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An Economic Study of Consumer Expenditure Patterns on The Most important of Food Commodities Groups during Inflation in Urban and Rural Egypt

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Abstract: The main objective of this research is to identify the food consumption expenditure patterns on the most important of food commodities groups in urban and rural Egypt during the prevailing inflation rates in national economy, and the study appeared the most important results which were: (1) The percentage of individual expenditure on food and beverages of total consumption expenditure on commodities during 2017/2018, 2019/2020 decreased from (35.01%, 42.88%) to (28.31%, 36.39%) in both of urban and rural Egypt. And this result was considered as extension of the negative impact of Egyptian pound floatation at the end of 2016, In addition to Corona pandemic spreading in the end of 2019 and the consequent decreasing of wages. (2)The elasticity of expenditure on meat in 2019/2020 increased from its counterpart in 2017/2018 as a result of the economic and social changes which led to decreasing income. (3)The necessity goods turned to inferior goods at the following food groups: dairy, cheese and eggs, vegetables group, cereals and bread group where the elasticity became negative, at highest income levels. (4)working lesser model showed that the poor people has highest elasticity, that means these individuals hadn't reach to their satisfaction of food commodities groups under study ,and some of necessity goods became luxury goods like dairy ,cheese and eggs and meat groups which acquires the largest share of expenditure. But vice versa, highest income levels have lowest elasticity, which means these individuals achieved their satisfaction of commodities groups under study, and some of necessity goods were considered luxury goods like dairy, cheese and eggs and vegetables, cereals and bread groups as inferior goods where they have negative elasticity. (5) the study recommended that decision-makers and officials should reduce the income gap between the individuals of the low-income group and the poverty line and providing monthly benefits To keep pace with the successive rise in the prices of food commodities and obtain their main needs.
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Introduction:

Changes in individual incomes are considered one of the main factors affecting on consumption pattern of different commodity groups, and this effect differs from one commodity to another according to the importance and preference of this commodity compared to other commodities, generally, the individual shows rational behavior while satisfying his needs when he works to reach the maximum benefit within his limited resources, Engel concluded that the percentage of food expenditure increases as a household's income decreases with other factors are constant(3).

And with an unprecedented rise in prices and in addition to presence of high inflation rates in Egypt, which amounted to about 31.9%(5) in 2023 which had negatively affect individual incomes, especially for individuals has low incomes, and then effect on individual behavior in spending on consumption of commodities, especially food which is considered one of the most basic needs.

Therefore, this research was concerned with studying the personal consumption expenditure pattern on the most important food groups represented in the following groups: meat, dairy and cheese, vegetables, grains and bread, where these groups together represent about two-thirds of per capita spending on food and drink in the rural and urban areas in Egypt, according to income, expenditure and consumption data survey in 2020, taking into consideration the inflation rate.

Research problem:

There is a large gap between the minimum individual's income to obtain his basic needs, which is known as the value of poverty line, and his actually income .Where it was found that the average per capita income in the lowest income group is about 2610 L.E and about 4120L.E in both rural and urban areas in Egypt, respectively, while the value of poverty line was estimated about 9650L.E annually, at 805L.E per month(4). In spite of diminishing this value, there is a category of individuals who can't obtain this income, As a result it affects on the individual consumption expenditure

patterns on the most important groups of food commodities.

The research objectives:

The main objective of this study is economic study of consumer expenditure patterns on the most important food groups in urban and rural Egypt, with presence of prevailing inflation in the national economy, by studying the following topics:

(1) Studying the relative importance of annual individual expenditure of the most important food and beverages groups of total individual's consumer expenditure in urban and rural Egypt.
(2) Studying the relative importance of annual individual expenditure of the most important food groups of total individual's consumer expenditure in urban and rural Egypt.
(3) Estimation of the consumption expenditure elasticities functions of the most important food expenditure groups in urban and rural Egypt.
(4) Estimation of the future poverty line value with presence of prevailing inflation rate.

Study methodology:

The study is based on regression model, Working Lesser model is one of the Angel curves and it can be explained in the following relationship:

Wi = a + b Ln Xi

Where,

Wi = the share of food consumer expenditure per capita, which is equal to the quotient of the value of expenditure on food group /total consumer expenditure per capita.

i = Income levels.

X = income per capita at category i

Where this model shows the impact of individual income on the proportion of commodity expenditure, and to depend this model, it must be valid for estimation in logical terms of economic and econometric aspects, by making sure that the model is free from econometric problems such as the auto-correlation between residuals ,its homoscedasticity, has normally distributed data in the model, through econometric tests t such as unit root test to ensure the absence of first-order auto-correlation, the white test to ensure the homoscedasticity in residual's model, and the Jarko-Bera test to ensure the normal distribution of these residuals, also to ensure its validity from a statistical aspect. Where the statistical significance of the model parameters and the overall test of model must be proven.

According to the Working model, elasticity of expenditure can be calculated through the following equation:

$E_i = 1 + (b/W_i)$

Through **b** sign It can be defined the classification of food commodity as necessity goods (elasticity less than 1), luxury (Veblen) goods (positive elasticity), inferior goods (negative elasticity), from the previous the value of expenditure elasticity of good decreases whenever the proportion of expenditure on it decreases (),**on the other hand** when the value of expenditure elasticity of commodity increases, the percentage of expenditure decreases if the absolute value of the amount (b/Wi) is greater than One, the commodity is inferior, while the luxury good when (b/wi) absolute value is positive[(8)].

Previous studies indicate that the Working model gives excellent results with household surveys, especially with food commodities data, as it was found that the decreasing proportion of food expenditure by arithmetic sequence with income increasing by geometric sequence. The Working model constitutes the main basic for the semi-ideal demand model because of its advantages, If prices are constant for all households, the near-ideal demand model is expressed by the working model [(8)].

Data sources:

This study is depend on data published in the Central Agency for Public Mobilization and Statistics (CAPMAS) especially income, expenditure and consumption survey in 2017/2018 , 2019/2020.

Research Results:

First The percentage of annual individual expenditure on food and Beverages group of total consumption expenditure per capita on commodities groups in urban and rural Egypt in 2017/2018, 2019/2020. Table (1) **and figure (1)** show**,** that:

Although increasing The individual expenditure for food and beverages from 4910L.E, to 5060L.E the percentage of individual expenditure for food and beverages of total expenditure on consumer goods decreased from about 35.01% to about 28.31% in **urban** regions in 2017/2018, 2019/2020 respectively**.** And also it increased from about 4300L.E, 4520L.E, while the percentage of individual expenditure for food and beverages of total expenditure on consumer goods decreased from about 42.88% to about 36.39% in **rural** regions in 2017/2018, 20192020 respectively**.**

This decline reflects the impact of many economic and social factors that led to this decline, the most important factors are the extension of the negative impact of Egyptian pound flotation at the end of 2016, and the consequent noticeable price rising of consumer goods especially food commodities, which led individuals to dispense with Part of their needs from consumer goods, including food commodities to adapt high prices; In addition to Corona pandemic spreading in the end of 2019, and Precautionary measures followed it ,which led to decreasing of labor demand as a result of the partial cessation of most economic activities and the consequent low wages, so most of households dispensed with some of their needs for adaptation their income deficit, which led to decreasing the

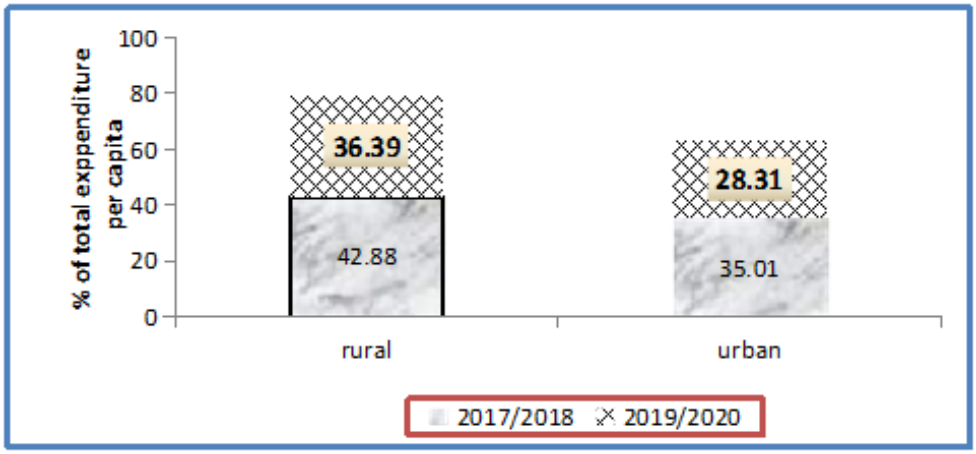
percentage expenditure on food and beverages between 2017/2018, 2019/2020.

