

ABSTRAK

Penelitian berjudul “*Pengaruh Tahapan Prediksi dan Diskusi pada Pembelajaran Berbasis Learning Cycle terhadap Kemampuan Berpikir Kreatif dan Penguasaan Konsep Sistem Saraf pada Siswa SMA*” ini bertujuan untuk mengetahui pengaruh tahapan prediksi dan diskusi pada pembelajaran berbasis *learning cycle* terhadap kemampuan berpikir kreatif dan penguasaan konsep sistem saraf pada siswa SMA. Metode penelitian yang digunakan adalah *Quasy Experiment* dengan desain penelitian *Pretest-Posttest Control Group Design*. Dalam penelitian ini digunakan dua kelas penelitian, pada kelas kontrol pembelajaran yang digunakan adalah model konvensional dengan metode diskusi, sedangkan kelas eksperimen pembelajaran yang digunakan adalah pembelajaran berbasis *learning cycle* yang di mana pada fase *exploration* menggunakan metode prediksi dan diskusi. Kemampuan berpikir kreatif siswa dijangkar dengan menggunakan soal essay berjumlah 8 butir soal yang dapat memunculkan indikator-indikator berpikir kreatif siswa, yang terdiri dari kemampuan berpikir luwes (*flexibility*), lancar (*fluency*), orisinal (*originality*), dan memerinci (*elaboration*). Penguasaan konsep siswa dijangkar dengan menggunakan soal isian singkat sebanyak 15 butir soal. Berdasarkan hasil penelitian yang dilakukan pada kedua kelas penelitian didapatkan nilai rata-rata *posttest* kemampuan berpikir kreatif siswa kelas kontrol adalah 35,49 dengan rata-rata indeks gain sebesar 0,18 berada pada kategori rendah, sedangkan kelas eksperimen adalah 54,87 dengan rata-rata indeks gain sebesar 0,46 berada dalam kategori sedang. Kemampuan berpikir kreatif kelas eksperimen lebih baik dari pada kemampuan berpikir kreatif kelas kontrol. Sedangkan untuk penguasaan konsep siswa, Nilai rata - rata penguasaan konsep kelas eksperimen sebesar 6,89, sedangkan kelas kontrol sebesar 4,09. Penguasaan konsep siswa kelas eksperimen lebih baik dibandingkan dengan kelas kontrol. Jadi, pembelajaran berbasis *learning cycle* dapat berpengaruh signifikan terhadap kemampuan berpikir kreatif dan penguasaan konsep sistem saraf pada siswa SMA.

Kata kunci : *Learning cycle*, Kemampuan berpikir kreatif, Penguasaan Konsep, Sistem saraf, dan *Quasy experiment*.

ABSTRACT

The study entitled "The Effect of Prediction and Discussion Phase on the Cycle-Based Learning toward the Creative Thinking and the Mastery of Nervous System Concept on High School Students" aims to determine the effect of prediction and discussion stage on cycle-based learning toward the creative thinking abilities and mastery of the concept of the nervous system on high school students. The method used was quasy experiment with pre-test and post-test control group design. This study used two classes: control class and experimental class. In the control class, the researcher employed a conventional learning model with the discussion method, while the cycle-based learning was applied in the experimental class in which its exploration phase was using a combined prediction and discussion method. Students' ability to think creatively was encapsulated by using 8 items of essay questions that could emerge the indicators of students' creative thinking. The indicators consisted of the ability to think flexibility, fluency, originality, and elaboration. Students' mastery of concepts was detained by using a short answer worksheet as many as 15 items. Based on the results of research conducted in both classroom, it was showed from the posttest that the average value of creative thinking abilities in control class was 35.49 with an average index of 0.18, which was considered low category. Meanwhile, the experimental class was 54.87 with a mean average index of 0.46, which was considered fair category. The ability to think creatively in the experimental class was better than when it was applied in the control class. Regarding to the mastering concepts, the student's average score in experimental class was 6.89, while the control class is 4.09. Thus, the students' mastery of the concept in the experimental class was better than the control class. At last, it can be deduced that the cycle-based learning can rise a significant effect on the ability to think creatively and mastery the nervous system concepts on high school students.

Keywords: Learning cycle, ability to think creatively, Concepts Mastery, nervous system, and Quasy experiment.