

Worksheets for Activities

Relay Race Clues Worksheet

Take **1 foot (12 inch)** steps

Players take turns standing fingertip to fingertip. Player A begins by spreading their arms wide, when player B will then spread their arms out (player A

spreads their arms, player B then spreads their arms at the fingertips of player A, and then player A comes back around spreading their fingertips at player B's arms)

Move **one footstep** at a time (walk toe to toe, so at each step your toes touch your heel of the foot in front)

Take **1 yard** leaps

Take as large of **a footstep** as your can, pivoting each time to move (step with your left in front, pivot so your next step puts your right foot in front)

Travel **10 yards** (each way) however you want

Rube Goldberg Invention Inspiration Worksheet

- Drop a marble down a paper towel tube so that it knocks over a chain of cereal boxes and batteries, too.



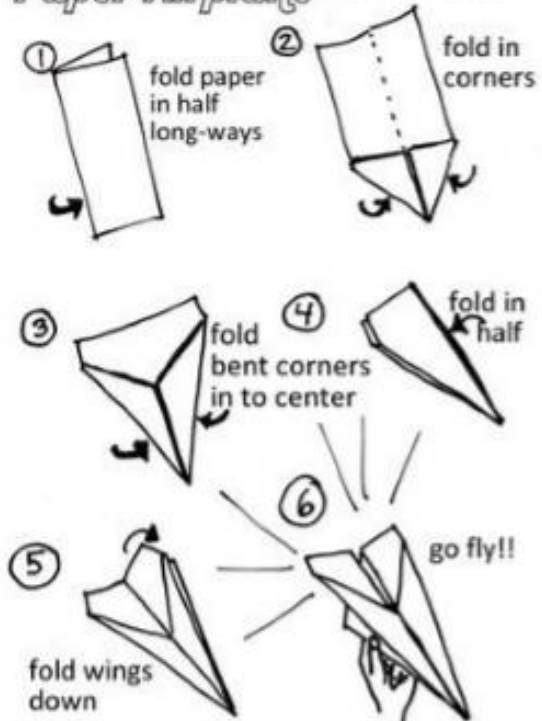
- Set up a pulley system using a piece of string, two plastic cups, a milk jug filled with water, and a weight such as a battery.

- Set a half-full water bottle near the edge of the table so that it pours into a funnel when the water bottle is knocked over. Place a plant underneath the funnel to create a watering mechanism.

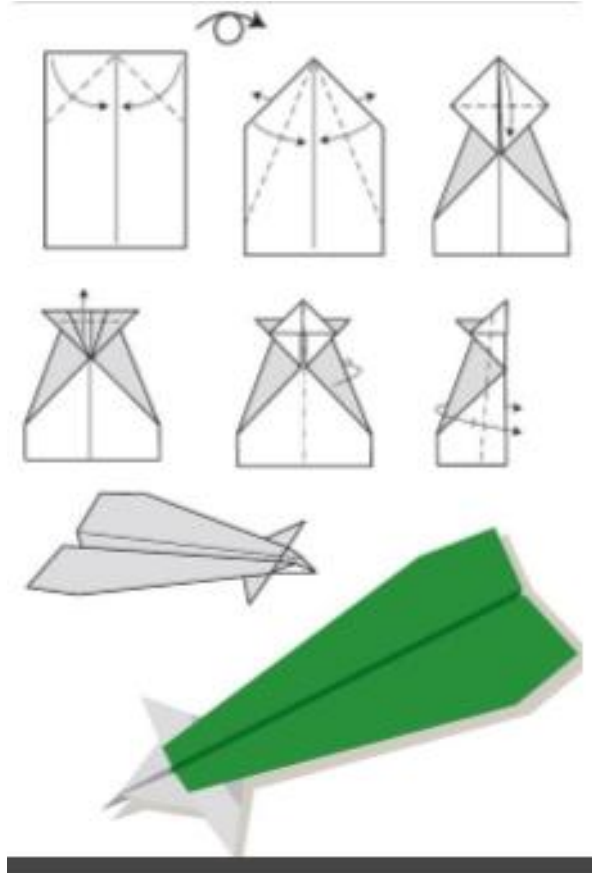


Paper Plane Ideas Worksheet

Paper Airplane creativewithkids.com



*Fold * Decorate * Fly*



Toothpick Challenge Worksheet

Background on Bridges:

Bridges are structures built to get from point A to point B when the land in between is inaccessible. The earliest bridges were simply logs laid across a stream or stones creating a path across a river, and grew to be more advanced by weaving together combinations of sticks, logs, branches, weeds and other fibers to form ropes capable of holding together bridge materials. These simple ideas were the foundations of the beam designs used in modern culture. Bridges today are made of wood, concrete, and/or steel and have many different structures.

Types of Bridges:

- **Beam Bridge:** The simplest design, a horizontal beam spanning between two regions; it can either be simply supported (beam across a single span) or continuous (beams across 2 or more spans).
- **Truss:** Structure of connected elements forming a triangle. Truss bridges are structurally stable because the forces are distributed throughout the triangle.
- **Cantilever:** Horizontal beam supported only on one end. Most cantilever bridges have 2 cantilever beams coming from opposite directions and connected by a suspended span in the middle.
- **Arch:** Horizontal beam with structures on both end where the load is distributed.
- **Suspension Bridge:** Bridge suspended from cables that are attached to large towers that are implanted deep into the floor of a lake or river.



