



The Mystery of the Salty Cove Saboteur

Grade 5 math · Place value, Multi-step word problems, Addition, Subtraction, Division · Reading level grades 5-6

Detective: _____ Date: _____

Someone tampered with the harbor lights at Salty Cove Haven! Use your math skills and clue clues to catch the pirate saboteur before their ship sails away with the town loot.

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 Pirate Saboteur is _____

Possible suspects

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

NAME	PRIMARY WEAPON	SHIP FLAG	DOMINANT HAND	BANDANA COLOR	FEAR
Christopher Myngs	Smoke Bomb	Golden Anchor	Left Handed	Red Bandana	Citrus Fruits
John Rackham	Smoke Bomb	Golden Anchor	Left Handed	Blue Bandana	Sea Monsters
Thomas Tew	Smoke Bomb	Kraken Crest	Right Handed	Blue Bandana	Citrus Fruits
Charlotte de Berry	Belaying Pin	Crossed Swords	Left Handed	Black Bandana	Sea Monsters
Anne Bonny	Cutlass	Jolly Roger	Left Handed	Black Bandana	Citrus Fruits
Grace OMalley	Belaying Pin	Golden Anchor	Left Handed	Blue Bandana	Sea Monsters
Sadie the Goat	Belaying Pin	Kraken Crest	Left Handed	Black Bandana	Sea Monsters
Samuel Bellamy	Grappling Hook	Kraken Crest	Right Handed	Red Bandana	Citrus Fruits
William Kidd	Flintlock	Golden Anchor	Right Handed	Red Bandana	Loud Cannonballs
Cheung Po Tsai	Flintlock	Jolly Roger	Left Handed	Black Bandana	Loud Cannonballs
Calico Jack	Cutlass	Jolly Roger	Right Handed	Red Bandana	Sea Monsters
Stede Bonnet	Flintlock	Kraken Crest	Right Handed	Black Bandana	Sea Monsters
Edward Teach	Smoke Bomb	Golden Anchor	Right Handed	Blue Bandana	Sea Monsters
Edward England	Grappling Hook	Golden Anchor	Right Handed	Black Bandana	Loud Cannonballs
Woodes Rogers	Flintlock	Crossed Swords	Left Handed	Black Bandana	Sea Monsters
Francois LOlonnais	Cutlass	Jolly Roger	Left Handed	Black Bandana	Sea Monsters
Bartholomew Roberts	Grappling Hook	Golden Anchor	Right Handed	Red Bandana	Loud Cannonballs
Henry Morgan	Smoke Bomb	Crossed Swords	Right Handed	Blue Bandana	Loud Cannonballs
Howell Davis	Grappling Hook	Sea Serpent	Left Handed	Black Bandana	Loud Cannonballs
Ching Shih	Flintlock	Sea Serpent	Left Handed	Black Bandana	Sea Monsters
Mary Read	Grappling Hook	Sea Serpent	Left Handed	Black Bandana	Sea Monsters

CLUE 1 Place value

Quartermaster Finch calculates total rations from multiple supply crates to figure out who visited the pantry before the robbery.

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

T																	T
700	80	500	30	60	3000	3000	20	60	5000	200	800	500	40	5000	800	700	
9000	3000	1000	90	2000	800	40	40	500	200	40	7000	800	2000	200	40		

What is the value of the 7 in 680,716? → **T**

What is the value of the 2 in 162,554? → **R**

What is the value of the 2 in 50,201? → **D**

What is the value of the 3 in 52,834? → **V**

What is the value of the 8 in 34,814? → **O**

What is the value of the 4 in 33,647? → **S**

What is the value of the 9 in 705,195? → **C**

What is the value of the 8 in 957,082? → **H**

What is the value of the 7 in 267,164? → **W**

What is the value of the 5 in 375,712? → **N**

What is the value of the 9 in 659,862? → **F**

What is the value of the 5 in 860,507? → **E**

What is the value of the 1 in 521,479? → **Y**

What is the value of the 2 in 985,024? → **A**

What is the value of the 6 in 915,264? → **I**

What is the value of the 3 in 863,815? → **L**

Scratch space:

CLUE 2

Multi-step word problems

Navigator Mae reads the nautical logbook where place value positions reveal secret code digits on the map.

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

A witness saw the villain was

L							D		D
18	87	69	20	50	19	17		87	

There were 242 treasure chests in all. 4 pirate crew used 38 treasure chests each. The other 5 pirate crew shared the rest equally. How many treasure chests did each of the other pirate crew get?

Answer: → **L**

There were 123 cannonballs in all. 2 pirate crew used 33 cannonballs each. The other 3 pirate crew shared the rest equally. How many cannonballs did each of the other pirate crew get?

Answer: → **A**

Quartermaster collected 368 cannonballs in the morning and 46 cannonballs in the afternoon, then split them equally among 6 pirate crew. How many cannonballs did each get?

