

## Assessment of Awareness Regarding Adulteration in Food Items among Housewives of Uttar Pradesh

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### ABSTRACT

Adulteration refers to mixing other matter of an inferior and sometimes harmful quality with food or drink intended to be sold. As a result of adulteration the food product become impure and unfit for human consumption. We are facing adulteration in our daily consumable items and go through various food borne illnesses that is reflecting lack of awareness and low focus on this problem. To find the prevalence of food adulteration and method to identify the selected food items and level of awareness towards food adulteration the study was designed. 100 women were selected from both urban and rural background from Kumarganj through random sampling. A questionnaire cum interview schedule was administered to fulfil our objectives. Chi square test was used for statistical analysis of the data. Findings revealed that there was positive association between educational status and Awareness level ( $X^2 = 48.10$ ), Family income group and awareness level ( $X^2 = 16.5783$ ) of the respondents that indicate that educated housewives and high-income group families were more aware about the food adulteration. It was also found that one third of respondents were aware regarding the adulteration of food but they didn't adapt any strategy to get rid of it. Therefore, there is a great need to educate housewives of the consumer rights and consumer forums for lodging their complaints.

**KEYWORDS:** Adulteration, Housewives, Awareness, Consumer protection

### INTRODUCTION

The focus on health benefits has brought awareness among housewives of adulteration in food products now more than it was before. Many of the disease facing mankind are reported to be due to food intake having adulterants in it. Adulteration is a legal term meaning that a food product fails to meet federal or state standards. Adulteration refers to mixing other matter of an inferior and sometimes harmful quality with food or drink intended to be sold. As a result of adulteration the food product become impure and unfit for human consumption. The federal food and drug Administration prohibits transportation of adulterated food, drugs and cosmetics in interstate commerce as provided under the food drug and cosmetic Act 1938. Adulteration refers to noncompliance with health or safety standards. Any product is considered adulterated if (a) It bears or contains any poisonous or deleterious substance which may render it injurious to health (b) it bears or contains any added poisonous or added deleterious substance like a pesticide, residue, food additive, colour additive or new animal drug that is unsafe. (c) Its container is composed, in whole or in part of any poisonous or deleterious substance which may render the contents injurious to health. (d) It bears or contains a pesticide chemical residue that is unsafe. Hence the present study was undertaken to measure the extent of awareness related to food adulteration and to study the methods used for testing the adulteration in food items.

### Methods and Material

The present study was undertaken in Kumarganj area of Ayodhya district which was purposively selected for the study because of convenient approach. Only those housewives were selected who did shopping themselves and were willing to give authentic information regarding adulteration.

A questionnaire cum interview schedule was used for data collection and the purpose of the study was explained to the respondents. The scores were divided into three categories i.e. 0-3 = Low Aware, 4-6= Medium aware and 7 – 10 =highly aware. The information collected was compiled, tabulated and analyzed using frequency and distribution and percentage of variables studied.

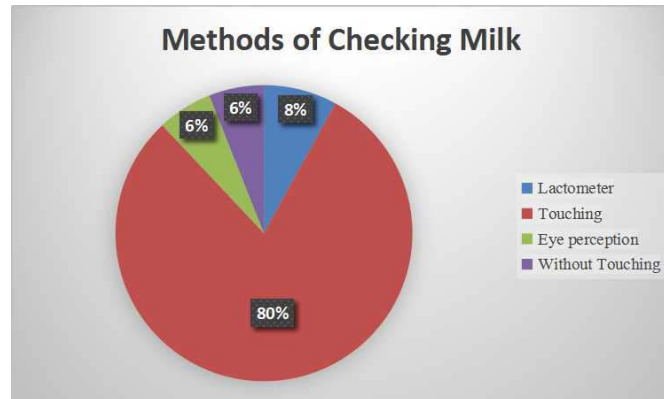
## Results and Discussion

- The findings of the study have been discussed under the following headings:-
1. Demographic profile of respondents
- Awareness regarding adulteration in Milk
2. Methods used for adulteration check in food products
  3. Level of Awareness of the respondents.

