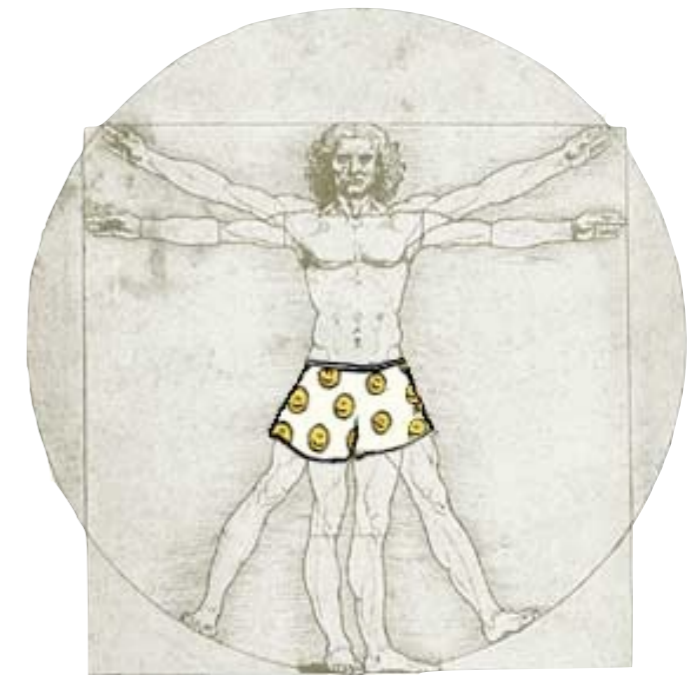


# Unit 14

## The Effect of pH on Amylase



*Miss School, Miss Out!*

# The Effect of pH on Amylase

**Question:** What pH does amylase work best?

**Hypothesis:**

**Materials:** Using 0.1 M HCl, develop a method of testing the effect of pH on amylase. (5 drops of amylase; 1 mL Benedict's; pH paper; 1 mL starch)

