



The Great Sky Chase

Grade 3 math · Addition, Skip counting, Place value, Rounding, Division · Reading level grades 3-4

Detective: _____ Date: _____

The floating islands of Aviaria are in deep trouble! The legendary Golden Propeller has been stolen from the Cloud Keepers. Without it, the islands will slowly float down into the misty depths below. A mysterious Sky Bandit was spotted escaping through the clouds. Chief Cloud Keeper Wendy needs your help to crack the clues, track down the bandit, and save the islands!

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 Sky Bandit is _____

Possible suspects

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

NAME	AIRSHIP GEAR	SKY GADGET	STEERING GRIP	SKY HAIR COLOR	WEAKNESS
Tom Sawyer	turbo propeller	grappling hook	right handed	orange hair	loud whistles
Sherlock Holmes	helium balloon	smoke bomb	left handed	orange hair	bright lights
Bessie Coleman	helium balloon	cloud glider	left handed	orange hair	loud whistles
John Watson	helium balloon	radar goggles	left handed	black hair	tickle feathers
Sally Ride	solar wings	net launcher	right handed	silver hair	tickle feathers
Wendy Darling	wind sails	net launcher	right handed	orange hair	bright lights
Dorothy Gale	helium balloon	smoke bomb	left handed	black hair	tickle feathers
Baron Von Richthofen	solar wings	cloud glider	right handed	black hair	loud whistles
Alice Liddell	helium balloon	cloud glider	right handed	silver hair	bright lights
Wilbur Wright	helium balloon	smoke bomb	left handed	black hair	bright lights
Nancy Drew	wind sails	radar goggles	right handed	silver hair	tickle feathers
Nellie Bly	wind sails	smoke bomb	left handed	orange hair	loud whistles
Peter Pan	turbo propeller	smoke bomb	right handed	orange hair	tickle feathers
Sinbad	steam engine	grappling hook	right handed	silver hair	loud whistles
Huckleberry Finn	wind sails	cloud glider	left handed	silver hair	bright lights
Phileas Fogg	turbo propeller	net launcher	right handed	silver hair	tickle feathers
Marco Polo	turbo propeller	smoke bomb	right handed	silver hair	tickle feathers
Captain Nemo	solar wings	cloud glider	right handed	silver hair	tickle feathers
Jim Hawkins	helium balloon	cloud glider	left handed	silver hair	tickle feathers
Amelia Earhart	wind sails	grappling hook	left handed	black hair	bright lights
Charles Lindbergh	solar wings	grappling hook	right handed	silver hair	bright lights

CLUE 1 Addition

We found a logbook left in the hangar. We must add up the fuel barrels counted this morning to unlock the first page.

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

T 850	671	857	925	234	907	357	491	T 850	357	221	857	826	907	221	T 850	419	826	857
957	234	357	234	957	359	221	359	359	944	857	826							

$332 + 518 = \square \rightarrow \text{ T }$

$274 + 217 = \square \rightarrow \text{ I }$

$76 + 158 = \square \rightarrow \text{ A }$

$141 + 218 = \square \rightarrow \text{ G }$

$294 + 125 = \square \rightarrow \text{ U }$

$355 + 471 = \square \rightarrow \text{ S }$

$107 + 114 = \square \rightarrow \text{ O }$

$215 + 142 = \square \rightarrow \text{ D }$

$400 + 544 = \square \rightarrow \text{ L }$

$640 + 285 = \square \rightarrow \text{ B }$

$242 + 429 = \square \rightarrow \text{ H }$

$609 + 298 = \square \rightarrow \text{ N }$

$380 + 577 = \square \rightarrow \text{ R }$

$259 + 598 = \square \rightarrow \text{ E }$

Scratch space:

CLUE 2 Skip counting

The hangar doors are locked tight. The keypad needs us to complete the skip counting pattern of brass gears to open up.

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

T						T											
120	50	14	30	100	55	120	35	100	10	110	80	14	35	14			
															T		
39	35	65	26	26	14	130	28	9	22	35	65	39	50	120	50	22	55

Skip-count by 10s. Fill the blank: 10, 20, 30, 40, 50, 60, 70, 80, 90, 100, 110, __, 130, 140 → **T**

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

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

Skip-count by 10s. Fill the blank: 10, 20, 30, 40, 50, 60, 70, 80, 90, __, 110, 120 → **O**

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

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

Skip-count by 10s. Fill the blank: 10, 20, 30, 40, 50, 60, 70, 80, 90, 100, __, 120, 130 → **S**

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

Skip-count by 10s. Fill the blank: 10, 20, 30, 40, 50, 60, 70, 80, 90, 100, 110, 120, __, 140, 150 → **D**

Skip-count by 3s. Fill the blank: 3, 6, __, 12, 15 → **Y**

Skip-count by 3s. Fill the blank: 3, 6, 9, 12, 15, 18, 21, 24, 27, 30, 33, 36, __, 42, 45 → **G**

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

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

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

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

Skip-count by 3s. Fill the blank: 3, 6, 9, 12, 15, 18, 21, 24, 27, __, 33, 36 → **C**

Skip-count by 2s. Fill the blank: 2, 4, 6, 8, 10, 12, 14, 16, 18, 20, 22, 24, 26, __, 30, 32 → **B**

Scratch space:

CLUE 3 Place value

A secret message is written in a digit code on the dashboard. We must find the value of the hundreds place to read it.

