



The Case of the Diamond Championship Trophy

Grade 4 math · Rounding, Addition, Subtraction, Multiplication, Division · Reading level grades 3-4

Detective: _____ **Date:** _____

During the championship match at the Pixelated Garden Arena, someone sneaked into the vault and snatched the Diamond Championship Trophy! Clues were left all over the basketball court and soccer pitch.

1. Solve each math problem. The answer is a number, and the letter beside it is what that number stands for.
2. In the clue boxes, write that letter in every box showing the same number, then read the secret clue.
3. Use each clue to cross suspects off the list. The one suspect left at the end is the culprit!

My answer: the stadium sneaker is _____

Possible suspects

Cross off a row as each clue rules it out. The one left at the end is the culprit.

NAME	SPECIAL MOVE	GEAR PIECE	DOMINANT HAND	HAIR COLOR	WEAKNESS
Son Heungmin	Ender Teleport	Nether Wings	Left Handed	Black Hair	Lava Traps
Marta Vieira	Slam Dunk Burst	Slime Boots	Left Handed	Green Hair	Loud Whistles
Steve Block	Pixel Sprint	Slime Boots	Left Handed	Green Hair	Water Blocks
Larry Bird	Redstone Shield	Emerald Cleats	Left Handed	Green Hair	Loud Whistles
Bukayo Saka	Redstone Shield	Emerald Cleats	Right Handed	Green Hair	Water Blocks
Lionel Messi	Ender Teleport	Emerald Cleats	Left Handed	Green Hair	Loud Whistles
Jaylen Brown	Pixel Sprint	Diamond Armor	Right Handed	Green Hair	Loud Whistles
Kevin Garnett	Block Toss	Gold Whistle	Left Handed	Green Hair	Loud Whistles
Kylian Mbappe	Block Toss	Diamond Armor	Left Handed	Green Hair	Water Blocks
Alex Morgan	Ender Teleport	Slime Boots	Right Handed	Green Hair	Loud Whistles
Sam Kerr	Ender Teleport	Diamond Armor	Left Handed	Green Hair	Lava Traps
Corey Court	Block Toss	Slime Boots	Right Handed	Black Hair	Loud Whistles
Alex Crafts	Slam Dunk Burst	Diamond Armor	Left Handed	Green Hair	Loud Whistles
Jrue Holiday	Ender Teleport	Slime Boots	Left Handed	Green Hair	Lava Traps
Robert Williams	Slam Dunk Burst	Diamond Armor	Right Handed	Black Hair	Water Blocks
Marcus Smart	Ender Teleport	Nether Wings	Right Handed	Green Hair	Loud Whistles
Payton Pritchard	Pixel Sprint	Emerald Cleats	Left Handed	Green Hair	Lava Traps
Derrick White	Slam Dunk Burst	Emerald Cleats	Left Handed	Green Hair	Water Blocks
Jayson Tatum	Ender Teleport	Gold Whistle	Right Handed	Black Hair	Water Blocks
Dan Builder	Redstone Shield	Emerald Cleats	Left Handed	Green Hair	Water Blocks
Ray Allen	Slam Dunk Burst	Slime Boots	Left Handed	Blonde Hair	Loud Whistles

CLUE 1

The digital scoreboard only shows rounded totals on the stadium display screen.

Solve each problem, then write its letter in every clue box that shows the same number.

The diagram consists of two rows of boxes, each containing a number. The first row has 18 boxes, and the second row has 14 boxes. In the first row, the first box (2300) and the last box (2300) are highlighted in orange and contain the letter 'T'. In the second row, the 11th box (2300) is highlighted in orange and contains the letter 'T'.

2300	230	1700	50	200	170	170	30	200	370	1100	7000	1700	90	370	7000	2300
110	90	1700	30	2900	7000	170	1100	900	230	200	90	2300	170	1700		

Round 2,252 to the nearest hundred $\rightarrow$ **T**

Round 1,125 to the nearest hundred $\rightarrow$ **D**

Round 228 to the nearest ten $\rightarrow$ **H**

Round 34 to the nearest ten $\rightarrow$ **A**

Round 1,690 to the nearest hundred $\rightarrow$ **E**

Round 107 to the nearest ten $\rightarrow$ **U**

Round 367 to the nearest ten $\rightarrow$ **N**

Round 49 to the nearest ten $\rightarrow$ **V**

Round 220 to the nearest hundred $\rightarrow$

Round 854 to the nearest hundred $\rightarrow$ **W**

Round 2,946 to the nearest hundred → **G**

Round 86 to the nearest ten $\rightarrow$ **S**

Round 173 to the nearest ten $\rightarrow$ **L**

Round 7,380 to the nearest thousand $\rightarrow$

Scratch space:

CLUE 2 Addition

Coach Craft tallied up all the extra equipment gathered after halftime.

Solve each problem, then write its letter in every clue box that shows the same number.