Millau Viaduct in Millau, France



Written by Anjali Mulchandani

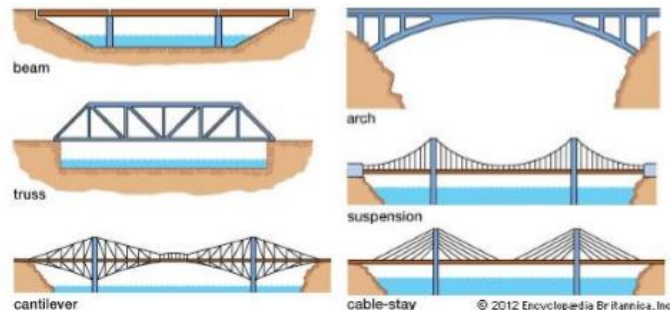
http://beam.ucla.edu/sites/default/files/docs/Bridge_Building.pdf

https://www.pinterest.com/pin/287456388690268639/_74

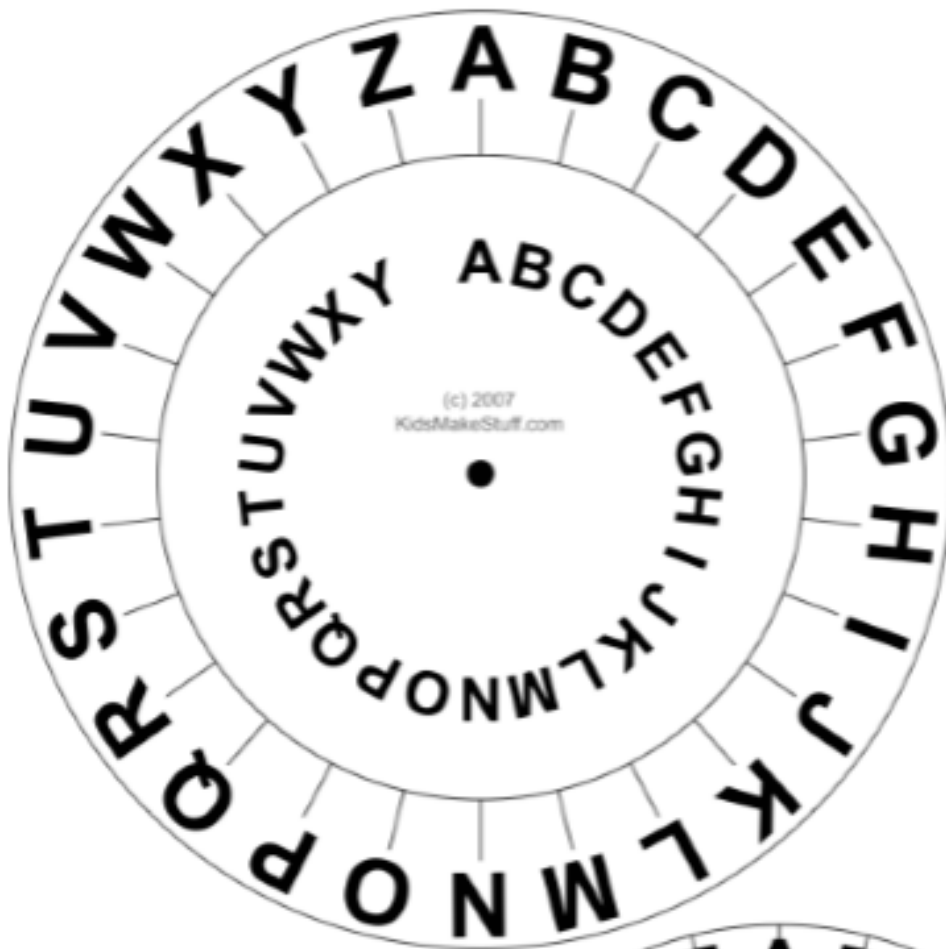
<http://10mosttoday.com/10-most-famous-bridges-in-the-world/>

Golden Gate Bridge in San Francisco, California

Forth Bridge in Edinburgh City, Scotland



Cipher Disks Worksheet



The KidsMakeStuff Cipher Disk

Print out on thick paper
or glue printout on
card board

Cut out the 2 disks

Cut out the the rectangle
next to "CODE"

Make holes into the
disk centers and attach
the smaller disk to the
larger one using a brass
paper fastener





