Final.		
Name:		

Spring 2015 Economics of Development

Each question is worth the total number of points in parentheses; sub-questions are allocated an equal share of the total points per question. Final is worth 30 points.

- 1) Kuznets curves. (3 points)
- a) Draw the original Kuznets curve and label everything clearly.

b) Explain the logic behind the shape of this curve.

c) Explain how an 'environmental Kuznet's curve' applies this basic idea to a different context.

## 2) Agriculture. (3 points)

a) Describe the three main types of agrarian systems found in the developing world and note in which geographic region each one is most commonly found.

b) Chose one of these agrarian systems. Describe a way to increase agricultural production for this system.

- 3) Demographic Transition. (3 points)
- a) Draw a figure illustrating the demographic transition and note the different stages.

b) Explain why the one rate you drew in (a) decreased before the other rate decreased.

c) Explain why there is concern that a country could get stuck in stage 2 of the transition.

4) Inequality. (3 points)

a) Draw a Lorenz curve for the distribution of income in a country. Be sure to label the axes.

b) Draw another Lorenz curve that has a more equal distribution than the one in (a).

c) Describe how to compute the Gini coefficient for each of these two Lorenz curves, and argue whether the coefficient in (b) will be greater than (a) or vice versa.

5) True or False (3 points)

Statement	Circle wh true or fal	hether the statement is
The proportion of the World's population living in rural areas	True	False
has been steadily increasing over the past 20 years. The majority of people in the developing world's labor force are	True	False
employed in agriculture. The majority of the population in developing countries lives in	True	False
rural areas.	Trave	Falsa
"Where Is the Wealth of Nations" reports wealthier countries have a larger share of wealth accounted for as natural capital than do poorer countries.	True	False
Psacharopoulos reported the private internal rate of return to primary education in sub-Saharan Africa was higher than a standard discount rate of 10%.	True	False
The world population growth rate has slowed since reaching a peak in 1920-1950.	True	False
Current estimates of global population are in the 11-11.2 billion people range.	True	False
All countries in the world are currently experiencing positive population growth rates.	True	False
The United States is the largest donor of official development assistance of any country in the world.	True	False
The United States allocates over 2% of GNI to official development assistance.	True	False
Williamson identified broadening the tax base and lowering tax rates as part of the 'Washington Consensus'.	True	False
The informal sector is the unorganized, unregulated, unregistered sector of the economy	True	False
Urban giantism describes the phenomena that the largest city in developing countries tends to hold a very large share of the national population.	True	False
The evidence from the WHO presented in class reported that malnutrition is a contributing factor to over half the deaths of children under five in developing countries.	True	False
Heart disease is the leading cause of mortality and the leading cause of DALY worldwide.	True	False

6) Hidden momentum of population growth (3 points)

a) Fill in the following tables. Fr stands for the total fertility rate of the associated age cohort during their reproductive years. Assume all future youth cohorts will have a total fertility rate of 2 in their reproductive years. Total population is for males and females; assume 50% of the population is female. The number in each cell of the table in rows a,b, and c should describe the number of females in each cohort in a given generation.

## Country A

	Generation	Generation	Generation	Generation
	1	2	3	4
a.Pre-reproductive cohort, Fr=2				
b. Reproductive cohort, Fr=2				
c.Post reproductive cohort, Fr=3	5000			
Female Population	20000			
Total population	40000			

Country B

	Generation	Generation	Generation	Generation
	1	2	3	4
a.Pre-reproductive cohort, Fr=2				
b.Reproductive cohort, Fr=8/3				
c.Post reproductive cohort, Fr=6	2500			
Female Population	20000			
Total population	40000			

Describe how your findings on total population by the fourth generation illustrate the concept of **the hidden momentum of population growth**.

b) What is meant by a 'bottom heavy' population pyramid and how does that relate to what you found in part a?

7) I Overty measures	(5 points)
Person number	Income per day
1	\$0.15
2	\$0.35
3	\$0.50
4	\$0.85
5	\$0.90
6	\$1.10
7	\$2.50
8	\$3.90
9	\$5.50
10	\$15.25
TOTAL INCOME	\$31.00

## 7) Poverty measures. (3 points)

TOTAL INCOME

a) What is the headcount, the headcount index, the total poverty gap, the average poverty gap, the average income shortfall, and the normalized average income shortfall if the poverty line is defined as \$1.25 per person per day? H=

HI=			
TPG=			
APG=	 	 	
AIS=	 	 	
NAIS=	 	 	

b) If we take \$0.10 from person 6 and give it to person 1, is there any change to the headcount index? Is there any change in the total poverty gap?

c) What share of total income is held by the highest quintile and what share is held by the lowest quintile? Highest=

Lowest=

8) Health (3 points).

a) Contrast wasting with stunting, noting what anthropometric measure is used to identify each condition.

b) Explain why we found a positive relationship between adult height and wage rates in the graph we considered in class for males in Brazil.

c) Describe the use of the MUAC (middle upper arm circumference) as a nutritional monitoring measure.

## 9) Education (3 points)

	Circle whether the statement is true or false	
The 'missing women mystery' asks why the share of primary school	True	False
teachers who are female is lower than that of males.	The	Taise
In general, as the average years of education in a developing country goes up, the education Gini also increases.	True	False
The rates of return to education calculations we discussed in class include the opportunity cost of wages that could have been earned during the years a student is at school.	True	False
The primary school enrollment ratio has declined from 1970 to now in Sub Saharan Africa due to population growing more rapidly that spaces in classrooms have been provided.	True	False
Achieving universal primary education is one of the Millennium Development Goals.	True	False
A country's educational attainment is included as a component of the Human Development index for that country.	True	False

- 10. Long term poverty dynamics.(3 points)
  - a. Contrast the concept of asset poverty with the concept of income poverty.

b. Describe a policy that could be used to reduce asset poverty.

c. What does Krishna mean in the title of his article "For Reducing Poverty Faster: Target Reasons Before People"

Extra Credit (get them all, get 1 bonus point).

Fun with Acronyms: Write out what the acronym stands for

PRGF	
NARS	
CAS	
HIPC	
TFP	