

## **Topic: The Research Experiment on Singing Wine Glasses**

**PURPOSE:** The purpose of this lab is to investigate the resonating characteristic for different volume filled wine glasses and study the effects and physical laws in association with it.

### **BACKGROUND INFORMATION:**

The singing wine glass or the Harmonica is a glass instrument designed in 1714 by Richard Pockrich, and Benjamin Franklin designed a modified form of the Harmonica. The sound of this lovely instrument is made when energy is applied to the glass and the physical properties of the glass begin to resonate. The connected energy will then for this situation be rubbing maybe a couple wet fingers on the edge of a glass, and the glass will then begin to vibrate, at its normal frequency. So my examination inquiry will be:

**How does the resonating frequency change with the water in a singing wineglass? The methodology I will use to answer my examination inquiry will be to quantify the frequencies with various measure of water**