

International Islamic University
Chittagong

Dept. of Computer Science
& Engineering

Course Code:- ECON-3501

Course Title: Economics

Submitted To:

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Lecturer

CSE, IIUC

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Semester: 6th

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Ans. to the ques. no. - 1 (a)

If the price of Macdonald's chees. burgers increases, we would expect the demand for Coca-cola to decrease. The reason is—

The definition of demands is—

- a) Desire to get any commodity
- b) Ability to get the commodity
- c) Desire to spend money for bringing commodity.

From the definition, we realize that if price increases, demand decreases. So, if price of Macdonald's burgers increases, its demand will be decreased. On the other hand, many people drink Coca-cola when they

eat Macdonald's cheese burgers,
So, people don't want to
spend extra money for
Coca-cola without eating
macdonald's burger. As
a result demand of coa-
cola also decreases.

From elasticity demand rule,

$$E_f = \frac{\text{Percentage change in quantity demand}}{\text{Percentage change in price}}$$

Ans. to the ques. no. - 1(b)

When the price of product increases, supply increases but demand decreases. When supply and demand is in equilibrium:-

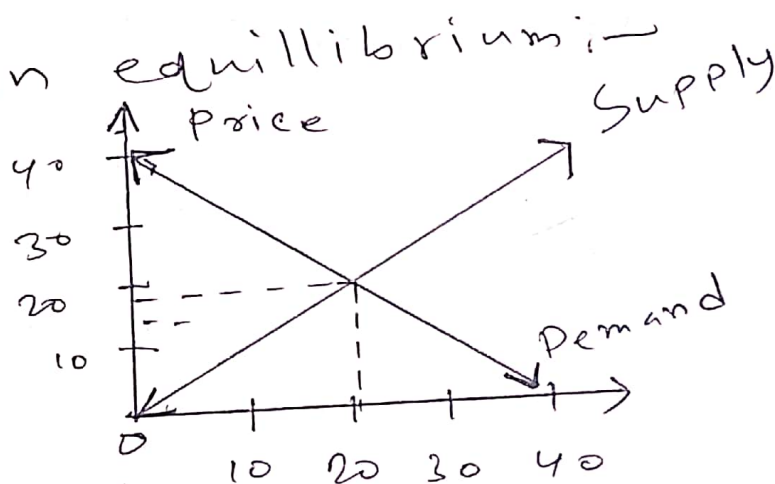


Fig: Supply and demand curve.

If, supply curve shift left and demand increases, it will be:-

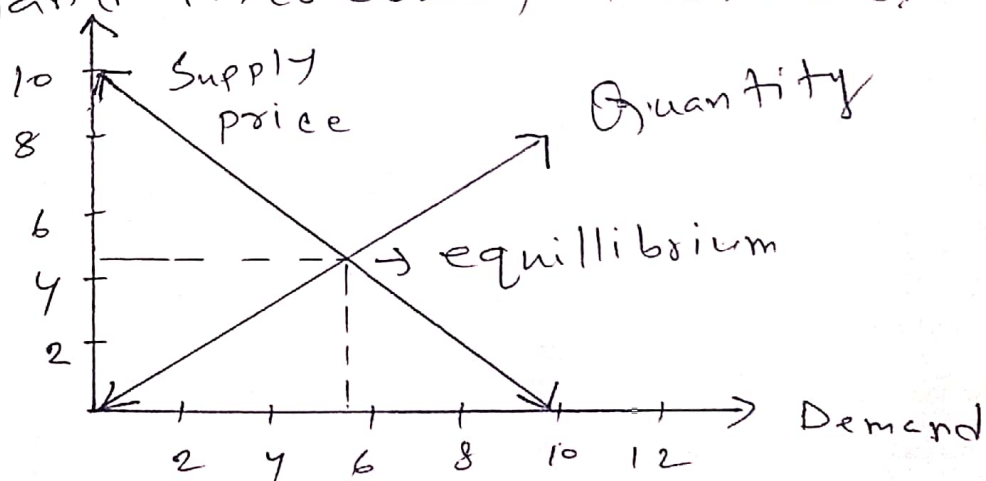


Fig: Equilibrium of Price and quantity

⇒ If price increases, supply increases.

⇒ If price increases, demand decreases.

