

ABSTRAK

Tulyabu, Nurmin. 2014. "Analisis Struktur Pengetahuan tentang Cara Menyelesaikan Soal-Soal Stoikiometri pada Mahasiswa Kimia FMIPA UNG" Skripsi, Jurusan Pendidikan Kimia Fakultas Matematika dan Ilmu Pengetahuan Alam Universitas Negeri Gorontalo. Pembimbing I: Dr. Lukman AR. Laliyo, M.Pd, MM dan Pembimbing II: La Ode Aman, S.Pd, M.Si

Penelitian ini bermaksud untuk (1) mendeskripsikan cara mahasiswa jurusan kimia Universitas Negeri Gorontalo menyelesaikan soal-soal stoikiometri. (2) memetakan struktur pengetahuan terkait dengan cara mahasiswa Universitas Negeri Gorontalo menyelesaikan soal-soal stoikiometri. Sampel penelitian ini adalah mahasiswa semester I angkatan 2013/2014, semester III angkatan 2012/2013 dan semester V angkatan 2011/2012 yang seluruhnya berjumlah 168 orang. Instrumen penelitian ini berupa tes penguasaan konsep stoikiometri sebanyak 10 item soal berbentuk *essay*. Hasil uji validitas tes menunjukkan 100 %. Analisis data dalam penelitian ini yakni menggunakan KST (*Knowledge Space Theory*). Berdasarkan hasil penelitian diketahui bahwa: (1) cara mahasiswa jurusan kimia Universitas Negeri Gorontalo menyelesaikan soal-soal stoikiometri tidak terstruktur. (2) peta struktur pengetahuan mahasiswa jurusan kimia Universitas Negeri Gorontalo dalam menguasai konsep stoikiometri cenderung mengalami ketidakakuratan dan tidak saling terkait (parsial).

Kata Kunci: Struktur Pengetahuan, Stoikiometri, *Knowledge Space Theory*

ABSTRACT

Tuliyabu, Nurmin. 2014. "The Analysis of Knowledge Structure in Solving the Stoichiometry Problems on Students of Chemistry Education Department of Faculty of Mathematics and Natural Sciences, Universitas Negeri Gorontalo". Skripsi. Department of chemistry Education, faculty of Mathematics and Natural Sciences, Universitas Negeri Gorontlo. The principal supervisor was Dr. Lukman AR Laliyo, M.Pd, MM and the Co-supervisor was La Ode Aman, S.Pd, M.Si

The research aimed to (1) describe the way of chemistry Education Department's student of University Negeri Gorontalo in solving the stoichiometry problems; (2) map the knowledge structure related to the way of chemistry Education Department's student of University Negeri Gorontalo in solving in the stoichiometry problems. Sample of the research were first semester student of 2013/2014 academic year, third semester of 2012/2013 academic year and fifty semester of 2011/2012 academic year with total students were 168 students. Instrument of research was mastering concept test of stoichiometry with 10 essays. The result of validity test was 100 %. The data analysis in this research used knowledge space theory. Based on the research result, it can be found that (1) students' way in solving the stoichiometry problems was unstructured;(2) the mapping of students' knowledge in mastering the stoichiometry concept to be unstructured and partial.

Keywords: knowledge, stoichiometry, knowledge Space Theory