This table also shows that a difference of food and beverages expenditure for rural and urban regions because of the difference between individuals consumption behavior patterns between rural and urban regions in 2017/2018, 2019/2020.

Table (1): The percentage of annual individual expenditure on food and Beverages group of total consumption expenditure per capita on commodities groups in urban and rural Egypt in 2017/2018, 2019/2020..

year	Total consumer expenditure per capita (L.E)		individual expenditure for food and beverages			
			Expenditure value (L.E)		% of annual individual expenditure	
	urban	rural	urban	rural	urban	rural
2017/2018	1004	1402	4910	4300	35.01	42.88
2019/2020	1242	1786	5060	4520	28.31	36.39

Source: Collected and counted from: Central Agency for Public Mobilization and Statistics (CAPMAS) - income, expenditure an
d consumption survey in 2017/2018 , 2019/2020.



Figure(1): The percentage of annual individual expenditure on food and Beverages group of total consumption expenditure per capita on commodities groups in urban and rural Egypt in 2017/2018, 2019/2020.

Source: Table (1).

Second the relative importance of annual individual expenditure on the most mainly food groups of total food and beverages expenditure in rural and urban regions in Egypt:

It appeared **Table (2) and figure (2), figure (3) that** the annual percentage expenditure per capita on nutrition groups of total expenditure on food and beverages through 2017/2018, 2019/2020 in both of urban and rural in Egypt. The study focused on four nutrition groups are meat, dairy, cheese and egg, vegetables, cereals and bread, which represented about two third of total food and beverages expenditure in both of Egyptian rural and urban regions in 2019/2020.and **the results indicates that** :

(1) The share of total annual individual's expenditure spent on **meat** of total annual expenditure per capita on food and beverages group **in urban** ranks **1st** where the annual expenditure's value per capita on the meat group it represented about 28.21%, 26.77%. Which it reached about 1390, and 1354 L.E for each of the two years in Egypt respectively. While **in rural** Egypt, the annual expenditure's value per capita on representing of total annual expenditure per capita on food and beverages about 27.4%, 25.48%. it was 1180L.E, 1152L.E in both of 2017/2018, 2019/2020 respectively**. It should be noted** that their share of total annual expenditure per capita on meat decreased in 2019/2020 compared with 2017/2018 in both urban and rural regions.

(2) The share of total individual's expenditure spent on **dairy, cheese and eggs** group of total expenditure per capita on food and beverages group **in urban** ranked **2nd** in 2017/2018, representing about 14.44 % which it was about 710 L.E but it became **3rd** in 2019/2020 representing about 14.24% where it was 720 L.E. While **in rural** Egypt The share of total individual's expenditure spent on **dairy, cheese and eggs** group of total expenditure per capita on food and beverages group ranked **4th** in both of 2017/2018, 2019/2020 representing about 10.38%, 11.94%, It was 470L.E, 540L.E in both of 2017/2018, 2019/2020 respectively**.**

(3) The share of total individual's expenditure spent on **vegetables** group of total expenditure per

capita on food and beverages group **in urban** Egypt ranked **3rd** in 2017/2018 representing about 13.34% which it was 660L.E, but it became **2nd** in 2019/2020 represented about 15.03%. Where it was about 760 L.E. While **in rural** Egypt The share of total individual's expenditure spent on vegetables group of total expenditure per capita on food and beverages group ranked **2nd** in both of 2017/2018, 2019/2020 representing about 14.94 % which it was about 640 L.E in 2017/2018 While representing about 17.16% it was about 776 L.E in 2019/2020.

Table (2): The relative importance of annual individual expenditure on the most mainly food groups of total food and beverages expenditure rural and urban regions in Egypt in 2017/2018, 2019/2020.

food and beverages groups	2017/2018				2019/2020			
	Expenditure value (L.E)		% of expenditure on food groups		Expenditure value (L.E)		% of expenditure on food groups	
	urban	rural	urban	rural	urban	rural	urban	rural
meat	1390	1180	28.21	27.4	1354	1152	26.77	25.48
dairy, cheese, eggs	710	470	14.44	10.83	720	540	14.24	11.94
Vegetables	660	640	13.34	14.94	760	776	15.03	17.16
Cereals, bread	600	580	12.26	13.57	675	629	13.35	13.91
Oil, fats	390	410	8.01	9.57	359	387	7.10	8.56
Fish	340	270	6.89	6.37	333	283	6.58	6.26
Sugar	240	260	4.79	6.02	225	234	4.45	5.17
Fruits	280	240	5.66	5.65	280	254	5.54	5.62
Non-alcoholic beverages	100	90	2.10	2.07	120	102	2.37	2.26
Other	210	150	4.36	3.58	231	165	4.57	3.65
Total	4910	4300	100	100	5060	4520	100	100

Source: Collected and counted from: Central Agency for Public Mobilization and Statistics (CAPMAS) - income, expenditure and consumption survey in 2017/2018 , 2019/2020.

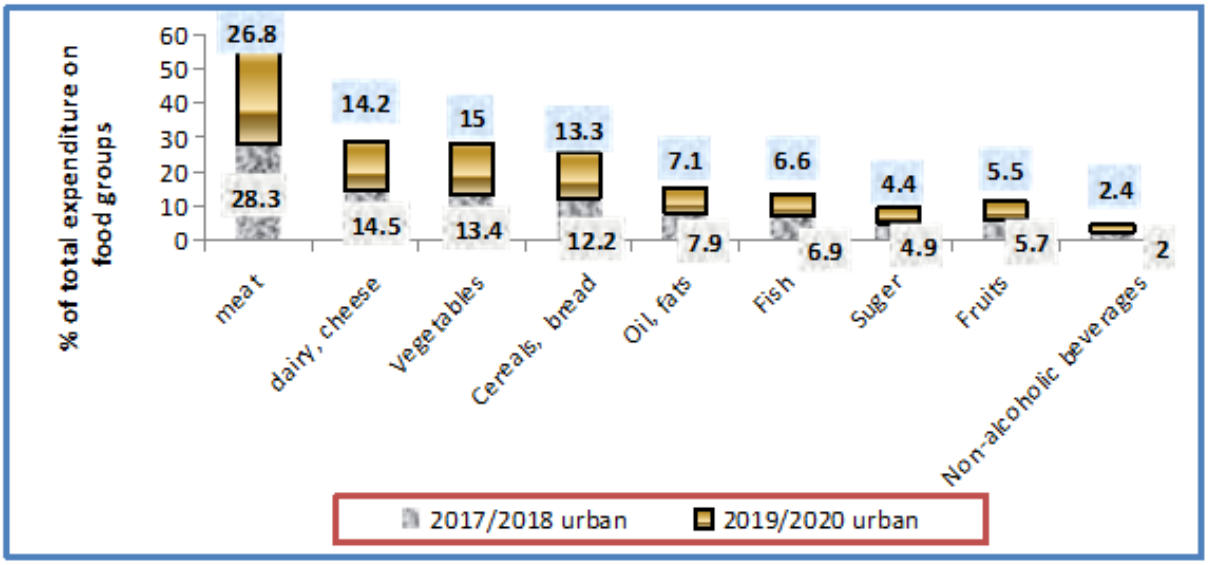


Figure (2): The percentage of annual individual expenditure on the most mainly food groups of total food and beverages expenditure in urban Egypt in 2017/2018, 2019/2020.
Source: Table (2).

