Midterm Exam - *Answers*
November 9, 2016

Answer on these sheets. Use the indicated point values as a guide to how extensively you should answer each question, and budget your time accordingly. Note that the last page of the exam (page 9) is intentionally left blank for you to use if you run out of space to answer any of the questions, although I do not intend that you should need it.

The exam has a total of 60 points.

1. (12 pts.) Define or explain any six (6) of the following eight terms. (If you answer more than 6, I will grade only the first 6, so be sure to cross out any answers you don't want me to grade.)

   a. CETA:

   Comprehensive Economic and Trade Agreement between Canada and the European Union. It was successfully negotiated and was recently signed by both Canada and the EU, after first being blocked by a regional government in Belgium.

   b. Section 337 of US trade law:

   The provision of US law that "allows trade sanctions for intellectual property theft." It is being used by the steel industry, objecting that Chinese companies have engaged in cyber-theft of the production secrets of US companies.

   c. The difference between GNP and GDP:

   GNP (Gross National Product) includes all production by the "nationals" of a country, regardless of whether the production is done at home or abroad. GDP (Gross Domestic Product) includes all production done within the geographic borders of the country, regardless of whether it is done by nationals or foreigners.

   d. Current account surplus:

   The excess of credits over debits in the current account, which includes exports and imports of goods and service, income payments (interest, dividends, wages) paid to and from foreigners, and transfer payments.

e. TRIPs:

The WTO agreement on Trade-Related Intellectual Property rights and their protection.

f. Trade Promotion Authority:

Informally called Fast Track, this is the commitment by the US Congress to bring trade agreements to an up-or-down vote, without amendments.

g. VER:

Voluntary Export Restraint, which is a restriction of exports done at the request of the importing country.

h. Column 2 tariffs:

These are the tariffs in the US tariff schedule that apply to countries that are not granted MFN (or normal trading relations) status.

2. (12 pts.) True or False (circle one)

a. If the Trans-Pacific Partnership goes into effect, the US will reduce its tariffs on imports from each of eleven other countries.

True False *Ans: False (US already has FTAs with 6)*

b. The vote for the United Kingdom to leave the European Union was due in part to the "leave" advocates raising and spending more money to promote their case than was spent by the "remain" advocates.

True False *Ans: False*

c. China defends its taxes on the export of certain raw materials on the grounds that the mining of these materials is harmful to the environment.

True False Ans: True

d. If the price of a good rises, the loss to demanders of the good is measured by the increase in the dollar (or other currency) amount that they spend on it.

True False *Ans: False*

e. If a large country levies a tariff, it may gain, but its gain is smaller than the tariff revenue collected by the government.

True False *Ans: True*

f. If the domestic industry has only a single firm, then replacing a tariff with a quota that allows in the same quantity of imports can cause the domestic price to rise.

True False *Ans: True*

g. More than half of the tariff reductions done by the United States since the early 1930s occurred before World War II.

True False *Ans: True*

h. Across the world as a whole on average, bound tariffs are almost twice as high as applied tariffs.

True False *Ans: True*

i. United States tariffs on imports of goods are set by the United States Trade Representative.

True False *Ans: False*

j. Of the FTAs that Japan is currently negotiating, the one that, according to the reading by Solis, will cover the most Japanese exports and be most beneficial in raising Japanese income is the Trans-Pacific Partnership.

True False *Ans: False (That would be RCEP)*

k. In 2009, the US levied a safeguard tariff on China's exports of tires, and not on tire exports of other countries. This was legal under WTO rules because China was not yet a member of the WTO.

