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# Evaluation Framework for the Implementation of the Dual Expertise Program and its Results

Agung Panji Sasmito<sup>1)</sup>
Doctoral Students of Vocational Education
Universitas Negeri Malang

Purnomo<sup>3)</sup> Lecturer of Vocational Education Universitas Negeri Malang

Abstract— Indonesian vocational school must increasingly be able to prepare students to enter the workforce to be able to print work-ready graduates along momentum of the ASEAN Economic Community and APEC. However, today Indonesia lack of vocational school productive teachers. One of any effort to deal with it is with the launch of the Program Keahlian Ganda (PKG, Dual Expertise Program) in line with the Vocational Education Revitalization initiated by the Government of Indonesia. So far there has been no evaluation associated PKG in Indonesia, despite the obstacles and the phenomenon that is contrary to expectations PKG launch common. In this article will be presented the idea to evaluate the implementation of PKG and its result in Indonesia.

Keywords: Dual Skills Program, dual expertise, evaluation of vocational teacher training program

# I. INTRODUCTION

Today, vocational school must increasingly be able to prepare individuals to enter the workforce to respond to labor market needs. Vocational High School (VHS, or in Indonesia also known as Sekolah Menengah Kejuruan, SMK) provide appropriate learning skills and specific knowledge related qualifications of engineering profession. As growth of time and technology in addition to changes in the work and ways of working [4], the needs of teachers also changed, so do productive teacher in vocational school. But the phenomenon that occurs is some vocational skills programs in Indonesia are lacking productive teachers. In 2016, known prolific teacher shortages in vocational are about 235,269 teachers.

In addition to quantity, teacher quality must also be qualified, because the successness of the education program depend on the availability of professional teachers. Qualified teachers have a positive impact to the quality of the learning and development of learner. However, today the quality of the teacher becomes one of the problems in Indonesia. Not all vocational teachers in Indonesia have background of teacher's education. In fact, teachers must be able to have academic qualifications in accordance with the field of teaching. If the quality of the teacher is not good, then it becomes less optimal learning so that the future of education in Indonesia, especially teachers, can not compete globally, mainly due to the

Djoko Kustono<sup>2)</sup> Lecturer of Vocational Education Universitas Negeri Malang

Hakkun Elmunsyah<sup>4)</sup> Lecturer of Vocational Education Universitas Negeri Malang

momentum of the ASEAN Economic Community and APEC.

One attempt to do is to improve the quality of existing teachers through pedagogical development, build what is already known by the teacher, active involvement of educators directly, and involves a team of teachers from the same school. In line with this, along with the Vocational Education Revitalization, Indonesian government launched the Program Keahlian Ganda (PKG) or Dual Skill Program, a program of additional authority for teachers who teach subjects normative and adaptive become subject

productive teachers in vocational competencies specific expertise that is different from the competence previous expertise and relevant educational background (e.g. Physics teacher become Mechanical Engineering teacher, Mathematic teacher become Informatics teacher). Addition of authority to teach on the new membership package for vocational teachers do after the teacher through the process of education and training through a pattern of on service training and in service training (they called it "On"-"In"-"On"-"In") and ends with skills certification and certification of educators at professional certification foundation (in Indonesia known as Lembaga Sertifikasi Profesi, LSP) and teacher professional education and training (in Indonesia known as Pendidikan dan Latihan Profesi Guru, PLPG). With PKG, expected quality and quantity of vocational teachers can be met.

So far PKG has been running one armed with a variety of phenomena that occur. Based on observations carried out at the place of execution PKG found many participants from the same initial expertise with the expertise of both taken on PKG (e.g. Computer Engineering teacher become Computer Engineering teacher). Besides that, many participants are mostly aged over 35 have trouble following andragogy method optimally. Doing so may result not all participants could pass the expertise certification in LSP, despite the age factor can not affect the preferences of adult learning. Beside, in relation to the Maslow's hierarchy of needs or McClelland achievement and acquired needs theory, participants tend to pursue their basic needs and affiliated such as income generation, the existence of teaching hours, beside they on teachers' comfort zone. Participant reluctant to re-develop their skill, re-learn, and lack to fulfill actualization needs and the needs of such



outstanding teachers of vocational awards and increase their knowledge. Whereas, the implementation will depend on the PKG participants, among which are influenced by self-efficacy, early expertise, teaching experience, and life long learning during the teacher's life cycle.

Based on the above explanation is known that in the implementation of the PKG encountered some resistance and a mismatch between goal expected with purpose that prevails. In fact, if done properly, PKG can be beneficial for improving the competence and professionalism of teachers. The successful implementation of PKG, especially in terms of the outcomes when teacher returns to vocational and support subject in new expertise becomes important to study because it is based on previous exposure PKG aims to meet the lack of vocational teachers in Indonesia. Implicitly required an investigation of PKG in terms of implementation process up to the product as well as the impact of the implementation of the PKG.

# II. PROBLEM SENTENCES

Based on the background, the problem senteces are how is process and the product of PKG on learning centers or at school organizers.

# III. DESIGN RESEARCH AND EVALUATION FRAMEWORK

The study was initiated with the aim to evaluate PKG with investigating the PKG implementation and compared it with the standard criteria. The PKG's process and product are evaluated by evaluation model approach by Stufflebeam (1983) such as process and product evaluation. Stufflebeam model selection is based on suppression underlying the evaluation of training needs (context) and the impact of such training (product and outcome). Such as Kirkpatrick evaluation model tends to be used by the internal evaluator, while the Stufflebeam model generally used by external evaluators for gathering data on the effectiveness of the program. Therefore, this study will evaluate the implementation PKG with Stufflebeam model.

Along with Stufflebeam models, Mixed Methods approaches is used to describe and able to find recommendations as well as guidelines on the assessment of the enforceability of the PKG appropriately and depth. Mixed Methods which is used is explanatory, which characterized by qualitative data explanating or built based on the quantitative results.

Process evaluation will investigate the implementation of a plan of activities to help describe the results, including the investigation of preparation, implementation, training, systematics, and activities of the training. Product evaluation will identify the desired results by assessing the achievement of the training objectives including the knowledge and expertise acquired after the training [29], and the impact of the training which can include classroom learning and management after training [30]. Framework of the instruments which used to evaluate PKG at least following: (1) process,

including an investigation of: (a) conformity and implementation constraints on the PKG in school organizers; (b) suitability and constraints in the implementation of PKG in the learning center; and (c) the characteristics of PKG; and (2) product, including: (a) an investigation of expertise in PLPG and LSP certification; and (b) the fulfillment of the needs of the investigation.

# IV. CONCLUSION

Based on the explanation that has been presented, it was concluded that: (1) vocational school in Indonesia is experiencing a shortage of teachers productive, so PKG was launched; (2) there should be carried out an evaluation of PKG in Indonesia; and (3) Stufflebeam evaluation model can be used to investigate the implementation of PKG, especially the process and its impact.

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