## Helping With Math

## 2-D and 3-D Shapes

## KINDERGARTEN

Shape can be defined as the form of an object or its outline, outer boundary, or outer surface. Shape can be classified into two: 2 dimensional shape which is considered a flat plane shape; and 3 dimensional shape which is considered as a solid shape.

Do you see any object at home that has similar shape with the figures below?


## 2-DIMENSIONAL SHAPES

## 2 DIMENSIONAL SHAPES <br> (2-D)

Defined as a flat plane shape with two dimensions- length and width

## 2 DIMENSIONAL SHAPES

## SQUARE

- It has 4 sides of the same length
- It has 4 corners


## TRIANGLE



RECTANGLE


- It has 4 straight sides
- 2 sides are long and 2 sides are shorter


## 2-DIMENSIONAL SHAPES

## 2 DIMENSIONAL SHAPES

## CIRCLE

- No straight sides, only one curved side
- No corners


## PENTAGON

| $\bullet$ | It has 5 straight sides |
| :--- | :--- |
| $\bullet$ | It has 5 corners |

## REAL LIFE EXAMPLES OF 2D SHAPES



## 3-DIMENSIONAL SHAPES

## 3 DIMENSIONAL SHAPES

 (3-D)Defined as a solid shape which has three dimensions- length, width, and height

FACE
Part of a shape that is flat (or curved)

EDGE

The line where two faces meet

VERTEX (VERTICES)

The place where three or more edges meet

## 3 DIMENSIONAL SHAPES

## CUBE



## SPHERE



- 1 Curved Face
- 0 Edges
- 0 Vertices


## 3 DIMENSIONAL SHAPES

## CUBOID

|  | - Also known as rectangular prism <br> - 6 Faces <br> - 12 Edges <br> - 8 Vertices |
| :---: | :---: |

## CONE



## CYLINDER



- 2 Flat Face
- 1 Curved Face
- 2 Edges
- 0 Vertice


## 3 DIMENSIONAL SHAPES

RECTANGULAR PYRAMID


- 5 Faces
- 8 Edges
- 5 Vertices


## REAL LIFE EXAMPLES OF 3D SHAPES



## EXERCISE

Classify the 2-d and 3-d shapes below. Draw the 2-d shapes on the left side and the 3 -d shapes on the right.


2D SHAPES
3D SHAPES

## TABLE OF ACTIVITIES

1. The Bailey Family
2. Daddy Bailey's Appliances Picking
3. Townhouse
4. House Architecture
5. Furniture Match
6. Sally's Room
7. Johnny's Playroom
8. House Properties
9. Dream House
10. A Place for Learning

## THE BAILEY FAMILY

Here are the members of the Bailey family! At this time, they want to play a shape game. Draw a star on the shape if it is a 3d one. Afterwards, write the name of all the shapes below on the box provided.


## DADDY BAILEY'S APPLIANCES PICKING

Help Mr. Bailey pick the appliances for their new home! Color the correct appliance that describes the right shape in each item.


## TOWNHOUSE

Classify 2 d shapes in the house by drawing a line to connect the shapes with its corresponding names. Note: the shapes are in the shade of red.


## CIRCLE

## TRIANGLE

SQUARE

## PENTAGON

## RECTANGLE

## HOUSE ARCHITECTURE

Let us build a dream house! Write the correct name for each 3 -dimensional shapes in the mind of the architect. The choices is provided down below.


Cylinder
Rectangular Pyramid

Cone
Cube
Sphere

Rectangular Prism

## FURNITURE MATCH

Match the shapes with furnitures of the Bailey family! Color the shape with one color that matches a real life example. An example is provided for you.

EXAMPLE:

$\square$


## SALLY'S ROOM

Help Sally paint her walls! Color 2d shapes pink and 3d shapes blue.


## JOHNNY'S PLAYROOM

Sort Johnny's toys! Identify objects as 2d or 3d shape! Cut and paste them in the right column.

2D OBJECTS 3D OBJECTS


## HOUSE PROPERTIES

Each house design has properties! Identify who has the properties mentioned in each box. Choose the correct shape from the choices below then write the name of the shape on the box provided.



- It has 5 straight sides
- It has 5 corners



## DREAM HOUSE

Help the Bailey family build their dream house! From the shapes provided below, form a house. Cut and paste it on the space provided. Afterwards, color the house with the shade of your choice.


## A PLACE FOR LEARNING

A house is indeed a place for learning! Draw three 2d and 3d shapes on the box provided. Don't forget to color!

## 2D SHAPES

 3D SHAPES

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