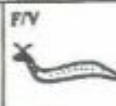





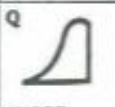
Sign Language Worksheet

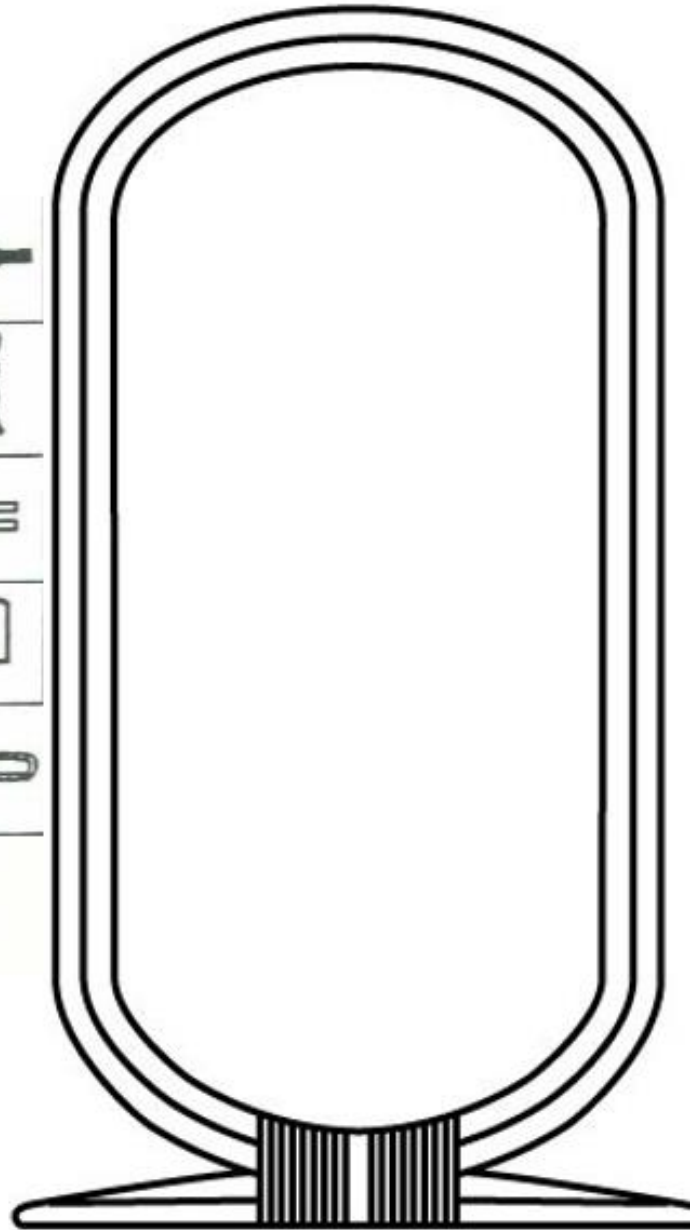


Hieroglyphics Worksheet

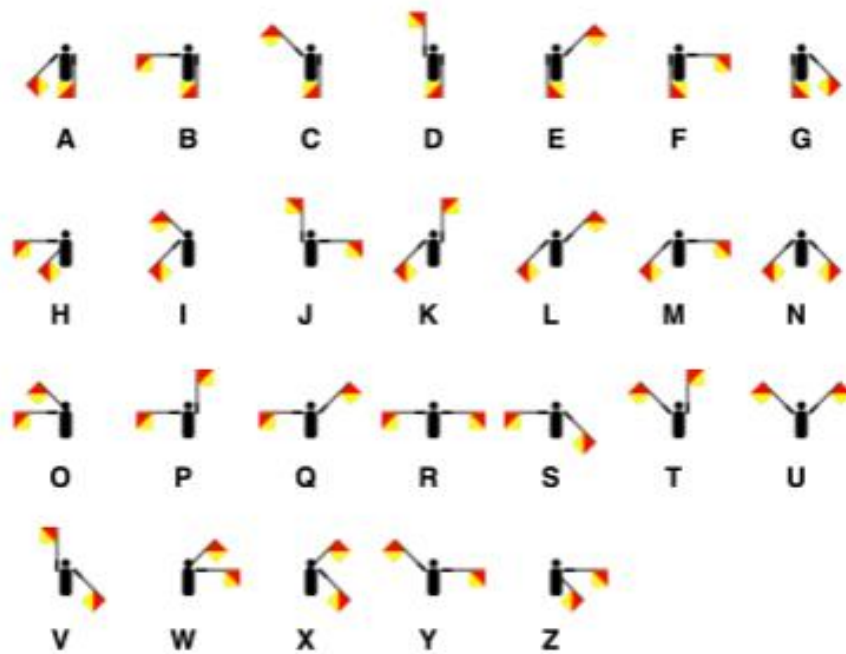
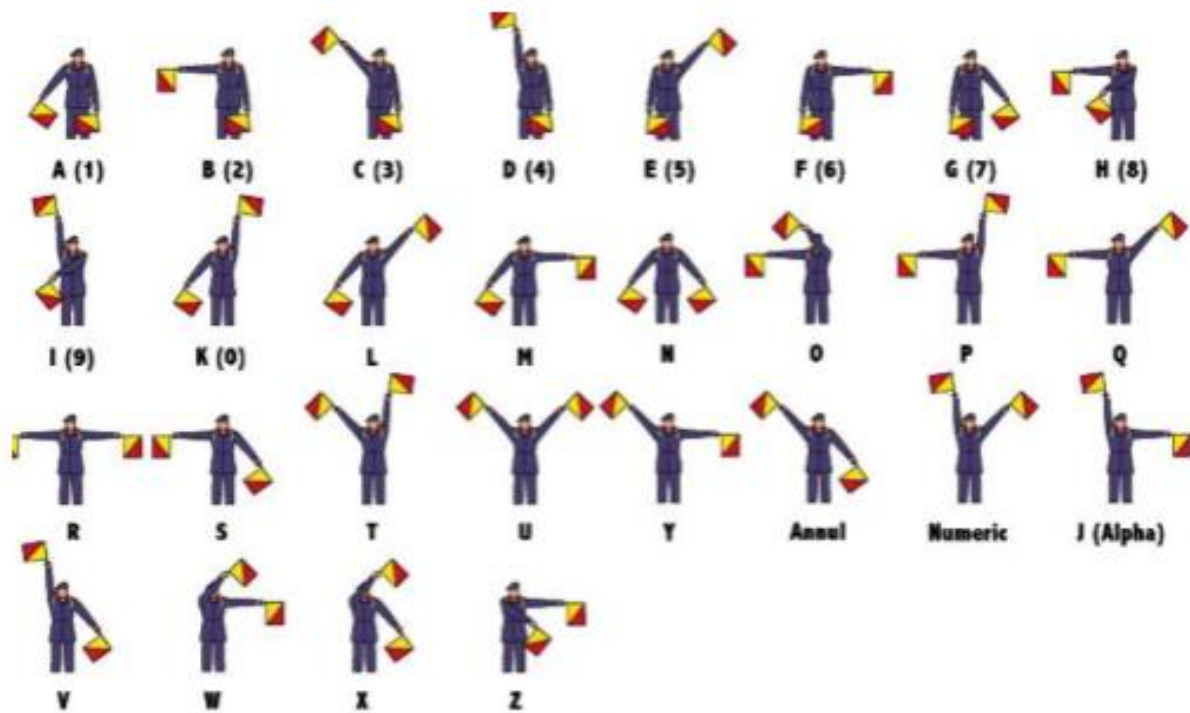
Cartouche Template

Hieroglyphic Alphabet

A  EAGLE	A  ARM	B  FOOT	C/X  BASKET	D  HAND
E/Y  TWO STROKES	F/V  VIPER	G  JAR	H  HOUSE	H  FLAX
I/Y/E  REED	J  COBRA	L  LION	M  OWL	M  BAR
N  WATER	N  CROWN	O/U/W  LASSO	P  DOOR	Q  SLOPE
R  MOUTH	S/Z  CLOTH	SH/CH  POOL	T  LOAF	TH  ROPE
U/W/O  CHICK	X  BASKET/ CLOTH	Y/E/I  DOUBLE REED	Z/S  BOLT	



Semaphores Worksheet



My Own Fingerprints Worksheet



Arch



Loop



Whorl

My
Left
Hand

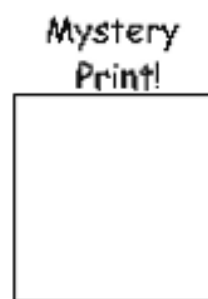


My
Right
Hand



1. I have _____ arches _____ loops _____ whorls.

This is the right thumbprint of:



(Name)

(Name)

(Name)

2

2. I think the mystery print belongs to _____

Rock! Sword! Firecracker! Worksheet

INT. rec room. Day.

