

# Advertising Effectiveness on Consumer Purchase Decision at Different Income and Education Levels

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## Abstract

*Advertising is a form of business communication about product related information. Basic intention of advertising is to induce prospective buyers to purchase the product. The present study attempts to analyse how Television and Print media advertisements create differential influence on the purchase intention of a sample of 400 respondents having demographic characteristics classified into Education and Income levels in Indore, the commercial capital city of Madhya Pradesh. Responses were collected through a self designed questionnaire on five point likert scale for assessing the impact of Television and print media advertisements on the respondents with different demographic profiles. Analysis of data was done with the help of Anova for four groups and Post hoc Analysis of Tukey HSD to calculate differential influence of two types of advertisements on two demographic groups. The findings of the study state that Television and Print media advertisements have significant impact on buying decisions of all groups while mean difference of the impacts between classified groups in this study are also noticed. Results are useful for the marketer in choosing mode of advertisement for the targeted group.*

**Keywords:** Advertising, communication, intention, education, impact, income, attitude.

## Introduction

The basic intention of advertising is to deliver message about the product to customers and thus to influence the attitude of viewers/readers about the product. Advertising has evolved into a vital communication links between businesses and their customers. The prospective customers can take a decision to buy the product on the basis of information provided in the advertisements. Every marketer is interested in stimulating the desires of the customers and thereby inducing them to purchase or repurchase the product or service advertised (Kumar and Venkateswara, 2013).

Lane and Russel (1996) have defined advertising as more than just a means of disseminating product information. According to them, it is a primary communication tool that can also be used to promote charitable causes, political ideas, social and economic development. It is an indispensable part of our social, cultural and business environment and mirrors this environment by bringing about subtle changes in the behavior of the public.

## Literature Review

According to Durkin and Mckenna (2011), it is very important to make the audience aware of the features of the product advertised. Advertising helps in enhancing inquisitiveness about the features and usefulness of the product advertised as well as contributes in the development of the rational response to a purchase. In their study Brown and Goonawardana (2007) state that advertising creates an emotional involvement in the product

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promotion. According to them, it becomes easy for the respondents to identify usefulness of the product in contributing to their happiness, improvement in lives or giving them pleasure. The results of the study by (Gulmez, Kitapci and Karaca, 2010) indicate that advertisements in general help in creation of new ideas. Generally, consumers have a positive viewpoint towards ideas which are informative, persuasive and sensitive to the environment. The visibility and striking level of advertisements is increasing among the consumers with higher income and education level. Today, companies allocate a large amount of budget for advertising in different media such as Television, radio, magazine etc. As per Datta (2008), advertising is usually the non personal dissemination of messages by recognized sponsors through the various media containing the information about products, services or ideas credible in nature. Research by Ravikumar (2012) finds that women consumer attitude towards visual media advertisements and their buying behaviour are related with each other. Advertising value is closely related with women consumers 'attitude towards visual media advertisements (Ravikumar, 2012). Television advertising is widely viewed and economical too ; yet no other media can match the impact of Television advertising on the customer especially the female customers (Saxena, 2005). Television is in great demand even in the urban and rural households (Shah & D'Souza, 2008) and for all strata of population. Thus, Television has greater reach with respect to coverage of milieu of the customer. Television is a mixture of video and audio features. It provides the products with instant validity and fame (kavitha, 2006). In the past few years, Television advertising has not only changed emotions but have given considerable message exerting a far reaching influence on the daily lives of people (Kotwal et. al., 2008). According to Ajzen and Fishbein (2005) computing the intention of the customer to have earlier procurement requires

a forecast of the consumers buying decision before they make their actual purchase. Consumer buying behaviour is influenced by the liking of the advertisement and in turn influences consumer buying behaviour (Smith et. al., 2006). An attitude towards an advertisement is formed by emotions (Morris et al., 2002), which finally influences the buying behaviour of consumers (Allen et al., 1992). The effectiveness of an advertisement in framing an attitude towards the product advertised, works as an mediating variable between advertising and buying intentions of the viewers (Shimp, 1981). In fact, Gorn (1982) in his experiment with 244 undergraduate students showed that the buying decision and behaviour were mainly influenced by commercial advertisement. Influence of different factors on purchase process, and finalization of purchase decision are significantly affected by level of education, occupation, and family income (Tiwari, 2007). Acceptability of medium of advertisement on purchase initiative are studied by researchers. Besides the purchasing behavior, the Television advertising also influences the social behavior (Kotwal et al., 2008). Advertisements help in making the consumers aware of the recent developments in the market. The modes of advertisement are selected by the advertisers on the basis of the nature of the product to be advertised as well keeping in the mind the target audience ( Jansen et al,2013 and Iyer et al.,2005). Schiffman & Kanuk (2000) suggest that perceptions of the consumers are not influenced by advertisements alone; there are many other factors like influence of peers, colleagues, friends as well as use of product which influence the perception of the consumers. In case of cosmetic brands loyalty of customers is also an important factor. Users of a particular brand are very loyal and do not easily shift towards use of other brands (Fatima and Lodhi, 2015). One thing is also important to mention that users of the cosmetics are very loyal to their brands and they