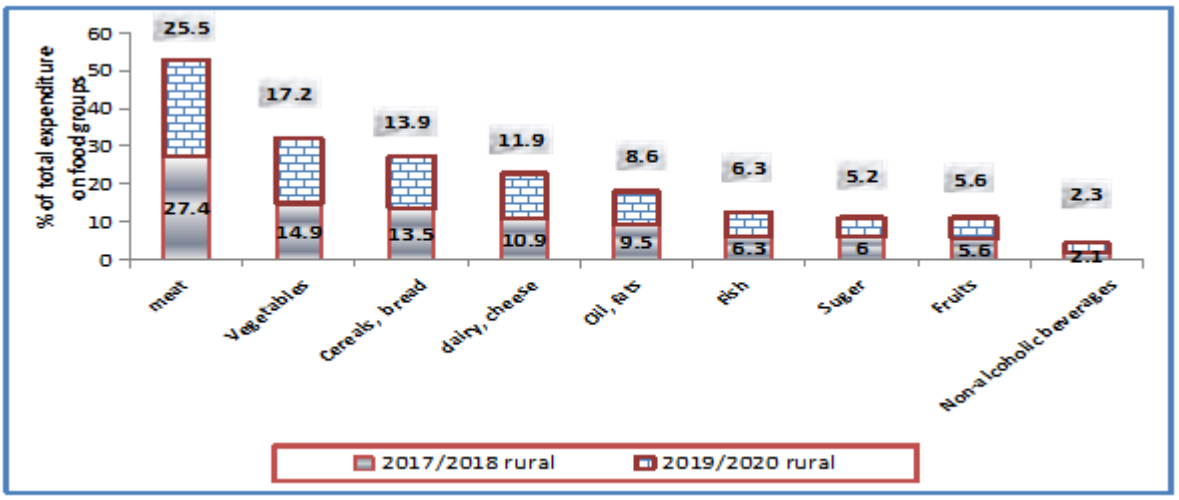


Figure (3): The percentage of annual individual expenditure on the most mainly food groups of total food and beverages expenditure in rural Egypt in 2017/2018 , 2019/2020.

Source: Table(2).

(4)The share of total individual's expenditure spent on **cereals and bread** group of total expenditure per capita on food and beverages group **in urban** ranked **4th** in both of 2017/2018,2019/2020 representing about 12.26%, 13.35% which reached about 600L.E, 675L.E for each of the two years in Egypt respectively. While in **rural** Egypt, The share of total individual's expenditure spent on **cereals and bread** group of total expenditure per capita on food and beverages group ranked **3rd** in both of 2017/2018, 2019/2020, it increased from 13.57% to 13.91% they were 580L.E, 629L.E for each of the two years in Egypt respectively.

(5) The annual percentage individual expenditure in **urban** regions for the following groups : oil and fats, fish, fruits, sugar, non-alcoholic were estimated about 8.01%, 6.89%, 5.66%, 4.79%, 2.10% of total annual expenditure per capita on food and beverage as 390L.E, 340L.E, 240L.E, 280L.E, 100L.E respectively in 2017/2018. while there were estimated about 7.10%, 6.58%, 4,45%, 5.54%, 2.37% of total expenditure per capita on food and beverages as 359L.E, 333L.E, 225L.E, 280L.E, 120L.E respectively in 2019/2020.

(6)While The annual percentage individual expenditure in **rural** regions for the following groups: oil and fats, fish, sugar, fruits, non-alcoholic beverages groups were estimated about 9.57%, 6.37%, 6.02%, 5.65%, 2.07% of total annual expenditure per capita on food and beverages as 410L.E, 270L.E, 260L.E, 240L.E, 90L.E respectively in 2017/2018. While there were estimated about 8.56%, 6.26%, 5.62%, 5.17%, 2.26% of total annual expenditure per capita on food and beverages as 387L.E, 283L.E, 254L.E, 234L.E, 102L.E respectively in 2019/2020.

From the previous results it was appeared that the consumption pattern of individuals and the annual percentage individual expenditure on some of food groups differed between **two years of study** in urban Egypt. This may be due to the high prices witnessed during the study period, which led to a decrease in the really incomes of individuals who are trying to satisfy more basic needs.

And also it was showed that the consumption pattern of individuals different between **urban** and **rural** Egypt in two years of study.

Third Estimating the consumption expenditure functions and expenditure elasticities of the most important main food expenditure groups in urban and rural Egypt:

This part discussed the changes of expenditure rates of the most important food groups which due to changes in income per capita in (2017/2018), (2019/2020), and its represented in each of: meat, dairy and cheese, vegetables, cereals and bread through the following table which shows the estimation of consumption expenditure functions and expenditure elasticities of those groups by using Engel curve through Working model for both urban and rural regions.

Where the functional relationship was estimated between the percentage of individual expenditure on goods under study as dependent variable (W_i), and the natural logarithm of average per capita income as independent variable (Ln X_i), at the different expenditure levels.

(1) Estimating the consumption expenditure functions of meat group in urban and rural in Egypt:

(a) Estimating the consumption expenditure functions of meat group in urban Egypt :

The results in **table (3)** showed that the percentage of annual expenditure per capita on **meat**

decreased from about 12% to about 5.5% with increasing income per capita from 5.38 thousand L.E to 100.57 thousands L.E in **2017/2018**. And also the percentage of expenditures on meat decreased from about 18.1% to about 2% by increasing income per capita from 8.43 thousands L.E to 303.79 thousands L.E in **2019/2020**.

And **the equation (1), (2)** in table (4) illustrate the change of income per capita by 10% leads to a reverse change of the percentage of expenditure on meat by about 0.24 and 0.25 in 2017/2018, 2019/2020 respectively.

It was shown from **table (5)** that meat's expenditure elasticity was ranged between 0.51 at highest income levels, 0.78 (at lowest income levels) in 2017/2018. While it was ranged between 0.40 at highest income levels, 0.84 at lowest income levels in 2019/2020. The result obtained that poor people are more responsive to changes in income levels.

(b) Estimating the consumption expenditure functions of meat group in rural Egypt:

The results in **table (3)** showed the percentage of annual expenditure per capita on **meat** decreased from about 28% to about 6.9% with increasing income per capita from 6.62 thousands L.E to 67.98 thousands L.E in **2017/2018**. And also the percentage of expenditures on meat decreased from about 21.6% to about 4.2% by increasing income per capita from 4.12 thousands L.E to 65.64 thousands L.E in **2019/2020**.

And through **the equation (3), (4)** from **Table (4)** illustrate a change of income per capita by 10% leads to a reverse change of percentage of expenditure on meat group by about 0.4 and 0.35 in 2017/2018, 2019/2020 respectively.

It was shown from **Table (5)** that meat's expenditure elasticity was ranged between (0.42 at highest income levels – 0.86 at lowest income levels) in 2017/2018. While it was ranged between 0.18 (at highest income levels), 0.84 (at lowest income levels) in 2019/2020. The result obtained that poor people are more responsive to changes in income levels.