CAST OF CHARACTERS

MASTER: Master of the game of Rock, Sword, Firecracker

MEL and KELLY: Rock, Scissors, Paper Players.

OPTIONAL EXTRAS: If you have more actors, you can divide up Mel and Kelly's lines and have actors become the characters in the master's story.

SCENE 1

Group of friends playing rock scissors paper at a local tournament. They all say:

ALL

Rock, scissors, paper!

They all do one of the above. One person gets rock and the rest get scissors and he/she pounds all their scissors. They all laugh and start another round.

One person gets scissors and the rest paper and he/she cuts all their papers dramatically. There is music and a person enters. The players don't notice at first but the master shouts:

MASTER

Stop!

They all freeze.

KELLY

Who are you?

MASTER

I am the master of the Rock!

Master holds out a fist. Players all look at each other and then laugh.

MEL

Well, I've got paper.

Mel puts a flat hand over the Master's fist. Players laugh and then Master grabs Mel's hand and throw Mel on the table and sticks a finger to Mel's throat.

MASTER

And I have sword.

KELLY

There's no sword in Rock, Paper, Scissors.

MASTER

That is where you are mistaken.

Master helps Mel up.

MASTER (CONT.)

I am here to tell you the story of... (dramatic pause) ROCK! (holds up a fist)
SWORD! (holds up index finger) FIRECRACKER! (holds up thumb).

Players all look at each other confused.

MEL

I thought it was rock, scissors, paper.

MASTER

You are wrong! The ancient game has been dishonored by scissors and paper.
It is a mockery of the true art of the challenge. Shall I tell you the story?

KELLY

Sure.

MASTER

If you wish to hear the story, you must say, "Yes, Master."

They all look at each other, some shrug, some make funny face but they all nod
in agreement.

ALL

Yes, master.

MASTER

Say... "Pretty please."

They give each other looks and then say.

ALL

Pretty please.

MASTER

Fine. I will tell you the story.

The master can pull out a scroll or book to help with the story. This next part
is flexible for staging.

The master can act out his story, more actors can come in and act out the story
or the players can act out the story.

MASTER (CONT.)

It all began with the rock.

KELLY

You mean like the wrestler?

MASTER

No, the rock was a big fat lazy slob. But he was unmovable. He was a champion
sumo wrestler because no one could move him. He won every match. And
then he sent a challenge out to all warriors that no one could defeat him. So
samurai and ninja from all over Asia came to fight him, but even a sword could
not pierce his rock-like skin. But then a magician from a distant land came
with a mighty weapon. A firecracker! No one had seen such a huge firecracker

before. The magician faced off against the Rock. He lit the fuse and placed it at the Rock's feet. The Rock did not care. He did not think anything could defeat him. Suddenly, there was a huge explosion. They were screams and cries of pain. And when the smoke cleared, the Rock had fallen. Everyone stood quietly and couldn't believe their eyes. A few began to cry. The magician's laugh broke the silence and he pulled another, even bigger firecracker from his robes. The magician yelled, "I shall rid this land of the Rock forever!" He placed the firecracker next to the Rock and lit it. But then a young one, who was a big fan and collected all the Rock memorabilia, sprang in to action. He snatched up a sword and "swish", cut the fuse, saving the rock from destruction.

The master bows to end his story and the players clap and cheer.

MEL

Amazing.

KELLY

Great story!

MASTER

So I ask that you no longer dishonor the game with scissors and paper.

MEL

Yes, Master!

KELLY

We will, Master.

Master bows and then leaves.

MEL

Ready?

ALL

Rock, sword, firecracker!

All except one do firecracker and one does sword and dramatically cuts their fuses with karate sounds.

KELLY

That is more fun.

ALL

Rock, sword, firecracker!

All except on do rock and one does dynamite and blows them up.

END OF PLAY

Night at the Library Mad Script! Worksheet

Fill in the following before passing out the play. Do NOT read the play first, or it will spoil the activity!

- 1) _____ a sound
- 2) _____ a state
- 3) _____ name of a local library
- 3) _____ a kind of weather
- 4) _____ a title of a book
- 5) _____ name of a villain
- 6) _____ the names of two women
- 7) _____ the name of a detective (not Sherlock Holmes)
- 8) _____ a popular character from a best seller.
- 9) _____ a terrible evil villain from a book
- 10) _____ a certain time at night or in the early morning
- 11) _____ a number of minutes
- 12) _____ something bad that can happen to someone

Mad Scripts Play: A Night at the Library Worksheet

MAD SCRIPT NIGHT AT THE LIBRARY FROM FREEDRAMA.NET

A librarian is at a desk checking in books. A narrator appears and speaks in a dramatic/scary movie type of voice.

NARRATOR

A librarian is working late at night. She hears a noise. She looks but hears nothing more.

Librarian looks around, sees nothing and then goes back to her books.

NARRATOR

Suddenly... she hears something again...

A wicked witch makes a cackling laughing sound off in the darkness.

LIBRARIAN

What was that? It sounds like a...

1) _____

A girl in a blue and white dress with a basket and small black dog runs up to the librarian.

DOROTHY

I have a feeling we're not in

2) _____ anymore.

LIBRARIAN

You're in the

3) _____ Library. How did you get in here?

DOROTHY

I don't know... one minute I was at home and then there was this terrible storm... and then

4) _____ ... and suddenly I was here.

LIBRARIAN

Um... that's quite a story...

HOLMES

Indeed it is.

Sherlock Holmes appears.

LIBRARIAN

Was there a costume party tonight that no one told me about?

HOLMES

This is no party. There is a mystery to be solved here.

LIBRARIAN

That's too bad. I have this great costume I've wanted to wear from my favorite book

5)_____.

A Southern Bell from Civil War times enters the scene.

SCARLETT

Oh fiddle dee dee. Where can I be?