cannot be easily shifted towards other brands. In their study Ahmed et al. (2017) conclude that if advertisement campaigns are properly managed then it can generate the ambition to buy the product and will show the positive trend of consumer's buying behavior and brand preference.

### Scope and Design of the Study

The study is exploratory in nature and focuses basically on primary data about impact of Television and Print media advertising on the purchase decision of consumers in the city of Indore, Madhya Pradesh. The study is based on survey method. In the pilot study, responses were collected from 100 respondents and in the second phase, 400 respondents were surveyed. Sample for both the surveys were selected from the city of Indore. The respondents were regular viewers of Television and print media. The respondents were selected through non-probability convenience sampling method.

In the first phase, a preliminary survey was conducted to identify top three frequently viewed advertisements which the respondents were able to recall in print as well as Television advertising. For this purpose an exploratory study was conducted in which a planned five point likert scale was administered. Results of this preliminary survey identified top three frequently viewed advertisements. Based on the survey responses clippings of these advertisements were stored in CD and copies of print advertisements were attached to the questionnaire. In the second phase respondents were shown these clippings and copy of print advertisements and then responses were selected for identifying the impact on the buying decision of consumers. The sample size was 400 respondents and items under study were 27. The sample consisted of respondents on the basis of education and income level. The data was analyzed using one way Anova and Post hoc Tukey HSD

methods.

### Respondents' Profiles

Demographic Variable	Number of Respondents	Percentage
Education level		
Undergraduate	184	46
Postgraduate/others	216	54
Family Income		
Upto Rs. 50,000 p.m. Income I	203	51
Above Rs. 50,000 p.m. Income II	197	49

### Objectives

- 1.To analyse influence of Television and Print media advertising on the buying decision of customers for FMCG products.
- 2.To identify the impact of Television and Print media advertisements on the basis of Education and Income level of respondents.
- 3.To compare advertisement effectiveness of Print and Television media according to Education and Income level of respondents.

### Hypotheses

H01: Television and Print media advertisement do not significantly influence purchase behaviour of customers classified on the basis education level (4 groups)

H02: There is no significant difference in influence of Television advertisement on the purchase behaviour between undergraduates and postgraduates/others (two groups).

H03: Mean influence of Print media advertising on the purchase behaviour of the customer is not significantly different between undergraduates and postgraduates/others (two groups).

H04: Mean Influence of Television and Print media advertising on the purchase behavior of

undergraduates is not significantly different (two groups).

H05: Television and Print media advertising do not have significantly different influence on the purchase behavior of postgraduate/other respondents (two groups).

H06: There no significant difference in mean influence of print media advertisement on the purchase behaviour of UG and PG groups (two groups).

H07: There is no significant mean difference of influence of Television and Print media advertising on purchase behavior of postgraduate/other respondents and undergraduate respondents (four Groups)

### Data Analysis

Reliability test was conducted for measuring the consistency of the measuring instrument. The Cronbach's alpha for the questionnaire in case of Television viewers is 0.83 (>.0.7) and in case of print advertisement viewers is 0.81. Statistical analyses (Anova and Post Hoc analysis of Tukey HSD) have been applied on the basis of consumer demographic characteristics i.e. education and income levels.

### Results of ANOVA and post hoc Tukey HSD tests for sample classified on Education level

**Table 1: ANOVA with four independent groups respondents on the basis of Education level (in Appendix)**

**Table 2: Multiple Comparisons for Impact of Advertisements on the basis of Education level (in Appendix)**

Table 1 depicts that the F value between four groups classified on basis of education levels and two media types is 7.104 and p value is 0.000; therefore null hypotheses H01 is rejected at 5% level of significance i.e. influence of Television