T																	
6583	8101	6429	8522	6495	8522	4742	6429	9814	6583	4317	5433	7178	4742	4742	6429	4317	6738
			T														
4256	6429	2908	6583	8101	6738	5086	4317	6429	4317	8496	4256	7178	7027	6429			

$$3569 + 3014 = \boxed{} \rightarrow \boxed{\text{T}}$$

$$1639 + 2678 = \boxed{} \rightarrow \boxed{\text{D}}$$

$$4023 + 4473 = \boxed{} \rightarrow \boxed{\text{G}}$$

$$3505 + 5017 = \boxed{} \rightarrow \boxed{\text{S}}$$

$$3447 + 1986 = \boxed{} \rightarrow \boxed{\text{R}}$$

$$2612 + 2130 = \boxed{} \rightarrow \boxed{\text{P}}$$

$$3457 + 4644 = \boxed{} \rightarrow \boxed{\text{H}}$$

$$3176 + 6638 = \boxed{} \rightarrow \boxed{\text{C}}$$

$$3582 + 3445 = \boxed{} \rightarrow \boxed{\text{V}}$$

$$2257 + 4481 = \boxed{} \rightarrow \boxed{\text{A}}$$

$$3236 + 3193 = \boxed{} \rightarrow \boxed{\text{E}}$$

$$3430 + 3748 = \boxed{} \rightarrow \boxed{\text{O}}$$

$$1916 + 2340 = \boxed{} \rightarrow \boxed{\text{L}}$$

$$913 + 1995 = \boxed{} \rightarrow \boxed{\text{F}}$$

$$2591 + 2495 = \boxed{} \rightarrow \boxed{\text{N}}$$

$$3724 + 2771 = \boxed{} \rightarrow \boxed{\text{U}}$$

Scratch space:

CLUE 3
Subtraction

The detective subtracted the missing training supplies from the locker room inventory.

Solve each problem, then write its letter in every clue box that shows the same number.

T																
1130	4609	3696	3603	2551	3696	4648	8620	3192	8943	2551	3603	4648	3848	4648	4936	
5788	3192	8034	5227	4967	8034	8943	2341	3848	4609	4447	3603	T				

$5346 - 4216 = \square \rightarrow \text{**T**}$

$10377 - 1757 = \square \rightarrow \text{**K**}$

$5792 - 1183 = \square \rightarrow \text{**H**}$

$3422 - 230 = \square \rightarrow \text{**R**}$

$13483 - 4540 = \square \rightarrow \text{**U**}$

$5908 - 2060 = \square \rightarrow \text{**W**}$

$8338 - 3690 = \square \rightarrow \text{**A**}$

$6069 - 281 = \square \rightarrow \text{**F**}$

$9757 - 4530 = \square \rightarrow \text{**M**}$

$6966 - 2519 = \square \rightarrow \text{**I**}$

$7084 - 4743 = \square \rightarrow \text{**D**}$

$11294 - 3260 = \square \rightarrow \text{**O**}$

$9875 - 4908 = \square \rightarrow \text{**L**}$

$8948 - 4012 = \square \rightarrow \text{**Y**}$

$6111 - 3560 = \square \rightarrow \text{**N**}$

$6890 - 3287 = \square \rightarrow \text{**S**}$

$6836 - 3140 = \square \rightarrow \text{**E**}$

Scratch space:

CLUE 4

Multiplication facts (1-12)

Stadium staff arranged identical rows of energy potions along the bench.

Solve each problem, then write its letter in every clue box that shows the same number.

I						I												
30	15	24	7	2	99	30	132	14	99	80	16	2	12	80	8	15	60	

2	99	16	14	15	60	2	80	12	132	16	7	7	15	28	14	30	16	

$6 \times 5 = \square \rightarrow \boxed{\text{I}}$

$5 \times 3 = \square \rightarrow \boxed{\text{N}}$

$9 \times 11 = \square \rightarrow \boxed{\text{T}}$

$12 \times 1 = \square \rightarrow \boxed{\text{F}}$

$12 \times 5 = \square \rightarrow \boxed{\text{D}}$

$1 \times 2 = \square \rightarrow \boxed{\text{S}}$

$2 \times 7 = \square \rightarrow \boxed{\text{A}}$

$12 \times 11 = \square \rightarrow \boxed{\text{G}}$

$4 \times 7 = \square \rightarrow \boxed{\text{H}}$

$8 \times 2 = \square \rightarrow \boxed{\text{R}}$

$4 \times 2 = \square \rightarrow \boxed{\text{U}}$

$8 \times 10 = \square \rightarrow \boxed{\text{O}}$

$8 \times 3 = \square \rightarrow \boxed{\text{V}}$

$1 \times 7 = \square \rightarrow \boxed{\text{E}}$

Scratch space:

CLUE 5**Division facts (1-12) - the last clue**

The referee divided all the gold jerseys equally among the starting players.

First solve each problem. Then find each answer in the numbered list below and cross that sentence out. One sentence will be left - that is exactly what the villain did!

