

## Lab #5 Pre-Lab Report Molecular Structure

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### Notice of ADA Accomodation

I have an ADA accommodation to type out my pre-lab report when my disability flares up. This document is a utilization of that accomodation.

#### 1 Question One

What is the point of this lab? Define the chemical principles we are testing in your own words.

The point of this lab is to teach students about the material we're going over in lecture. Currently, we are learning about molecular structure. This lab goes over the molecular structure of a number of different molecules.

#### 2 Question Two

What is the logic of this lab? How do the procedures test the hypothesis that the chemical processes are correct?

The logic of this lab is that it gives students a hands-on activity to accompany the material that is taught in lecture. This lab teaches students how to evaluate and determine a molecular structure based on a number of criteria. These criteria include electronegativity, electron affinity, electron configuration, bond types, formal charge, and VSEPR theory, among others. Students will use these criteria to complete the lab, detailing the factors that went into determining the structure of the molecule.

#### 3 Question Three

Where are potential problem points in the procedures? Where is it easy to make an error or have something just go wrong?

The main potential problem point with this lab would be students not fully understanding what determines molecular structure and how to parse it. Otherwise, the lab is fairly straightforward and doesn't seem to include too many potential problem points.

## 4 Question Four

What are the health and safety hazards for this lab and how do we minimize them?

I do not foresee any health or safety hazards for this lab. We are dealing with balloons and plastic atomic models, not chemicals or fire. The only issue would be a potential latex allergy.