**DNA Extraction from Strawberries Lab – Teacher’s Notes**

**Rationale**

This lab is an excellent resource to allow students to extract, spool, and see DNA. Strawberries are an excellent source for extracting DNA because they are easy to work with and have lots of DNA to isolate. They actually have 8 copies of each chromosome which makes them octoploid.

**Materials**

Student worksheets

Strawberries (frozen can be used but they must be thawed to room temperature)

Resealable plastic freezer bags

Small plastic cups

Plastic pipettes

Coffee filters (cone shaped #2 work best)

Extraction Buffer (see below)

Alcohol (95% ethanol or 100% isopropyl)

Ice (to keep the ethanol cold)

Coffee stirrers

The following should be completed in advance of the lab:

**DNA Extraction Buffer**

50 mL of clear shampoo without conditioner

1. tsp non-iodized salt
2. mL water

Mix the materials gently in a container so as not to create many bubbles.

This amount is enough for 50 groups of students working in pairs.

Make sure the alcohol is ice cold!

Freezer bags work better than regular plastic bags because they are thicker.

Fill 50 test tubes with approximately 15 mL of ethanol (one for each group). Cap the test tubes and keep them on ice until students are ready for them.