

ABSTRAK

Budi Harianto, NIM 4193351010 (2023). Pengaruh Project Based Learning (PjBL) Pendekatan STEM Terhadap Kemampuan Literasi Sains Dan Berpikir Kreatif Siswa SMP T.P 2022/2023.

Penelitian pengembangan ini bertujuan untuk mengetahui: (1) pengaruh model *project based learning* (PjBL) pendekatan STEM terhadap literasi sains dan berpikir kreatif pada materi sistem pencernaan, dan (2) untuk mengetahui hubungan *project based learning* (PjBL) pendekatan STEM terhadap literasi sains dan berpikir kreatif pada materi sistem pencernaan. Populasi dalam penelitian ini adalah seluruh siswa kelas VIII SMP Negeri Harapan Medan. Desain penelitian menggunakan *two group pretest-posttest design*. Pengujian data dilakukan dengan Uji Manova, Uji Korelasi dan Uji N-gain. Hasil penelitian diperoleh : (1) Uji manova terdapat dua uji yaitu uji normalitas dan uji homogenitas. Berdasarkan uji hipotesis terdapat pengaruh penggunaan model *project based learning* (PjBL) pendekatan STEM terhadap kemampuan literasi sains dan berpikir kreatif siswa pada materi sistem pencernaan di SMP Harapan Mekar Medan; (2) Uji korelasi menyatakan bahwa antara kemampuan literasi sains dan berpikir kreatif memiliki hubungan pada materi sistem pencernaan manusia di kelas VII SMP Harapan Mekar Medan; dan (3) Uji N-gain menunjukkan adanya peningkatan 66% terhadap kemampuan literasi sains dan 51% terhadap berpikir kreatif melalui penerapan model PjBL pendekatan STEM pada materi sistem pencernaan manusia di kelas VII SMP Harapan Mekar Medan.

Kata Kunci : Model *Project Based Learning* (*PjBL*), STEM, Uji Manova, Uji Korelasi, Uji N-Gain, Literasi Sains dan Berpikir Kreatif.

ABSTRACT

Budi Harianto, NIM 4193351010 (2023). The influence of the Project Based Learning (PjBL) STEM Approach On The Scientific Literacy And Creative Thinking Abilities Of Junior High School Students T.P 2022/2023.

This development research aims to determine: (1) the influence of the *project based learning* (PjBL) STEM approach model on scientific literacy and creative thinking on digestive system material, and (2) to determine the relationship between the *project based learning* (PjBL) STEM approach on scientific literacy and creative thinking on the digestive system material. The population in this study were all class VIII students at SMP Negeri Harapan Medan. The research design uses a two group pretest-posttest design. Data testing was carried out using the Manova Test, Correlation Test and N-Gain Test. The research results obtained: (1) There are two tests in the MANOVA test, namely the normality test and the homogeneity test. Based on the hypothesis test, there is an influence of using the *project based learning* (PjBL) STEM approach on students' scientific literacy and creative thinking abilities in the digestive system material at SMP Harapan Mekar Medan; (2) The correlation test states that scientific literacy ability and creative thinking have relationship in the human digestive system material in class VII of SMP Harapan Mekar Medan; and (3) The N-gain test shows an increase of 66% in scientific literacy ability and 51% in creative thinking through the application of the PjBL model of the STEM approach to material on the human digestive system in class VII SMP Harapan Mekar Medan.

Keywords: Project Based Learning (PjBL) Model, STEM, Manova Test, Correlation Test, N-Gain Test, Scientific Literacy and Creative Thinking.