Ans. to the ques. no. - I(c)

Let,

supply function, $Q_s = y + zp$

Demand function, $Q_d = w - xp$

The equilibrium curve

is :-

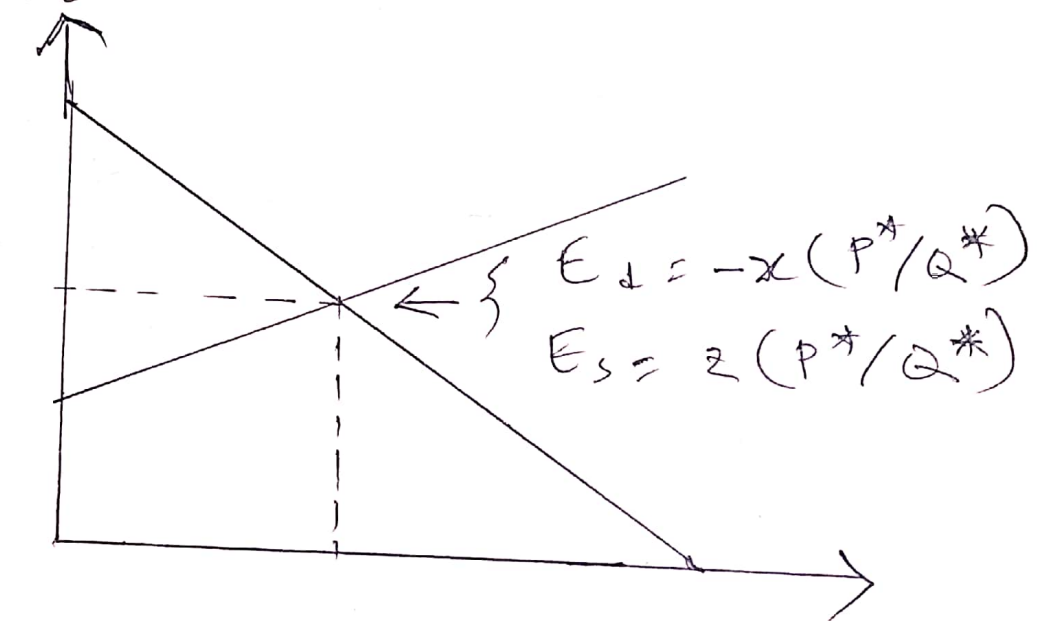


Fig: Supply and demand
curve in equilibrium

Ans. to the ques. no. - 2(a)

"Economics enquires into the nature and causes of wealth of nations": -

‘An inquiry into the Nature and causes of the wealth of Nations’ ^{was} ~~was~~ written by Adam Smith. Means, it was an attempt at understanding the reasons behind the economic growth of a nation. An interesting backdrop to consider here the fundamental assumption that we need to make for the whole economic system to work is that human beings are motivated by pure self-interest and will take decisions that they

think will make them
"better off" now or sometime
in the future.

Real-life example: Money

is an important factor of
economics. People ~~spending~~^{spending}
money to buy something,
and government get
tax. The tax is again
distributed in different
sectors of country and
in various development
projects. If people expend
money such way that
no tax is charged, then
many development projects will
be hampered. So, I ~~am~~
agree with the statement
which is illustrated on question.

Ans. to the ques. no. - 2(b)

The circular flow model
of economic activity.

