# The persona computer 

Technology, Computer

## ASSIGN BUSTER

A student has several different-size samples of substances I and II. She measures the masses and volumes of these samples and plots the graphs shown in Figure D page 67. Which substance has greater density? How do you know? 22 more dense because It doesn't rise as fast as number one. 5 . How can you determine the density of ice? Can you determine the volume of the ice by melting it and measuring the volume of the resulting water? Explain. 4 No, you can not determine the volume of Ice by melting it down to water, this Is because the volume Is lowered, while the mass Is kept the same, changing the density. 46. It is likely that the temperature readings on several thermometers will be different even when their bulbs are close together In a well-stirred beaker of water. What can you do so that data taken with the different thermometers can be accurately compared? Yes, it is very likely that it will be within 2 degree in catheter. 47. Explain your reasoning. A. Would adding more ice to an insulated cooler filled with canned drinks make the drink colder? (opts) No, it will not lower the temperature, but instead increase the amount of time that it will stay cool. B. If not, how would adding more ice affect the drinks? (opts) Adding more ice would change the temperature of the drinks. C. Describe an experiment to test your answer to part (b)? (opts) You could measure the temperature of the water with 3 ice cubes after 10 minis, then add cubes, and watt 10 minutes and measure the temperature, 48.

The melting point of a few tiny crystals of BATH can be measured by placing the crystals in a small capillary tube held next to the bulb off thermometer in a water bath See figure $E$, page 68 . When the melting point is found by this method, the result agrees with the freezing point you found in Experiment 3.

9, Freezing and melting, using about CACM of the substance. 8 a. Use Figure E page 68 to estimate the volume of BATH used in the experiment. The inner diameter of the capillary tube is about 0 . Mm. (opts) oz b. By what factor is the volume of BATH used in the experiment smaller than that used in Experiment 3.