True False *Ans: False*

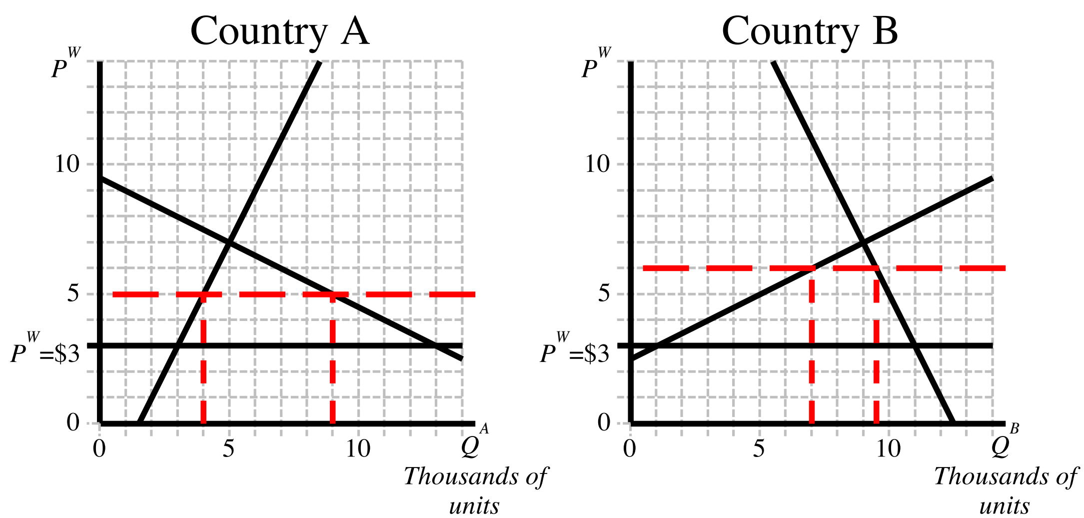
l. Comparing US presidents with the US Congress, the members of Congress tend on average to be more protectionist than presidents.

True False *Ans: True*

3. (8 pts.) For each of the following place a check in just one column to indicate whether the transaction enters as a credit or a debit in the current or financial accounts of the US balance of payments.

	Current Account		Financial Account	
	Credit	Debit	Credit	Debit
a. A US resident imports a car from Germany		✓		
b. An Italian borrows dollars from a New York bank				✓
c. American gives money to a French charity		✓		
d. American receives dividends from a share of ownership in a British firm	✓			

4. (12 pts.) The graphs below show supply and demand curves for two different countries, A and B, both of which you may think of as small open economies that initially are engaged in free trade with a large rest of world where the world price is P^W=\$3 per unit of the good. Both are importing 10,000 units of the good, as you may verify using the grids and labels in the graphs.



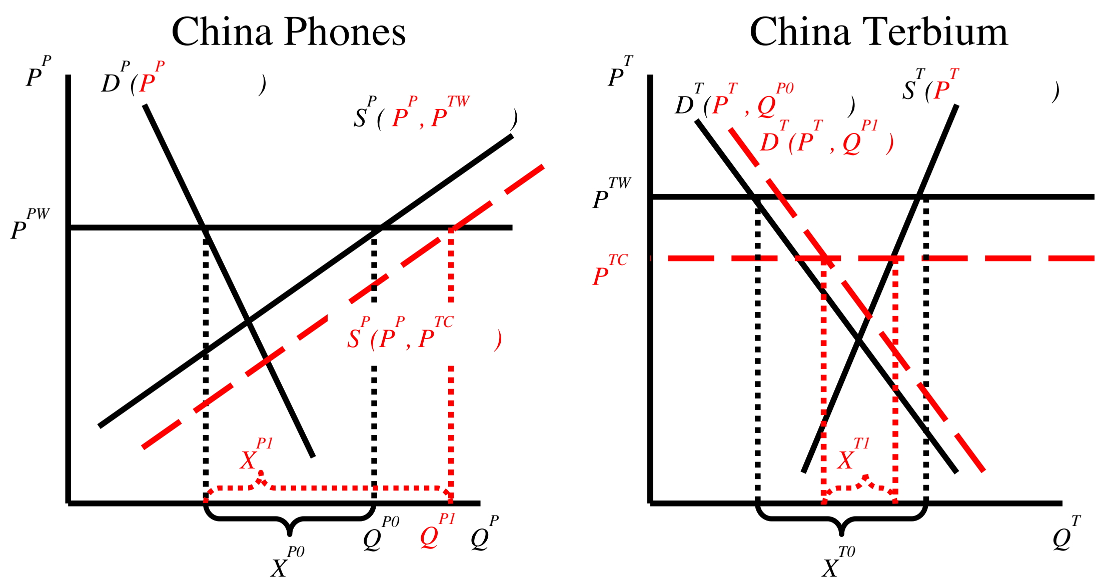
a. Country A now levies a specific tariff of \$2 per unit of the good imported. Show this in the figure and, using the grid and labels provided there, record below the following quantities and values in the presence of this tariff.