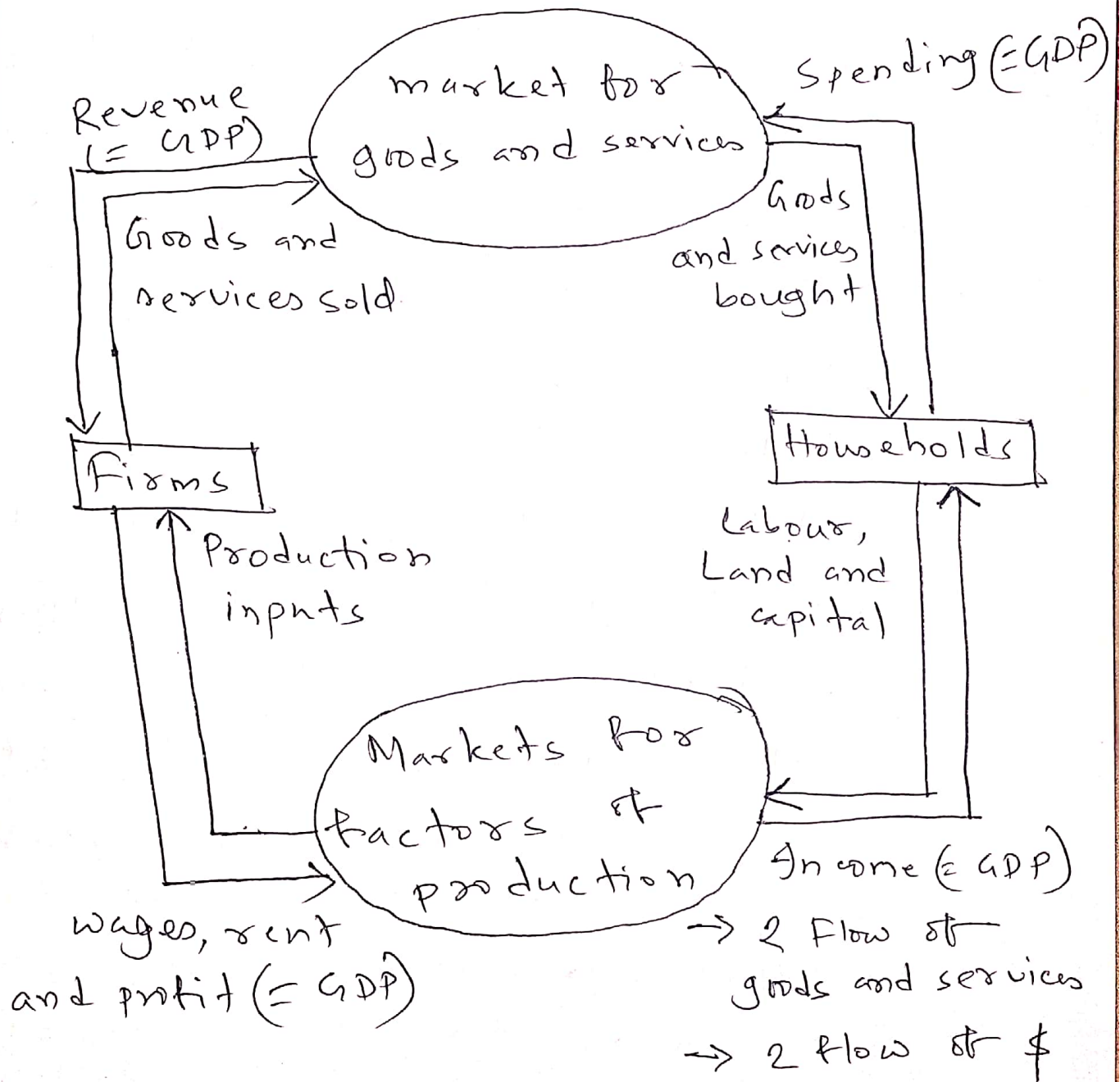


Fig: Circular Flow Diagram

Ans. to the ques. no. - 2(c)

"Economics is the distribute scarce resource to different group of society" -

Economics is the study of how society allocates scarce resources and goods. Resource are inputs that society uses to produce output, called goods. Resource include inputs such as labour, capital, and land. Goods include products such as food, clothing and houses as well as services such as those provided by barbers, doctors, police officers. This resources and goods are considered scarce because of society's tendency. One means by which society allocates scarce resources and goods is the market system.

Ans. to the ques. no. - 3(a)

(i) My student id is C181029

$$D_A = 29 - P_A - 2P_B$$

$$D_B = 6 - P_A - P_B$$

$$S_A = -3 + P_A + P_B$$

$$S_B = -2 + P_B$$

We know, demand and supply for a product are same in equilibrium condition.

So,

$$D_A = S_A$$

$$\text{or, } 29 - P_A - 2P_B = -3 + P_A + P_B$$

$$\text{or, } -2P_A - 3P_B + 32 = 0$$

$$\text{or, } 2P_A + 3P_B - 32 = 0 \quad \text{--- (i)}$$

$$\text{Again, } D_B = S_B$$

$$\text{or, } 6 - P_A - P_B = -2 + P_B$$

$$\text{or, } -P_A - 2P_B + 8 = 0$$

$$\text{or, } P_A + 2P_B = 8$$

$$\therefore P_A = 8 - 2P_B \quad \text{--- (ii)}$$

Putting the value of P_A in eqⁿ (i) \Rightarrow

$$2(8 - 2P_B) + 3P_B - 32 = 0$$

$$\text{or, } 16 - 4P_B + 3P_B - 32 = 0$$

$$\text{or, } -P_B - 16 = 0$$

$$\text{or, } P_B + 16 = 0$$

$$\therefore P_B = -16$$

Putting the value of P_B in eqⁿ (ii) \Rightarrow

$$P_A = 8 - 2(-16)$$

$$= 8 + 32$$

$$= 40$$

$$\therefore P_A = 40 \text{ and } P_B = -16$$

(ii)

$$Q_{DA} = 29 - P_A - 2P_B$$

$$= 29 - 40 - 2(-16)$$

$$= 29 - 40 + 32$$

$$= 21$$

$$Q_{DB} = 6 - P_A - P_B$$

$$= 6 - 40 - (-16)$$

$$= -18$$

$$\therefore Q_{DA} = 21 \text{ and } Q_{DB} = -18$$

Ans. to the ques. no. - 3 (b)