and Print advertisements on buying decisions of respondents of different Education levels is significantly different. Post hoc Tukey Tests have been undertaken to calculate pairwise mean differences among four groups (i.e. pair of 1. UG print & PG Print; 2. UG Print & UG Television, 3. UG print & PG Television) in Table 2. the p value between UG & PG Print advertisement viewers is 0.825 therefore null hypotheses H02 is accepted at 5 % level of significance i.e. mean influence difference of print advertisement on the purchase behavior of undergraduates and postgraduates/others is significant. The p value for other groups is 0.000 therefore null hypotheses H03 is rejected at 5 % level of significance i.e. impact of Television and Print advertising on the undergraduate respondents is having significant differences in their mean values. H04 is rejected at 5 % level of significance i.e. there is significant difference in mean influence of two advertisements on the buying behavior between undergraduate and postgraduate/other respondents. The p value between postgraduate/other Television and Print advertisement viewers is 0.932 therefore null hypotheses H05 is accepted at 5% level of significance i.e. there is no significant difference between the impact of Television and Print media advertising on the buying behavior of postgraduate/other respondents.

The p value in between impact of Television advertisements on undergraduate respondents and impact of Print advertisement on postgraduate/other respondents is 0.023 therefore null hypotheses H06 is rejected at 5 % level of significance i.e. There is significant difference between impact of Television advertisements on undergraduate respondents and impact of Print advertisement on postgraduate/other respondents. The p value in between postgraduate/other Television advertisement viewers and undergraduate Print advertisements viewers is 0.618 therefore null hypotheses H07 is accepted

at 5% level of significance i.e. There is significant mean difference between influence of Television advertising on purchase behavior of postgraduate/ other respondents and Print media advertising of undergraduate respondents.

### **Results of ANOVA and post hoc Tukey HSD tests for sample classified on income levels.**

#### **Hypotheses:**

H08: Television and Print media advertising do not significantly influence the purchase decision of respondents of different Income level.

H09: Mean impact of the print advertising on purchase behavior is not significantly different between Income level I and Income level II

H10: Mean impact of Television advertising does not significantly influence the purchase behavior with respect to Income level I and Income level II.

H11: Mean impact of Television and Print media advertising on purchase decision is not significantly different for Income level I respondents.

H12: There is no significant mean difference between the impact of Television and Print media advertising on the buying decision of of Income level II respondents.

H13: There is significant difference in mean impacts of Television advertisements and Print advertisement between Income level I respondents on Income level II respondents. H14: Mean impacts of Television advertising on the purchase behavior of Income level II respondents and Print media advertising on Income level I respondents is not significantly different

H14: Mean impact of Television advertising and Print media advertising on the purchase behavior of Income level II respondents and Income level I respondents is not significantly different .

### **Table 3: One way ANOVA among four groups of respondents on the basis of Family**

#### **Income (in Appendix)**

### **Table 4: Multiple Comparisons for Impact of Advertisements on the basis of Family**

#### **Income(in Appendix)**

Table 3 depicts that the F value between four groups classified on the basis of two income levels and two types of advertisements, is 8.105 and p value is 0.015 therefore null hypotheses H08 is rejected at 5 % level of significance i.e. Television and print advertisement viewers with Income level have significantly different impact on their buying decisions.

Post hoc Tukey tests are carried out in pairs of two groups from the above four in order to find out difference in mean impact of Print and Television advertisements on respondents of two income levels. In Table 4, the p value of mean impact of print media between Income level I and Income level II is 0.785 ; therefore null hypotheses H09 is accepted at 5 % level of significance i.e. impact of the print advertising on purchase behavior is not significantly different between Income level I and Income level II. Results of Turkey test in Table 4 depicts that p value between groups is 0.001; therefore null hypotheses H10 is rejected at 5 % level of significance i.e. There is significant difference between the mean impacts of Television advertisements on the buying behavior of Income level I and Income level II respondents. The p value between other group is 0.003 therefore null hypotheses H11 is rejected at 5 % level of significance i.e. mean impacts of Television and Print advertising on the Income level I respondents is significantly different. The p value of difference of mean impact of Television and Print advertisement for income level II is 0.837, therefore, null hypotheses H12 is accepted at 5% level of significance i.e. there is no significant mean

difference between the impact of Television and Print media advertising on the buying behavior of Income level II respondents.

