



EC1101E:

Introduction to Economic Analysis

ACTIVE LEARNING 1.1

What to Have for Lunch

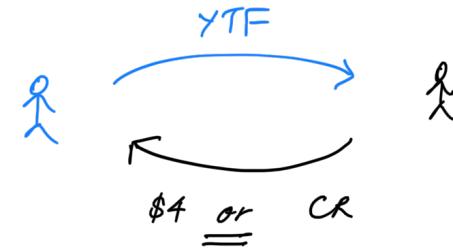
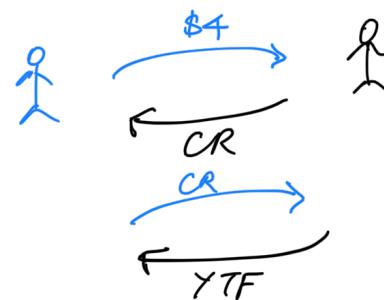
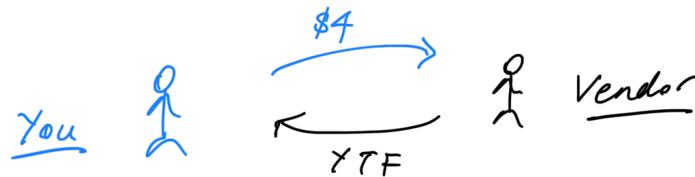
You are deciding what to have for lunch. You have two options: *yong tau foo* and chicken rice. Each option costs \$4. What is the opportunity cost of *yong tau foo*?

- A. Chicken rice. 53%.
- B. \$4. 5%.
- C. Chicken rice and \$4. 36%.
- D. None of the above. 6%.

You are deciding what to have for lunch. You have two options: yong tau foo and chicken rice. Each option costs \$4. What is the opportunity cost of yong tau foo?

Price vs. Value (Cost) (Benefit)

- YTF
- Chicken Rice
- Burger
- Pizza
- Hot dog
- Nasi lemak
- Mee goreng
- Ice-cream



ACTIVE LEARNING 1.2

Opportunity Cost of a Concert

You have won a free ticket to an Ariana Grande concert. The ticket has no resale value. Billie Eilish is performing on the same night, and is your next best alternative. Tickets to the Billie Eilish concert cost \$150, but you are willing to pay up to \$250. Assume there are no other costs to attending either concert. What is the opportunity cost of attending the Ariana Grande concert?

- A. \$0. 48%.
- B. \$50. 0%.
- C. \$100. 7%.
- D. \$150. 18%.
- E. \$250. 27%.

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$$\begin{aligned}
 \text{Opportunity cost of AG} &= \text{Explicit Cost} + \text{Implicit Cost} \\
 &= \$0 + \boxed{\text{TIME}} \\
 &\quad \left. \begin{array}{rcl} \text{Benefit} & \$250 \\ \text{Cost} & - \$150 \\ \hline \text{Net Benefit} & \$100 \end{array} \right\}
 \end{aligned}$$

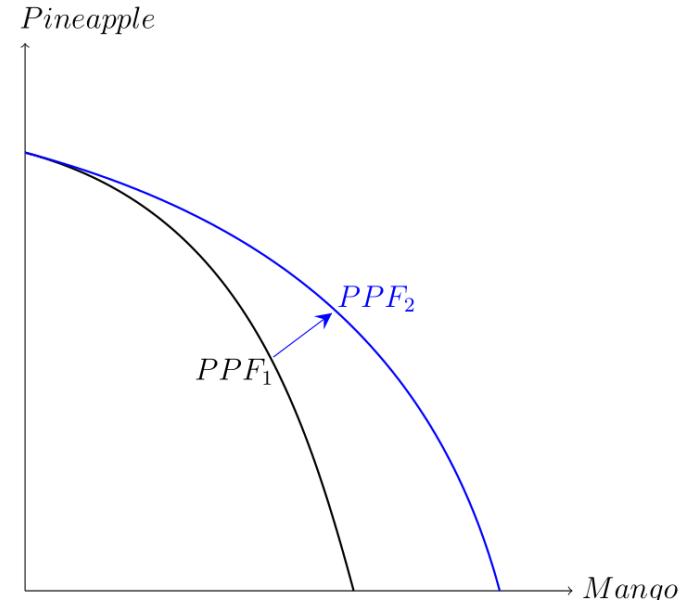
$$\begin{aligned}
 \text{Opportunity cost of YTF} &= \$4 \quad \text{OR} \quad \text{something you can buy with } \$4
 \end{aligned}$$