**Table1: Demographic profile of respondents**

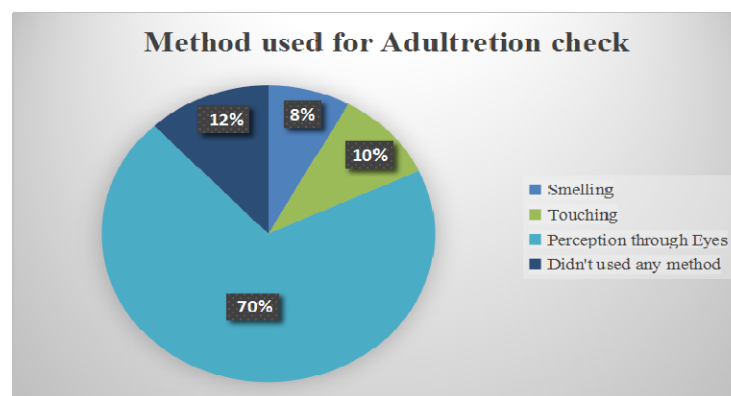
Criteria	Category	Frequency	Percentage
Age group	25-35	22	22
	36-45	44	44
	46-55	34	34
Educational Status	Illiterate	50	50
	Metric pass	28	28
	Graduation & above	22	22
Family Income Group	Lower	25	25
	Middle	59	59
	High	26	26

The table 1 shows the demographic profile of the respondents. The majority of women i.e. 45 percent women were in 36 to 45 years age group. In the case of educational level, the majority of the women were illiterate and 59 percent women belong to middle income group. In a study conducted by **Khapre et al. (2011)** 59.5% percent of selected respondents were illiterate.



**Fig.1:**Method of adulteration check used for Milk

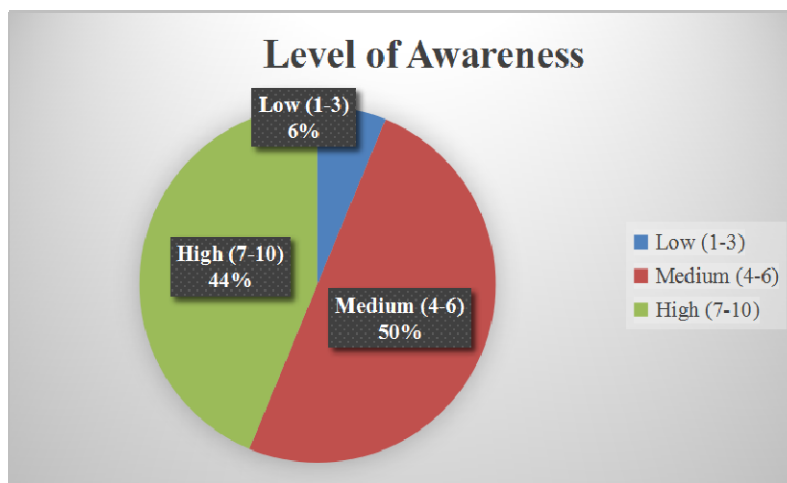
The above figure 1 shows the method of adulteration check used for Milk and it was found that 8percent of respondents tested through lactometer and found the milk adulterated. They were neighbours but found the work fruitless because the milkman stopped giving them the milk and they had no options to hire any other supplier. The respondents were from the university campus. 80 percent of respondents tasted the milk by their fingers and gave the reason that when the milk is adulterated, it slips of their finger tips and palm, tilted spoon or table faster than the unadulterated milk and dairy milk of N.D.U.A.T. Total 12 percent of the respondents gave the reason that when the milk is adulterated, it is easily detected by seeing its colour and after shaking slightly in the vessels.6 percent of the respondents gave the reason that their milkman agreed to the adulteration and promised not to repeat.The study reveals that all the housewives agreed that there was adulteration in milk that was taken from milkman. Selected women reported that the most common adulterant in milk was water. Barham et al. (2014) also found in their study that among various adulterants 73 percent of water was found in majority of milk samples. Whereas Swathi & Kauser 2015 also found that in various milk products the milk was majorly adulterated by water.FSSAI in 2011 conducted a survey on milk adulteration in selected rural and urban areas and found that the most common adulterant was found to be the addition of water, and the main reason for deviation from the standards was addition of glucose and skimmed milk powder.