It is shown from previous results that meat is a semi-necessity good at all income levels in both of rural and urban regions, on the other hand this commodity group was close to be luxury good at the poorest people, because its high prices, which cause erosion in a large amount of individuals income of these levels, and therefore it was found that the expenditure elasticity of meat has increased in 2019/2020 compared with 2017/2018, and also the reverse relationship in working model and elasticity values are consistent with Engel's laws, which said "the percentage of food commodities expenditure decreases by increasing individuals income level[8],[10].

Table (3): The ratio of per capita expenditure on the meat group in urban and rural area in Egypt for the different levels of household income during (2017/2018), (2019/2020).

Levels of household income (L.E)	2017/2018				2019/2020			
	urban		rural		urban		rural	
	per capita (1000L.E)	ratio of expenditure on meat	per capita (1000L.E)	ratio of expenditure on meat	per capita (1000L.E)	ratio of expenditure on meat	per capita (1000L.E)	ratio of expenditure on meat
-10000	5.38	0.120	6.62	0.281	2.61	0.156	4.12	0.216
10000-	9.39	0.120	7.99	0.15	11.18	0.109	9.90	0.119
20000-	9.33	0.115	8.04	0.132	10.01	0.092	11.57	0.109
25000-	9.79	0.114	8.07	0.131	10.50	0.147	10.76	0.112
30000-	9.45	0.109	8.38	0.124	11.36	0.094	10.16	0.106
35000-	9.99	0.108	8.81	0.119	9.97	0.092	10.24	0.103
40000-	11.00	0.105	9.47	0.121	11.97	0.09	11.04	0.100
45000-	11.54	0.108	10.46	0.117	12.51	0.085	11.36	0.100
50000-	12.45	0.106	10.78	0.116	13.43	0.082	11.88	0.094
55000-	13.29	0.105	11.56	0.118	14.48	0.09	12.89	0.093
60000-	14.54	0.108	12.31	0.115	12.67	0.085	13.27	0.092
65000-	15.69	0.107	13.39	0.116	15.55	0.086	14.30	0.091
70000-	17.71	0.100	14.41	0.115	17.38	0.083	15.67	0.089
80000-	19.39	0.103	15.95	0.113	19.39	0.08	16.70	0.089
90000-	21.30	0.091	17.54	0.1	21.26	0.08	18.98	0.085
100000-	26.23	0.093	20.22	0.111	4.28	0.075	20.48	0.086
120000-	29.94	0.083	25.28	0.103	30.36	0.071	26.52	0.072
150000-	41.10	0.075	29.53	0.093	38.73	0.065	32.68	0.07
200000-	100.57	0.055	67.98	0.069	91.34	0.042	65.64	0.042

Source: Collected and counted from:

(1) Central Agency for Public Mobilization and Statistics (CAPMAS**) income, expenditure and consumption survey** in 2017/2018, 2019/2020.

(2) Data in table (1), (2) in supplement

Table (4): Results of the statistical analysis of the Working Model Estimating the consumption expenditure functions of meat group in urban and rural in Egypt during (2017/2018), (2019/2020).

N0	Year		Equation	R2	F
1	2017/2018	urban	Wi = 0.17 – 0.024 Ln Xi (39.244)** (-15.715)**	0.94	246.96**
2	2019/2020		Wi = 0.156 – 0.025 Ln Xi (10.030)** (-4.412)**	0.53	19.470**
3	2017/2018	rural	Wi = 0.18 – 0.040 Ln Xi (9.753)** (-5.629)**	0.65	31.685**
4	2019/2020		Wi = 0.24 – 0.035 Ln Xi (13.017)** (- 7.847)**	0.60	25.743**

$W_{i:}$ ratio of expenditure on meat Ln $X_{i:}$ Ln per capita i: income levels

Source: Collected from data in Table (3).

Table (5): Expenditure elasticity of per capita expenditure on meat in urban and rural in Egypt for different income levels during (2017/2018), (2019/2020).

Levels of household income(L.E)	Expenditure elasticity in (2017/2018)		Expenditure elasticity in (2019/2020)	
	urban	rural	urban	rural
-10000	0.8	0.86	0.84	0.84
10000-	0.8	0.73	0.77	0.71
20000-	0.79	0.7	0.73	0.68
25000-	0.79	0.69	0.83	0.69
30000-	0.78	0.68	0.74	0.67
35000-	0.78	0.66	0.73	0.66
40000-	0.77	0.67	0.72	0.65
45000-	0.78	0.66	0.71	0.65
50000-	0.77	0.66	0.69	0.63
55000-	0.77	0.66	0.72	0.62
60000-	0.78	0.65	0.71	0.62
65000-	0.78	0.65	0.71	0.61
70000-	0.76	0.65	0.7	0.6
80000-	0.77	0.65	0.69	0.61
90000-	0.74	0.6	0.69	0.59
100000-	0.74	0.64	0.67	0.59
120000-	0.71	0.61	0.65	0.51
150000-	0.68	0.57	0.62	0.5
200000-	0.56	0.42	0.4	0.18

Source: Collected from data in Table (3) and expenditure functions in Table (4).

(2) Estimating the consumption expenditure functions of dairy, cheese and eggs group in urban and rural Egypt:

(a) Estimating the consumption expenditure functions of dairy, cheese and eggs group in urban Egypt:

The results in **table (6)** showed that the percentage of annual expenditure per capita on **dairy, cheese and eggs** group decreased from about 13% to about 2% by increasing income per capita from 5.38 thousands L.E to 100.57 thousands L.E in **2017/2018**. And also the percentage of expenditures on dairy, cheese and eggs decreased from about 17% to about 2% by increasing income per capita from 2610 L.E to 91.34 thousands L.E in **2019/2020**.

And **the equation (1), (2)** in Table (7) illustrate the change of income per capita by 10% leads to a reverse change of the percentage of expenditure on dairy, cheese and eggs by about 0.25 and 0.03 in 2017/2018, 2019/2020 respectively.

It was shown from **Table (8)** that **dairy, cheese and egg**'s expenditure elasticity was ranged between (0.29 at 150 to less than 200 thousands L.E levels – 0.80 at lowest income levels) in 2017/2018. It should be noted that in this group, **the necessity good** turns to **inferior good** at individuals whose income 200 thousands and more than, where the value of expenditure elasticity (b) is (-0.25) in **the equation (1),** in table (7). When divided the expenditure elasticity by the ratio of expenditure on commodity group whose income 200 thousands and more (0.02) it was 1.01 greater than 1, and the elasticity was negative. This indicates that this commodity group is considered inferior good in this level. The expenditure elasticity of **dairy, cheese**

and egg's was ranged between (0.14 at 120 to less than 150 thousands L.E levels – 0.82 at lowest income levels) in 2019/2020. It should be noted that in this group, **the necessity good** turns to **inferior good** at individuals whose income 150 thousands and more , where the value of expenditure elasticity (b) is (-0.03), (-0.58) in the two highest income groups.

(b) **Estimating the consumption expenditure functions of dairy, cheese and eggs group in rural Egypt :**

The results in **table (6)** showed the percentage of annual expenditure per capita on **dairy, cheese and eggs** decreased from about 10.8% to about 2.2% by increasing income per capita from 6.62 thousands to 67.98 thousands L.E in **2017/2018**. And also the percentage of expenditures on dairy, cheese and eggs decreased from about 11.5% to about 1.6% by increasing income per capita from 4.12 thousands L.E to 65.64 thousands L.E in **2019/2020**.

And **the equation (3), (4)** in Table (7) illustrate the change of income per capita by 10% leads to a reverse change of the percentage of expenditure on dairy, cheese and eggs in rural by about 0.20 and 0.21 in 2017/2018, 2019/2020 respectively.

