ABSTRACT

Dwi Athifah Ramadhani, 2019. "Development of student physics worksheets based on inquiry training to improve the creative thinking skills of high school/MA students in Class X Semester 1. Thesis. Master Program in Physics Education, Faculty of Mathematics and Natural Sciences, Padang State University.

The ability of students to think creatively was still not optimal. One reason was the lack of availability of teaching materials in the form of students physics worksheets which can encourage students to actively find their own knowledge in the learning process. Therefore, it was necessary to develop teaching materials in the form of worksheets for students of physics that can foster the activities of students find their own knowledge so that it can improve their creative thinking skill. The purpose of this study was to development of student physics worksheets based on inquiry training to improve the creative thinking skills with valid, practical, and effective criteria.

This type of research was research and development. The development model used ADDIE model which consists of Analysis, Design, Development, Implementation, and Evaluation. The research instruments used were questionnaires, validation sheets, practical sheets, final test questions, attitude observation sheets and creative thinking ability assessment sheets. Data analysis techniques for validity analysis using Aiken's V, practical analysis using descriptive percentages. Analysis of effectiveness for knowledge uses N-gain analysis, while analysis for attitudes and creative thinking abilities uses descriptive analysis.

The results of the analysis phase obtained information about the need to develop of student physics worksheets based on inquiry training to improve the creative thinking skill. The results of the design phase were obtained by the students physics worksheets design based on inquiry training. The results of the development phase found that the developed LKPD in the valid category with an average of 0.92. The practical testing phase carried out was in a very practical category, namely 91.59% of the teacher response questionnaire, and 89.29% of the student response questionnaire. The results of the LKPD inquiry training based on the physics-based phase met the effective criteria which were marked by an increase in knowledge competencies with a gain score of 0.66 which was categorized as medium. The attitude competency assessment has an average achievement of 85.19%, and assessment of creative thinking skills in the very creative category at the third meeting with an average of 81. The evaluation phase was conducted formative evaluation and summative evaluation to improve each step of the research. Based on the results of the study, student physics worksheets based on inquiry training to improve the creative thinking skills of high school/MA students in Class X Semester 1 to meet valid, practical and effective criteria.

Keywords: Student Worksheets, Inquiry Training, Creative Thinking Skill.

ABSTRAK

Dwi Athifah Ramadhani, 2019. "Pengembangan Lembar Kerja Peserta Didik Fisika SMA/MA Berbasis *Inquiry Training* Untuk Meningkatkan Kemampuan Berpikir Kreatif Peserta Didik Kelas X Semester 1. Tesis. Program Studi Magister Pendidikan Fisika Fakultas Matematika dan Ilmu Pengetahuan Alam Universitas Negeri Padang.

Kemampuan berpikir kreatif peserta didik masih belum optimal. Salah satu penyebabnya yaitu kurang tersedianya bahan ajar berupa lembar kerja peserta didik fisika yang dapat mendorong peserta didik untuk aktif menemukan pengetahuan sendiri pada proses pembelajaran. Oleh karena itu, Perlu dikembangkan bahan ajar berupa lembar kerja peserta didik fisika yang dapat menumbuhkembangkan aktivitas peserta didik menemukan pengetahuan sendiri sehingga dapat meningkatkan kemampuan berpikir kreatifnya. Penelitian ini bertujuan untuk mengembangkan lembar kerja peserta didik fisika berbasis *inquiry training* untuk meningkatkan kemampuan berpikir kreatif peserta didik dengan kriteria valid, praktis, dan efektif.

Jenis penelitian adalah penelitian dan pengembangan. Model pengembangan yang digunakan adalah model ADDIE yang terdiri dari tahap *Analysis*, *Design*, *Development*, *Implementation*, dan *Evaluation*. Instrumen penelitian yang digunakan adalah angket, lembar validasi, lembar praktikalitas, lembar penilaian efektifitas. Teknik analisis data untuk analisis validitas menggunakan Aiken's V, analisis praktikalitas menggunakan analisis deskriptif persentase. Analisis efektivitas untuk pengetahuan menggunakan analisis *N-gain*, sedangkan analisis untuk sikap dan kemampuan berpikir kreatif menggunakan analisis deskriptif.

Hasil tahap analisis diperoleh informasi perlunya dilakukan pengembangan lembar kerja peserta didik fisika berbasis *inquiry training* untuk meningkatkan kemampuan berpikir kreatif. Hasil tahap perancangan diperoleh rancangan lembar kerja peserta didik fisika berbasis *inquiry training*. Hasil tahap pengembangan didapatkan produk yang telah dikembangkan berada pada kategori valid dari aspek komponen LKPD, aspek kemampuan berpikir kreatif dan komponen model *inquiry training* dengan rata-rata 0,92. Tahap uji praktikalitas yang telah dilakukan berada pada kategori sangat praktis yaitu 91,59% dari angket respon guru, dan 89,29% dari angket respon peserta didik. Hasil tahap implementasi LKPD fisika berbasis *inquiry training* memenuhi kriteria efektif yang ditandai dengan peningkatan kompetensi pengetahuan dengan *gain score* sebesar 0,66 yang dikategorikan sedang. Penilaian kompetensi sikap rata-rata ketercapaian 85,19%, dan penilaian kemampuan berpikir kreatif pada kategori sangat kreatif pada pertemuan ke tiga dengan rata-rata 81. Tahap evaluasi dilakukan evaluasi formatif dan evaluasi sumatif untuk penyempurnaan setiap langkah penelitian. Berdasarkan hasil penelitian diperoleh LKPD fisika berbasis *inquiry training* untuk meningkatkan kemampuan berpikir kreatif peserta didik memenuhi kriteria valid, praktis dan efektif.

Kata Kunci : Lembar Kerja Peserta Didik, *Inquiry Training*, Berpikir Kreatif.