LIBRARIAN

You're in the library.

SCARLETT

Oh great balls of fire! I'm completely lost.

HOLMES

We all appear lost. Or the victims of my archenemy

6)_____.

DOROTHY

Or is it a dream?

A person in Shakespearean costume walks in.

HAMLET

"To die, to sleep; -- To sleep, perchance to dream."

SCARLETT

Is this a stage production of some sort? Or are we dead? There was a war going on back home... I remember now. Never mind, I won't think about it today... maybe tomorrow.

HAMLET

"For in that sleep of death what dreams may come..."

HOLMES

Sir? Are you an actor?

HAMLET

The plays the thing. But this is more than a stage. Have I gone mad after all? Or is there some method to this madness as Polonius says.

HOLMES

Sir? Are you Hamlet?

HOLMES

Prince of Denmark. And you are?

HOLMES

Sherlock Holmes.

LIBRARIAN

And we have

7) _____over here.

HOLMES

You know all these people?

LIBRARIAN

Who doesn't?

A Spanish man in armor enters.

DON QUIXOTE

"All will come out in the washing."

HOLMES

And who are you, sir?

DON QUIXOTE

Sir Don Quixote.

HOLMES

Hamlet and Don Quixote. Of course. Elementary!

SCARLETT

Please don't say we're all dead. Oh, Mother of God, I'm too young to die!

HAMLET

Ah! The undiscovered country!

DON QUIXOTE

"Until death all is life... where there's life there's hope."

LIBRARIAN

Look... it didn't take Sherlock Holmes or

8) _____ to figure out what is going on. The characters from the books in the library are coming to life.

HOLMES

Perhaps it has something to do with this glowing book over here.

The librarian gets a book from a display.

LIBRARIAN

It's a first edition copy of the Children's Book "Night at the Museum"... this is the copy of the book that director Christopher Columbus bought for his child that inspired the movie.

DOROTHY

It appears to be magic!

HAMLET

There are more things in heaven and earth than are dreamt of in your philosophy.

LIBRARIAN

There are more characters appearing. Now I see

9) _____ in the best seller section! We have to stop this before we end up with someone like

10) _____

SCARLETT

Maybe we should rip up the book or something.

LIBRARIAN

Put one little rip in that book missy and you'll be in big trouble with the Friends of the Library!

SCARLETT

Oh Fiddle Dee Dee.

HOLMES

From reading these pages it appears that all we have to do is wait until the clock strikes

11) _____.

LIBRARIAN

That's only

12) _____ minutes away!

HOLMES

Then we must all get back to our books.

All the characters start to exit.

LIBRARIAN

It was nice meeting you all.

Hamlet takes her hand and kisses it.

HAMLET

Good-night, sweet lady, good-night.

Librarian smiles and waves good-bye. Then she frowns.