Answer: → **F**

Quartermaster earned 4 treasure chests in each of 3 rounds, plus 15 bonus treasure chests. Then 7 treasure chests were lost. How many treasure chests are left?

Answer: → **T**

There were 389 cannonballs in all. 39 cannonballs were set aside. The rest were shared equally among 7 pirate crew. How many cannonballs did each get?

Answer: → **H**

Quartermaster filled 2 boxes with 2 doubloons each, then found 83 more doubloons. How many doubloons are there in all?

Answer: → **E**

There were 173 doubloons in all. 37 doubloons were set aside. The rest were shared equally among 8 pirate crew. How many doubloons did each get?

Answer: → **N**

Scratch space:

CLUE 3

Addition

First Mate Barnaby counts up the extra doubloons dropped along the dock to trace the thief footsteps.

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

T						T											
9533	7574	4416	4688	6212	5739	7336	9533	4416	2783	9581	9581	6212	8943	5687	9581	7336	5057

					T					
4688	4416	6212	5057	7336	8943	4688	9533	4416	9581	4688

$5249 + 4284 = \boxed{} \rightarrow \boxed{\text{T}}$

$3247 + 2440 = \boxed{} \rightarrow \boxed{\text{F}}$

$2933 + 2124 = \boxed{} \rightarrow \boxed{\text{M}}$

$2732 + 4842 = \boxed{} \rightarrow \boxed{\text{H}}$

$2336 + 5000 = \boxed{} \rightarrow \boxed{\text{O}}$

$5635 + 3946 = \boxed{} \rightarrow \boxed{\text{R}}$

$2039 + 2649 = \boxed{} \rightarrow \boxed{\text{S}}$

$1465 + 1318 = \boxed{} \rightarrow \boxed{\text{U}}$

$3142 + 2597 = \boxed{} \rightarrow \boxed{\text{B}}$

$4349 + 1863 = \boxed{} \rightarrow \boxed{\text{A}}$

$4635 + 4308 = \boxed{} \rightarrow \boxed{\text{N}}$

$2191 + 2225 = \boxed{} \rightarrow \boxed{\text{E}}$

Scratch space:

CLUE 4

Subtraction

Gunner Pete subtracts damaged gunpowder kegs from the total armory inventory to spot the missing supplies.

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

B					B									B			
5593	7923	4168	5920	3485	5593	4168	5866	6005	4168	5866	4168	6994	4168	5593	3005	5139	5920
8485	4168	5805	6887	5866	6310	1892	7798	6005	7798	5920	3485						

$8781 - 3188 = \square \rightarrow \text{B}$

$7902 - 4417 = \square \rightarrow \text{K}$

$8914 - 3775 = \square \rightarrow \text{I}$

$9536 - 1051 = \square \rightarrow \text{W}$

$8012 - 1702 = \square \rightarrow \text{T}$

$6398 - 478 = \square \rightarrow \text{C}$

$8421 - 2616 = \square \rightarrow \text{S}$

$7730 - 736 = \square \rightarrow \text{F}$

$4487 - 2595 = \square \rightarrow \text{H}$

$7223 - 1218 = \square \rightarrow \text{D}$

$7984 - 186 = \square \rightarrow \text{E}$

$7394 - 3226 = \square \rightarrow \text{A}$

$4647 - 1642 = \square \rightarrow \text{R}$

$6343 - 477 = \square \rightarrow \text{N}$

$11875 - 4988 = \square \rightarrow \text{O}$

$10849 - 2926 = \square \rightarrow \text{L}$

Scratch space:

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

Boatswain Tigg divides the salvaged rope bundles evenly among the rescue boats to find who left the extras behind.

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:

$42 \div 6 = \boxed{}$

$80 \div 8 = \boxed{}$

$60 \div 10 = \boxed{}$

$72 \div 8 = \boxed{}$

$60 \div 12 = \boxed{}$

$24 \div 2 = \boxed{}$

$33 \div 11 = \boxed{}$

$6 \div 3 = \boxed{}$

$40 \div 5 = \boxed{}$

$11 \div 1 = \boxed{}$

$8 \div 8 = \boxed{}$

Step 2 - cross out the sentence with each answer:

1. The villain cast a sharp grappling hook, then snagged the Golden Anchor.
2. The villain dropped a thick smoke bomb, then revealed the Sea Serpent.
3. The villain swung a wooden belaying pin, then snagged the Golden Anchor.
4. The villain swung a wooden belaying pin, then unfurled the Kraken Crest.
5. The villain dropped a thick smoke bomb, then snagged the Golden Anchor.
6. The villain swung a heavy cutlass, then hoisted the Jolly Roger.
7. The villain fired a flintlock pistol, then revealed the Sea Serpent.
8. The villain dropped a thick smoke bomb, then raised the Crossed Swords.
9. The villain swung a wooden belaying pin, then revealed the Sea Serpent.
10. The villain cast a sharp grappling hook, then revealed the Sea Serpent.
11. The villain swung a heavy cutlass, then snagged the Golden Anchor.
12. The villain cast a sharp grappling hook, then unfurled the Kraken Crest.