The value of difference of mean impacts of Television advertisements on Income level I respondents and Print advertisement on Income level II respondents is 0.000 therefore null hypotheses H13 is rejected at 5 % level of significance i.e. There is significant difference between mean impacts of Television advertisements on Income level I respondents and Print advertisement on Income level II respondents. The p value of difference in mean impacts of Television advertisement on Income level II viewers and Print advertisements on Income level I viewers is 0.618 ; therefore null hypotheses H14 is accepted at 5% level of significance i.e. Mean impacts of Television advertising on the purchase behavior of Income level II respondents and Print media advertising on Income level I respondents is not significantly different

## Conclusion

This research finds that there are differential effects of television and print media advertisements according as education and income levels while both advertisement methods do influence purchase decisions of the sample groups. While print media advertisement is relatively more important for Post graduate degree, television advertisement seems to be more effective for under graduate respondents. For income levels again print media has relatively more influence compared to television advertisement. Again for income level II also print media advertisement has better impact. Thus these findings are important for advertisers to utilize these channels for advertisements for targeted groups differently to achieve maximum benefits from the advertisements.

The findings of this study have interesting managerial implications. Given the current success

of television commercials, it would appear to be a very important medium for advertisements. Various advertising strategies can be framed such as schedule of Television ads, selection of Television Program, use of ad appeals, celebrity endorsement, and brand recall strategies, etc to capture the attention of prospective customers thereby inducing their purchase decision.

Finally, the findings reported here are likely to be limited to the Television and print media commercials and may not be generalized to other medium of advertising. The sample of the study is collected from Television viewers and print media respondents from a small city like Indore and nearby areas. The view of the selected respondents may differ from those who are staying in the big cities such as Mumbai, Delhi, Bangalore, Ahmadabad, etc.

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**Table 1: One way ANOVA with four independent groups respondents on the basis of Education level**

ANOVA					
	Sum of Squares	Df	Mean Square	F	Sig.
Between Groups	3448.74779	3	1149.5826	7.103943	0.00
Within Groups	128811.252	796	161.82318		
Total	132260	799			

**Table 2: Multiple Comparisons for Impact of Advertisements on the basis of Education level**

	VAR00002	VAR00002	Mean Difference (I-J)	Std. Error	Sig.	95% Confidence Interval	
						Lower Bound	Upper Bound
Tukey HSD	UG Print	PG/Others Print	-.92536	1.27479	.825	-4.2073	2.3566
		UG Television	-5.54420*	1.27299	.000	-8.8215	-2.2669
		PG/Others Television	-1.69213	1.23412	.618	-4.8693	1.4851
	PG/Others Print	UG Print	.92536	1.27479	.825	-2.3566	4.2073
		UG Television	-4.61884*	1.31382	.002	-8.0012	-1.2365
		PG/Others Television	-.76677	1.27620	.932	-4.0523	2.5188
	UG Television	UG Print	5.54420*	1.27299	.000	2.2669	8.8215
		PG/Others Print	4.61884*	1.31382	.002	1.2365	8.0012
		PG/Others Television	3.85207*	1.27439	.014	.5712	7.1330
	PG/Others Television	UG Print	1.69213	1.23412	.618	-1.4851	4.8693
		PG/Others Print	.76677	1.27620	.932	-2.5188	4.0523
		UG Television	-3.85207*	1.27439	.014	-7.1330	-.5712

\*. The mean difference is significant at the 0.05 level.

**Table 3: One way ANOVA among four groups of respondents on the basis of Family Income**

	Sum of Squares	Df	Mean Square	f	Significance
Between the groups	2425.017	3	908.239	8.105	.0015
Within the groups	137256.983	796	166.760		
Total	138452.000	799			

**Table 4: Multiple Comparisons for Impact of Advertisements on the basis of Family Income**

	(I) VAR00002	(J) VAR00002	Mean Difference (I-J)	Std. Error	Sig.	95% Confidence Interval	
						Lower Bound	Upper Bound
Tukey HSD	Income I- Print	Income II print	.1748	1.30004	.785	-3.5317	3.1621
		Income I- Television	4.0125	1.23332	.003	-7.1888	-.8385
		Income II-Television	2.3368	1.30004	.618	-5.6706	1.0232
	Income II Print	Income I- print	.1748	1.30004	.785	-3.1621	3.5317
		Income I-Television	-3.8288	1.30004	.000	-7.1757	-.4819
		Income II-Television	-2.1389	1.36349	.837	-5.6491	1.3714
	Income I- Television	Income I- print	4.0136	1.23332	.003	.8385	7.1888
		Income II print	3.8288	1.30004	.000	.4819	7.1757
		Income II-Television	1.6899	1.30004	.001	-1.6570	5.0368
	Income II- Television	Income I- print	2.3237	1.30004	.618	-1.0232	5.6706
		Income II print	2.1389	1.36349	.837	-1.3714	5.6491
		Income I- Television	-1.6899	1.30004	.001	-5.0368	1.6570