ACTIVE LEARNING 1.4

Production Possibilities Frontier

The shift of the PPF from PPF_1 to PPF_2 illustrates

- A. simultaneous technological advances
17% in the mango and pineapple industries.
- B. an increase in preferences for mango
10% over pineapple.
- C. a reallocation of resources away from
22% the production of pineapple and toward the production of mango.
- D. a reduction in unemployment.
81%
- E. economic growth.
43%

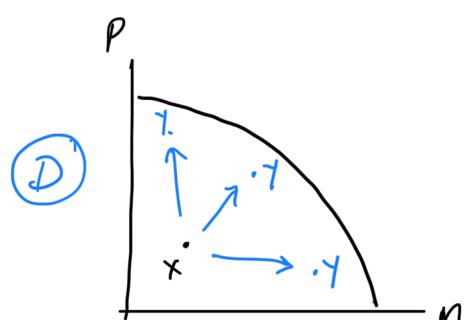
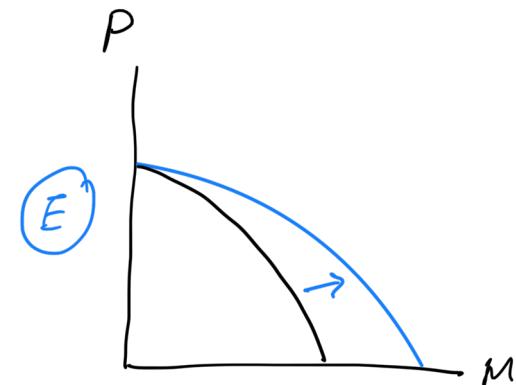
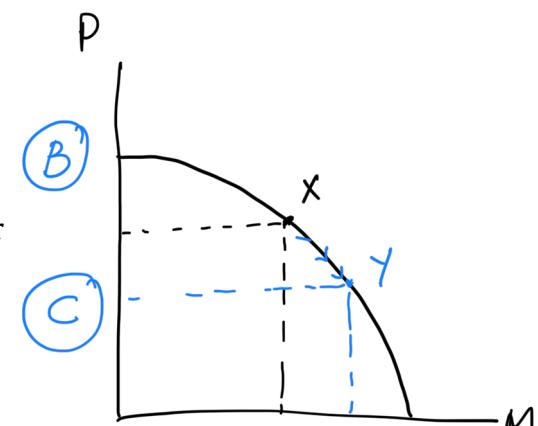
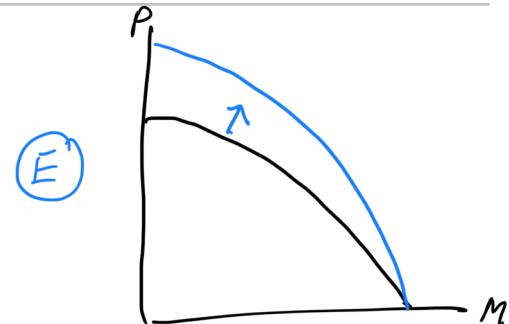
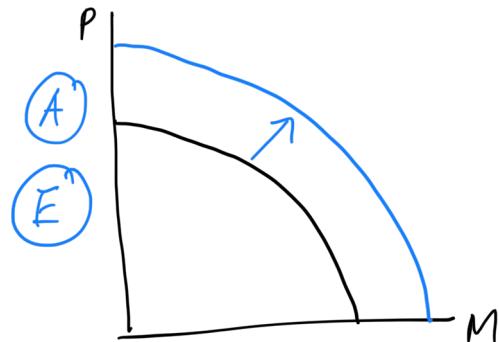


ACTIVE LEARNING 1.4

Production Possibilities Frontier

The shift of the PPF from PPF_1 to PPF_2 illustrates

- A. simultaneous technological advances in the mango and pineapple industries.
- B. an increase in preferences for mango over pineapple.
- C. a reallocation of resources away from the production of pineapple and toward the production of mango.
- D. a reduction in unemployment.
- E. economic growth.