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

T																	
700	600	1000	900	500	30	30	2000	500	50	8000	2000	50	70	8000	7000	4000	

T									T								
700	500	90	9000	30	1000	70	1000	2000	700	600	1000	8000	60				

What is the value of the 7 in 735? → **T**

What is the value of the 9 in 79,661? → **K**

What is the value of the 9 in 2,597? → **C**

What is the value of the 6 in 631? → **H**

What is the value of the 3 in 9,738? → **L**

What is the value of the 5 in 512? → **I**

What is the value of the 6 in 2,867? → **S**

What is the value of the 8 in 8,105? → **R**

What is the value of the 7 in 9,974? → **F**

What is the value of the 5 in 4,057? → **N**

What is the value of the 4 in 4,531? → **M**

What is the value of the 7 in 57,023? → **O**

What is the value of the 1 in 1,403? → **E**

What is the value of the 9 in 3,983? → **V**

What is the value of the 2 in 2,396? → **A**

Scratch space:

CLUE 4 Rounding

Our sky radar is fuzzy and can only show rounded numbers. Round the distance of the escaping airship to lock our scanner on them.

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

W															
600	700	500	60	70	30	90	900	20	4000	50	30	90	900	60	500

900	8000	6000	400	700	4000	200	50	8000	4000

Round 579 to the nearest hundred → **W**

Round 3,880 to the nearest thousand → **R**

Round 54 to the nearest ten → **A**

Round 153 to the nearest hundred → **H**

Round 33 to the nearest ten → **N**

Round 707 to the nearest hundred → **E**

Round 68 to the nearest ten → **U**

Round 62 to the nearest ten → **O**

Round 16 to the nearest ten → **T**

Round 7,806 to the nearest thousand → **I**

Round 549 to the nearest hundred → **F**

Round 6,095 to the nearest thousand → **L**

Round 910 to the nearest hundred → **S**

Round 427 to the nearest hundred → **V**

Round 89 to the nearest ten → **D**

Scratch space:

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

To power up our pursuit glider, we need to divide the spare batteries equally among our spark plugs.

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:

$88 \div 11 = \square$

$110 \div 11 = \square$

$44 \div 11 = \square$

$18 \div 6 = \square$

$12 \div 6 = \square$

$35 \div 7 = \square$

$24 \div 4 = \square$

$70 \div 10 = \square$

$60 \div 5 = \square$

$6 \div 6 = \square$

$54 \div 6 = \square$

Step 2 - cross out the sentence with each answer:

1. The villain fired up the steam engine, then soared off on a cloud glider.
2. The villain inflated the helium balloon, then fired a heavy net launcher.
3. The villain fired up the steam engine, then fired a heavy net launcher.
4. The villain stretched out the solar wings, then soared off on a cloud glider.
5. The villain inflated the helium balloon, then scanned the horizon with radar goggles.
6. The villain stretched out the solar wings, then swung away on a grappling hook.
7. The villain fired up the steam engine, then scanned the horizon with radar goggles.
8. The villain started up the turbo propeller, then fired a heavy net launcher.
9. The villain unfurled the giant wind sails, then swung away on a grappling hook.
10. The villain started up the turbo propeller, then vanished inside a smoke bomb.
11. The villain stretched out the solar wings, then fired a heavy net launcher.
12. The villain started up the turbo propeller, then swung away on a grappling hook.

Answer Key

The Great Sky Chase

Culprit: Sally Ride

solar wings · net launcher · right handed · silver hair · tickle feathers

Trail: Start 21 → Clue 1 19 → Clue 2 11 → Clue 3 5 → Clue 4 4 → Clue 5 1

Clue 1 (Addition): "THE BANDIT DOES NOT USE RADAR GOGGLES"

$332 + 518 = 850$ (T) · $274 + 217 = 491$ (I) · $76 + 158 = 234$ (A) · $141 + 218 = 359$ (G) · $294 + 125 = 419$ (U) · $355 + 471 = 826$ (S) · $107 + 114 = 221$ (O) · $215 + 142 = 357$ (D) · $400 + 544 = 944$ (L) · $640 + 285 = 925$ (B) · $242 + 429 = 671$ (H) · $609 + 298 = 907$ (N) · $380 + 577 = 957$ (R) · $259 + 598 = 857$ (E)

Clue 2 (Skip counting): "THE CONTROLS WERE GRIPPED BY A RIGHT HAND"

