



A GIANT POPULATION

Objectives:

- Students will learn about the population of the world, and the population of Asia as it relates to the populations of other continents.
- Students will learn about the concepts of population distribution and population density and how they apply to selected Asian countries.

Recommended Grades: 4-8

Materials (all included in the trunk):

- World map
- Inflatable globe
- Asia Country Cards
- College Atlas of the World
- Plastic cups
- Continent placards
- Country placards

Preparation: 10 minutes

- Read over the activity, make adaptations for student grade level, and gather materials.

Rules:



Shoes are not allowed on the map. Please have students remove shoes before walking on the map.



No writing utensils on the map.

PART 1: WORLD POPULATION

Introduction

Tell students the world population (as of August, 2007) is 6.6 billion people. Ask them if they can picture this many people all in one place. What would that look like?

Since it is very difficult to picture such a large number of people, ask them to picture 100 people in one space. Where could they fit, and what would that look like? [Common answers are that they could imagine this in the school gym, the playground, the cafeteria, etc.]

100 People in the World

The class is going to imagine that the world is populated by 100 people. (Explain that we use 100 as a number because this is the basis on which percentage is calculated.)

Review the seven continents on a world map or the inflatable globe.

What percentage of people live on each continent – Asia, Africa, Europe, North America, South America, Australia & Oceania, and Antarctica? In other words, if the world population is 100, how many people would live on each continent to accurately reflect the true world population? Have student predict answers before you giving them the percentages.

Place placards for each continent on the floor or on a table away from the map. Ask students to count out the plastic cups to represent the percentage of the world's population on each continent, and to place them on the placards. For example, 60% of the world's population resides in Asia, so instruct students to count out 60 plastic cups and place them on the Asia placard.

Continent	Percentage of the world's population
Africa	14%
Asia	60%
Australia & Oceania	1%
Europe	11%
North America	8%
South America	6%
Antarctica	less than 1%

Ask students these questions:

- Are you surprised by the percentages?
- Did you expect that more people live in Asia than North America?

PART 2: POPULATION DENSITY AND DISTRIBUTION IN ASIA

As of mid-2006, 3.97 billion (3,970,000,000) people lived in Asia. Assign individuals or groups of students to stand on the ten countries in the table below. Then, direct them to count out the number of plastic cups that represents the percentage of Asia's population residing in that country. For example, 6% of the Asia's population resides in Indonesia, so they place 6 plastic cups on Indonesia.

Country	Percentage of Asia's population
Bangladesh	4%
China	33%
India	28%
Indonesia	6%
Iran	2%
Japan	3%
Pakistan	4%
Philippines	2%
Turkey	2%
Vietnam	2%
All others in Asia	14%

Ask students these questions:

- Are you surprised by the percentages? (Remind them that these numbers are not the number of millions of people living in that country, but are percentages of the total Asian population.)
- Is this where you expected that people would live?

Provide these concepts and definitions to help students articulate their observations of where people live in Asia:

Population Density: The number of people in a certain area. This is an average created by dividing the total population of an area by the total land area of that area. For example, Thailand has a population of 65,700,000 and a total land area of 198,116 square miles. Therefore, Thailand's population density is 332 people per square mile.

Population Distribution: The pattern of where people live. Places with few people are sparsely populated, usually meaning they are difficult places to live. Places rich in human resources are often densely populated.

Ask them the following questions and encourage them to use the concepts of population distribution and population density in their answers. For more data, use the data map in the College Atlas of the World, page 175.

- What do you notice about the areas where people live? [If necessary, use the map legends. Discuss water sources, climate, topography.]
- What do you notice about the areas where people don't live?
- Do you think people are spread out evenly within a continent, or do they cluster in certain areas? (Are people spread out evenly in your town/city? State? North America?)

Optional extensions:

- Give each student a Country Card and ask them to line up in order from smallest to largest by area. (See Data Table 1)
- Give each student a Country Card and ask them to line up in order from smallest to largest by population. (See Data Table 2)
- Ask students to predict how many times your state can fit into China. Then, have them do the math to calculate the answer. (See Data Table 3) Print out a PDF of your state to the same scale as the map of Asia for visual reference.
- Using the Country Cards, assign students to calculate the population density for several Asian countries. (See Data Table 4)



Data Table 1: Countries in Asia by Area (in square miles)

Country	Area
Maldives	116
Singapore	239
Bahrain	266
Brunei	2,228
Palestinian Territory	2,417
Cyprus	3,571
Lebanon	4,015
Qatar	4,247
East Timor	5,741
Kuwait	6,880
Israel	8,131
Armenia	11,506
Taiwan	13,969
Bhutan	18,147
Sri Lanka	25,332
Georgia	26,911
United Arab Emirates	32,278
Azerbaijan	33,436
Jordan	34,444
South Korea	38,324
North Korea	46,541
Tajikistan	55,251
Bangladesh	55,598
Nepal	56,826
Cambodia	69,900