ACTIVE LEARNING 1.8

Absolute Advantage & Comparative Advantage

Argentina and Brazil each have 10,000 hours of labor per month.

In Argentina,

- producing one pound of coffee requires 2 hours
- producing one bottle of wine requires 4 hours

In Brazil,

- producing one pound of coffee requires 1 hour
- producing one bottle of wine requires 5 hours

- A. Which country has an absolute advantage in coffee? 98%. Brazil
- B. Which country has a comparative advantage in wine? 90%. Argentina

ACTIVE LEARNING 1.8

A. Absolute Advantage in Coffee

	Argentina	Brazil
1 lb coffee	2 hrs	1 hr
1 bottle wine	4 hrs	5 hrs

ACTIVE LEARNING 1.8

B. Comparative Advantage in Wine

$$= \frac{\text{opp cost of wine}}{? \text{ coffee}} \\ / \text{ wine}$$

	Argentina	Brazil
1 lb coffee	2 hrs	1 hr
1 bottle wine	4 hrs	5 hrs

A: 1 wine \Leftrightarrow 4 hrs \Leftrightarrow 2 lbs coffee

B: 1 wine \Leftrightarrow 5 hrs \Leftrightarrow 5 lbs coffee

$$A: \frac{P}{Q} \frac{\frac{2 \text{ hrs}}{1 \text{ coffee}}}{\frac{4 \text{ hrs}}{1 \text{ wine}}} = \frac{2 \text{ hrs}}{1 \text{ coffee}} \times \frac{\frac{1}{Q}}{\frac{4 \text{ hrs}}{1 \text{ wine}}} = \frac{1 \text{ wine}}{2 \text{ coffee}} \Leftrightarrow \boxed{\frac{2 \text{ coffee}}{1 \text{ wine}}}$$

$$B: \frac{\frac{1 \text{ hr}}{1 \text{ coffee}}}{\frac{5 \text{ hrs}}{1 \text{ wine}}} = \frac{1 \text{ hr}}{1 \text{ coffee}} \times \frac{\frac{1 \text{ wine}}{Q}}{\frac{5 \text{ hrs}}{1 \text{ wine}}} = \frac{1 \text{ wine}}{5 \text{ coffee}} \Leftrightarrow \boxed{\frac{5 \text{ coffee}}{1 \text{ wine}}}$$

