**Design a City**

**Materials:**

1. **Paper** (computer paper or poster board. The directions allow for computer drawn maps as

 well)

2. **Ruler**

3. **Colors** (markers, crayons, etc)

**Procedure:**

1. Have students split up into groups of 3 people or less. (This project can also be done as an individual, take-home project)

# 2. Students will be using the newly learned concepts of parallel lines to place objects on a city map.

# 3. Vocabulary/Concepts: transversal

#  alternate interior angles

#  corresponding angle

#  same side interior angles

#  vertical angles

# **DESIGN YOUR OWN CITY**

Your group must design a city with the following requirements.

Your group may have **NO MORE THAN 3** members.

The city must have:

* a name and population
* at least 4 parallel streets
* at least 3 transversals (which do not have to be parallel to each other)
* a key (complete with symbols and names for all the locations listed below)
* a fire station and a mall located at alternate interior angles
* a school and a park located at same side interior angles
* a library and a swimming pool located at vertical angles
* a church and a car dealership located at corresponding angles
* a restaurant and a theatre located at same side interior angles
* a college and a grocery store located at alternate interior angles
* a gas station and a post office located at corresponding angles
* a police station and hospital located at vertical angles
* a rail system that must have at least 2 rail lines, a minimum of 4 stops, and a train station

You must name each of the following:

* city
* parallel streets
* transversal streets
* gas station
* library
* grocery store
* restaurant
* school
* park
* college
* hospital
* fire station
* church
* post office
* mall
* theatre
* swimming pool
* police station
* car dealership
* train station
* each rail line

You may use a computer or draw the city by hand. It may also be three dimensional. If you choose to draw your it city must be on at least an 8 ½ by 11-inch white unruled paper or white poster board. Your city drawing must be legible and neat. The city does not have to be in color although it is recommended. The more creative the more points!

**DUE:**

Group Members: , ,

## Grade for City

## Names:

 (2) city

 (8) parallel streets

 (6) transversal streets

 (2) gas station

 (2) library

 (2) grocery store

 (2) restaurant

 (2) school

 (2) park

 (2) college

 (2) hospital

 (2) fire station

 (2) church

 (2) post office

 (2) mall

 (2) theatre

 (2) swimming pool

 (2) police station

 (2) car dealership

 (2) train station

 (2) rail lines

 (48) TOTAL Names

Other:

 (2) Population

 (5) Key

 (10) Creativity

 (9) Neatness/Legible

 (5) Color

 (5) Poster board, unruled paper, other

 (36)TOTAL Other

Locations:

 (2) a fire station and a mall located at alternate interior angles

 (2) a school and a park located at same side interior angles

 (2) a library and a swimming pool located at vertical angles

 (2) a church and a car dealership located at corresponding angles

 (2) a restaurant and a theatre located at same side interior angles

 (2) a college and a grocery store located at alternate interior angles

 (2) a gas station and a post office located at corresponding angles

 (2) a police station and hospital located at vertical angles

 (16) TOTAL Locations

 (16) TOTAL Locations

 (36) TOTAL Other

GRADE: