**Module name** | Basic Chemistry I  
---|---  
**Module level, if applicable** | Bachelor  
**Code, if applicable** | MKK-1101  
**Subtitle, if applicable** |  
**Courses, if applicable** | Basic Chemistry I  
**Semester(s) in which the module is taught** | 1st (first)  
**Person responsible for the module** | Department of Chemistry  
**Lecturers** | Team  
**Language** | Bahasa Indonesia  
**Relation to curriculum** | Compulsory course in the first year (1st semester) Bachelor Degree  
**Type of teaching, contact hours** | 150 minutes lectures and 180 minutes structured activities per week.  
**Workload** | Total workload is 136 hours per semester, which consists of 150 minutes lectures per week for 14 weeks, 180 minutes structured activities per week, 180 minutes individual study per week, in total is 16 weeks per semester, including mid exam and final exam.  
**Credit points** | 3  
**Requirements according to the examination regulations** | Students have taken Basic Chemistry I course (MKK-1101) and have an examination card where the course is stated on.  
**Recommended prerequisites** | No prerequisite is needed  
**Module objectives/intended learning outcomes** |  
After completing this course the students should be able to:  
CO understand the concept of atom structure and molecule, reaction and energy changes, and the fundamental theory of chemical bond.  
**Content** |  
- Introduction, Molecules, Ions and Chemical Formulas, Chemical Reactions;  
- Reactions in solution, Energy changes in chemical reactions;  
- Atomic Structure, Periodic Table;  
- Ionic Bond vs. Covalent bonding, Molecular Geometry and Covalent Bonding Model  
**Study and examination requirements and forms of examination** | The final mark will be weighted as follows:  
<table>
<thead>
<tr>
<th>No</th>
<th>Assessment methods (components, activities)</th>
<th>Weight (percentage)</th>
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<tbody>
<tr>
<td>1</td>
<td>Final Examination</td>
<td>40%</td>
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<tr>
<td>2</td>
<td>Mid-Term Examination</td>
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<td>3</td>
<td>Class Activities: Quiz, Homework, etc.</td>
<td>30%</td>
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The initial cut-off points for grades A, B, C, and D should not be less than 80%, 70%, 50%, and 40%, respectively.  
**Reading List** |  
## PLO and CO Mapping

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