Country	Area
Syria	71,498
Kyrgyzstan	76,641
Oman	82,031
Laos	91,429
Philippines	115,830
Malaysia	127,317
Vietnam	128,066
Japan	145,869
Iraq	169,236
Uzbekistan	172,741
Turkmenistan	188,456
Thailand	198,116
Yemen	203,849
Afghanistan	251,772
Myanmar	261,228
Turkey	299,158
Pakistan	307,375
Mongolia	604,826
Iran	630,575
Indonesia	735,355
Saudi Arabia	829,996
Kazakhstan	1,049,151
India	1,269,340
China	3,696,100

Data Table 2: Countries in Asia by Population (in millions)

Country	Population
Maldives	0.3
Brunei	0.4
Bahrain	0.8
Qatar	0.9
Bhutan	0.9
Cyprus	1.0
East Timor	1.0
Mongolia	2.6
Oman	2.7
Kuwait	2.8
Armenia	3.0
Lebanon	3.9
Palestinian Territory	4.0
United Arab Emirates	4.4
Georgia	4.5
Singapore	4.6
Kyrgyzstan	5.2
Turkmenistan	5.4
Jordan	5.7
Laos	5.9
Tajikistan	7.1
Israel	7.3
Azerbaijan	8.6
Cambodia	14.4
Kazakhstan	15.5

Country	Population
Syria	19.9
Sri Lanka	20.1
Yemen	22.4
Taiwan	22.9
North Korea	23.3
Uzbekistan	26.5
Malaysia	27.2
Saudi Arabia	27.6
Nepal	27.8
Iraq	29.0
Afghanistan	31.9
South Korea	48.5
Myanmar	49.8
Thailand	65.7
Iran	71.2
Turkey	74.0
Vietnam	85.1
Philippines	88.7
Japan	127.7
Bangladesh	149.0
Pakistan	169.3
Indonesia	231.6
India	1,131.9
China	1,318.0

Data Table 3: Number of times each U.S. State would fit in China (by area)

Country	Population
Alabama	71
Alaska	6
Arizona	32
Arkansas	70
California	23
Colorado	36
Connecticut	667
Delaware	1,485
District of Columbia	54,084
Florida	56
Georgia	62
Hawaii	338
Idaho	44
Illinois	64
Indiana	101
Iowa	66
Kansas	45
Kentucky	91
Louisiana	71
Maine	104
Maryland	298
Massachusetts	350
Michigan	38
Minnesota	43
Mississippi	76
Missouri	53

Country	Population
Montana	25
Nebraska	48
Nevada	33
New Hampshire	395
New Jersey	424
New Mexico	30
New York	68
North Carolina	69
North Dakota	52
Ohio	82
Oklahoma	53
Oregon	38
Pennsylvania	80
Rhode Island	2,392
South Carolina	115
South Dakota	48
Tennessee	88
Texas	14
Utah	44
Vermont	384
Virginia	86
Washington	52
West Virginia	153
Wisconsin	56
Wyoming	38

Data Table 4: Countries in Asia: Area and Population

Country	Area (in sq. miles)	Population (in millions)
Afghanistan	251,772	31.9
Armenia	11,506	3
Azerbaijan	33,436	8.6
Bahrain	266	0.8
Bangladesh	55,598	149.0
Bhutan	18,147	0.9
Brunei	2,228	0.4
Cambodia	69,900	14.4
China	3,696,100	1,318.0
Cyprus	3,571	1.0
East Timor	5,741	1.0
Georgia	26,911	4.5
India	1,269,340	1,131.9
Indonesia	735,355	231.6
Iran	630,575	71.2
Iraq	169,236	29.0
Israel	8,131	7.3
Japan	145,869	127.7
Jordan	34,444	5.7
Kazakhstan	1,049,151	15.5
Kuwait	6,880	2.8
Kyrgyzstan	76,641	5.2
Laos	91,429	5.9
Lebanon	4,015	3.9
Malaysia	127,317	27.2
Maldives	116	0.3
Mongolia	604,826	2.6
Myanmar	261,228	49.8
Nepal	56,826	27.8
North Korea	46,541	23.3
Oman	82,031	2.7
Pakistan	307,375	169.3
Palestinian Territory	2,417	4.0
Philippines	115,830	88.7
Qatar	4,247	0.9
Saudi Arabia	829,996	27.6
Singapore	239	4.6
Sri Lanka	25,332	20.1
South Korea	38,324	48.5
Syria	71,498	19.9
Taiwan	13,969	22.9
Tajikistan	55,251	7.1
Thailand	198,116	65.7
Turkey	299,158	74.0
Turkmenistan	188,456	5.4
United Arab Emirates	32,278	4.4
Uzbekistan	172,741	26.5
Vietnam	128,066	85.1
Yemen	203,849	22.4