



The Case of the Golden Pineapple

Grade 2 math · Addition, Place value, Subtraction, Skip counting, Missing addends · Reading level grades 3-4

Detective: _____ **Date:** _____

Welcome to the Secret Jungle Club! The legendary Golden Pineapple has vanished from the Chief Explorer's cabin. A rogue explorer has taken it into the deep jungle. It is up to you to search for clues, use your clever math skills, and track down the culprit before they escape on the evening ferry!

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 Pineapple Thief is _____

Possible suspects

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

NAME	JUNGLE TOOL	SECRET BADGE	MAP HAND	CAP COLOR	FEAR
Owen Vine	Laser Lasso	Quick Climb Badge	Right Handed	Neon Green Cap	Buzzing Bees
Sam River	Super Snorkel	Animal Whisper Badge	Right Handed	Bright Red Cap	Tickling Vines
Mia Canopy	Grappling Hook	Night Vision Badge	Right Handed	Sunny Yellow Cap	Squeaking Frogs
Eli Summit	Laser Lasso	Quick Climb Badge	Right Handed	Bright Red Cap	Tickling Vines
Ava Trail	Mud Boots	Map Master Badge	Right Handed	Sunny Yellow Cap	Squeaking Frogs
Max Tracker	Pocket Glider	Deep Dive Badge	Left Handed	Bright Red Cap	Tickling Vines
Nora Navigator	Grappling Hook	Deep Dive Badge	Right Handed	Bright Red Cap	Tickling Vines
Ivy Explorer	Mud Boots	Map Master Badge	Right Handed	Neon Green Cap	Tickling Vines
Zoe Scout	Mud Boots	Deep Dive Badge	Right Handed	Bright Red Cap	Squeaking Frogs
Cleo Canyon	Pocket Glider	Map Master Badge	Right Handed	Bright Red Cap	Squeaking Frogs
Cora Boulder	Laser Lasso	Deep Dive Badge	Right Handed	Bright Red Cap	Squeaking Frogs
Lily Fern	Mud Boots	Night Vision Badge	Left Handed	Bright Red Cap	Squeaking Frogs
Luke Safari	Pocket Glider	Map Master Badge	Left Handed	Neon Green Cap	Tickling Vines
Maya Meadow	Laser Lasso	Map Master Badge	Right Handed	Bright Red Cap	Tickling Vines
Amy Amazon	Laser Lasso	Night Vision Badge	Right Handed	Bright Red Cap	Tickling Vines
Toby Compass	Mud Boots	Quick Climb Badge	Left Handed	Neon Green Cap	Tickling Vines
Ben Falcon	Laser Lasso	Animal Whisper Badge	Left Handed	Neon Green Cap	Squeaking Frogs
Leo Jungle	Pocket Glider	Animal Whisper Badge	Left Handed	Sunny Yellow Cap	Tickling Vines
Jake Jaguar	Mud Boots	Deep Dive Badge	Right Handed	Sunny Yellow Cap	Tickling Vines
Zack Zephyr	Pocket Glider	Quick Climb Badge	Right Handed	Sunny Yellow Cap	Squeaking Frogs
Ruby Ranger	Grappling Hook	Night Vision Badge	Left Handed	Sunny Yellow Cap	Tickling Vines

CLUE 1 Addition

We need to pack enough fresh water for the jungle trip. Let us count the flasks on each shelf and add them together to get our final supply list.

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

T			T											T					
45	22	90	45	22	78	90	92	75	73	90	62	48	73	45	22	82	35	90	
T																			
45	22	90	53	26	78	52	57	52	59	78	51	71	71	82	75	23	90		

$27 + 18 = \square \rightarrow$ T	$58 + 32 = \square \rightarrow$ E	$34 + 14 = \square \rightarrow$ N
$30 + 43 = \square \rightarrow$ O	$31 + 31 = \square \rightarrow$ S	$10 + 25 = \square \rightarrow$ V
$7 + 19 = \square \rightarrow$ U	$33 + 45 = \square \rightarrow$ I	$29 + 30 = \square \rightarrow$ L
$49 + 26 = \square \rightarrow$ D	$53 + 29 = \square \rightarrow$ A	$18 + 33 = \square \rightarrow$ M
$24 + 47 = \square \rightarrow$ B	$34 + 23 = \square \rightarrow$ K	$14 + 9 = \square \rightarrow$ G
$52 + 40 = \square \rightarrow$ F	$9 + 13 = \square \rightarrow$ H	$24 + 29 = \square \rightarrow$ Q
$20 + 32 = \square \rightarrow$ C		

Scratch space:

CLUE 2

The old stone door has a giant gold lock. To open it, we must find which number sits in the tens place on this dusty dial.

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

17 69 59 60 83 60 48 59 82 17 69 59 77 37 17 69 59

78 27 48 66 55 17 69 59 93 66 91 69 17 69 27 55 37

What number has 1 ten and 7 ones?