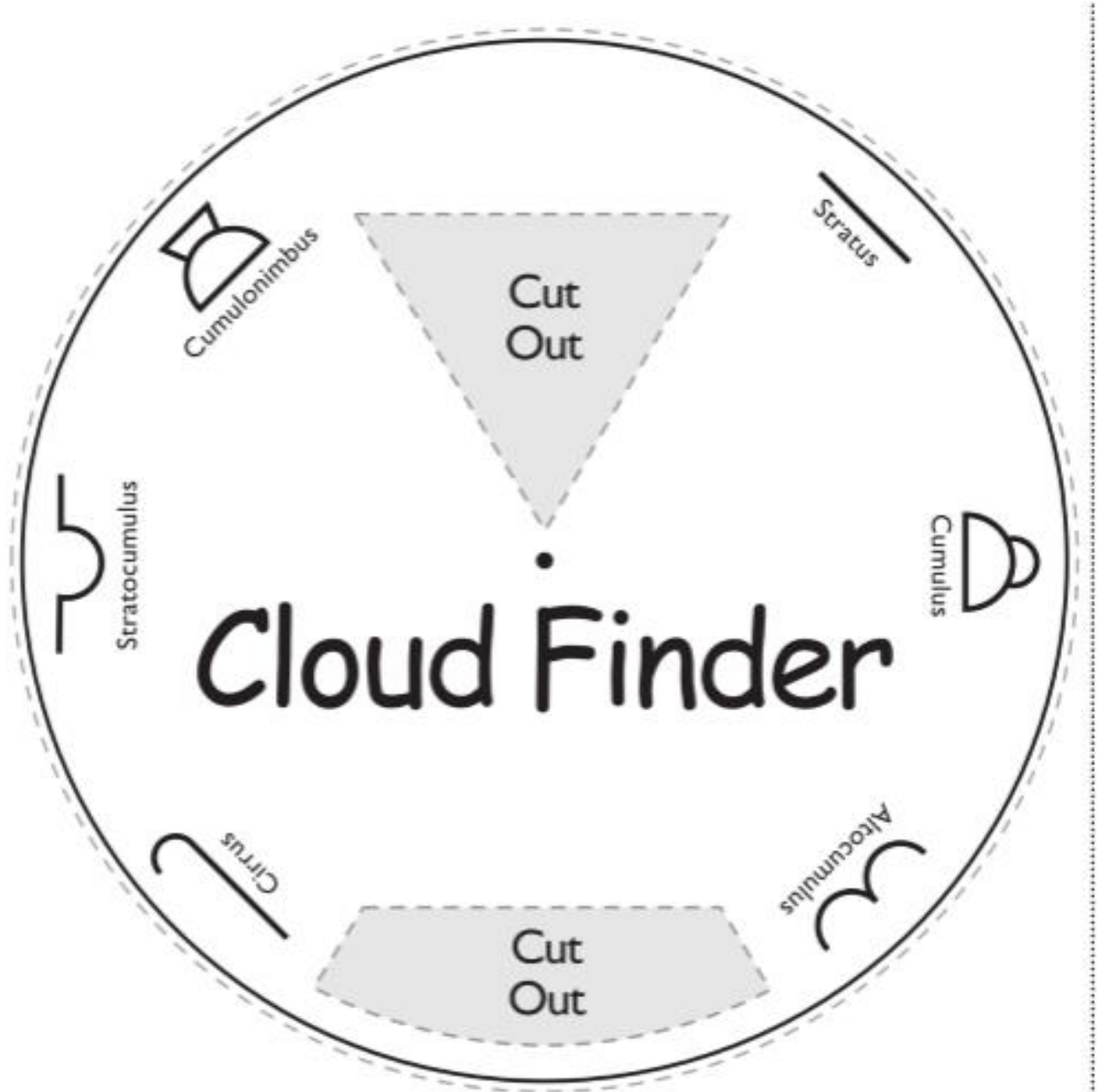
LIBRARY

Wait, didn't Ophelia say that before she

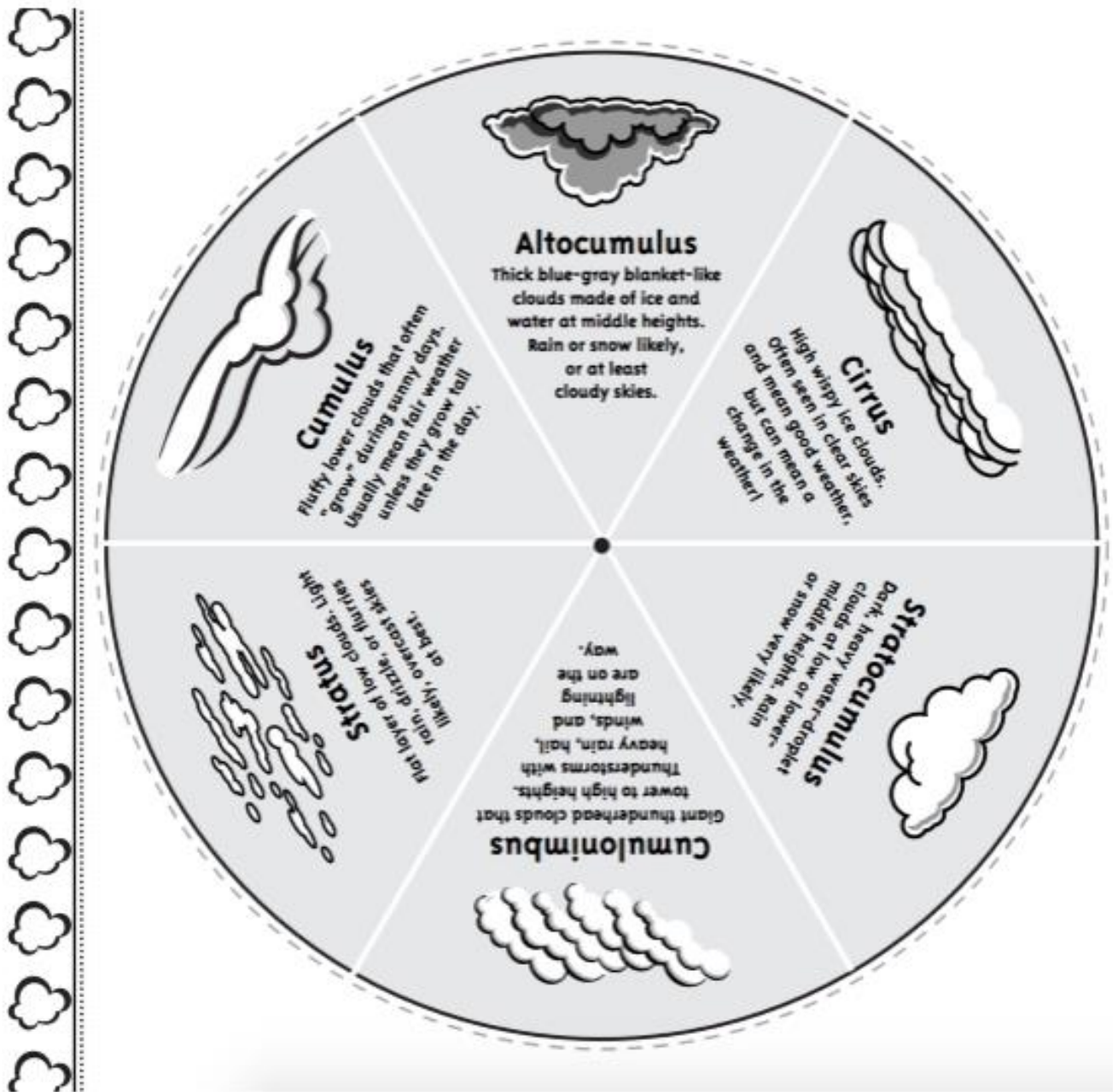
13) _____?

END OF SCRIPT

Cloud Key Front Worksheet



Cloud Key Back Worksheet



NATURE SCAVENGER HUNT

SEE HOW MANY ITEMS YOU CAN FIND ON THE LIST.
LOOK HIGH AND LOW SO NOTHING IS MISSED!

CAN YOU FIND ME?

- ☐ Rock
- ☐ Leaf
- ☐ Pine Cone
- ☐ Wild Flower
- ☐ Bark
- ☐ Piece of Litter
- ☐ Stick
- ☐ 3 Leaf Clover
- ☐ Green Grass
- ☐ Feather
- ☐ Berry

