



The Case of the Missing Hover-Drive

Grade 6 math · Multiplication, Rounding, Multi-step word problems, Percentages, Division · Reading level grades 5-6

Detective: _____ Date: _____

Someone bypassed the lasers and swiped the experimental Hover-Drive from the Academy vault. The Head Gadget Master needs our best recruits to analyze the clues and catch the Rogue Agent before they escape the island!

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 Rogue Agent is _____

Possible suspects

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

NAME	PRIMARY GADGET	SPECIAL TOOL	WRITING HAND	DISGUISE TRACE	SECRET FOIL
Agent Finn	Rocket Boots	Night Vision Goggles	Left-handed writer	Neon Blue Wig	Spicy Jalapenos
Indiana	Grapple Gun	Hacker USB	Right-handed writer	Spiky Green Gel	Slippery Bananas
Agent Ben	Spy Drone	Decoy Hologram	Right-handed writer	Silver Glitter	Slippery Bananas
Agent Leo	Laser Watch	Hacker USB	Right-handed writer	Spiky Green Gel	Squeaky Toys
Agent Chloe	Laser Watch	Hacker USB	Right-handed writer	Neon Blue Wig	Squeaky Toys
Agent Mia	Laser Watch	Sonic Whistle	Right-handed writer	Spiky Green Gel	Slippery Bananas
Watson	Spy Drone	Decoy Hologram	Left-handed writer	Spiky Green Gel	Slippery Bananas
Agent Ava	Laser Watch	Vault Keycard	Left-handed writer	Spiky Green Gel	Squeaky Toys
Lara	Rocket Boots	Night Vision Goggles	Right-handed writer	Spiky Green Gel	Squeaky Toys
Agent Max	Stealth Cloak	Night Vision Goggles	Right-handed writer	Neon Blue Wig	Spicy Jalapenos
Agent Jack	Spy Drone	Decoy Hologram	Left-handed writer	Spiky Green Gel	Spicy Jalapenos
Agent Noah	Grapple Gun	Sonic Whistle	Left-handed writer	Spiky Green Gel	Squeaky Toys
Agent Maya	Laser Watch	Sonic Whistle	Right-handed writer	Neon Blue Wig	Squeaky Toys
Agent Ella	Rocket Boots	Decoy Hologram	Right-handed writer	Spiky Green Gel	Squeaky Toys
Sherlock	Spy Drone	Night Vision Goggles	Right-handed writer	Neon Blue Wig	Spicy Jalapenos
Agent Sam	Spy Drone	Hacker USB	Left-handed writer	Neon Blue Wig	Spicy Jalapenos
Agent Zoe	Rocket Boots	Hacker USB	Left-handed writer	Spiky Green Gel	Squeaky Toys
Carmen	Spy Drone	Hacker USB	Right-handed writer	Spiky Green Gel	Squeaky Toys
Agent Lily	Stealth Cloak	Vault Keycard	Right-handed writer	Spiky Green Gel	Squeaky Toys
Agent Toby	Rocket Boots	Night Vision Goggles	Left-handed writer	Neon Blue Wig	Squeaky Toys
Agent Luke	Rocket Boots	Sonic Whistle	Right-handed writer	Spiky Green Gel	Slippery Bananas

CLUE 1

Multiplication facts (1-12)

We found crates of tracking devices stacked in equal rows in the warehouse. Multiply the rows to count the total devices and unlock the first clue.

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

N		N									N								
96	84	96	40	9	64	33	54	40	20	40	84	96	9	84	9	9	28	24	20
110	24	72	24	30	20	24	56												

$8 \times 12 = \square \rightarrow \boxed{\text{N}}$

$8 \times 7 = \square \rightarrow \boxed{\text{D}}$

$12 \times 7 = \square \rightarrow \boxed{\text{O}}$

$4 \times 5 = \square \rightarrow \boxed{\text{S}}$

$9 \times 8 = \square \rightarrow \boxed{\text{R}}$

$3 \times 10 = \square \rightarrow \boxed{\text{U}}$

$11 \times 10 = \square \rightarrow \boxed{\text{W}}$

$4 \times 6 = \square \rightarrow \boxed{\text{E}}$

$1 \times 9 = \square \rightarrow \boxed{\text{G}}$

$10 \times 4 = \square \rightarrow \boxed{\text{I}}$

$8 \times 8 = \square \rightarrow \boxed{\text{H}}$

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

$9 \times 6 = \square \rightarrow \boxed{\text{V}}$

$11 \times 3 = \square \rightarrow \boxed{\text{T}}$

Scratch space:

CLUE 2 Rounding

The infrared heat scanner is fuzzy and only displays temperature readings rounded to the nearest ten. Round the scanner values to pinpoint the runaway's trail.

