Econ 188 – Exam 1

Spring 2012

Professor Spearot

NAME: _Key_

ID:_____

I have neither given nor received unauthorized aid on this examination, nor have I concealed any similar misconduct by others.

Signature_____

Part 1 (2 points each – circle your answer for multiple choice)

1. Ad-valorem tariffs are _____

   a. assessed per-unit

   b. assessed as a percentage of value

   c. free up to a specified limit

   d. None of the above

2. Ben and Jerry's entered Japan in the 1990s via

   a. 7-11

   b. Dominos

   c. Scoop shops

   d. Häagen-Dazs

3. For Canadian firms, the US Canada Free trade agreement

   a. Decreased employment

   b. Increased productivity

   c. 'a' and 'b'

   d. None of the above

4. For Canadian firms, improved Canadian business conditions

   a. Decreased employment

   b. Increased productivity

   c. 'a' and 'b'

   d. None of the above

5. Export supply for commodities is usually _____ export supply for differentiated products.

   a. Less elastic than

   b. More elastic than

   c. Equal to

   d. More rigid than

Part 2: (5 points each)

1. Please list at least 5 dimensions on which exporters are different from non-exporters, and the way in which exporters are different.

Exporters are

hire more workers/larger employment

Sell more

Are more capital intensive

are more skill intensive   +1 for each

pay higher wages

are more productive

2. Please describe how the data indicates that exporting is exceptionally concentrated.

The data shows that all though 11-12% of firms   +2 export to 5+ countries in 5+ products, they account for 92% of sales and 70% of employment among all exporters.   +2

+1

3. Other than data quality, provide two reasons why the Canada-US Free Trade agreement studied in Trefler (2004) is an innovative study of tariff liberalization.
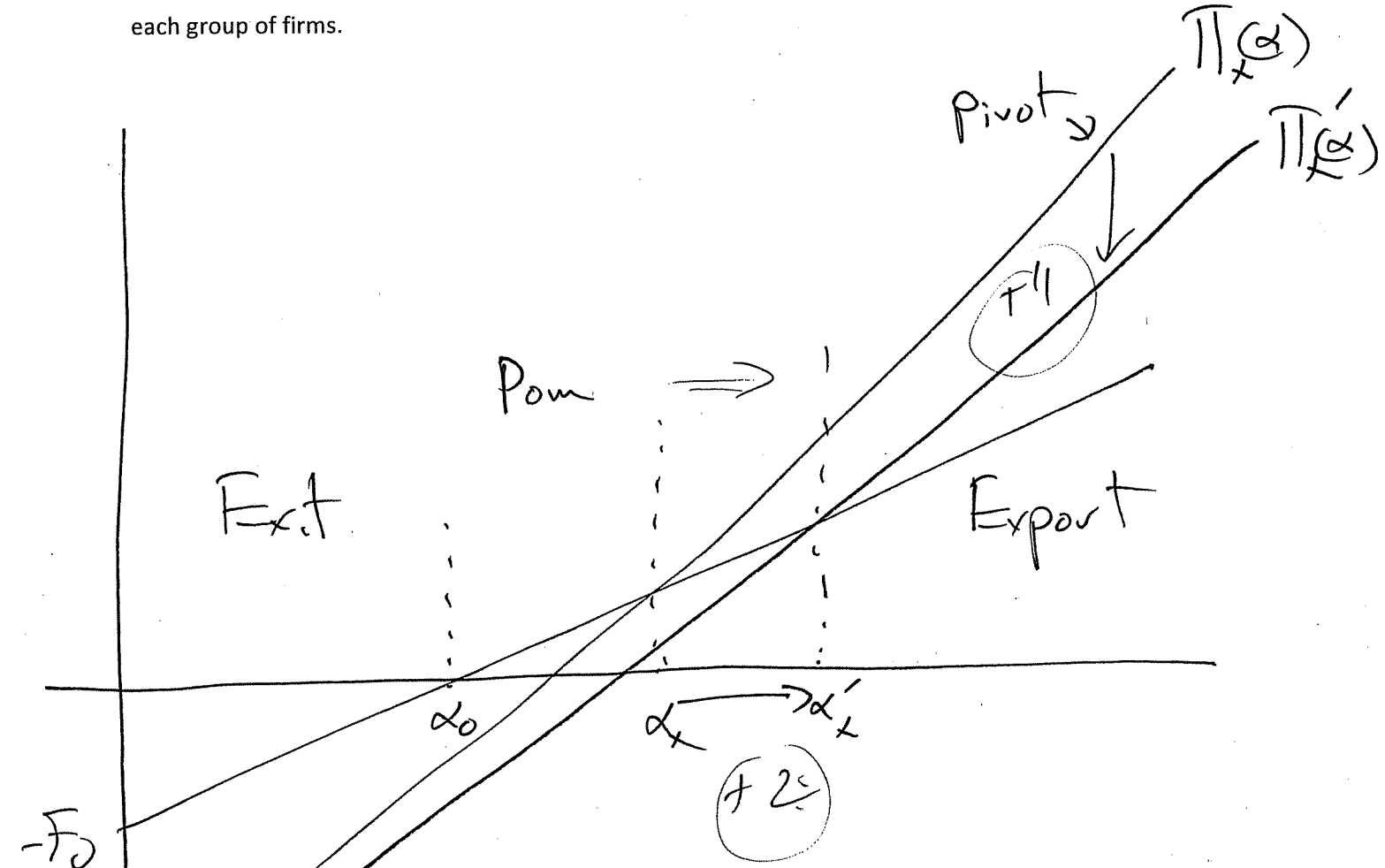
- It was un expected r2.5