A diagram consisting of a rectangular box on the left, followed by a right-pointing arrow, and then another rectangular box on the right containing the letter 'T'.

What number has 9 tens and 3 ones?

A diagram illustrating a transition. On the left is a simple rectangular box. An arrow points from this box to a second box on the right. The second box is a rounded rectangle with a thick black border and contains the capital letter 'R' in a bold, black, sans-serif font.

What number has 7 tens and 7 ones?

A diagram showing a transformation. On the left is a simple rectangular box. An arrow points from this box to another rectangular box on the right. Inside the second box is the capital letter 'L'.

What number has 9 tens and 1 one?

A diagram showing a box with a question mark pointing to a box with the letter G.

What number has 8 tens and 3 ones?

A diagram showing a transition from an empty box to a box containing the letter 'U'. The first box is empty, followed by a right-pointing arrow, and then a second box containing the letter 'U'.

What number has 8 tens and 2 ones?

A diagram showing a transformation. On the left is a rounded rectangle containing a question mark. An arrow points to the right, where there is a rounded rectangle containing the letter 'C'.

What number has 6 tens and 0 ones?

A diagram showing a transition from an empty box to a box containing the letter S. The first box is empty, followed by a right-pointing arrow, and then a box containing the letter S.

What number has 4 tens and 8 ones?

A diagram showing a box with an arrow pointing to a box labeled P.

What number has 5 tens and 5 ones?

A diagram showing a mapping from an empty box to a box labeled 'N'. An arrow points from an empty box on the left to a box containing the letter 'N' on the right.

What number has 3 tens and 7 ones?

A diagram showing a box with an arrow pointing to a box labeled 'D'.

What number has 7 tens and 8 ones?

A diagram showing a box with an arrow pointing to a box labeled **M**.

What number has 6 tens and 9 ones?

A diagram illustrating a transformation. On the left is a simple rectangular box. An arrow points from this box to another rectangular box on the right. This second box contains the letter 'H' in a bold, black font.

What number has 6 tens and 6 ones?

A diagram illustrating a transformation. On the left is a simple rectangular box. An arrow points to the right, where a second rectangular box is shown. This second box has a thick border and contains a single, bold, black letter 'I' in the center.

What number has 2 tens and 7 ones?

A diagram showing a transformation. On the left is a square box with a thin black border and a light gray background, containing a large black question mark. An arrow points to the right, where there is a square box with a thick black border and a light gray background, containing a large black letter 'A'.

What number has 5 tens and 9 ones?

A diagram showing a transition from an empty box to a box containing the letter E. The first box is empty, followed by a right-pointing arrow, and then a second box containing the letter 'E'.

Scratch space:

Subtraction

A cheeky monkey swiped a bunch of our trail mix bags! Subtract the stolen snacks from our pile to see how many we have left.

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

30 47 36 85 62 47 18 69 36 77 36 23 65 30 30 47 36

30 69 32 77 21 69 22 61 12 69 22 36 62

$46 - 16 = \boxed{} \rightarrow \boxed{\text{T}}$

$69 - 7 = \boxed{} \rightarrow \boxed{\text{S}}$

$$73 - 26 = \boxed{} \rightarrow \boxed{\text{H}}$$

$115 - 30 = \boxed{} \rightarrow \boxed{\text{Y}}$

$94 - 29 = \boxed{} \rightarrow \boxed{\text{A}}$

$101 - 24 = \boxed{} \rightarrow \boxed{\text{K}}$

$$39 - 17 = \boxed{} \rightarrow \boxed{\text{N}}$$

$52 - 20 = \boxed{} \rightarrow \boxed{\text{C}}$

$98 - 29 = \boxed{} \rightarrow \boxed{}$

$64 - 3 = \boxed{} \rightarrow \boxed{\mathbf{G}}$

39 - 18 = → **L**

$32 - 14 = \boxed{} \rightarrow \boxed{\text{R}}$

$61 - 25 = \boxed{} \rightarrow \boxed{\text{E}}$

34 - 22 = → **V**

$$49 - 26 = \boxed{} \rightarrow \boxed{\text{D}}$$

Scratch space:

CLUE 4 Skip counting

To cross the bubbling mud pits safely, we must follow the stone path by skipping numbers. Let us count by fives to find the next safe rock.