**Fig.2:** Method of Adulteration check in other food products(i.e. Gram flour, maida & semolina etc)

The above figure shows that the most of respondents opted all the methods of seeing, touching and smelling while buying gramflour, Maida and semolina.The area of resident was having small and rural market for grocery and the above

items are sold in loose in the market so 8percent availed the opportunity of smelling while buying the product and 10percentof them by touching. Majority of respondents i.e.70percentused the perception through eyes the product while buying.12percentof respondent didn't use any method for checking the items while purchasing and brought it home. The results indicated that majority of women were aware about the adulteration and their checking method and took keen interest to check the product.



**Fig.3:** Level of awareness regarding adulteration in food items

The figure 3 indicated the data with respect to level of awareness of respondents regarding the adulteration in food products. A 10 point rating scale was used to assess the awareness level of the respondents regarding the adulteration of food products. Half of the respondents were in Medium level of awareness followed by 44percentof respondents were having the high awareness level whereas only 6percentof low respondents were in the category of low level awareness. The study shows that the housewives are aware of the adulteration in the food items that they use. There was significant relation between Family income & Awareness level at .05 percent level of significance. The chi-square value was 16.5783 (p-value=.000251) There was significant relation between Educational status& Awareness level at .05 percent level of significance. The chi-square value was 48.1099 (p-value=.00001) There are some studies that indicated the low awareness of respondents. **Abidfaheem et al.(2013)** reported an average level of knowledge regarding food adulteration amongst Taluka dwellers in Karnataka state. Another study conducted by **Kumar M.V. (2016)** assess the level of awareness on consumer rights and found that majority of the respondents (65 percent) had low level of awareness. **Gautam et al. 2016** concluded that majority of consumers had low awareness score about adulteration in food items and its harmful effects in the body.

## CONCLUSIONS

Although the women had the idea of adulteration in food items and milk but they did not use any concrete steps to remove it but they had not any good alternatives. There is high level of awareness but the housewives did not know to solve their problems. Therefore there is a great need to educate housewives of the consumer rights and consumer forums for lodging their complaints. It is also suggested that special attention should be paid by the government policy planners in framing programmes in stopping adulteration

## REFERENCES

1. **Abidfaheem, T.K., Nayak B.S. and Andrade M. (2013)**Food adulteration and family's knowledge on food adulteration in selected village of Udupi taluk, Karnataka. *SS Nitte University Journal of Health Science*; 3(2):33–37.
2. **Barham, G. S. and Khaskheli, M. (2014)**.Extent of extraneous water and detection of various adulterants in market milk at Mirpurkhas, Pakistan. *IOSR Journal of Agriculture and Veterinary Science*; 7(3): 83-89
3. **Chandila, J. and Puri, D. (2019)**. A Comparative Study on Consumer Perception towards Packaged Spices among Rural and Urban Women, *International Journal of Health Sciences & Research*; 9 (8):399-405
4. **FSSAI (2011)**,(<https://www.fssai.gov.in> ).
5. **Gautam, A., & Singh, N. (2016)**. Assessment of consumer's awareness about food adulteration and its harmful effects in the body. *International Journal of Research*; 3:321-324.
6. **Khapre, M.P., Mudey, A., Chaudhary, S., Wagh, V., Dawale A. (2011)**.Buying Practices and Prevalence of Adulteration in Selected Food items in a Rural Area ofWardha District: A Cross - Sectional Study, *Online Journal of Health and Allied Sciences*; 10 (3):1-4
7. **Kumar, M.V. (2016)**. An Assessment of Consumer Awareness and protection, *International Journal of Humanities & Social Science Studies*; 2(4):338-343
8. **Swathi, J. K., and Kauser, N. (2015)**. A study on adulteration of milk and milk products from local vendors.*International Journal of Biomedical and Advance Research*; 6(09): 678-681.



