

## HCF / LCM

Read each statement carefully & and Identify whether statements represent HCF or LCM

- 1) A baker wants to arrange 24 chocolate cakes and 18 vanilla cakes in a display shelf. How many should he put in each line so that each line has same flavour cakes & there is equal number of cakes in each line.  
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- 2) Sandwiches are sold in packs of 6 and juices are sold in packs of 8. If we wish to buy equal number of sandwiches and juices how many packs do we need to buy ?  
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- 3) At a train station a train leaves every 10 minutes and a time clock rings after 15 minutes if a train leaves and the clock rings at 11:00am , after how much time the train leaves and the clock rings at the same time again ?  
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- 4) Three different groups of scientist with 12 , 30 and 42 members respectively will go to Japan for a research conference . An equal number of scientists from the same group will stay in each hotel room , with no scientists left over.  
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- 5) A man has a rectangular field whose sides is 100m and 85m long. He wants to plants trees around the field such that distance between each tree is the same.  
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A merchant has 120 liters and 180 liters of two kinds of oil. He wants to sell the oil by filling the two kinds in tins of equal volumes. Find the greatest volume of such a tin.

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Find the least number of square tiles by which the floor of a room of dimensions 1658 cm and 832 cm can be covered completely.

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Six bells commence tolling together and toll at intervals of 2, 4, 6, 8 10 and 12 seconds respectively. In 30 minutes, how many times do they toll together ? (excluding the one at start)

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Shannon is making identical balloon arrangements for a party. She has 32 maroon balloons, 24 white balloons, and 16 orange balloons. She wants each arrangement to have the same number of each color. What is the greatest number of arrangements that she can make if every balloon is used?

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Hot dogs come in packages of 8. Hot dog buns come in packages of 12. If Grace wants to have enough to serve 24 people and have none left over, how many packages of hot dogs and hot dog buns should she purchase?)

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There are 40 girls and 32 boys who want to participate in 6th grade intramurals. If each team must have the same number of girls and the same number of boys,

What is the greatest number of teams that can participate in intramurals?

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How many girls and boys will be on each team?

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Beginning at 8:30 A.M., tours of the National Capitol and the White House begin at a tour agency. Tours for the National Capitol leave every 15 minutes. Tours for the White House leave every 20 minutes. How often do the tours leave at the same time?

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A wholesale coffee dealer has 24 kilograms, 120 kilograms and 72 kilograms of three different qualities of coffee. He wants it all to be packed into various boxes of equal size without mixing. Find the capacity of the largest possible box.

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### *BONUS QUESTION*

Find the greatest number which when divides 259 and 465 leaves remainders 4 and 6 respectively.

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Find the side of the largest square slab which can be paved on the floor of a room 5 meters 44cm long and 3 meters 74 cm broad

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