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

W																		
21	25	20	8	10	22	80	15	26	16	40	35	55	14	16	25	80		
12	15	65	15	14	14	55	25	60	12	25	22	25						

Skip-count by 3s. Fill the blank: 3, 6, 9, 12, 15, 18, __, 24, 27 → **W**

Skip-count by 10s. Fill the blank: 10, 20, 30, __, 50, 60 → **I**

Skip-count by 2s. Fill the blank: 2, 4, 6, 8, __, 12, 14 → **U**

Skip-count by 10s. Fill the blank: 10, 20, 30, 40, 50, __, 70, 80 → **S**

Skip-count by 5s. Fill the blank: 5, 10, 15, 20, 25, 30, 35, 40, 45, 50, __, 60, 65 → **H**

Skip-count by 5s. Fill the blank: 5, 10, 15, 20, 25, 30, __, 40, 45 → **G**

Skip-count by 3s. Fill the blank: 3, 6, 9, __, 15, 18 → **C**

Skip-count by 5s. Fill the blank: 5, 10, __, 20, 25 → **A**

Skip-count by 2s. Fill the blank: 2, 4, 6, 8, 10, 12, 14, __, 18, 20 → **R**

Skip-count by 2s. Fill the blank: 2, 4, 6, 8, 10, 12, __, 16, 18 → **T**

Skip-count by 2s. Fill the blank: 2, 4, 6, 8, 10, 12, 14, 16, 18, 20, __, 24, 26 → **N**

Skip-count by 2s. Fill the blank: 2, 4, 6, __, 10, 12 → **O**

Skip-count by 5s. Fill the blank: 5, 10, 15, 20, 25, 30, 35, 40, 45, 50, 55, 60, __, 70, 75 → **P**

Skip-count by 2s. Fill the blank: 2, 4, 6, 8, 10, 12, 14, 16, 18, 20, 22, 24, __, 28, 30 → **B**

Skip-count by 10s. Fill the blank: 10, 20, 30, 40, 50, 60, 70, __, 90, 100 → **D**

Skip-count by 2s. Fill the blank: 2, 4, 6, 8, 10, 12, 14, 16, 18, __, 22, 24 → **F**

Skip-count by 5s. Fill the blank: 5, 10, 15, 20, __, 30, 35 → **E**

Scratch space:

CLUE 5**Missing addends - the last clue**

The ancient bridge demands ten heavy pineapples to stay balanced. We only have seven on the scale, so we must figure out how many more we need.

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:

$2 + \underline{\quad} = 11$

$9 + \underline{\quad} = 16$

$2 + \underline{\quad} = 7$

$2 + \underline{\quad} = 12$

$7 + \underline{\quad} = 11$

$9 + \underline{\quad} = 20$

$4 + \underline{\quad} = 16$

$4 + \underline{\quad} = 10$

$2 + \underline{\quad} = 3$

$10 + \underline{\quad} = 12$

$4 + \underline{\quad} = 12$

Step 2 - cross out the sentence with each answer:

1. The villain stomped through the deep swamp in mud boots, then spotted the hidden path with a night vision badge.
2. The villain soared off the cliff with a pocket glider, then convinced the monkeys to help using an animal whisper badge.
3. The villain swung through the trees with a laser lasso, then spotted the hidden path with a night vision badge.
4. The villain soared off the cliff with a pocket glider, then retrieved the sunken key using a deep dive badge.
5. The villain scaled the ancient stone wall with a grappling hook, then retrieved the sunken key using a deep dive badge.
6. The villain soared off the cliff with a pocket glider, then navigated the maze using a map master badge.
7. The villain swung through the trees with a laser lasso, then navigated the maze using a map master badge.
8. The villain swam across the river using a super snorkel, then scrambled up the muddy hill with a quick climb badge.
9. The villain swam across the river using a super snorkel, then convinced the monkeys to help using an animal whisper badge.
10. The villain stomped through the deep swamp in mud boots, then convinced the monkeys to help using an animal whisper badge.
11. The villain stomped through the deep swamp in mud boots, then navigated the maze using a map master badge.
12. The villain scaled the ancient stone wall with a grappling hook, then convinced the monkeys to help using an animal whisper badge.

Answer Key

The Case of the Golden Pineapple

Culprit: Amy Amazon

Laser Lasso · Night Vision Badge · Right Handed · Bright Red Cap · Tickling Vines

Trail: Start 21 → Clue 1 17 → Clue 2 11 → Clue 3 6 → Clue 4 4 → Clue 5 1

Clue 1 (Addition): "THE THIEF DOES NOT HAVE THE QUICK CLIMB BADGE"

$27 + 18 = 45$ (T) · $58 + 32 = 90$ (E) · $34 + 14 = 48$ (N) · $30 + 43 = 73$ (O) · $31 + 31 = 62$ (S) · $10 + 25 = 35$ (V) · $7 + 19 = 26$ (U) · $33 + 45 = 78$ (I) · $29 + 30 = 59$ (L) · $49 + 26 = 75$ (D) · $53 + 29 = 82$ (A) · $18 + 33 = 51$ (M) · $24 + 47 = 71$ (B) · $34 + 23 = 57$ (K) · $14 + 9 = 23$ (G) · $52 + 40 = 92$ (F) · $9 + 13 = 22$ (H) · $24 + 29 = 53$ (Q) · $20 + 32 = 52$ (C)