**Observations:** Record observations in a data table.

**Analysis & Conclusion:** Support or reject your hypothesis with observational evidence.

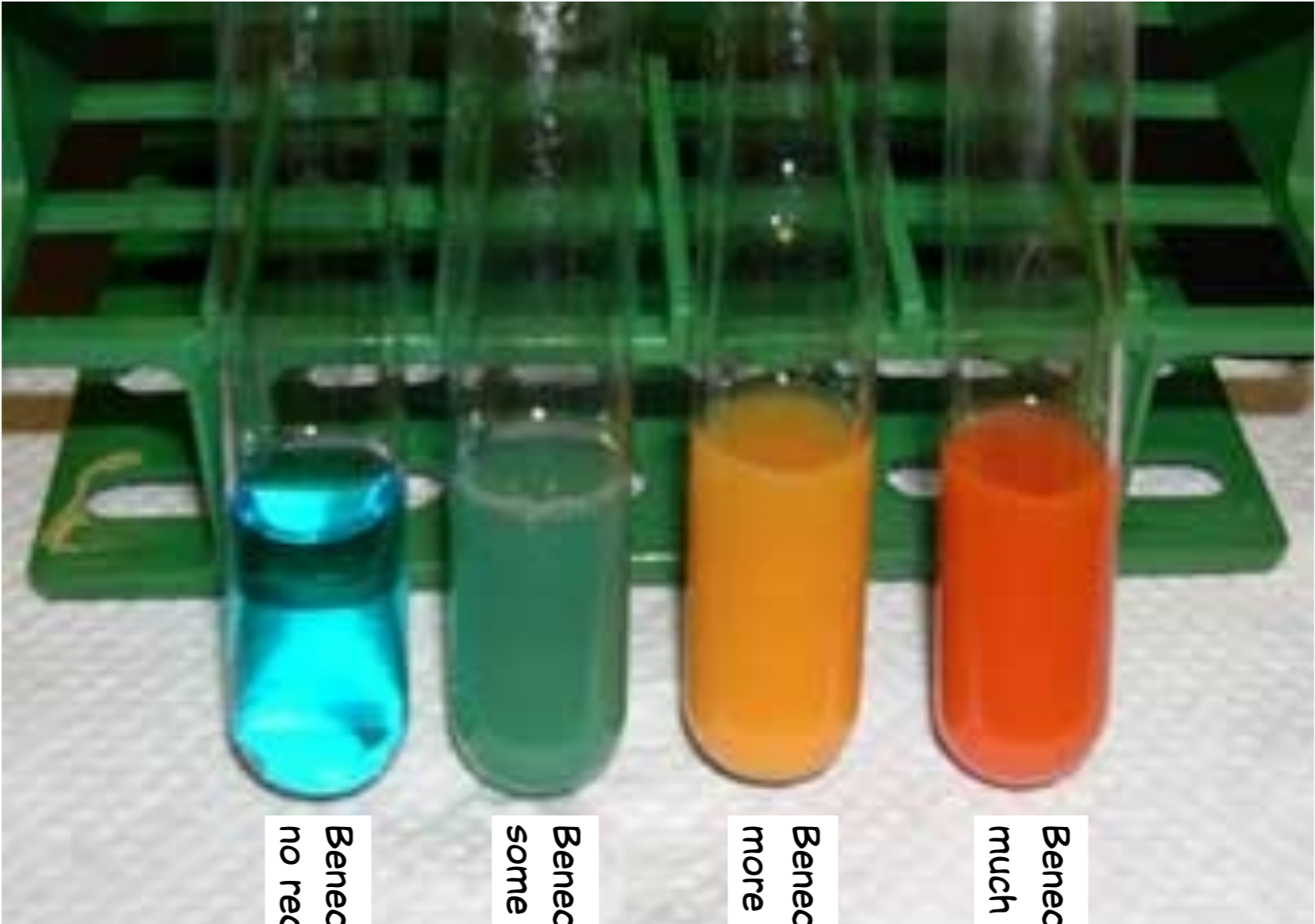
# The Effect of pH on Amylase

	<i>pH</i>	<i>Observations Amylase Activity</i>
<i>Distilled Water (Control)</i>		
<i>Strong Acid</i>		
<i>Weak Acid</i>		

**Materials:** Using 0.1 M HCl, develop a method of testing the effect of pH on amylase. (5 drops of amylase; 1 mL Benedict's; pH paper; 1 mL starch;)



# The Effect of pH on Amylase



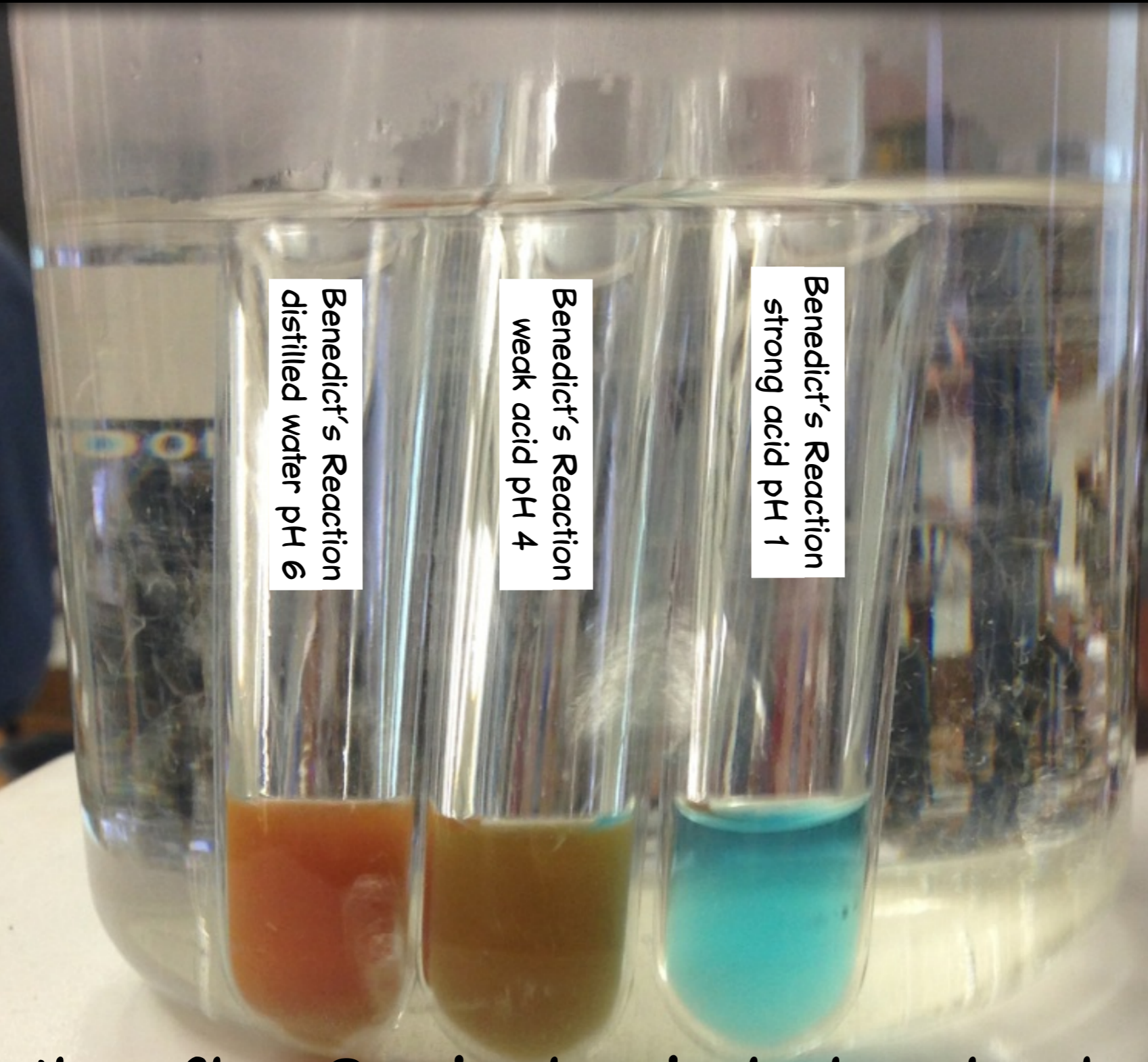
Benedict's - no reaction  
no reducing sugar present

Benedict's - slight reaction  
some reducing sugar present

Benedict's - normal reaction  
more reducing sugar present

Benedict's - major reaction  
much reducing sugar present

# The Effect of pH on Amylase



Results after 3 minutes in hot water bath



# The Effect of pH on Amylase

Why does the body produce amylase in both the mouth and pancreas?