The domestic price in Country A	*\$5*
The quantity demanded in Country A	*9,000 units*
The quantity imported by Country A	*5,000 units*
The tariff revenue of Country A	*\$10,000*
The dead-weight loss caused by the tariff in Country A	*\$5,000*

b. Country B now imposes a quota limiting imports to 2,500 units of the good and its government auctions off the quota licenses. Show this in the figure and record below the following quantities and values in the presence of this quota.

The domestic price in Country B	*\$6*
The quantity supplied in Country B	*7,000 units*
The tariff equivalent of the quota	*\$3*
The quota rent of Country B	*\$7,500*
The dead-weight loss caused by the quota in Country B	*\$11,250*

5. (10 pts.) The "rare earth" terbium is used as an input (as are many other rare earths that we'll ignore here) in the production of many high-technology products, including smart phones. China, which produces terbium, recently placed a tax on its exports of it. Use the diagrams below, which treat China as a small country in both the world market for terbium and the world market for phones, to analyze the effects of this export tax on Chinese supply, demand, and exports of both terbium and phones.



a. (4 pts.) First, indicate in the figure how supplies and demands do or do not depend on the prices or quantities of each good, given that terbium is an input to production of phones. Do this by writing into the parentheses in the labels for each curve the appropriate arguments for them.

b. (2 pts.) Now, show in the market for terbium (on the right) what an export tax will do to the Chinese price for the mineral. Label the new Chinese price P^{TC}.

c. (2 pts.) Next, in the left-hand figure, show how this price change will shift one or both curves for phones.

d. (1 pts.) What has happened, as a result of the export tax on terbium, to Chinese exports of phones?

Ans: Chinese exports of phones increase.

e. (1 pts.) What has happened to Chinese exports of terbium?

Ans: Chinese exports of terbium decrease.

6. (6 pts.) In the space below, discuss how the analysis that you have just done in question 5 may miss some important aspects of the Chinese export tax on rare earths, given the facts that

    a. China has been the only producer of rare earths in the world, and

    b. Production of rare earths, including terbium, is harmful to the environment

    Ans: The small country assumption for China is especially inappropriate in this case, as China is the only producer of rare earths such as terbium. By placing an export tax on terbium, it will reduce supply to the world market and cause the world price to rise by some fraction of the amount of the tax. The domestic price of terbium will still fall, but by less than the tax. Thus the cost reduction for Chinese phone producers will be smaller. But this may not lessen the impact on Chinese phone exports, since the rise in world price of terbium will increase the costs of the phone producers abroad.

    The fact that production (i.e., mining) of rare earths is harmful to the environment does not matter for the analysis above of effects on prices and quantities, but it could matter if we were to look at welfare effects. Production of terbium harms the environment in China, and to the extent that the export tax lowers the price that suppliers of terbium in China get, they will reduce their production and reduce their harm to the environment. That, as we saw in class, is the reason that China has given for its export tax. But by lowering the price of terbium to the Chinese phone producers, the export tax also increases the demand for terbium there, partially offsetting any benefit to the environment.

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