Clue 2 (Place value): "THE SUSPECT HELD THE MAP IN THE RIGHT HAND"

What number has 1 ten and 7 ones? = 17 (T) · What number has 9 tens and 3 ones? = 93 (R) · What number has 7 tens and 7 ones? = 77 (L) · What number has 9 tens and 1 one? = 91 (G) · What number has 8 tens and 3 ones? = 83 (U) · What number has 8 tens and 2 ones? = 82 (C) · What number has 6 tens and 0 ones? = 60 (S) · What number has 4 tens and 8 ones? = 48 (P) · What number has 5 tens and 5 ones? = 55 (N) · What number has 3 tens and 7 ones? = 37 (D) · What number has 7 tens and 8 ones? = 78 (M) · What number has 6 tens and 9 ones? = 69 (H) · What number has 6 tens and 6 ones? = 66 (I) · What number has 2 tens and 7 ones? = 27 (A) · What number has 5 tens and 9 ones? = 59 (E)

Clue 3 (Subtraction): "THEY SHRIEKED AT THE TICKLING VINES"

$46 - 16 = 30$ (T) · $69 - 7 = 62$ (S) · $73 - 26 = 47$ (H) · $115 - 30 = 85$ (Y) · $94 - 29 = 65$ (A) · $101 - 24 = 77$ (K) · $39 - 17 = 22$ (N) · $52 - 20 = 32$ (C) · $98 - 29 = 69$ (I) · $64 - 3 = 61$ (G) · $39 - 18 = 21$ (L) · $32 - 14 = 18$ (R) · $61 - 25 = 36$ (E) · $34 - 22 = 12$ (V) · $49 - 26 = 23$ (D)

Clue 4 (Skip counting): "WE FOUND A BRIGHT RED CAP AT THE SCENE"

Skip-count by 3s. Fill the blank: 3, 6, 9, 12, 15, 18, __, 24, 27 = 21 (W) · Skip-count by 10s. Fill the blank: 10, 20, 30, __, 50, 60 = 40 (I) · Skip-count by 2s. Fill the blank: 2, 4, 6, 8, __, 12, 14 = 10 (U) · Skip-count by 10s. Fill the blank: 10, 20, 30, 40, 50, __, 70, 80 = 60 (S) · Skip-count by 5s. Fill the blank: 5, 10, 15, 20, 25, 30, 35, 40, 45, 50, __, 60, 65 = 55 (H) · Skip-count by 5s. Fill the blank: 5, 10, 15, 20, 25, 30, __, 40, 45 = 35 (G) · Skip-count by 3s. Fill the blank: 3, 6, 9, __, 15, 18 = 12 (C) · Skip-count by 5s. Fill the blank: 5, 10, __, 20, 25 = 15 (A) · Skip-count by 2s. Fill the blank: 2, 4, 6, 8, 10, 12, 14, __, 18, 20 = 16 (R) · Skip-count by 2s. Fill the blank: 2, 4, 6, 8, 10, 12, __, 16, 18 = 14 (T) · Skip-count by 2s. Fill the blank: 2, 4, 6, 8, 10, 12, 14, 16, 18, 20, __, 24, 26 = 22 (N) · Skip-count by 2s. Fill the blank: 2, 4, 6, __, 10, 12 = 8 (O) · Skip-count by 5s. Fill the blank: 5, 10, 15, 20, 25, 30, 35, 40, 45, 50, 55, 60, __, 70, 75 = 65 (P) · Skip-count by 2s. Fill the blank: 2, 4, 6, 8, 10, 12, 14, 16, 18, 20, 22, 24, __, 28, 30 = 26 (B) · Skip-count by 10s. Fill the blank: 10, 20, 30, 40, 50, 60, 70, __, 90, 100 = 80 (D) · Skip-count by 2s. Fill the blank: 2, 4, 6, 8, 10, 12, 14, 16, 18, __, 22, 24 = 20 (F) · Skip-count by 5s. Fill the blank: 5, 10, 15, 20, __, 30, 35 = 25 (E)

Clue 5 (Missing addends): surviving statement is box 3 → Amy Amazon

$2 + \underline{\quad} = 11 = 9$ · $9 + \underline{\quad} = 16 = 7$ · $2 + \underline{\quad} = 7 = 5$ · $2 + \underline{\quad} = 12 = 10$ · $7 + \underline{\quad} = 11 = 4$ · $9 + \underline{\quad} = 20 = 11$ · $4 + \underline{\quad} = 16 = 12$ · $4 + \underline{\quad} = 10 = 6$ · $2 + \underline{\quad} = 3 = 1$ · $10 + \underline{\quad} = 12 = 2$ · $4 + \underline{\quad} = 12 = 8$