

## ACCESS TO ANIMAL-SOURCE FOODS AMONG URBAN DWELLERS IN IBADAN METROPOLIS

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### ABSTRACT

The importance of proteins in relation to healthy human life cannot be over-emphasized. Animal-source foods (ASFs) are rich sources of protein. The consumption of protein in the appropriate quantity and quality is crucial for proper growth and development in children and healthy life for adults. Access to animal-source foods (ASFs) is therefore of utmost importance. This study seeks to identify and examine the factors that influence access of consumers to animal-source foods in Ibadan metropolis. A multistage sample survey of one hundred and twenty urban dwellers from three wards in Ibadan south west Local Government Area was carried out in order to achieve the study's objective. Results revealed that age, level of education, number of children below eighteen years old, distance from home to market and price influence consumers' access to ASFs. Price and distance from home to market had negative influence while age, education, number of children below eighteen years old had positive influence on access to animal-source foods. ASFs such as snail and rabbit meat were reported to be scarce and very expensive when available. This gap between demand and supply of these ASFs provides opportunity for investments in appropriate agricultural enterprises that will bridge the gap.

### Key words

Animal protein, access, preferences, urban dwellers, consumption

### INTRODUCTION

Protein is the most essential component of cells and tissues in the human body because it provides the building blocks (amino acids) for establishing new body tissues and repairing worn-out tissues. There are twenty essential amino acids out of which nine cannot be synthesized by the human body and must therefore be obtained through dietary intake. These amino acids obtained from dietary protein are critical for good health, growth, development, reproduction, and survival of human beings (Wu, 2019). Protein quality is a function of its ability to meet human requirements for these essential amino acids. It has been established that adequate protein intake is essential for good health and development (Elmadfa and Meyer, 2017). Animal-source foods are rich sources of protein and contain balanced level of amino acids. These foods include egg, poultry, meat, seafood and dairy products. Access to animal-source foods is therefore very crucial to consumption of adequate quantities and quality protein for good health.

This study examines the factors that influence consumers' access to adequate animal-source foods in Ibadan metropolis.

### MATERIALS AND METHODS

The study was carried out in Ibadan metropolis, Oyo state. Following a multi-stage sampling technique, one (Ibadan South-west) out of the five Local Government Areas (LGAs) which make up Ibadan metropolis was randomly selected. Three wards were then randomly selected from the twelve wards that make up the LGA. A total of one hundred and twenty respondents were selected from the three wards for the study. Data were collected with the aid of structured questionnaire administered to the respondents while analysis was done using inferential statistics and regression model analysis.

Specification of model:  $Y = f(X_1, X_2, X_3, \dots, X_{10})$

Where Y = Access to animal-source foods

X<sub>1</sub> = Sex (female = 0, male = 1)

X<sub>2</sub> = Age

X<sub>3</sub> = Number of children below 18 years old

X<sub>4</sub> = Number of children above 18 years old

X<sub>5</sub> = Education level

- X<sub>6</sub>= Income type
- X<sub>7</sub>= Household size
- X<sub>8</sub>= Purchase frequency
- X<sub>9</sub>= Distance from home to market
- X<sub>10</sub>= Price

**RESULTS AND DISCUSSION**

Most (73.3%) of the respondents were middle-aged who earned their income on daily basis (Table 1). They however make decisions on the allocation of their income to all possible goods and services in order to obtain the greatest satisfaction. Thus, individuals have a set of preferences which allow the ranking of goods and services according to the satisfaction they give to the individual. In relation to animal-source foods, the respondents’ first choice preferences are as shown in Figure 1. Result showed that beef ranked highest on the preference list for half of the respondents. This is similar to the finding of Adetunji and Rauf (2012) who reported beef to be the most preferred meat by 43.7% of individuals in three states of South-west Nigeria. Ogunwole and Adedeji (2014) also reported 55.1% of their respondents in Ibadan had beef as their most frequently consumed meat type. None of the respondents in this study ranked pork, rabbit meat or goat meat as the highest ASF preference. Results revealed that none of the respondents had ever eaten rabbit meat due to its non-availability in the market. More than half (63.3%) of the respondents did not have pork on their preference list for reasons such as religion, personal beliefs and taste. There is observed general relation between consumption of animal products and tradition, availability and price (Bender, 1992). In terms of preferred form of ASF, most (96.7%) of the respondents indicated fresh ASF as the preferred form as against frozen form. Reasons given include better taste and better quality with regard to nutrients of fresh ASFs. However, all respondents attested to the existence of growth and development benefits for children and general health benefits for adults in the protein obtained from consumption of ASF.