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

R													R					
900	1700	2000	90	430	90	20	30	3000	300	3000	2000	900	1700	4300	110	30		

						R
430	90	300	3000	110	110	900

Round 886 to the nearest hundred → **R**

Round 93 to the nearest ten → **H**

Round 1,741 to the nearest hundred → **I**

Round 4,273 to the nearest hundred → **P**

Round 33 to the nearest ten → **N**

Round 2,328 to the nearest thousand → **G**

Round 110 to the nearest ten → **O**

Round 2,633 to the nearest thousand → **D**

Round 428 to the nearest ten → **T**

Round 305 to the nearest hundred → **E**

Round 23 to the nearest ten → **A**

Scratch space:

CLUE 3

Multi-step word problems

To unlock the encrypted server room, we must calculate the exact battery drain across several testing stages. Solve this multi-step energy puzzle to retrieve the next file.

Solve each problem, then write its letter in the boxes to fill in the missing word.

Someone scared the villain off with S T O S .

54 78 38 66 57 76 8 8 54

There were 109 decoder rings in all. 1 decoder rings were set aside. The rest were shared equally among 2 Academy Squad. How many decoder rings did each get?

Answer: → S

There were 466 decoder rings in all. 4 decoder rings were set aside. The rest were shared equally among 7 Academy Squad. How many decoder rings did each get?

Answer: → E

Agent filled 4 boxes with 6 laser pens each, then found 33 more laser pens. How many laser pens are there in all?

Answer: → A

There were 197 laser pens in all. 1 Academy Squad used 7 laser pens each. The other 5 Academy Squad shared the rest equally. How many laser pens did each of the other Academy Squad get?

Answer: → U

There were 57 laser pens in all. 1 Academy Squad used 9 laser pens each. The other 6 Academy Squad shared the rest equally. How many laser pens did each of the other Academy Squad get?

Answer: → Y

There were 326 decoder rings in all. 14 decoder rings were set aside. The rest were shared equally among 4 Academy Squad. How many decoder rings did each get?

Answer: → Q

Agent earned 4 decoder rings in each of 4 rounds, plus 66 bonus decoder rings. Then 6 decoder rings were lost. How many decoder rings are left?

Answer: → K

Scratch space:

CLUE 4 Percentages

The recovery program has restored a partial image of the suspect, but we need to compute the remaining battery percentage of the backup generator first.

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

A number line from 0 to 100 with various numbers marked in boxes. Some boxes are shaded orange and contain the letter 'S'. The numbers marked are: 45, 20, 11, 23, 19, 21, 29, 8, 8, 27, 21, 8, 15, 45, 20, 8, 6, 23, 45, 22, 27, 28, 3, 8, 26, 8, 45, 23.

10% of 450 = $\rightarrow$ **S**

50% of 40 = $\rightarrow$ **P**

5% of 220 = $\rightarrow$

25% of 84 = $\rightarrow$ **G**

25% of 88 = $\rightarrow$

10% of 190 = $\rightarrow$ **Y**

75% of 8 = → **C**

$$25\% \text{ of } 116 = \boxed{} \rightarrow \boxed{\text{R}}$$

$$40\% \text{ of } 20 = \boxed{} \rightarrow \boxed{\text{E}}$$

25% of 104 = $\rightarrow$ **D**

10% of 30 = $\rightarrow$ **H**

10% of 150 = → **L**

10% of 230 = → **K**

50% of 56 = $\rightarrow$ **T**

20% of 135 = $\rightarrow$ **N**

Scratch space:

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

We must distribute the recovered decoder badges equally among our field agents. Divide the badges to find the final clue hidden in the locker.

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:

$24 \div 3 = \boxed{}$

$15 \div 3 = \boxed{}$

$72 \div 6 = \boxed{}$

$6 \div 2 = \boxed{}$

$81 \div 9 = \boxed{}$

$8 \div 8 = \boxed{}$

$80 \div 8 = \boxed{}$

$4 \div 2 = \boxed{}$

$66 \div 6 = \boxed{}$

$70 \div 10 = \boxed{}$

$8 \div 2 = \boxed{}$

Step 2 - cross out the sentence with each answer:

1. The villain blasted over the security gate using rocket boots, then uploaded a virus to the security feed using a hacker usb.
2. The villain blasted over the security gate using rocket boots, then shattered the glass alarms using a sonic whistle.
3. The villain slipped past the cameras using a stealth cloak, then navigated the pitch-black ventilation system with night vision goggles.
4. The villain cut through the window using a laser watch, then navigated the pitch-black ventilation system with night vision goggles.
5. The villain mapped out the ventilation shafts using a spy drone, then uploaded a virus to the security feed using a hacker usb.
6. The villain blasted over the security gate using rocket boots, then tricked the hallway guards with a decoy hologram.
7. The villain slipped past the cameras using a stealth cloak, then shattered the glass alarms using a sonic whistle.
8. The villain cut through the window using a laser watch, then uploaded a virus to the security feed using a hacker usb.
9. The villain mapped out the ventilation shafts using a spy drone, then navigated the pitch-black ventilation system with night vision goggles.
10. The villain mapped out the ventilation shafts using a spy drone, then tricked the hallway guards with a decoy hologram.
11. The villain scaled the elevator shaft using a grapple gun, then bypassed the secure door lock using a vault keycard.
12. The villain slipped past the cameras using a stealth cloak, then bypassed the secure door lock using a vault keycard.