TOUCH

- ☐ something Soft
- ☐ something Smooth
- ☐ something Rough

SHAPES

- ☐ something Circle
- ☐ something Square
- ☐ something Triangle

COLORS

- ☐ something Green
- ☐ something Brown
- ☐ something Red

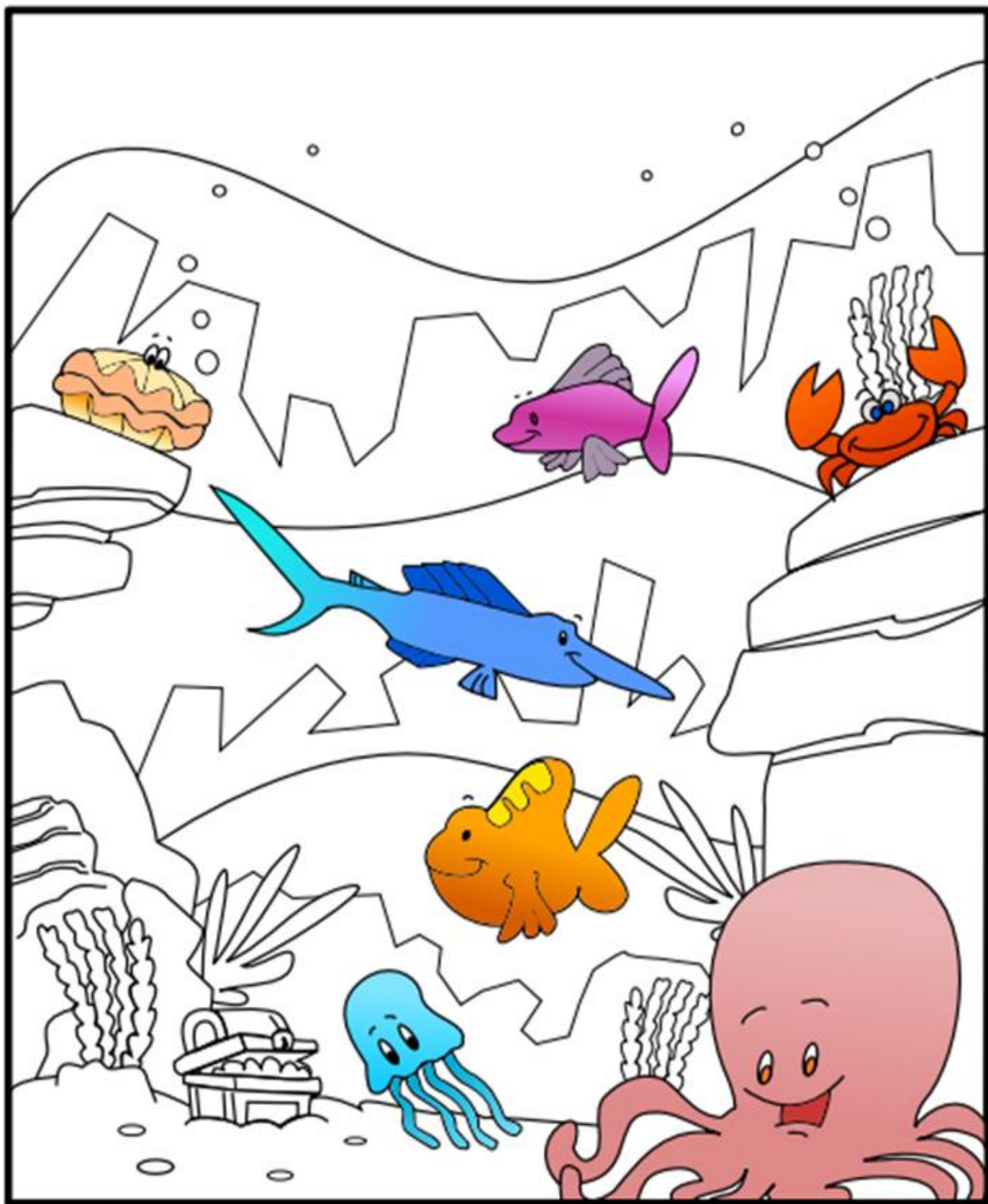
TOTAL POINTS _____

Acid or Base? Worksheet

Name of Liquid	Red Litmus Reaction			Blue Litmus Reaction		
	Acidic	Basic	Neutral	Acidic	Basic	Neutral
	Acidic	Basic	Neutral	Acidic	Basic	Neutral
	Acidic	Basic	Neutral	Acidic	Basic	Neutral
	Acidic	Basic	Neutral	Acidic	Basic	Neutral
	Acidic	Basic	Neutral	Acidic	Basic	Neutral
	Acidic	Basic	Neutral	Acidic	Basic	Neutral
	Acidic	Basic	Neutral	Acidic	Basic	Neutral
	Acidic	Basic	Neutral	Acidic	Basic	Neutral
	Acidic	Basic	Neutral	Acidic	Basic	Neutral

Bubble Masters! Worksheets

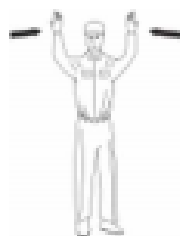




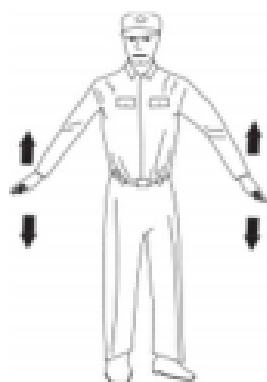
Hula Hoop Times Tables Worksheet

x	0	1	2	3	4	5	6	7	8	9	10
0	0	0	0	0	0	0	0	0	0	0	0
1	0	1	2	3	4	5	6	7	8	9	10
2	0	2	4	6	8	10	12	14	16	18	20
3	0	3	6	9	12	15	18	21	24	27	30
4	0	4	8	12	16	20	24	28	32	36	40
5	0	5	10	15	20	25	30	35	40	45	50
6	0	6	12	18	24	30	36	42	48	54	60
7	0	7	14	21	28	35	42	49	56	63	70
8	0	8	16	24	32	40	48	56	64	72	80
9	0	9	18	27	36	45	54	63	72	81	90
10	0	10	20	30	40	50	60	70	80	90	100

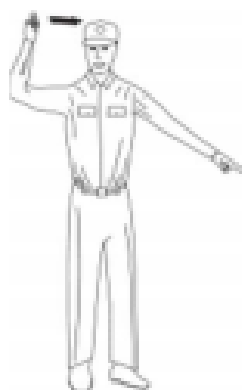
Aircraft Marshalling Game Worksheets



Move straight ahead: Bend arms at elbows and move wands up and down from waist to head.



Slow down: Move extended arms downwards, moving wands up and down from waist to knee.



Turn right: With left arm and wand extended, right hand makes a "come ahead" signal.