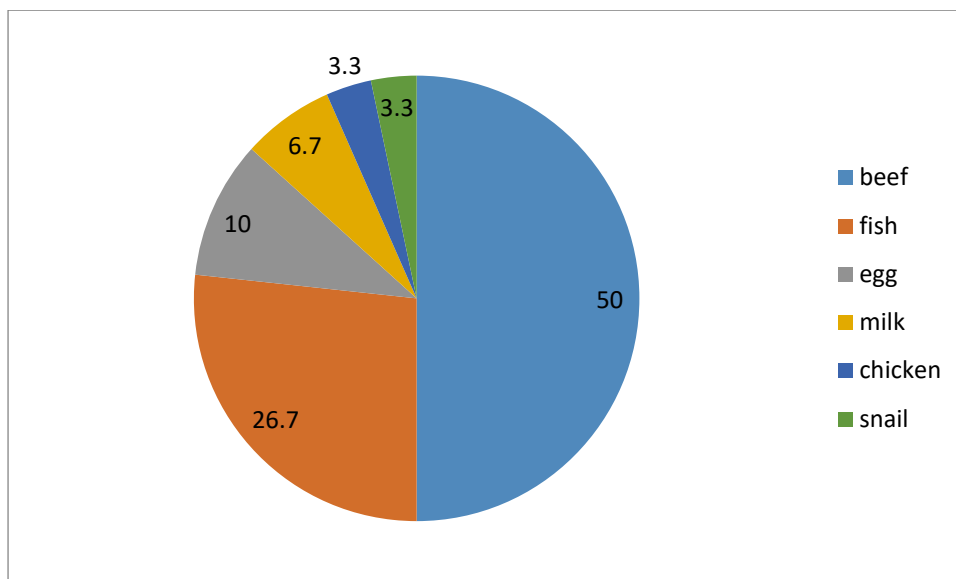


Figure 1:Proportion of respondents with corresponding most preferred ASF

Table 1: Socioeconomic characteristics of respondents

Characteristic	Frequency	%
Sex Male	28	23.3
Female	92	76.7
Age 20-29	20	16.7
30-49	88	73.3
50 and over	12	10.0
Household size 1-4	56	46.7
5-8	60	50.0
Above 8	4	3.3
Level of Education None	16	13.3
Primary	8	6.7
Secondary	64	53.3
Tertiary	32	26.7
Income Type Daily	92	76.7
Monthly	28	23.3

With an average age of 37.14 years, majority (80%) of the respondents had a minimum of secondary school education and 86.7% were married. In order to identify and examine some of the factors which affect respondents' access to animal-source foods, a regression analysis was carried out with results shown in Table 2.

Table 2: Regression analysis result

Variable	Coefficient	t	P value
Sex	-0.4877	-1.97	0.067
Age	0.0300	2.39	0.030
Children below 18	0.3688	2.17	0.046
Children above 18	0.0238	0.14	0.891
Education	0.2920	2.06	0.057
Income type	0.0743	0.78	0.447
Household size	-0.2120	-1.39	0.184
Purchase frequency	0.2533	1.74	0.101
Distance to market	-0.0600	-1.66	0.118
Price of ASF	-0.0007	-3.67	0.002
R <sup>2</sup>	0.6521		

Distance from home to the market had significant effect on access of the respondents to animal-source foods. This is important as more than 85% of them obtain their animal-source foods directly from the market which was an average of 4.06km from home. This follows the pattern of the finding of Ogunwale and Adedeji (2014) who reported that the market place was the place of purchase of meat for most (60.3%) of their respondents in a study carried out in Ibadan. The farther the distance of market from home, the less the access that they have. Frequency of purchase and access are positively related but not significantly so from the results. The higher the level of education, the more the access to animal-source foods as analysis shows a positive significant relationship between education and access to animal-source foods. This is not surprising as higher education means more enlightenment on issues pertaining to nutrition and health. Results also indicated that the more the children under the age of eighteen years there are in the household, the more the access to animal-source foods. This might be due to the knowledge of respondents of the importance of protein in the proper growth and development of growing children. It is also interesting to note that results indicated more access to animal-source foods by females than males under this study. Income type (daily, fortnightly or monthly), household size and number of children above eighteen years old had no significant influence on access to ASFs.

## CONCLUSION AND RECOMMENDATION

Protein is the most essential component of cells and tissues in the human body because it provides the building blocks (amino acids) for establishing new body tissues and repairing worn-out tissues. Animal-source foods are rich sources of protein and contain balanced level of amino acids. These foods include egg, poultry, meat, seafood and dairy products. Access to animal-source foods is therefore very crucial to consumption of adequate quantities and quality protein for good health. Age, education and number of children below eighteen years old positively influence access of consumers to animal-source foods while it is negatively influenced by price and distance from home to market in Ibadan metropolis. ASFs such as snail and rabbit meat were reported to be very scarce and very expensive when available. There are opportunities for investment in animal agriculture to bridge the gap between demand and supply. Entrepreneurs, philanthropists and government (Local, State and Federal) are encouraged to direct efforts in this aspect for better access to animal-source foods.

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