- It is liberalization by a developed country. +.2/5

4. Please list two differences between liner shipping and tramp shipping.

Liner shipping		Tramp shiping
Defined port of call	r2.5	No defined port of call
Containerization	+2.5	Not os prevalent

Part 3 – 10 Points each

Consider the "Melitz" exporting model we discussed in class. A firm must decide to exit the market or operate, and if the latter, whether to be purely domestic or a domestic firm that also exports. The returns from exiting are zero. If the firm decides to operate in some manner, it must pay F_0 in overhead costs. If the firm also decides to export, it must pay F_X in exporting fixed costs, such as up-front export financing. The firm can earn $\prod_H(\alpha)$ in the domestic market. If the firm exports, it earns $\prod_F(\alpha)$ in the foreign market, but loses 't' percent of these profits through a foreign tariff. The term α is firm level productivity, where each profit function is increasing in α.

1. Please graphically detail how firms sort into the three outcomes. Please comment on the relative productivity of each group of firms.

$$\prod_H(\alpha) + (1-t)\prod_F(\alpha) - F_0 - F_X$$

$$\prod_H(\alpha) - F_0$$

Export

Exit

Dom

α

α_0

α_X

(+2)

(+2)

(+2)

(+2)

F_0

$-F_0 - F_X$

Productivity

Exporters > Dom > Exiting firms.

(+2)

2.Suppose that 't' increases. Please detail graphically the *direct* effects of this change. Please also discuss, if any, the effect of the increase in 't' on the share of active firms and exporting firms, and the average productivity of each group of firms.
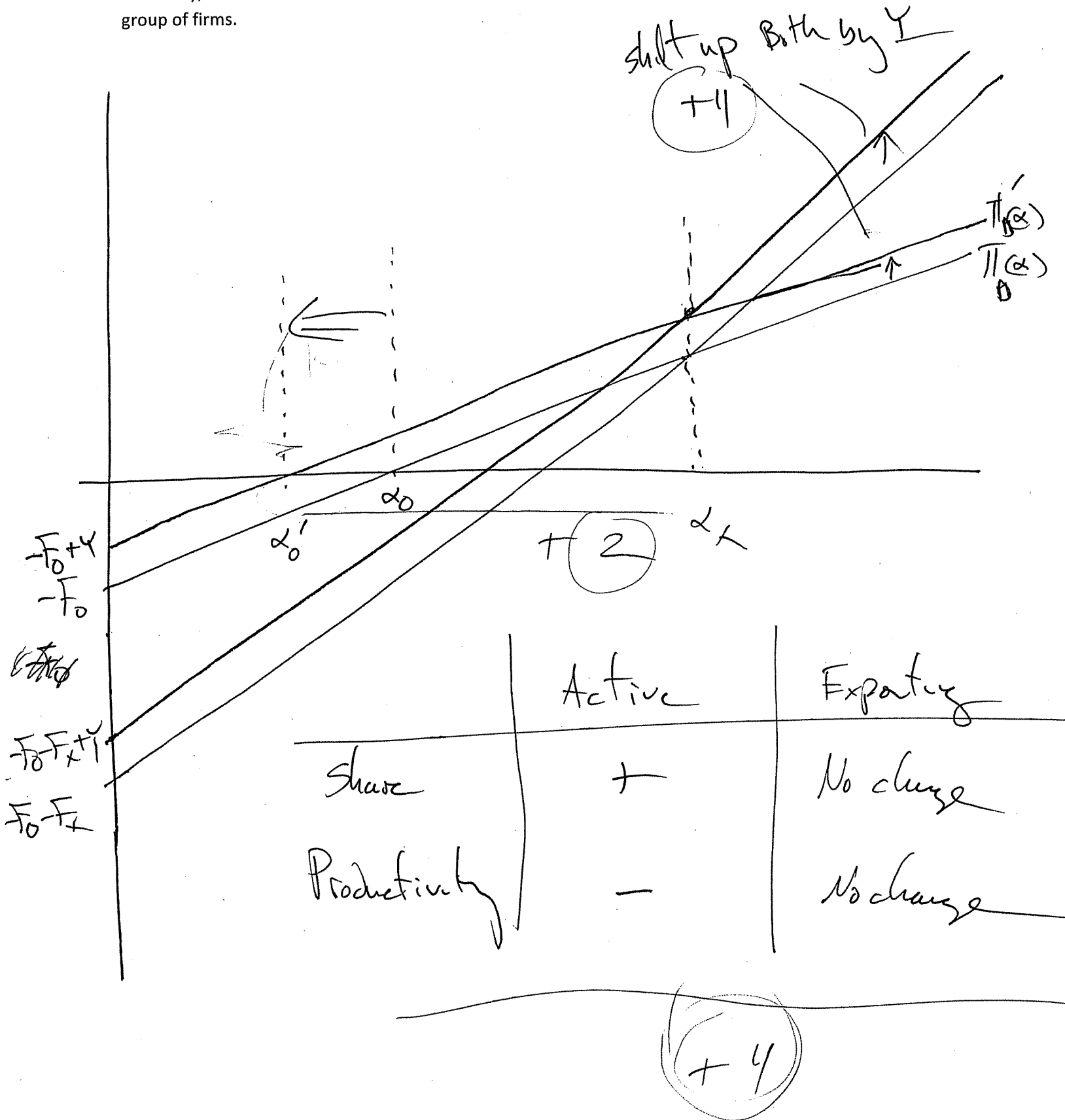