Answer Key

The Case of the Missing Hover-Drive

Culprit: Agent Ella

Rocket Boots · Decoy Hologram · Right-handed writer · Spiky Green Gel · Squeaky Toys

Trail: Start 21 → Clue 1 16 → Clue 2 10 → Clue 3 6 → Clue 4 4 → Clue 5 1

Clue 1 (Multiplication facts (1-12)): "NO NIGHT VISION GOGGLES WERE USED"

$8 \times 12 = 96$ (N) · $8 \times 7 = 56$ (D) · $12 \times 7 = 84$ (O) · $4 \times 5 = 20$ (S) · $9 \times 8 = 72$ (R) · $3 \times 10 = 30$ (U) · $11 \times 10 = 110$ (W) · $4 \times 6 = 24$ (E) · $1 \times 9 = 9$ (G) · $10 \times 4 = 40$ (I) · $8 \times 8 = 64$ (H) · $7 \times 4 = 28$ (L) · $9 \times 6 = 54$ (V) · $11 \times 3 = 33$ (T)

Clue 2 (Rounding): "RIGHT HANDED GRIP ON THE DOOR"

Round 886 to the nearest hundred = 900 (R) · Round 93 to the nearest ten = 90 (H) · Round 1,741 to the nearest hundred = 1700 (I) · Round 4,273 to the nearest hundred = 4300 (P) · Round 33 to the nearest ten = 30 (N) · Round 2,328 to the nearest thousand = 2000 (G) · Round 110 to the nearest ten = 110 (O) · Round 2,633 to the nearest thousand = 3000 (D) · Round 428 to the nearest ten = 430 (T) · Round 305 to the nearest hundred = 300 (E) · Round 23 to the nearest ten = 20 (A)

Clue 3 (Multi-step word problems): "SQUEAKY TOYS"

There were 109 decoder rings in all. 1 decoder rings were set aside. The rest were shared equally among 2 Academy Squad. How many decoder rings did each get? = 54 (S) · There were 466 decoder rings in all. 4 decoder rings were set aside. The rest were shared equally among 7 Academy Squad. How many decoder rings did each get? = 66 (E) · Agent filled 4 boxes with 6 laser pens each, then found 33 more laser pens. How many laser pens are there in all? = 57 (A) · There were 197 laser pens in all. 1 Academy Squad used 7 laser pens each. The other 5 Academy Squad shared the rest equally. How many laser pens did each of the other Academy Squad get? = 38 (U) · There were 57 laser pens in all. 1 Academy Squad used 9 laser pens each. The other 6 Academy Squad shared the rest equally. How many laser pens did each of the other Academy Squad get? = 8 (Y) · There were 326 decoder rings in all. 14 decoder rings were set aside. The rest were shared equally among 4 Academy Squad. How many decoder rings did each get? = 78 (Q) · Agent earned 4 decoder rings in each of 4 rounds, plus 66 bonus decoder rings. Then 6 decoder rings were lost. How many decoder rings are left? = 76 (K)

Clue 4 (Percentages): "SPIKY GREEN GEL SPECKS ON THE DESK"

10% of 450 = 45 (S) · 50% of 40 = 20 (P) · 5% of 220 = 11 (I) · 25% of 84 = 21 (G) · 25% of 88 = 22 (O) · 10% of 190 = 19 (Y) · 75% of 8 = 6 (C) · 25% of 116 = 29 (R) · 40% of 20 = 8 (E) · 25% of 104 = 26 (D) · 10% of 30 = 3 (H) · 10% of 150 = 15 (L) · 10% of 230 = 23 (K) · 50% of 56 = 28 (T) · 20% of 135 = 27 (N)

Clue 5 (Division facts (1-12)): surviving statement is box 6 → Agent Ella

$24 \div 3 = 8$ · $15 \div 3 = 5$ · $72 \div 6 = 12$ · $6 \div 2 = 3$ · $81 \div 9 = 9$ · $8 \div 8 = 1$ · $80 \div 8 = 10$ · $4 \div 2 = 2$ · $66 \div 6 = 11$ · $70 \div 10 = 7$ · $8 \div 2 = 4$