Answer Key

The Mystery of the Salty Cove Saboteur

Culprit: Sadie the Goat

Belaying Pin · Kraken Crest · Left Handed · Black Bandana · Sea Monsters

Trail: Start 21 → Clue 1 18 → Clue 2 10 → Clue 3 6 → Clue 4 4 → Clue 5 1

Clue 1 (Place value): "THE VILLAIN DOES NOT FLY CROSSED SWORDS"

What is the value of the 7 in 680,716? = 700 (T) · What is the value of the 2 in 162,554? = 2000 (R) · What is the value of the 2 in 50,201? = 200 (D) · What is the value of the 3 in 52,834? = 30 (V) · What is the value of the 8 in 34,814? = 800 (O) · What is the value of the 4 in 33,647? = 40 (S) · What is the value of the 9 in 705,195? = 90 (C) · What is the value of the 8 in 957,082? = 80 (H) · What is the value of the 7 in 267,164? = 7000 (W) · What is the value of the 5 in 375,712? = 5000 (N) · What is the value of the 9 in 659,862? = 9000 (F) · What is the value of the 5 in 860,507? = 500 (E) · What is the value of the 1 in 521,479? = 1000 (Y) · What is the value of the 2 in 985,024? = 20 (A) · What is the value of the 6 in 915,264? = 60 (I) · What is the value of the 3 in 863,815? = 3000 (L)

Clue 2 (Multi-step word problems): "LEFT HANDED"

There were 242 treasure chests in all. 4 pirate crew used 38 treasure chests each. The other 5 pirate crew shared the rest equally. How many treasure chests did each of the other pirate crew get? = 18 (L) · There were 123 cannonballs in all. 2 pirate crew used 33 cannonballs each. The other 3 pirate crew shared the rest equally. How many cannonballs did each of the other pirate crew get? = 19 (A) · Quartermaster collected 368 cannonballs in the morning and 46 cannonballs in the afternoon, then split them equally among 6 pirate crew. How many cannonballs did each get? = 69 (F) · Quartermaster earned 4 treasure chests in each of 3 rounds, plus 15 bonus treasure chests. Then 7 treasure chests were lost. How many treasure chests are left? = 20 (T) · There were 389 cannonballs in all. 39 cannonballs were set aside. The rest were shared equally among 7 pirate crew. How many cannonballs did each get? = 50 (H) · Quartermaster filled 2 boxes with 2 doubloons each, then found 83 more doubloons. How many doubloons are there in all? = 87 (E) · There were 173 doubloons in all. 37 doubloons were set aside. The rest were shared equally among 8 pirate crew. How many doubloons did each get? = 17 (N)

Clue 3 (Addition): "THE SABOTEUR RAN FROM SEA MONSTERS"

5249 + 4284 = 9533 (T) · 3247 + 2440 = 5687 (F) · 2933 + 2124 = 5057 (M) · 2732 + 4842 = 7574 (H) · 2336 + 5000 = 7336 (O) · 5635 + 3946 = 9581 (R) · 2039 + 2649 = 4688 (S) · 1465 + 1318 = 2783 (U) · 3142 + 2597 = 5739 (B) · 4349 + 1863 = 6212 (A) · 4635 + 4308 = 8943 (N) · 2191 + 2225 = 4416 (E)

Clue 4 (Subtraction): "BLACK BANDANA FABRIC WAS ON THE DECK"

8781 - 3188 = 5593 (B) · 7902 - 4417 = 3485 (K) · 8914 - 3775 = 5139 (I) · 9536 - 1051 = 8485 (W) · 8012 - 1702 = 6310 (T) · 6398 - 478 = 5920 (C) · 8421 - 2616 = 5805 (S) · 7730 - 736 = 6994 (F) · 4487 - 2595 = 1892 (H) · 7223 - 1218 = 6005 (D) · 7984 - 186 = 7798 (E) · 7394 - 3226 = 4168 (A) · 4647 - 1642 = 3005 (R) · 6343 - 477 = 5866 (N) · 11875 - 4988 = 6887 (O) · 10849 - 2926 = 7923 (L)

Clue 5 (Division facts (1-12)): surviving statement is box 4 → Sadie the Goat

42 ÷ 6 = 7 · 80 ÷ 8 = 10 · 60 ÷ 10 = 6 · 72 ÷ 8 = 9 · 60 ÷ 12 = 5 · 24 ÷ 2 = 12 · 33 ÷ 11 = 3 · 6 ÷ 3 = 2 · 40 ÷ 5 = 8 · 11 ÷ 1 = 11 · 8 ÷ 8 = 1