Step 1 - solve these:

$10 \div 1 = \boxed{}$

$7 \div 7 = \boxed{}$

$132 \div 11 = \boxed{}$

$30 \div 10 = \boxed{}$

$40 \div 5 = \boxed{}$

$18 \div 3 = \boxed{}$

$110 \div 10 = \boxed{}$

$2 \div 1 = \boxed{}$

$12 \div 3 = \boxed{}$

$9 \div 1 = \boxed{}$

$40 \div 8 = \boxed{}$

Step 2 - cross out the sentence with each answer:

1. The villain executed a slam dunk burst, then strapped on diamond armor.
2. The villain hurled a block toss at defenders, then strapped on diamond armor.
3. The villain raised a redstone shield, then flapped nether wings.
4. The villain dashed off with pixel sprint, then strapped on diamond armor.
5. The villain dashed off with pixel sprint, then bounced off in slime boots.
6. The villain raised a redstone shield, then strapped on diamond armor.
7. The villain used ender teleport to vanish, then laced up emerald cleats.
8. The villain dashed off with pixel sprint, then blew into a gold whistle.
9. The villain executed a slam dunk burst, then blew into a gold whistle.
10. The villain executed a slam dunk burst, then bounced off in slime boots.
11. The villain dashed off with pixel sprint, then laced up emerald cleats.
12. The villain raised a redstone shield, then laced up emerald cleats.

Answer Key

The Case of the Diamond Championship Trophy

Culprit: Lionel Messi

Ender Teleport · Emerald Cleats · Left Handed · Green Hair · Loud Whistles

Trail: Start 21 → Clue 1 19 → Clue 2 13 → Clue 3 5 → Clue 4 4 → Clue 5 1

Clue 1 (Rounding): "THE VILLAIN DOES NOT USE A GOLD WHISTLE"

Round 2,252 to the nearest hundred = 2300 (T) · Round 1,125 to the nearest hundred = 1100 (D) · Round 228 to the nearest ten = 230 (H) · Round 34 to the nearest ten = 30 (A) · Round 1,690 to the nearest hundred = 1700 (E) · Round 107 to the nearest ten = 110 (U) · Round 367 to the nearest ten = 370 (N) · Round 49 to the nearest ten = 50 (V) · Round 220 to the nearest hundred = 200 (I) · Round 854 to the nearest hundred = 900 (W) · Round 2,946 to the nearest hundred = 2900 (G) · Round 86 to the nearest ten = 90 (S) · Round 173 to the nearest ten = 170 (L) · Round 7,380 to the nearest thousand = 7000 (O)

Clue 2 (Addition): "THE SUSPECT DROPPED A LEFT HANDED GLOVE"

$3569 + 3014 = 6583$ (T) · $1639 + 2678 = 4317$ (D) · $4023 + 4473 = 8496$ (G) · $3505 + 5017 = 8522$ (S) · $3447 + 1986 = 5433$ (R) · $2612 + 2130 = 4742$ (P) · $3457 + 4644 = 8101$ (H) · $3176 + 6638 = 9814$ (C) · $3582 + 3445 = 7027$ (V) · $2257 + 4481 = 6738$ (A) · $3236 + 3193 = 6429$ (E) · $3430 + 3748 = 7178$ (O) · $1916 + 2340 = 4256$ (L) · $913 + 1995 = 2908$ (F) · $2591 + 2495 = 5086$ (N) · $3724 + 2771 = 6495$ (U)

Clue 3 (Subtraction): "THE SNEAK RUNS AWAY FROM LOUD WHISTLES"

$5346 - 4216 = 1130$ (T) · $10377 - 1757 = 8620$ (K) · $5792 - 1183 = 4609$ (H) · $3422 - 230 = 3192$ (R) · $13483 - 4540 = 8943$ (U) · $5908 - 2060 = 3848$ (W) · $8338 - 3690 = 4648$ (A) · $6069 - 281 = 5788$ (F) · $9757 - 4530 = 5227$ (M) · $6966 - 2519 = 4447$ (I) · $7084 - 4743 = 2341$ (D) · $11294 - 3260 = 8034$ (O) · $9875 - 4908 = 4967$ (L) · $8948 - 4012 = 4936$ (Y) · $6111 - 3560 = 2551$ (N) · $6890 - 3287 = 3603$ (S) · $6836 - 3140 = 3696$ (E)

Clue 4 (Multiplication facts (1-12)): "INVESTIGATORS FOUND STRANDS OF GREEN HAIR"

$6 \times 5 = 30$ (I) · $5 \times 3 = 15$ (N) · $9 \times 11 = 99$ (T) · $12 \times 1 = 12$ (F) · $12 \times 5 = 60$ (D) · $1 \times 2 = 2$ (S) · $2 \times 7 = 14$ (A) · $12 \times 11 = 132$ (G) · $4 \times 7 = 28$ (H) · $8 \times 2 = 16$ (R) · $4 \times 2 = 8$ (U) · $8 \times 10 = 80$ (O) · $8 \times 3 = 24$ (V) · $1 \times 7 = 7$ (E)

Clue 5 (Division facts (1-12)): surviving statement is box 7 → Lionel Messi

$10 \div 1 = 10$ · $7 \div 7 = 1$ · $132 \div 11 = 12$ · $30 \div 10 = 3$ · $40 \div 5 = 8$ · $18 \div 3 = 6$ · $110 \div 10 = 11$ · $2 \div 1 = 2$ · $12 \div 3 = 4$ · $9 \div 1 = 9$ · $40 \div 8 = 5$