrations should be interesting in order to attract the interest of the reader. The images added must be able to clarify the content of the material because usually readers in particular usually see the picture first rather than reading the material (Media Validation).

3.1. Expert Validation data (Product Validity)

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3.2. Limited Trial Data (Attractiveness, Product Effectiveness and Practicality)

On August 28, 2021, the trial of the implementation of the PBL Method textbook through the media marquee was carried out in the form of a demonstration and a 100-minute question and answer session. This field trial was conducted to determine student responses to the developed product. The subjects of this trial were 10 students who had heterogeneous abilities. Student response data obtained in the extensive trial are presented in table 3 as follows:

Table 3. Student Response Data in Field Trials

No	Score			Percentage	
	Name	Result	Max	Student	Category
1	A	78	85	91.7 %	Very Good
2	B	74	85	87.1%	Very Good
3	C	71	85	83.5 %	Very Good
4	D	75	85	88.2 %	Very Good
5	E	70	85	81.8 %	Very Good
6	F	71	85	82.3 %	Very Good
7	G	70	85	81.8 %	Very Good
8	H	72	85	84.7 %	Very Good
9	I	76	85	89.4 %	Very Good
10	J	70	85	81.8 %	Very Good
	Total	727	850	852.3 %	
	Average	72.7	85	85.5	Very Good

From the results of the student response data in the field trial above, it can be obtained that the total score of acquisition is 727 from the maximum total score of 850. After being analyzed and presented, the score is 85.5%. Therefore, the trial data showed high/significant results although there were still some shortcomings that still needed further improvement.

The extensive trial data is not only derived from the questionnaire assessment but also based on suggestions and input. From the suggestions and inputs for the broad trial, it can be concluded as follows:

1. The completeness of the contents of the PBL method through the media marquee is considered good, concise and understandable. But it will be even more interesting if the book cover is displayed neatly with color selection and neat layout on the front cover.
2. The language of the book in the textbook section is good and easy to understand.
3. Because this book has targets that are used for higher education levels, the provision of knowledge about the PBL method, Media Marquee and HOTS Learning as an introduction is very important and properly introduced so that readers are not confused.

Discussion

Two expert validation results showed that the total score was 123 out of a maximum total score of 148. The results of the analysis and the percentage of the results obtained were 83%. Based on the validity criteria that have been determined, the value is included in the appropriate criteria and can be used but with minor revisions. However, suggestions and input from experts are also needed to be included in the eligibility criteria for textbooks.

The use of several terms has an ambiguous meaning, and some texts need to be corrected, adjusted to the characteristics and understanding abilities of students (Material Validation). This is in line with the opinion of Priyanto (2012) who concluded that teaching must be a good prose style, namely the issue of clarity is very important. Writing textbooks needs to pay attention to effective forms of language use, so that students can read well and easily. Minimize the use of foreign words, inappropriate short words and long sentences. Students should be given the opportunity to make notes according to their thought processes, and not to use writing whose meaning is unknown. The criteria for textbooks need to be considered considering that textbooks are academic integrity, this proves that textbooks are scientific because they are tested and contain scientific-academic meaning.

Based on the validity table, it can be concluded that the PBL method teaching book through Media Marquee with the HOTS learning pattern concept is included in the criteria for use even though there are minor revisions in it. The revisions made must be adjusted to the suggestions and criticisms of media experts.

There are several things that must be considered in writing textbooks so that readers can understand the material presented by the author. These things include minimizing the use of foreign words, abbreviations and long sentences. Minimizing the use of foreign words is expected so that readers can better understand the essence of the sentence material in question. Because actually not all readers understand the true meaning of these foreign words. Reducing word abbreviations also aims to make the writing more correct and neat in accordance with the good and correct Indonesian sentence structure. Reducing long sentences also aims to increase understanding for the readers.

The addition of pictures to the textbook is also very important to add to the beauty of the results of the textbook that is made. According to Muiarti (2014) adding pictures to textbooks can improve student learning outcomes. The addition of the value of the experts about 95% of the addition of pictures in the textbook proved to have high interest. The addition of pictures in textbooks has an effective, positive, valid and proven effect on improving student learning outcomes. Not only from the aesthetic factors that make textbooks interesting to read, student learning outcomes can also increase if a textbook is added to several elements of images. This is influenced by the eyes that are not monotonous in facing the letters of the alphabet which are sometimes boring. But if interspersed with interesting pictures. Then the reader can refresh the eyes of the reader. The pictures or illustrations that are included must be pictures that can provide a more detailed explanation of the description of the material carried out descriptively in the textbook.

