

Name _____

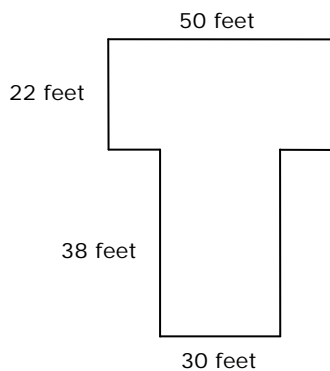
Date _____

Using Geometry in Design Problems - Independent Practice Worksheet

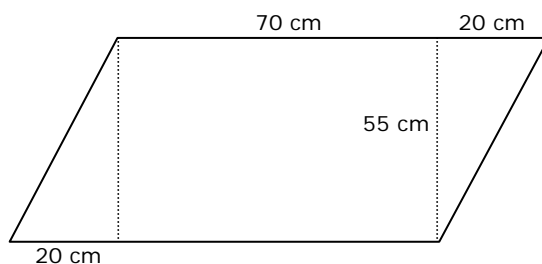
Complete all the problems. Make sure to draw pictures to help you solve the problems.

1) You have some books. You need to ship the books to your friend. The books are 8 inches height, 5 inches width, and 2 inches depth. How many of these books could you pack into your closet which is 20 inches long, 25 inches wide and 30 inches high?

2) An oil company inherits a "T" shaped oil tank; as seen below. The tank is 10 feet thick throughout the entire tower. One cubic foot of the specific oil that they wish to store equals 7.48 gallons. How many gallons of oil can be stored in the oil tank?



3) Two carpenters decided to design cardboard boxes for a client. The dimensions of the box are as shown. How much cardboard in cm^2 would they need for 40 boxes?



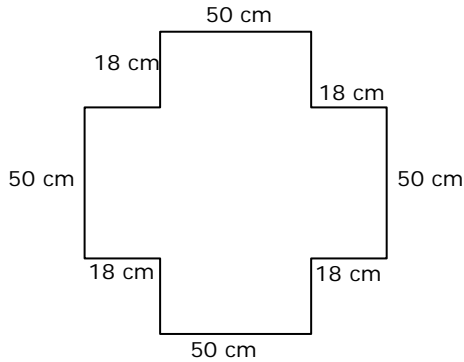
4) You have some Blue-Ray movies boxes. You need to send movies to another city. The boxes measure 1 foot high, 2 feet in width, and 4 feet deep. How many of these boxes could you pack into a shipping truck container which is 23 feet long, 20 feet wide, and 40 feet high?



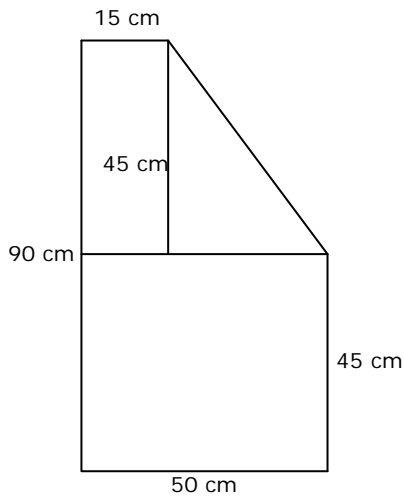
Name _____

Date _____

5) A water company inherits a “+” shaped water tank; as seen below. The tower is 10 feet thick throughout the entire tower. One cubic foot of water equals 7.48 gallons. How many gallons of water can be stored in the water tank?



6) Two carpenters decided to design computer cabinet for a lab. The dimensions of the cabinet are as shown. How much wood in cm^2 would they need for 15 cabinets?



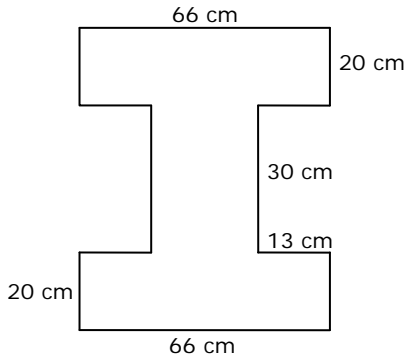
7) You decide to start your own business of selling crockery items. The crockery boxes come packed in cartons that are 12 inches long, 9 inches wide and 14 inches high. How many of these cartons could you pack into a storage locker that is 88 inches long, 60 inches wide and 95 inches high?



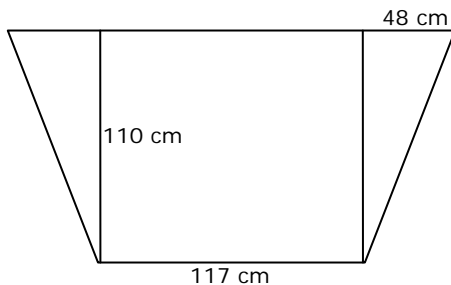
Name _____

Date _____

8) A water pump is shaped like an "I"; as seen below. The pump is 10 feet thick throughout the entire tank. One cubic foot of water equals 7.48 gallons. How many gallons of water can fill the pump?



9) Two carpenters decided to design a door for a home. The dimensions of the door are as shown. How much wood in cm^2 would they need for 7 doors?



10) You are a computer distributor. You have some laptops. You need to ship laptops retailers. The laptop boxes are 1.5 feet high, 2 feet in width, and 0.5 feet deep. How many of these laptop boxes could you pack into your car's trunk space that is 5 feet long, 4.5 feet wide and 7 feet high?

