🛢️ Making & Burning Biodiesel (Observer Jobs)

Biology A · Unit 3 · Level 2



Name: _____

A6 Making Biofuel + Day 2 burning + Combustion Lab: our students observe and record; staff or the teacher handle methanol, the catalyst and the flame.

🧺 What I need (observer)

- ☐ 🥽 **1** pair of goggles (on the whole time)
- ☐ 📋 **1** observer card + pencil
- ☐ ⏱️ **1** timer or clock
- ☐ 📷 **1** tablet for photos (if allowed)

🌱 Steps: check each box when you finish

1. 🌻 **Observe** the canola oil: color, thickness, smell (wave the air to your nose). ☐
2. 🧪 **Watch** the teacher add methanol and the catalyst (teacher only). ☐
3. ⏱️ **Time** 10 minutes of shaking. Record. ☐
4. 🥞 **Day 2**: record the 2 layers. Biodiesel is on top, glycerol on the bottom. ☐
5. 🌡️ **Record** the start temperature of the water in the can. ☐
6. 🔥 **Watch** the biodiesel burn for 5 minutes (teacher lights it). ☐
7. 🌡️ **Record** the highest water temperature. Find the change. ☐
8. 📝 **Answer**: what forms of energy did you see? (chemical → heat and light) ☐

📋 Data table

What	Before	After
Oil / biodiesel color		
Thickness (thick / thin)		
Water temperature (°C)		
Temperature change (°C)		

💡 *This lab is for watching and recording. Our students never handle methanol, potassium hydroxide, or the flame.*

🚧 **Under construction:** Ms. Dunham said in Canvas the teacher adds the catalyst. Please confirm our students' observer roles and where the safety line goes. *Check with Ms. Dunham.*