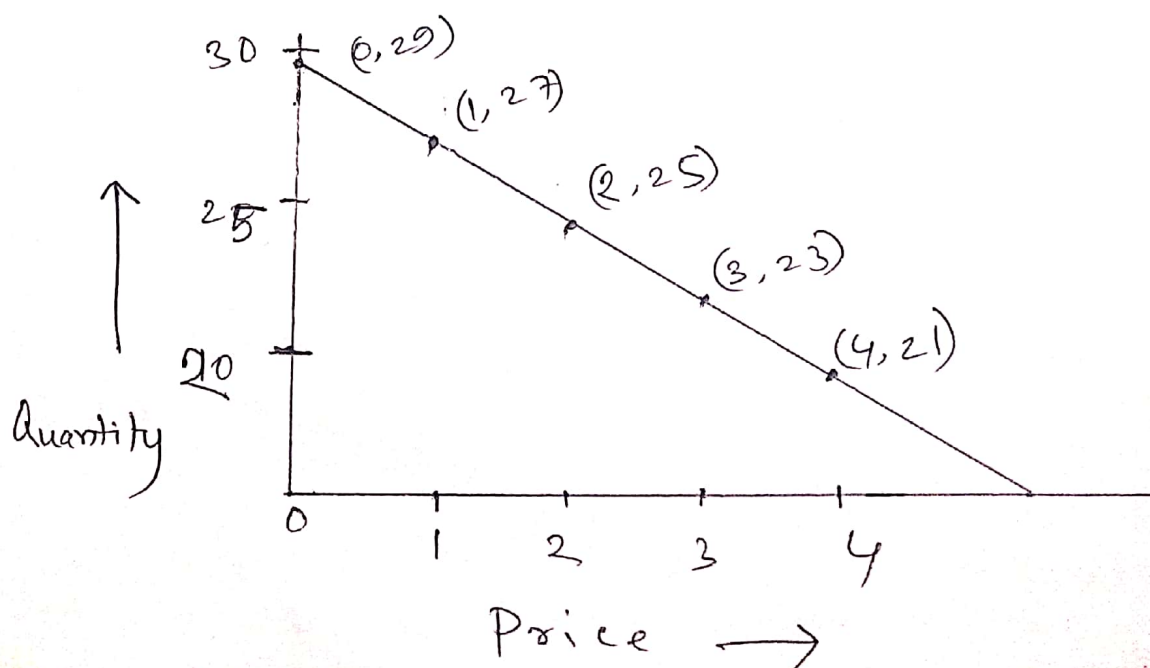
ID: C181029

Last two digits of id = 29

$$\therefore Q_d = 29 - 2P$$

Price	Demand function	Quantity demand
0	$29 - 2(0)$	29
1	$29 - 2(1)$	27
2	$29 - 2(2)$	25
3	$29 - 2(3)$	23
4	$29 - 2(4)$	21

The demand curve is below for this data:-





Admit Card (Mid Term)

Session : Autumn-2020

ID No. : C181029

Semester Enrld: 6

Program : Bachelor of Science in Computer Science and Engineering

Name : Mahbubul Hasan

Father's Name : Hafez Kamal Uddin

Mother's Name : Afroza Begum

Section : Male

Validity: Mid Term Exam

Registered Courses : CSE-3525, CSE-3632, CSE-3636, CSE-3638, ECON-3501, CSE-3631, CSE-3635, CSE-3637, CSE-3640, URED-3604



Print Date: 2021-03-06

(Mohammad Zabedur Rahman)
Controller of Examinations

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1. Admit card & ID card are a must to sit for the examination
2. Students are not allowed to enter the Examination hall 15 (fifteen) minutes from the commencement of the examination.
3. No student is allowed to leave the Examination hall until the expiration of the first hour.
4. ID Number, Course Code, Course Title etc should be written in the given space correctly and clearly.
5. ID number should be written in words (Example: C071002 C-Zero-Seven-One-Zero-Zero-Two)
6. Mobile phone/wrist watch/unauthorized calculator are not to be carried in the Examination Hall.
7. Anything found written on the desk, table or wall before commencement of the exam should be erased or brought to the notice of the invigilators by the student immediately.
8. Any form of unfair means or misbehavior or keeping unauthorized paper/material will be treated as serious offense and it might lead to the maximum penalty of expulsion from the university.
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