$\Pi_x(\alpha)$

Pivot

$\Pi'_x(\alpha)$

$t'\!\uparrow$

Pom $\Rightarrow$

Exit

Export

$-F_0$

α_0

α_x $\rightarrow \alpha'_x$

$+ 2\text{:}$

$-F_0 F_x$

Share of active firms does not change

	Active Firms	Exporting firms
Share	No change	—
Productivity	No change	+

$+ 4$

3. Suppose that the government in H decides that they want to uniformly subsidize the profits their home firms earn in the domestic market by a lump-sum value Y. Please detail graphically the direct effects of this change, and if any, the effect on the share of active firms and exporting firms, and the average productivity of each group of firms.

shift up Both by Y

$+4$

$\pi_x'(\alpha)$

$\pi_x(\alpha)$

$\frac{-}{f_0} + Y$

$-f_0$

α_0'

α_0

α_x

$+2$

$\frac{}{f_0 - f_x} + Y$

$f_0 - f_x$

	Active	Exporting
Share	+	No change
Productivity	−	No change

$+4$

Key

4. Suppose that Spearot Vineyard sells a $20 bottle of wine at the factory (production cost $15) that can be exported to Cruzland for $10 per bottle in shipping costs. At a delivered price of $20 in Cruzland, 100 units are sold, but sales decrease uniformly to zero as the delivered price rises from $20 to $40 (ie 90 units are sold at $22, 80 at $24, etc..). Spearot Vineyard also sells a bottle for $200 at the factory (production cost $150), which can be exported to Cruzland for $10 per bottle. At a delivered price of $200, the bottle sells 10 units, but sales decrease uniformly to zero as prices rise from $200 and $250 (ie 10 units are sold at $200, 9 at $205, etc..).

If the fixed costs of export are $300, which (if any) bottles are profitably exported to Cruzland? If there were no transport costs, how does this answer change? What have we added to this problem that complicates the value/weight discussion from class? Demand!

$$\Pi_{cheap} = (20-15)\cdot 50 - 300$$

+3

$$= 250 - 300 = -50 \quad \boxed{\text{Do not export}}$$

$$\Pi_{Expensive} = (200-150)\cdot 8 - 300$$

+3

$$= 400 - 300 = 100 \quad \boxed{\text{Export expensive bottle}}$$

No transport:

+2 $$\Pi_{cheap} = (20-15)\cdot 100 - 300 = 200$$

+2 $$\Pi_{expensive} = (200-150)\cdot 10 - 300 = 200$$

Export both.

+2 We added demand