It was shown from **Table (8)** that **dairy, cheese and egg**'s expenditure elasticity was ranged between (0.10 at less than 200 thousands L.E levels –to 0.81 at lowest income levels) in 2017/2018. And the expenditure elasticities of vegetables group was ranged between 0.17 (at the annual income levels 150 thousands L.E to less than 200 thousands L.E), 0.82 (at lowest income levels) respectively in 2019/2020. It should be noted that in this group, **the necessity good** turns to **inferior good** at individuals whose income 200 thousands and more, where the value of expenditure elasticity (b) is (-0.34).

Table (6): The ratio of ratio expenditure on dairy, cheese and eggs group in urban and rural area in Egypt for the different levels of household income during (2017/2018), (2019/2020).

Levels of household income(L.E)	2017/2018				2019/2020			
	urban		rural		urban		rural	
	per capita (1000L.E)	ratio of expenditure on dairy, cheese, eggs	per capita	ratio of expenditure on dairy, cheese, eggs	per capita (1000L.E)	ratio of expenditure on dairy, cheese, eggs	per capita (1000L.E)	ratio of expenditure on dairy, cheese, eggs
-10000	5.38	0.13	6.62	0.108	2.61	0.17	4.12	0.115
10000-	9.39	0.07	7.99	0.064	11.18	0.07	9.90	0.062
20000-	9.33	0.07	8.04	0.056	10.01	0.06	11.57	0.057
25000-	9.79	0.06	8.07	0.051	10.50	0.09	10.76	0.054
30000-	9.45	0.06	8.38	0.052	11.36	0.06	10.16	0.052
35000-	9.99	0.06	8.81	0.05	9.97	0.05	10.24	0.048
40000-	11.00	0.06	9.47	0.05	11.97	0.05	11.04	0.047
45000-	11.54	0.05	10.46	0.049	12.51	0.05	11.36	0.048
50000-	12.45	0.05	10.78	0.047	13.43	0.05	11.88	0.046
55000-	13.29	0.06	11.56	0.046	14.48	0.05	12.89	0.046
60000-	14.54	0.05	12.31	0.045	12.67	0.05	13.27	0.044
65000-	15.69	0.05	13.39	0.044	15.55	0.04	14.30	0.042
70000-	17.71	0.05	14.41	0.043	17.38	0.04	15.67	0.041
80000-	19.39	0.05	15.95	0.042	19.39	0.04	16.70	0.039
90000-	21.30	0.04	17.54	0.037	21.26	0.04	18.98	0.038
100000-	26.23	0.05	20.22	0.034	4.28	0.04	20.48	0.037
120000-	29.94	0.04	25.28	0.029	30.36	0.04	26.52	0.031
150000-	41.10	0.04	29.53	0.026	38.73	0.03	32.68	0.025
200000-	100.57	0.02	67.98	0.022	91.34	0.02	65.64	0.016

Source: Collected and counted from:

(1) Central Agency for Public Mobilization and Statistics (CAPMAS**) income, expenditure and consumption survey** in 2017/2018, 2019/2020. (2) Data in table (1), (2) in supplement

Table (7): Results of the statistical analysis of the Working Model Estimating the consumption expenditure functions of dairy, cheese, eggs group in urban and rural in Egypt during (2017/2018), (2019/2020).

N0	Year		Equation	R^2	F
1	2017/2018	urban	$W_i = 0.13 - 0.025 \text{ Ln } X_i$ $(9.167)^{**}$ $(-5.237)^{**}$	0.62	27.429^{**}
2	2019/2020		$W_i = 0.134 - 0.030 \text{ Ln } X_i$ $(10.030)^{**}$ $(-4.216)^{**}$	0.51	17.774^{**}
3	2017/2018	rural	$W_i = 0.13 - 0.020 \text{ Ln } X_i$ $(14.399)^{**}$ $(-9.200)^{**}$	0.83	84.637^{**}
4	2019/2020		$W_i = 0.132 - 0.021 \text{ Ln } X_i$ $(13.621)^{**}$ $(-8.993)^{**}$	0.60	25.743^{**}

W_i: percentage of expenditure on dairy, cheese, eggs Ln X_i : Ln per capita i :income levels
Source: Collected from data in Table (6).

Table (8): Expenditure elasticity of per capita expenditure on dairy, cheese, eggs in urban and rural in Egypt for different income levels during (2017/2018), (2019/2020).

Levels of household income(L.E)	**Expenditure elasticity in (2017/2018)**		**Expenditure elasticity in (2019/2020)**	
	urban	**rural**	**urban**	**rural**
-10000	0.80	0.81	0.82	0.82
10000-	0.66	0.69	0.6	0.66
20000-	0.62	0.64	0.48	0.63
25000-	0.59	0.61	0.65	0.61
30000-	0.57	0.61	0.47	0.6
35000-	0.56	0.6	0.43	0.56
40000-	0.56	0.6	0.45	0.55
45000-	0.54	0.59	0.4	0.56
50000-	0.54	0.58	0.38	0.54
55000-	0.56	0.57	0.38	0.54
60000-	0.53	0.55	0.34	0.53
65000-	0.53	0.55	0.31	0.50
70000-	0.5	0.54	0.32	0.48
80000-	0.51	0.52	0.29	0.46
90000-	0.43	0.46	0.23	0.45
100000-	0.47	0.41	0.21	0.43
120000-	0.36	0.32	0.14	0.33
150000-	0.29	0.23	-0.03	0.17
200000-	-0.01	0.10	-0.58	-0.34

Source: Collected from data in Table (6) and expenditure functions in Table (7).

(3) Estimating the consumption expenditure functions of vegetables group in urban and rural Egypt:

(a) Estimating the consumption expenditure functions of vegetables group in urban regions:

Table (9) indicated that by increasing income per capita from 5.38 thousands L.E to 100.57 thousands L.E the percentage of expenditures on vegetables decreased from about 11% to 1.1% in 2017/2018, and also by increasing income per capita from 2.61 thousands L.E to 91.34 thousands L.E in 2019/2020 the percentage of expenditures on vegetables decreased from about 12.8% to about 1.2% in 2019/2020.

And through the equation (1), (2) **from Table (10)** illustrate a change of income per capita by 10% leads to a reverse change of percentage of expenditure on vegetables group about 0.34 and 0.29 for each of the two years, respectively.

It was shown from **Table. (11)** That the expenditure elasticities of vegetables group, was ranged between 0.10 (at the income levels 80 thousands L.E to less than 90 thousands L.E), 0.69 (at lowest income levels) respectively in 2017/2018. So this commodity group is considered **inferior good** at an annual income levels between (90 thousands L.E more than 200 thousands L.E), The elasticity became negative, This result explains that as increasing income per capita, individual consumption was decreased because consumers reached to satisfaction stage of their needs of these goods. On the other hand in 2019/2020, the expenditure elasticities of vegetables group was ranged between 0.14 (at the annual income levels 100 thousands L.E to less than 120 thousands L.E), 0.77 (at lowest income levels) respectively, so the this commodity group is considered **necessity good** at these annual income levels. And the result mentioned that vegetables group is considered **inferior goods** at annual income level more than 120 thousands L.E where the highest three levels of annual income has negative elasticity.

Table (9): The ratio of per capita expenditure on vegetables group in urban and rural area in Egypt for the different levels of household income during (2017/2018) , (2019/2020).