Skip-count by 10s. Fill the blank: 10, 20, 30, 40, 50, 60, 70, 80, 90, 100, 110, __, 130, 140 = 120 (T) · Skip-count by 5s. Fill the blank: 5, 10, 15, 20, 25, 30, 35, 40, 45, 50, __, 60, 65 = 55 (N) · Skip-count by 2s. Fill the blank: 2, 4, 6, 8, 10, 12, 14, 16, 18, 20, __, 24, 26 = 22 (A) · Skip-count by 10s. Fill the blank: 10, 20, 30, 40, 50, 60, 70, 80, 90, __, 110, 120 = 100 (O) · Skip-count by 2s. Fill the blank: 2, 4, 6, 8, __, 12, 14 = 10 (L) · Skip-count by 5s. Fill the blank: 5, 10, 15, 20, 25, 30, 35, 40, 45, __, 55, 60 = 50 (H) · Skip-count by 10s. Fill the blank: 10, 20, 30, 40, 50, 60, 70, 80, 90, 100, __, 120, 130 = 110 (S) · Skip-count by 5s. Fill the blank: 5, 10, 15, 20, 25, 30, __, 40, 45 = 35 (R) · Skip-count by 10s. Fill the blank: 10, 20, 30, 40, 50, 60, 70, 80, 90, 100, 110, 120, __, 140, 150 = 130 (D) · Skip-count by 3s. Fill the blank: 3, 6, __, 12, 15 = 9 (Y) · Skip-count by 3s. Fill the blank: 3, 6, 9, 12, 15, 18, 21, 24, 27, 30, 33, 36, __, 42, 45 = 39 (G) · Skip-count by 2s. Fill the blank: 2, 4, 6, 8, 10, 12, __, 16, 18 = 14 (E) · Skip-count by 2s. Fill the blank: 2, 4, 6, 8, 10, 12, 14, 16, 18, 20, 22, 24, __, 28, 30 = 26 (P) · Skip-count by 10s. Fill the blank: 10, 20, 30, 40, 50, 60, 70, __, 90, 100 = 80 (W) · Skip-count by 5s. Fill the blank: 5, 10, 15, 20, 25, 30, 35, 40, 45, 50, 55, 60, __, 70, 75 = 65 (I) · Skip-count by 3s. Fill the blank: 3, 6, 9, 12, 15, 18, 21, 24, 27, __, 33, 36 = 30 (C) · Skip-count by 2s. Fill the blank: 2, 4, 6, 8, 10, 12, 14, 16, 18, 20, 22, 24, 26, __, 30, 32 = 28 (B)

Clue 3 (Place value): "THE VILLAIN RAN FROM TICKLE FEATHERS"

What is the value of the 7 in 735? = 700 (T) · What is the value of the 9 in 79,661? = 9000 (K) · What is the value of the 9 in 2,597? = 90 (C) · What is the value of the 6 in 631? = 600 (H) · What is the value of the 3 in 9,738? = 30 (L) · What is the value of the 5 in 512? = 500 (I) · What is the value of the 6 in 2,867? = 60 (S) · What is the value of the 8 in 8,105? = 8000 (R) · What is the value of the 7 in 9,974? = 70 (F) · What is the value of the 5 in 4,057? = 50 (N) · What is the value of the 4 in 4,531? = 4000 (M) · What is the value of the 7 in 57,023? = 7000 (O) · What is the value of the 1 in 1,403? = 1000 (E) · What is the value of the 9 in 3,983? = 900 (V) · What is the value of the 2 in 2,396? = 2000 (A)

Clue 4 (Rounding): "WE FOUND STRANDS OF SILVER HAIR"

Round 579 to the nearest hundred = 600 (W) · Round 3,880 to the nearest thousand = 4000 (R) · Round 54 to the nearest ten = 50 (A) · Round 153 to the nearest hundred = 200 (H) · Round 33 to the nearest ten = 30 (N) · Round 707 to the nearest hundred = 700 (E) · Round 68 to the nearest ten = 70 (U) · Round 62 to the nearest ten = 60 (O) · Round 16 to the nearest ten = 20 (T) · Round 7,806 to the nearest thousand = 8000 (I) · Round 549 to the nearest hundred = 500 (F) · Round 6,095 to the nearest thousand = 6000 (L) · Round 910 to the nearest hundred = 900 (S) · Round 427 to the nearest hundred = 400 (V) · Round 89 to the nearest ten = 90 (D)

Clue 5 (Division facts (1-12)): surviving statement is box 11 → Sally Ride

$88 \div 11 = 8$ · $110 \div 11 = 10$ · $44 \div 11 = 4$ · $18 \div 6 = 3$ · $12 \div 6 = 2$ · $35 \div 7 = 5$ · $24 \div 4 = 6$ · $70 \div 10 = 7$ · $60 \div 5 = 12$ · $6 \div 6 = 1$ · $54 \div 6 = 9$