True vs False

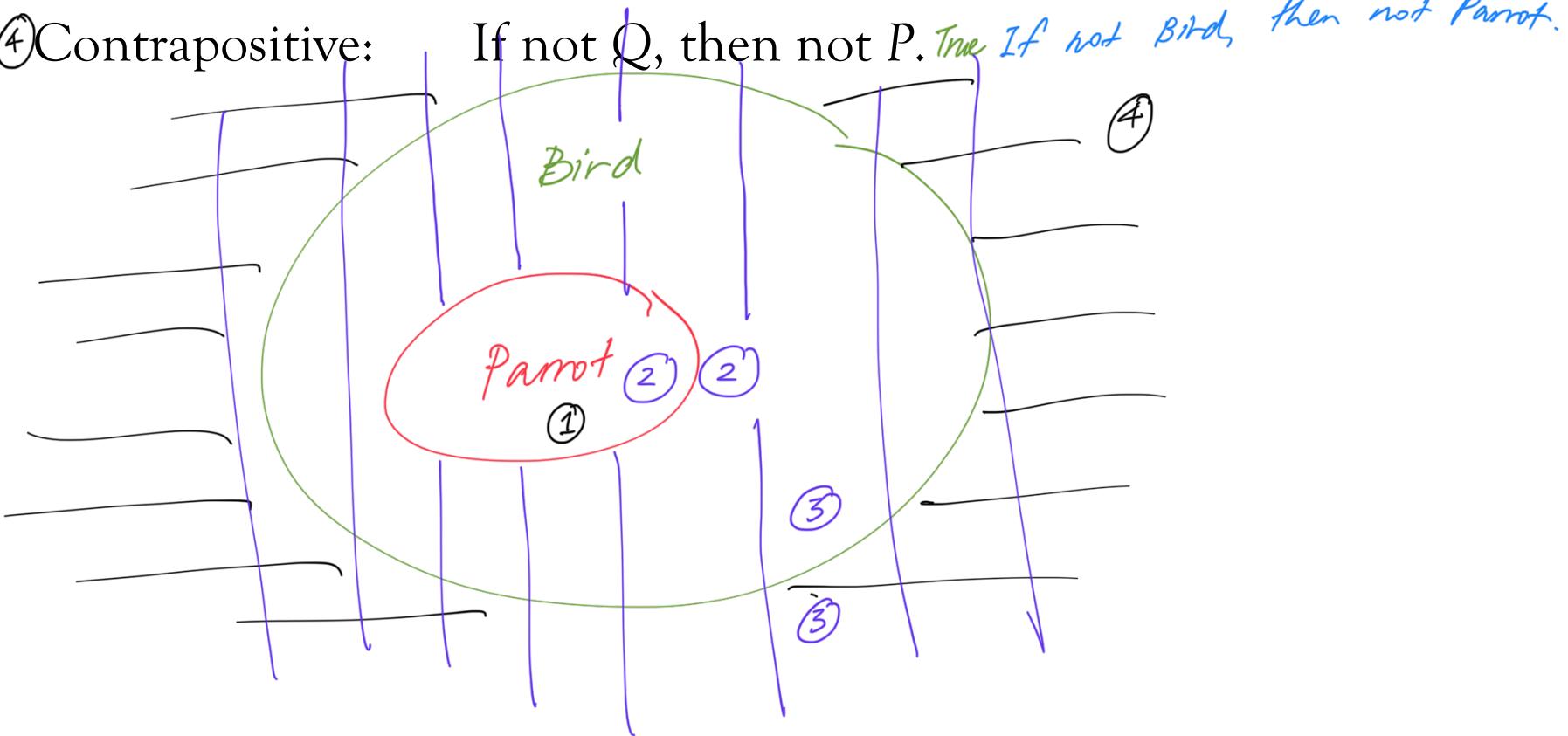
All boys are blue.

TRUE. ♂ ♂ ♂ ♂ ♂ ... all

FALSE. ♂ counterexample

Conditional Statement

- ① Statement: If P , then Q . True If Parrot, then Bird.
- ② Converse: If Q , then P . False If Bird, then Parrot.
- ③ Inverse: If not P , then not Q . False If not Parrot, then not Bird.
- ④ Contrapositive: If not Q , then not P . True If not Bird, then not Parrot.



Concept Check

There are two individuals: Chip and Dale, and two goods: tea and crumpets. Are the following statements True or False?

- If Chip has **comparative advantage** in making tea, then he must have **absolute advantage** in making tea.
- If Chip has **absolute advantage** in making tea, then he must have **comparative advantage** in making tea.
- If Chip has **absolute advantage** in making tea and Dale has **absolute advantage** in making crumpets, then Chip must have **comparative advantage** in making tea.

Concept Check Q1

- If Chip has **comparative advantage** in making tea, then he must have **absolute advantage** in making tea.

88%. FALSE

Counterexample:

Dale AA tea,

Dale AA crumpets-

Chip CA tea,

Dale CA crumpets

Concept Check Q2

- If Chip has absolute advantage in making tea, then he must have comparative advantage in making tea.

91%. FALSE

Counterexample:

Chip AA tea

Dale CA tea,

Chip AA crumpets-

Chip CA crumpets.

Concept Check Q3

- If Chip has **absolute advantage** in making tea and Dale has **absolute advantage** in making crumpets, then Chip must have **comparative advantage** in making tea.

40% TRUE, 60% FALSE

- ① One person has AA in both goods.
- ② One person has AA in tea, the other has AA in crumpets.
- ③ Nobody has AA in either good.

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- ① (a) Chip CA tea, Dale CA crumpets.
 - (b) Dale CA tea Chip CA crumpets
 - (c) Chip CA tea, Chip CA crumpets
 - (d) Dale CA tea, Dale CA crumpets
 - (e) Nobody has CA in either good.