Levels of household income (L.E)	2017/2018				2019/2020			
	urban		rural		urban		rural	
	per capita (1000L.E)	ratio of expenditure on vegetables	per capita (1000L.E)	ratio of expenditure on vegetables	per capita (1000L.E)	ratio of expenditure on vegetables	per capita (1000L.E)	ratio of expenditure on vegetables
-10000	5.38	0.11	6.62	0.134	2.61	0.128	4.12	0.181
10000-	9.39	0.088	7.99	0.100	11.18	0.095	9.90	0.100
20000-	9.33	0.079	8.04	0.089	10.01	0.086	11.57	0.091
25000-	9.79	0.073	8.07	0.083	10.50	0.118	10.76	0.085
30000-	9.45	0.07	8.38	0.079	11.36	0.072	10.16	0.081
35000-	9.99	0.065	8.81	0.074	9.97	0.067	10.24	0.079
40000-	11.00	0.061	9.47	0.070	11.97	0.064	11.04	0.074
45000-	11.54	0.058	10.46	0.067	12.51	0.06	11.36	0.070
50000-	12.45	0.054	10.78	0.063	13.43	0.058	11.88	0.067
55000-	13.29	0.05	11.56	0.060	14.48	0.055	12.89	0.064
60000-	14.54	0.048	12.31	0.057	12.67	0.053	13.27	0.061
65000-	15.69	0.044	13.39	0.056	15.55	0.05	14.30	0.059
70000-	17.71	0.041	14.41	0.052	17.38	0.046	15.67	0.055
80000-	19.39	0.038	15.95	0.047	19.39	0.041	16.70	0.051
90000-	21.30	0.033	17.54	0.044	21.26	0.038	18.98	0.049
100000-	26.23	0.031	20.22	0.042	4.28	0.034	20.48	0.046
120000-	29.94	0.023	25.28	0.036	30.36	0.028	26.52	0.037
150000-	41.10	0.019	29.53	0.031	38.73	0.024	32.68	0.031
200000-	100.57	0.011	67.98	0.022	91.34	0.012	65.64	0.020

Source: Collected and counted from:
(1) Central Agency for Public Mobilization and Statistics (CAPMAS**) income, expenditure and consumption survey** in 2017/2018, 2019/2020. (2) Data in table (1), (3) in supplement

Table (10): Results of the statistical analysis of the Working Model Estimating the consumption expenditure functions of percentage of vegetables group in urban and rural in Egypt during (2017/2018),(2019/2020).

N0	Year		Equation	R^2	F
1	2017/2018	urban	$W_i = 0.147 - 0.034 \text{ Ln } X_i$ $(13.971)^{**}$ $(-9.242)^{**}$	0.83	85.413^{**}
2	2019/2020		$W_i = 0.135 - 0.029 \text{ Ln } X_i$ $(7.169)^{**}$ $(-4.175)^{**}$	0.51	17.428^{**}
3	2017/2018	rural	$W_i = 0.188 - 0.03 \text{ Ln } X_i$ $(34.632)^{**}$ $(-23.433)^{**}$	0.97	549.091^{**}
4	2019/2020		$W_i = 0.132 - 0.038 \text{ Ln } X_i$ $(15.722)^{**}$ $(-11.074)^{**}$	0.88	122.628^{**}

W_i :percentage of expenditure on vegetable $\text{Ln } X_i$: Ln per capita i :income levels
Source: Collected from data in Table (9).

Table (11) : Expenditure elasticity of per capita expenditure on vegetables in urban and rural in Egypt for different income levels during (2017/2018) and (2019/2020).

Levels of household income(L.E)	Expenditure elasticity in (2017/2018)		Expenditure elasticity in (2019/2020)	
	urban	rural	urban	rural
-10000	0.69	0.78	0.77	0.79
10000-	0.62	0.7	0.7	0.62
20000-	0.57	0.66	0.66	0.58
25000-	0.54	0.64	0.75	0.55
30000-	0.51	0.62	0.6	0.53
35000-	0.48	0.6	0.57	0.52
40000-	0.44	0.57	0.55	0.48
45000-	0.41	0.55	0.51	0.46
50000-	0.37	0.53	0.5	0.43
55000-	0.32	0.5	0.47	0.4
60000-	0.3	0.48	0.45	0.37
65000-	0.23	0.46	0.42	0.36
70000-	0.17	0.42	0.37	0.3
80000-	0.1	0.37	0.29	0.25
90000-	-0.03	0.32	0.23	0.22
100000-	-0.11	0.28	0.14	0.17
120000-	-0.45	0.16	-0.03	-0.02
150000-	-0.75	0.04	-0.22	-0.22
200000-	-2.04	-0.33	-1.45	-0.94

source: Collected from data in Table (9) and expenditure functions in Table (10).

(b) Estimating the consumption expenditure functions of vegetables group in rural areas:

The results in **Table (10)** showed that by increasing income per capita from 6.62 thousands L.E to 67.98 thousands L.E the percentage of annual expenditure per capita on vegetables decreased from about 13.4% to about 2.2% in 2017/2018 and by increasing income per capita from 4.12 thousands L.E to 65.64 thousands L.E the percentage of expenditures on vegetables decreased from about 18.1% to about 2% in 2019/2020.

And through **the equation (3), (4)** from Table (10) illustrate a change of income per capita by 10% leads to a reverse change of percentage of expenditure on vegetables by about 0.3 and 0.38 in 2017/2018, 2019/2020 respectively.

It was shown from **Table (11)** that this commodity group is considered **necessity good** where the expenditure elasticities of **vegetables group** was ranged between 0.04 (at the annual income levels 150 thousands L.E to less than 200 thousands L.E), 0.78 (at lowest income levels) respectively except the annual income levels 200 thousands L.E and more. The expenditure elasticity was estimated about -0.33 in **2017/ 2018**. **On the other hand** the expenditure elasticities of vegetables group was ranged between 0.17 (at the annual income levels 100 thousands L.E to less than120 thousands L.E), 0.79 (at lowest income level) respectively in 2019/2020.

Also the result mentioned that vegetables group is considered **inferior good** at annual income levels (120 thousands L.E more than 200 thousands L.E) where this group has **negative elasticity**.

(4) Estimating the consumption expenditure functions of cereals and bread group in urban and rural Egypt:

(a) Estimating the consumption expenditure functions of cereals and bread in urban regions:

Table (12) indicated that by increasing income per capita from 5.38 thousands L.E to 100.57 thousands L.E The percentage of expenditures on cereals and bread decreased from about 7.6% to 2% in 2017/2018, and also income per capita increased from 2.61 thousands L.E to 91.34 thousands L.E the Percentage of expenditures on cereals and bread decreased from about 9.8% to about 1.8% in 2019/2020.

Through the equation (1), (2) from Table (13) illustrate a change of income per capita by 10% leads to a reverse change of percentage of expenditure on cereals and bread group about 0.19, 0.18 for each of the two years, respectively.

And it was shown from Table (14) that the expenditure elasticities of cereals and bread group, was ranged between 0.07 (at highest annual income levels), 0.75 (at minimum annual income levels) respectively in 2017/ 2018. On the other hand in 2019/2020, the expenditure elasticities of cereals

and bread group was ranged between 0.01 (at highest annual income levels, 0.82 (at minimum annual income levels) respectively, so this commodity group is considered **semi-necessity good** at lowest annual income levels and turns to **inferior good** at highest income levels at 2019/2020.

(b) **Estimating the consumption expenditure functions of cereals and bread group in rural areas**

The results in **table (12)** showed that by increasing income per capita from 6.62 thousands L.E to 67.98 thousands L.E the percentage of annual expenditure per capita on cereals and bread group decreased from about 9.3% to about 2.3% in 2017/2018. And also by increasing income per capita from 4.12 thousands L.E to 65.64 thousands L.E the percentage of expenditures on cereals and bread group decreased from about 10.7% to about 1.6% in 2019/2020.

