

Write your name on the cover of the test booklet and nowhere else. Enclose this sheet with the booklet. Failure to follow these directions will cost you 1 point. The test has 150 points (to be scaled up to 210 points) and is scheduled to take 75 minutes. Therefore, expect to spend 1 minute for every 2 points. For example, a 12-point question should take 6 minutes. I can give extra time, but I won't give much.

1) (12 points) Answer EITHER Part A OR Part B.

A) Explain why it can take two or three generations for the population of a country to stop growing after it reaches the replacement birthrate.

B) If you were the head of a country with a high population growth rate, what would you do to reduce it? Explain how that would have the desired effect.

2) (12 points) Answer EITHER Part A OR Part B.

A) Why do economists, who study economic development, generally feel that the HDI is a better measure of how well off a country is than GNI per capita? Explain your logic.

B) One of the Millennium Development Goals is "Eliminate gender disparity in primary and secondary education, preferably by 2005 and to all levels of education no later than 2025." Why is that important for the world?

3) (12 points) Answer EITHER Part A OR Part B.

A) Even without min wage, labor in agriculture is less productive than in industry. Either prove this statement to be true or explain the economics as to why this is true.

B) One of the five key elements for the markets to work well is that, "firms must maximize profits." Explain why this is important.

4) (14 points) For EITHER the Washington Consensus item in Part A OR the one in Part B, explain why that it would improve the economy. Make sure you define the term.

A) Liberalization of interest rates.

B) Privatization of enterprises.

5) (14 points) Answer EITHER Part A OR Part B.

A) If we use the poverty line of \$2/day. If a country has a head-count index of .30 and the mean consumption of people below the poverty line is \$120/day, then what is the value of the poverty gap for this country? Show all calculations.

B) The Republicans are proposing that welfare payments have restrictions attached to them. Given what our book says, what do you feel would be the best conditional requirement to put on the payments. Explain how the condition would work and why it would have good results. (I realize that I am implicitly stating that the USA is a developing country.)

6) (16 points) Answer EITHER Part A OR Part B.

A) Argentina's life expectancy at birth is 75.4 years, expected years of schooling is 17.9 years, mean years of schooling is 11.1, and the GNI per capita using PPP is \$20,925. Setup the equation which would calculate Argentina's HDI. **Do NOT do the calculation.** If you feel something needs to be explained, explain what you are doing. (Source: the HDI Report 2023)

B) According to Statista, Italy's capital grows about 3% a year in 2018. According to an article in

American Journal of Industrial and Business Management from 2019, the growth rate of total factor productivity was about 0% in Italy then. The IMF said that Italy's GDP (pretend its GNI) grew at 0.9% at that time. Given that information, setup the equation which would calculate how much the labor supply grew. **Calculate** the growth rate of labor in Italy back then, showing all work.

7) (16 points) Answer EITHER Part A OR Part B.

A) If an economy is growing at 2%, how long will it take to double? If it grew at 3%, how long would it take to double? Show all work. Why are those two numbers so different? Explain your logic.

B) Niger, Mali, and Burkina Faso, have all had at least one successful coup in the past four years. Also, on January 28th, all three announced that they will be leaving the free trade area called ECOWAS. **Based solely on that information**, do you think their economies will improve over the next decade? Explain your logic mentioning both facts I stated.

8) (16 points) Do EITHER Part A OR Part B using the following data. The CIA Factbook's webpage describes the DR Congo's population as: 0-14 years: 45.99% , 15-64 years: 51.52%, and 65 years and over: 2.49% (2023 est.)

A) Draw a population pyramid which could be for the DR Congo. State why you feel your graph is consistent with the data provided.

B) What is the dependency ratio in the DR Congo? Setup the calculation, but do not actually do it. Tell me what you are doing. Why is that dependency ratio a bad thing for the country? Explain your logic.

9) (18 points) Answer EITHER Part A OR Part B.

A) Draw a Lorenz Curve such that the Gini Coefficient is approximately .67. Explain why you feel your graph has a Gini Coefficient of .67. (Of interest, the World Inequality Report says the world's Gini Coefficient is approximately .67.)

B) Draw the Kuznets Curve. Explain why it takes that shape. When you drew two Lorenz Curves on the homework assignment, I marked off if your curve got flatter for a short while. Why can't it do that?

10) (20 points) Answer EITHER Part A OR Part B.

A) Draw the two-sector labor market with a minimum wage. Illustrate the effects of an increase in the working age population. Explain why the curve(s) moved as drawn. What happens to the amount of labor in the two sectors and the wage rates in the two sectors? Explain how you reached your conclusions.

B) Draw the two-sector labor market with a minimum wage. Illustrate the effects of an improvement in technology in the agriculture sector. Explain why the curve(s) moved as drawn. What happens to the amount of labor in the two sectors and the wage rates in the two sectors? Explain how you reached your conclusions.