

Mathematics for College Liberal Arts
Unit 9 Project
Metric

Instructions: Answer **ALL** questions. You **MUST** show all calculations and/or explanations to justify your answers. Upload the completed project as a Word or PDF file.

1. A student consumed 10 cans of their favorite soda last week. If each can contained 39 g of sugar, how many milligrams of sugar did they consume?
2. A doctor recommends their patient drinks 5 liters of water on days of vigorous exercise. If the patient drinks 3,400 mL, how much more do they need to drink?
3. A studio apartment has a length of 1,200 cm and a width that one half of the length. What is the area of the apartment in meters?
4. A living room is 7 m long and 8 m wide. Carpet costs \$9.50 per square meter. How much will it cost to carpet the room?
5. A fish tank has the dimensions 40cm \times 25cm \times 20cm. What is the capacity of the fish tank in liters?
6. A recipe for chili makes 5.4 L of chili. If a restaurant serves chili in 300 mL bowls, how many bowls of chili can they serve?
7. A restaurant has 126 kg of rice. If each serving contains 125 g, how many servings will they make?
8. A boiling pan of water is 212 °F. As the water cools the temperature drops 12 °C every 3 minutes. How many minutes until the temperature of the water reaches 28 °C?
9. A garden walkway has the dimensions shown. How many square meters of brick are needed to cover the walkway?