Table (12): The ratio of per capita expenditure on cereals and bread group in urban and rural area in Egypt for the different levels of household income during (2017/2018), (2019/2020).

Levels of household income (L.E)	2017/2018				2019/2020			
	urban		rural		urban		rural	
	per capita (1000L.E)	ratio of expenditure on cereals and bread	per capita (1000L.E)	ratio of expenditure on cereals and bread	per capita (1000L.E)	ratio of expenditure on cereals and bread	per capita (1000L.E)	ratio of expenditure on cereals and bread
-10000	5.38	0.076	6.62	0.098	2.61	0.093	4.12	0.107
10000-	9.39	0.061	7.99	0.056	11.18	0.080	9.90	0.056
20000-	9.33	0.057	8.04	0.050	10.01	0.079	11.57	0.057
25000-	9.79	0.056	8.07	0.079	10.50	0.067	10.76	0.055
30000-	9.45	0.054	8.38	0.051	11.36	0.069	10.16	0.059
35000-	9.99	0.052	8.81	0.052	9.97	0.068	10.24	0.059
40000-	11.00	0.052	9.47	0.051	11.97	0.064	11.04	0.059
45000-	11.54	0.050	10.46	0.050	12.51	0.063	11.36	0.058
50000-	12.45	0.048	10.78	0.047	13.43	0.059	11.88	0.055
55000-	13.29	0.047	11.56	0.046	14.48	0.057	12.89	0.054
60000-	14.54	0.046	12.31	0.044	12.67	0.054	13.27	0.052
65000-	15.69	0.043	13.39	0.045	15.55	0.053	14.30	0.050
70000-	17.71	0.041	14.41	0.041	17.38	0.050	15.67	0.049
80000-	19.39	0.037	15.95	0.038	19.39	0.046	16.70	0.045
90000-	21.30	0.035	17.54	0.036	21.26	0.045	18.98	0.045
100000-	26.23	0.034	20.22	0.033	4.28	0.041	20.48	0.041
120000-	29.94	0.031	25.28	0.032	30.36	0.034	26.52	0.034
150000-	41.10	0.026	29.53	0.026	38.73	0.032	32.68	0.028
200000-	100.57	0.020	67.98	0.018	91.34	0.023	65.64	0.016

Source: Collected and counted from:
(1) Central Agency for Public Mobilization and Statistics (CAPMAS**) income, expenditure and consumption survey** in 2017/2018, 2019/2020. (2) Data in table (1), (3) in supplement

Table (13): Results of the statistical analysis of the Working Model Estimating the consumption expenditure functions of percentage of cereals and bread group in urban and rural in Egypt during (2017/2018),(2019/2020).

N0	Year		Equation	R^2	F
1	2017/2018	urban	$W_i = 0.098 - 0.019 \text{ Ln } X_i$ $(22.703)^{**} \quad (-12.473)^{**}$	0.90	155.581^{**}
2	2019/2020		$W_i = 0.135 - 0.029 \text{ Ln } X_i$ $(7.169)^{**} \quad (4.659)^{**}$	0.56	21.704^{**}
3	2017/2018	rural	$W_i = 0.14 - 0.021 \text{ Ln } X_i$ $(50.389)^{**} \quad (-30.730)^{**}$	0.97	944.30^{**}
4	2019/2020		$W_i = 0.128 - 0.019 \text{ Ln } X_i$ $(14.262)^{**} \quad (-8.794)^{**}$	75.674	0.82^{**}

W_i :percentage of expenditure on cereals and bread Ln X_i : Ln per capita i :income levels
Source: Collected from data in Table (12).

Table (14): Expenditure elasticity of per capita expenditure on cereals and bread in urban and rural in Egypt for different income levels during (2017/2018) and (2019/2020).

Levels of household income(L.E)	Expenditure elasticity in (2017/2018)		Expenditure elasticity in (2019/2020)	
	urban	rural	urban	rural
-10000	0.75	0.77	0.82	0.82
10000-	0.69	0.74	0.68	0.66
20000-	0.66	0.73	0.64	0.67
25000-	0.66	0.69	0.77	0.65
30000-	0.65	0.70	0.65	0.68
35000-	0.64	0.69	0.65	0.68
40000-	0.63	0.67	0.65	0.68
45000-	0.62	0.67	0.64	0.67
50000-	0.60	0.64	0.62	0.65
55000-	0.60	0.63	0.61	0.65
60000-	0.59	0.61	0.59	0.63
65000-	0.56	0.61	0.60	0.62
70000-	0.53	0.58	0.57	0.61
80000-	0.49	0.55	0.52	0.57
90000-	0.46	0.53	0.50	0.58
100000-	0.44	0.49	0.45	0.54
120000-	0.39	0.38	0.43	0.44
150000-	0.28	0.34	0.32	0.33
200000-	0.07	0.10	0.01	-0.21

source: Collected from data in Table (12) and expenditure functions in Table (13).

And through **the equation (3),(4)** from **Table (13)** illustrate a change of income per capita by 10% leads to a reverse change of percentage of expenditure on cereals and bread group by about 0.19 and 0.18 in 2017/2018, 2019/2020 respectively.

It was shown from **Table (14)** that this commodity group is considered **semi- necessity goods** where the expenditure elasticities of **cereals and bread group** was ranged between 0.10 (at highest annual income levels), 0.77 (at minimum annual income levels) respectively, and it turns to **necessity goods** at income levels more than 100 thousands L.E in **2017/ 2018**.

On the other hand in 2019/2020, the expenditure elasticities of cereals and bread group was ranged between 0.33 (at the annual income levels 150 thousands L.E to less than 200 thousands L.E), 0.82 (at minimum annual income levels) respectively. this group is considered inferior good at income levels more than 200 thousands L.E, where expenditure elasticity was estimated about -0.21.

Through the previous results it was found that:

Income is one of the main factors affecting the percentage of expenditure per capita on food commodities under study, The average annual income per capita decreased in all income levels in urban areas, while in rural areas it decreased only for individuals whose lower incomes (less than 100 thousand L.E) and higher incomes (200 thousand L.E or more) during the years 2017/2018 and 2019/2020.

From through working lesser model which indicated that increasing income per capita leads to the proportion of food groups was decreased and vice versa. So decreasing income leads to increasing proportion of expenditure at people whose less income for following: meat group from (12%to15.6%), dairy group (13% to 17%), vegetables group (11% to 12.8), cereals and bread group (7.6%-9.8%) of total expenditure on food and beverages while for people whose high income it was showed that the percentage of meat expenditure decreased from (5.5% to 4.2%) of total expenditure on food and beverages, but the percentage of expenditure the other food groups were equal in urban regions in Egypt in 2017/2018, 2019/2020.

While the individual's expenditure behavior on meat group was differed when difference of income had occurred, While this percentage converged for the dairy, vegetables, cereals and bread groups in rural regions in Egypt in 2017/2018, 2019/2020.

Working Lesser model also shows that the elasticities estimated through it are that the poorest individuals are the highest in flexibility, while the highest-income individuals are the lowest in flexibility, which shows that the individuals of the first category have not satisfied their spending needs on the food groups under study, but rather they deal with Some food groups that are considered essential as luxury goods, although they account for the largest share of their spending, such as the meat and dairy group, while the highest-income individuals have achieved a great deal of satisfying their needs from their spending on these food groups, so that the flexibility achieved has become negative for some food groups, as is This is the case in the dairy, vegetables, grains and bread groups, meaning that individuals with higher incomes regard these food groups as inferior goods.

