

Unit 4 Organic Chemistry

Chapters 24 and 25

**Organics Project**

Create a **visual presentation** (Digital, poster, etc.) to explain the following concepts found in chapters 24 and 25 **OR** choose an **organic compound** and provide information about it **OR** create a **multiple choice AND written response test** to assess the following concepts.

Visual Presentation CRITERIA:

Concept/Description (What you need to do)	Mark
Description, Picture, and Explanation of ALKANES & Nomenclature	3
Description, Picture, and Explanation of ALKENES & Nomenclature	3
Description, Picture, and Explanation of ALKYNES & Nomenclature	3
Description, Picture, and Example of Straight Chain Organic Molecule	6
Description, Picture, and Explanation of "CYCLO" HYDROCARBONS	3
Products of Hydrocarbon Combustion AND explanation of Products effects on Environment	3
Description, Picture, and Explanation of OCTANE NUMBER	3
Description, Picture, and Explanation of FUNCTIONAL GROUPS	6
Description, Picture, and Explanation of ISOMERS	3
Description, Picture, and Explanation of TYPES OF ISOMERS	3
Description, Picture, and Explanation of FRACTIONAL DISTILLATION	3
Description, Picture, and Explanation of RESONANCE	3
Description, Picture, and Explanation of ESTERIFICATION	3
Description, Picture, and Explanation of SAPONIFICATION	3
Organic Molecule Example with functional groups, longest chain, Name, Uses, Etc.	3
ATLEAST FOUR (4) "CHECK INS" to REVIEW/REVISE PROJECT (Allows me to help you and provide constructive feedback) (Formative Assessment)	6
REFERENCES are provided for pictures IN TEXT (APA)	3
Total	60

Presentation Quality

Correct Spelling and Grammar use	3
Presentation At least 60 Slides long or Comparably Length	3
Presentation includes At least 20 Pictures or Graphics	3
Student Can Explain and Elaborate on the Concepts in the Presentation	12
Presentation Organization and Clarity (Clear and Logical Order)	3
Presentation is Appealing and Engaging	3
Source(s) Listed (NOT THE SAME AS IN TEXT REFERENCES)	3
Presentation Explained and Questions Answered in Summative Interview	10
Total	40

****Creating a presentation that covers ALL of the above topics ONLY will result in a 95% proficient score.**

**Organic Compound CRITERIA:**

Description, Picture, and Explanation of Organic Compounds Structure	5
Organic Molecule Example with functional groups, longest chain, Name(s), Uses, Common Name, Etc.	10
Description, Picture, and Explanation of Organic Compounds Function/Purpose	5
Description, Picture, and Explanation of Organic Compounds Origin (Where it came from, how it was created...effects on environment)	5
Description, Picture, and Explanation of Organic Compounds that MIMIC (do the same thing, serve the same function as the Organic Compound you chose)	10
Possible RESONANCE Structures	5
Description, Picture, and Explanation of ISOMERS and other forms your Organic Compound can form (Either intentionally or unintentionally)	5
Description, Picture, and Explanation of Applications of your Organic Compound	5
Description, Picture, and Explanation of FUNCTIONAL GROUPS your Organic Compound has.	10
Description, Picture, and Explanation of how to Synthesize (Make) your Organic Compound AND explanation of Compounds effects on Environment	5
Project is explained and questions correctly answered during summative Interview	10
Correct Spelling and Grammar use, adequate length of around 60 slides	5
Project is an adequate length to address criteria above (Information is separated, not all squished on one or two pages)	5
ATLEAST FOUR (4) "CHECK INS" to REVIEW/REVISE PROJECT (Allows me to help you and provide constructive feedback) (Formative Assessment)	10
Source(s) Listed	5
Total	100

****Creating a project that covers ALL of the above topics ONLY will result in a 95% proficient score.**

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Further Explanation of Test Creation Option

The test should have a total of 100 marks.

Overall Mark:

Multiple questions for each topic are needed to fully summarize one's understanding of the concept being assessed.

/100

Many of the organic compounds you are describing effect the environment, make a few questions about how

***The test should be weighted 60:40...this means that 60% of test questions are Multiple Choice (M.C.) and 40% is Written Response (W.R.)
(So, on a test out of 100 Marks, 60 Marks from M.C. and 40 marks from W.R.)***

Test must have pictures, graphics, or examples

Test must have a title page with space for overall final grade

***Source(s) Listed.

*****You need to create an answer key for it AND can explain answers about questions**

*****ATLEAST FOUR (4) "CHECK INS" to REVIEW/REVISE PROJECT (Formative Assessment).**

Creating a test that covers **ALL of the above topics **ONLY** will result in a 95% proficient score.

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Choose Your Own Adventure

(Open Option)

This option MUST be discussed and approved by your teacher. It must be/have a comparable length and address many (if not all) of the concepts included in the project rubric. This option is for you to decide how you are going to show your learning.

As it is open project there is less structure to support what you need to do, you have to have a unique idea that address the concepts in the Organics Unit (Chapters 24 and 25) as a minimum! Feel free to let your passions lead to you create a true inquiry project that goes above and beyond the minimum expectation.

This option requires multiple “Check-Ins” with your teacher to make sure that what you are creating/proposing/presenting meets ALL of the criteria specified by your teacher. Think of them as your supervisor providing you with directions on what/how to do the things that you have previous explained and determined you want to do. Failure to do so will result in a poor overall grade.

Possible projects that have been proposed in the past are:

- A presentation that describes all of the hydrocarbons from class and how each affects the environment.
- A research project that details the organic compounds that are part of the many devices/items (some are electronic) we currently use.
- Multiple experiments and official lab write ups that deal with the synthesis of some of the compounds we currently use.
- A brochure that details the many organic compounds and their uses in society. This can also include how these many compounds have side-effects (unintentional affect) on the environment.