Organic Chemistry I Evaluation

# Interpretation of Skills Evaluated in the Final Examination

The skills listed below are the dimensions to which I have graded myself.

**Multiple Choice:** This is an indication of my level of comprehending organic chemistry. To put into context a variety of problems and answer the questions correctly through referral of the knowledge attained from completing the curriculum of the course.

**Structure Determination:** This is an indication of my level of ability to solve complex organic chemistry problems through lateral thinking – that is to mold the theory to fit the facts presented. By utilizing all the details of the phenomenons presented in each of these problems, can I correctly draw the inevitable conclusions.

**Synthesis:** This is an indication of my ability to create chemical reactions from commercially available materials in order to make the assigned compounds. Since synthesis has a variety of correct solutions, in practice the best synthesis is the one that works given the resources. However, in an exam situation such as this one, the best synthesis is the one that has the highest yield of product in the most efficient way; the shortest number of steps.

**Reactions and Reagents:** This is an indication of my ability to recall knowledge of chemical reactions in and required reagents in order to conduct a successful transformation from one compound or functional group to another. This skill requires clarity of understanding and flexibility in the way reactions and reagents are employed in a given set of parameters.

**Mechanisms:** This is an indication of my ability to understand organic chemical reactions at the level of electron transfer, bond formation and bond breaking. Mechanisms in organic chemistry are more than just recall of chemical reactions – this skill allows one to explain various chemical phenomenon through an understanding of how intermediates are formed that are not apparent in any chemical reaction in question.

# Final Examination

|  |  |  |  |
| --- | --- | --- | --- |
| **Skill** | **Score** | **Grade** | **Comments** |
| Multiple Choice | |  | | --- | |  | | 50 | |  | | |  | | --- | |  | | **C** | |  | | I went through this part quickly not giving myself time to think. But my reaction time was good and I demonstrated an adequate recall of knowledge in comprehending the correct responses. |
| Structure Determination | |  | | --- | |  | | 24 | |  | | |  | | --- | |  | | **A-** | |  | | I overspent time on this area of the Final, but proved to have strong problem solving skills. |
| Synthesis | |  | | --- | |  | | 31.5 | |  | | |  | | --- | |  | | **C** | |  | | This area although the most creative, often the most precise. Only correct reactions need recall in sequence in order to generate any compound given the parameters. My skill so far for synthesis is adequate. |
| Reactions and Reagents | |  | | --- | |  | | 23 | |  | | |  | | --- | |  | | **D+** | |  | | The most difficult part of the exam. The required skill set to transform organic molecules, like synthesis is a recall of reactions that are going to work. I could benefit from continued studies in this area to improve my knowledge set. |
| Mechanisms | |  | | --- | |  | | 5 | |  | | |  | | --- | |  | | **F** | |  | | I didn’t spend much attention to studying mechanisms, but the fundamental ones need review. |
| Final Exam Mark | |  | | --- | |  | | **133.5** | |  | | |  | | --- | |  | | **C** | |  | | This is not bad for a 4 hour exam. |

# Final Course Summary

|  |  |  |  |
| --- | --- | --- | --- |
| **Component** | **Grade** | **Contributing GPE** | **Weight** |
| Assignments |  | **4.0** | 10% |
| Quizzes | **B** | **3.0** | 10% |
| Midterm 1 | **C** | **1.2** | 5% |
| Midterm 2 | **C** | **2.4** | 10% |
| Midterm 3 | **D** | **2.4** | 15% |
| Final Exam | **C** | **12.0** | 50% |

# Final Course Mark

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Course** | **Total GPE** | **Course Grade** | **Mark (%)** | **Pass Mark (%)** |
| **Organic Chemistry I** | **25.0** | **C** | **62** | 40 |