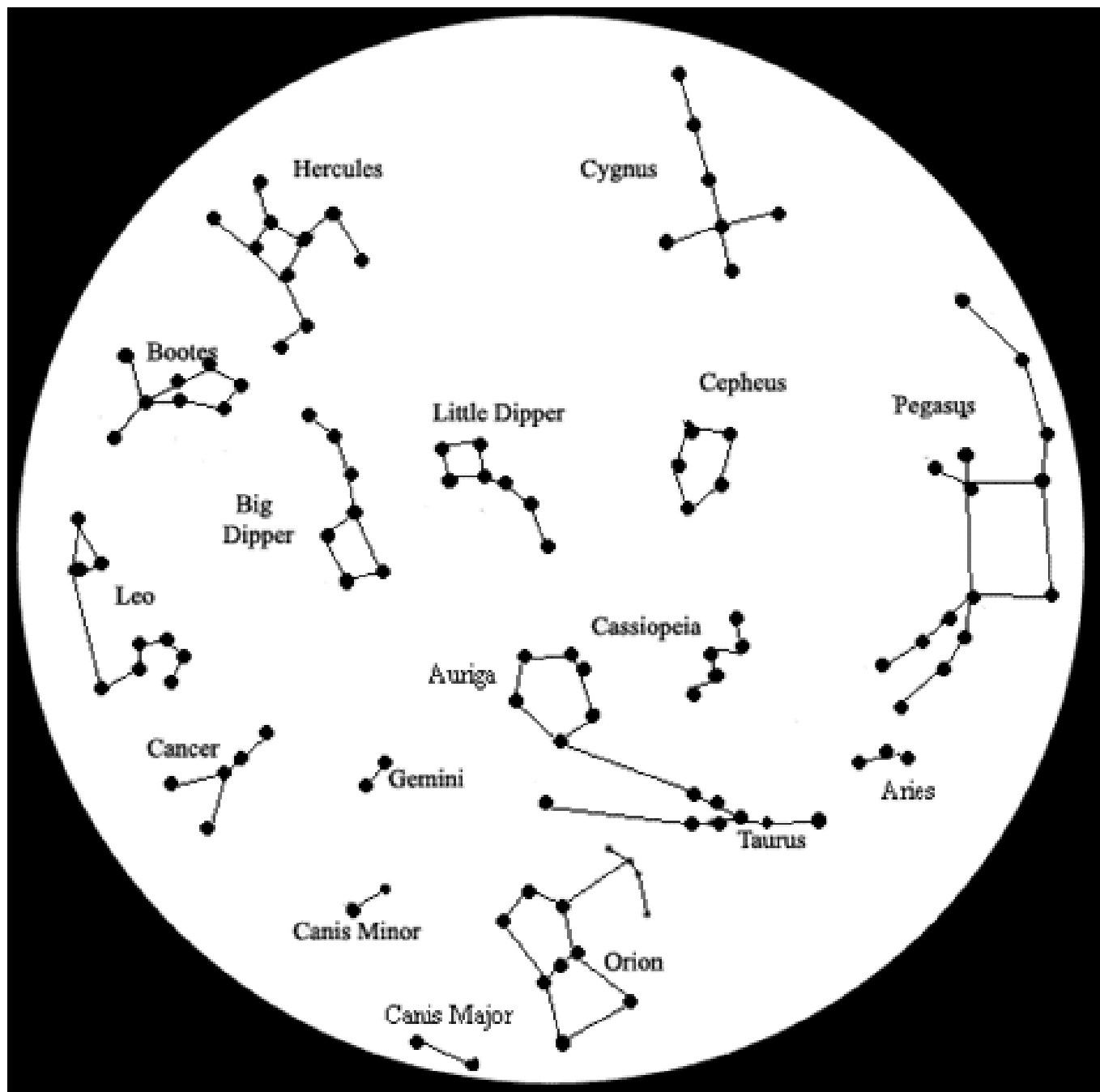


ahead” signal.

Turn left: With right arm and wand extended, left hand makes a “come



Stop: Fully extend arms and wands to the sides and slowly move to above the head until the wands cross.



Hula Hoop Math Toss Worksheet

$$\begin{array}{r} 8 \\ + 2 \\ \hline \end{array}$$

$$\begin{array}{r} 6 \\ + 2 \\ \hline \end{array}$$

$$\begin{array}{r} 5 \\ - 2 \\ \hline \end{array}$$

$$\begin{array}{r} 6 \\ - 5 \\ \hline \end{array}$$

$$\begin{array}{r} 9 \\ + 5 \\ \hline \end{array}$$

$$\begin{array}{r} 8 \\ + 6 \\ \hline \end{array}$$

$$\begin{array}{r} 5 \\ - 1 \\ \hline \end{array}$$

$$\begin{array}{r} 5 \\ - 4 \\ \hline \end{array}$$

$$\begin{array}{r} 7 \\ + 1 \\ \hline \end{array}$$

$$\begin{array}{r} 6 \\ - 0 \\ \hline \end{array}$$

$$\begin{array}{r} 7 \\ + 0 \\ \hline \end{array}$$

$$\begin{array}{r} 4 \\ + 4 \\ \hline \end{array}$$

$$\begin{array}{r} 7 \\ + 3 \\ \hline \end{array}$$

$$\begin{array}{r} 5 \\ - 5 \\ \hline \end{array}$$

$$\begin{array}{r} 8 \\ + 0 \\ \hline \end{array}$$

$$\begin{array}{r} 5 \\ - 1 \\ \hline \end{array}$$

$$\begin{array}{r} 9 \\ + 3 \\ \hline \end{array}$$

$$\begin{array}{r} 9 \\ - 1 \\ \hline \end{array}$$

$$\begin{array}{r} 6 \\ + 3 \\ \hline \end{array}$$

$$\begin{array}{r} 5 \\ - 4 \\ \hline \end{array}$$

$$\begin{array}{r} 7 \\ - 3 \\ \hline \end{array}$$

$$\begin{array}{r} 7 \\ - 2 \\ \hline \end{array}$$

$$\begin{array}{r} 5 \\ + 1 \\ \hline \end{array}$$

$$\begin{array}{r} 7 \\ - 3 \\ \hline \end{array}$$