Fourth Estimation of the future poverty line value with presence of prevailing inflation rate:

This research revealed that poor people hadn't reached to their essential needs or requirements from necessity food commodities, where the poverty line reached by 857 L.E/Capita/month, as about 9650 L.E /annually in 2019/ 2020, compared with average annual income for poor people which estimated by 2610 in urban Egypt, 4120 L.E/ annually in rural Egypt, and this means that annual income for poor people was less than poverty line by 7050 L.E in urban Egypt, 5530 L.E in rural Egypt. as a result poor people hadn't reach to poverty line yet according to income, expenditure and consumption survey data in 2019/2020.

By estimating the minimum per capita income that allows him to obtain his basic needs in 2024, 2025 assuming that the inflation rate remains constant about 31.9% in 2023, as it is considered the highest inflation rate during the period 2020/2025, it appears from Table (15) that the value of the minimum income that must be provided to individuals is not less than about 21.66 thousand L.E in 2024, and 28.57 thousand L.E in 2025..

Table (15): The current and future poverty line value and inflation rate during (2020/2025).

year	% inflation rate	poverty line value* (1000L.E)
2020	-	9.654
2021	5.8	10.21
2022	21.9	12.45
2023	31.9	16.42
2024	31.9	21.66
2025	31.9	28.57

*poverty line value in 2021 and next years = *poverty line value in last year + (poverty line value in last year * inflation rate in 2023)

Source: Collected and counted from:

(1) Central Agency for Public Mobilization and Statistics, Income, expenditure and Consumption survey for the years 2017/2018 and 2019/2020.

(2) Central Agency for Public Mobilization and Statistics**,** Monthly Bulletin of Consumer Price Indices, 2023

According to previous results; the study recommended that decision-makers and officials should reduce the income gap between the individuals of the low-income group and the poverty line and providing monthly benefits To keep pace with the successive rise in the prices of food commodities and obtain their basic needs to obtain their main food needs.

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Supplement:

Table (1): The total consumption expenditure per capita on commodities groups (1000L.E) in urban and rural Egypt in 2017/2018, 2019/2020.

Levels of household income(L.E)	2019/2020		2017/2018	
	urban	rural	urban	rural
-10000.00	7.191	6.078	4.738	6.775
10000-	8.906	8.123	10.33	9.539
20000-	9.058	7.897	9.571	9.679
25000-	8.972	7.701	7.185	9.42
30000-	9.005	7.818	10.377	9.605
35000-	9.699	8.302	10.843	9.574
40000-	10.321	8.977	11.342	10.15
45000-	10.931	9.397	12.028	10.643
50000-	11.589	10.113	12.62	11.323
55000-	12.687	10.651	13.346	11.853
60000-	13.477	11.213	14.415	12.31
65000-	14.356	11.772	14.89	13.188
70000-	16.091	12.801	16.041	14.274
80000-	18.681	14.111	18.623	15.699
90000-	20.748	15.125	19.667	16.604
100000-	23.371	16.908	23.167	18.219
120000-	28.904	18.861	28.277	22.647
150000-	37.983	21.03	36.663	27.29
200000-	65.856	30.846	76.897	46.727

Source: Collected and counted from: Central Agency for Public Mobilization and Statistics (CAPMAS**) income, expenditure and consumption survey** in 2017/2018, 2019/2020.

Table (3): The value of per capita expenditure on meat and dairy, cheese, eggs groups (1000L.E) in urban and rural area in Egypt for the different levels of household income during (2017/2018) , (2019/2020).

Levels of household income(L.E)	The value of per capita expenditure on meat group				The value of per capita expenditure on dairy, cheese, eggs group			
	2017/2018		2019/2020		2017/2018		2019/2020	
	urban	rural	urban	rural	urban	rural	urban	rural
-10000.00	0.865	1.707	0.739	1.463	0.916	0.654	0.810	0.780
10000-	1.073	1.220	1.131	1.137	0.661	0.516	0.768	0.587
20000-	1.042	1.039	0.882	1.059	0.594	0.439	0.553	0.552
25000-	1.020	1.009	1.057	1.056	0.548	0.391	0.622	0.511
30000-	0.977	0.967	0.981	1.021	0.525	0.405	0.583	0.504
35000-	1.049	0.991	0.994	0.983	0.554	0.417	0.572	0.456
40000-	1.087	1.085	1.022	1.017	0.583	0.445	0.615	0.478
45000-	1.178	1.103	1.024	1.069	0.600	0.457	0.601	0.514
50000-	1.226	1.176	1.034	1.065	0.632	0.478	0.611	0.522
55000-	1.335	1.252	1.198	1.102	0.725	0.495	0.642	0.544
60000-	1.456	1.286	1.224	1.137	0.714	0.499	0.658	0.547
65000-	1.541	1.361	1.274	1.197	0.757	0.523	0.643	0.557
70000-	1.616	1.477	1.326	1.264	0.806	0.552	0.704	0.581
80000-	1.929	1.598	1.497	1.392	0.956	0.587	0.792	0.614
90000-	1.880	1.516	1.578	1.410	0.917	0.559	0.765	0.632
100000-	2.172	1.884	1.749	1.567	1.104	0.577	0.885	0.672
120000-	2.408	1.945	2.010	1.632	1.134	0.552	0.991	0.709
150000-	2.855	1.948	2.401	1.912	1.345	0.550	1.070	0.692
200000-	3.620	2.140	3.216	1.984	1.636	0.686	1.456	0.731

Source: Collected and counted from: Central Agency for Public Mobilization and Statistics (CAPMAS**) income, expenditure and consumption survey** in 2017/2018, 2019/2020.

Table (3): The value of per capita expenditure on vegetables, cereals and bread groups (1000L.E) in urban and rural area in Egypt for the different levels of household income during (2017/2018) , (2019/2020).

Levels of household income(L.E)	The value of per capita expenditure on vegetables group				The value of per capita expenditure on cereals and bread group			
	2017/ 2018		2019/2020		2017/ 2018		2019/2020	
	urban	rural	urban	rural	2017/2018	2019/2020	2017/2018	2019/2020
-10000.00	0.792	0.565	0.605	0.726	0.546	0.814	0.466	1.225
10000-	0.787	0.653	0.984	0.535	0.546	0.810	0.582	0.955
20000-	0.715	0.626	0.825	0.554	0.513	0.702	0.483	0.885
25000-	0.659	0.517	0.847	0.518	0.506	0.639	0.570	0.797
30000-	0.628	0.541	0.746	0.563	0.485	0.616	0.529	0.781
35000-	0.633	0.563	0.725	0.566	0.508	0.617	0.559	0.754
40000-	0.629	0.573	0.724	0.602	0.537	0.624	0.579	0.748
45000-	0.631	0.590	0.719	0.613	0.551	0.625	0.596	0.749
50000-	0.628	0.596	0.732	0.622	0.553	0.640	0.591	0.756
55000-	0.637	0.611	0.737	0.637	0.602	0.640	0.618	0.755
60000-	0.653	0.609	0.764	0.634	0.621	0.645	0.636	0.745
65000-	0.637	0.628	0.751	0.658	0.616	0.656	0.668	0.779
70000-	0.661	0.637	0.733	0.694	0.652	0.663	0.665	0.780
80000-	0.704	0.653	0.765	0.701	0.691	0.670	0.704	0.795
90000-	0.687	0.676	0.739	0.743	0.734	0.667	0.705	0.806
100000-	0.716	0.694	0.779	0.747	0.788	0.708	0.760	0.834
120000-	0.677	0.638	0.793	0.767	0.906	0.673	0.899	0.846
150000-	0.739	0.667	0.870	0.768	0.997	0.655	0.964	0.849
200000-	0.737	0.721	0.910	0.733	1.346	0.694	1.398	0.916

Source: Collected and counted from: Central Agency for Public Mobilization and Statistics (CAPMAS**) income, expenditure and consumption survey** in 2017/2018, 2019/2020.

3/16/2023