4. CONCLUSSION

Based on testing by experts as a whole, learning resources in the form of textbooks obtained an average score of 83%. Based on the predetermined criteria, the value is included in the attractive, feasible and understandable criteria with a few revisions based on suggestions and input. These results, after being interpreted, the score is included in the very appropriate category for use in learning as an effort to accelerate the achievement of learning objectives. After getting an assessment from expert validators and users (students), then researchers carry out revisions to product development in order to improve and refine the product. The benefits of the existence of textbooks can add insight to students related to the material that has been studied and learning is more meaningful, namely students achieve learning objectives contextually.

REFERENCES

- Andirastowo. (2011). *Metode Penelitian Kualitatif dalam Perspektif Rancangan Penelitian*. Jogjakarta: Ar-Ruzz Media.
- Anisah anisah, dkk. 2018. Dengan judul *Pengembangan Bahan Ajar berbasis HOTS untuk Meningkatkan Kemampuan Pemecahan Masalah Matematis Mahasiswa*. Jurnal Kreano vol 9 no 2.
- Antoe. (2009). *Membuat Efek Tulisan Berjalan (Marquee)*. Jakarta: Gramedia
- Asrizal. (2018). *Penerapan Model Pembelajaran Penemuan Mengintegrasikan Laboratorium Virtual dan Hots untuk Meningkatkan Hasil Belajar Siswa SMA Kelas XI*. Prosiding PDS UNP
- Brookhart, S. M. (2010). *How to Assess Higher-Order Thinking Skills in Your Classroom*. Virginia: ASCD.
- Dick, W & Carey, L. (2005). *The systematic design of instruction*. New York: Longman
- Edi Purwanto. (2019) . dengan judul *Pengembangan Bahan Ajar Berbasis Project Based Learning Mata Kuliah Media Pembelajaran Pai Stai Al-Hikmah Tanjung Balai*. Jurnal Edu-Riligia vol 3 no 3.
- Ghufron, M. Nur dan Risnawati S. Rini. (2011). *Gaya Belajar: Kajian Teoretik*. Yogyakarta: Pustaka Pelajar.
- King, A. L. (2010). *Psikologi Umum Sebuah Pandangan Apresiatif*. Jakarta: Salemba Humanika
- Lestari, Ika. (2013). *Pengembangan Bahan Ajar Berbasis Kompetensi: Sesuai dengan Kurikulum Tingkat Satuan Pendidikan*. Padang: Akademia
- Mujiarti, Lia. (2014). *Pengembangan Buku Ajar Berbasis Gambar Untuk Meningkatkan Hasil Belajar Siswa Pada Mata Pelajaran Ips Materi Pokok Kenampakan Alami Dan Bantuan Kelas X Semester 1 MI Islamiyah Jatisari Nganjuk*.
- Muniamal. (2015). Innovative English language acquisition through problem-based learning in Malaysian polytechnic. *Proceedings of Ninth The IIER International Conference, Bangkok, Thailand*, 79-81
- Ria Rahmawati, Sukidjo, (2016). *Pengembangan Bahan Ajar Berbasis Pbl Pada Pelajaran Ekonomi Untuk Meningkatkan Keterampilan Sosial Peserta Didik Sma*. Jurnal Socia vol 13, no 2.
- Rohim, A. (2014). *Improving students' speaking skill through problem based learning (PBL) strategy*. JP3, 3(8), 1-7.
- Sugiyono, (2012). *Metode Penelitian Kuantitatif Kualitatif dan R&D*, Bandung: Alfabeta.
- Triasningsih, E. (2020). Berpikir HOTS Pada Metode Pembelajaran Problem Based Learning IPS. *Jurnal Penelitian Dan Pendidikan IPS*, 13(2), 1-6. <https://doi.org/10.21067/jppi.v13i2.4743>
- Wahyu Anggoro. 2021. *Pengembangan Perangkat Pembelajaran Problem Based Learning (Pbl) Berbasis Higher Order Thinking Skill (Hots) Pada Siswa Kelas Xi Ipa Di Man Terbanggi Besar Universitas Islam Negeri Raden Intan Lampung*

