STUDY OF ADVERTISEMENTS WITH TECHNICAL WORDS ON CONSUMER PERUSAL

Abstract

There are wide ranges of products in the consumer's world today. Each product has its own way of communication in the form of advertisements through various media. Some try to make it simple while some try to differentiate the product through their advertisements. In recent times, we come across advertisements with technical jargons to communicate about their products. This paper has been designed to study the awareness and the influence of such technical words that we come across in the advertisements on consumers. Convenience sampling technique has been adopted and the study was conducted amongst the educated youngsters. The study employed a survey method using a structured questionnaire and the response of 101 respondents was analyzed. A statistical test was conducted to understand the relationship between number of times the respondents notice technical words in advertisement and their preference to buy such products. The paper also analyses the awareness of such technical words amongst the educated youngsters, the media in which such technical words are prevalently noted and the feeling such words sows in the minds of the people. The data obtained are also represented in descriptive forms such as graphs, charts and tabulations.

Introduction

Over the years, the consumers are bombarded with a wide range of products for any particular need. In recent times, advertisements have been the predominant mode of communication about the products to the customers. It has been a huge challenge that marketers are facing due to flow of a plethora of products into the market today. The advertisers try to differentiate their products over the competitor's products with innovative ideas. It has been identified that with the increase in educated population, advertisers try to appeal the customers by projecting with technical words about the products. It has been believed by the advertisers that the usage of such technical words gives the consumers a sense of superiority about their products. There are a lot of Advertising researchers looking at the effects of many types of complexities(eg.semantic, visual) but few has been investigated in it, altering the attitude of such products in the consumer's mind. This study used within-subjects experiment to examine how surface-structure transformations affected readers' comprehension, recognition, recall, and attitudes toward such technical words.

Literature Review

This study primarily focuses on how linguistic terms used in advertisements have psychological effects on buying behaviour of customer. People with varying degrees of knowledge respond to technical information showed in advertisements differently. This variability in consumer knowledge emphasizes the need for an optimal relationship between the technical language used and advertising effectiveness.

But on the other hand with the accumulation of new products every now and then, novice technical terms are forced to show up in the promotion of a new product. This usage of technical terms in advertisements is done to ensure that the product is a level above its rivals in the market and also to lure a potential buyer to go for the product. By this way the product not only sustains in the market but also has a greater chance of trending. However, various factors substantially influence the buying behaviour. These factors include consumer's ability to process knowledge, antecedent conditions and the consequences of processing. The purchase decision is mainly attributed towards the information

seeking nature of the consumer. Several studies have been carried out to relate these consumer level differences and effective advertising.

Stafford (1996) showed that, regardless of product category, as copy became more tangible, attitude toward the advertisement increased. Motes et al. (1992) found that ads using vivid language were rated as being more believable and were more likely to be read than other ads. Percy (1982) reported ads with concrete language and short headlines produced higher attitude toward the brand. A study by Ducoffe (1995) found informative nature to be the single factor most strongly related with the perceived value of advertising. As Motes et al. (1992) points out, though, while psycholinguistic studies have concentrated substantially on ad headlines, too little attention has been directed to ad text. When ad text has been examined, complex technical language is frequently included (Meeds 1998). Although the reading difficulty is measured on the basis of sentence length, word length and word familiarity, there are a number of other dimensions for assessing text difficulty. Bradley and Meeds (2002) manipulated three levels of syntactic complexity in ad slogans and found that moderate complexity enhanced both recall and attitudes. This study is concerned with how these kinds of individual level differences as well as technical level difficulty usage relate the potential buying behaviour of a product.

Analysis

To understand the relationship between the preference to buy the products with technical words and the number of times a customer notices such technical words in advertisement, logistic regression model is used. Logistic regression model is generally used when the dependent variable is Categorical. This article uses binary dependent variable as the response from the respondents to understand their preference to buy the product with technical words. In the terminology of economics, logistic regression is an example of a qualitative response/discrete choice model. The binary logit model is generally used to estimate the probability of a binary response based on one or more predictor (or independent) variables (features). The independent variable used here to estimate the probability is based on the number of times the customer notices the technical words showcased in the advertisements of any product. The respondents had provided us the number of times technical words are noticed in the advertisements through categorical data such as never, sometimes and always. With these two inputs in hand, the logit regression is run on the data.

	Coeff b	*Std Error*	*Wald*	*p-value*
Intercept	-1.91688	0.786649	5.937803	0.014819
Number of times technical words are noticed in advertisements**(x)**	0.500757	0.223732	5.009558	0.025208

The output indicates that the number of times technical words are noticed in the advertisement by the consumer is significantly related to their preference to buy such products (p value = 0.025208). The output also provides the co-efficient for Intercept= -1.91688 and number of times technical words being noticed in advertisement = 0.500757. These coefficients enter in logistic regression equation to estimate the probability of individual's preference to buy such products.

Probability of individual's preference to buy products with technical words = $\frac{1}{1 + \exp(-(0.500757*x - 1.91688))}$

where x is number of times a person notices technical words in advertisements

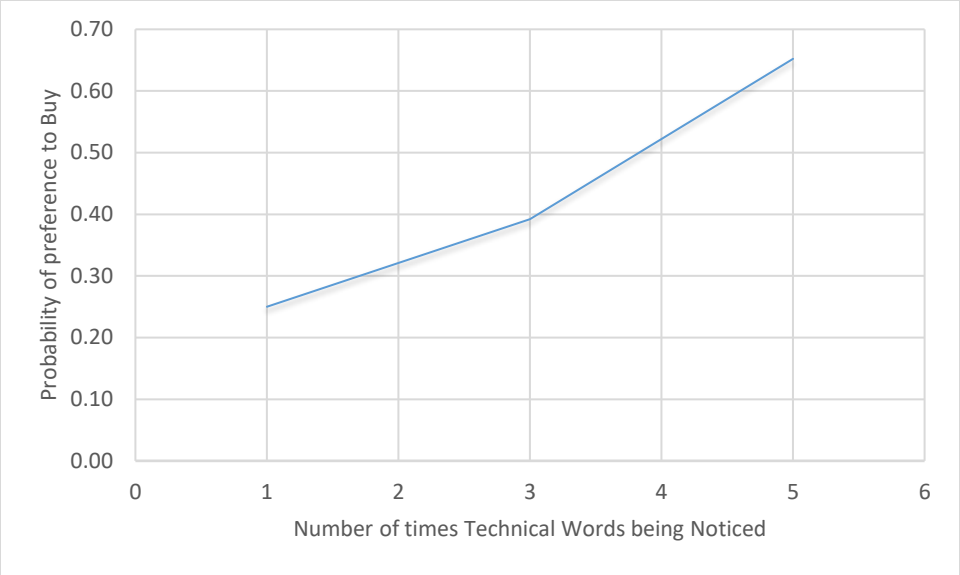
X (i)	*Success (ii)*	*Failure (iii)*	*Total (iv)*	*p-Obs (v)*	*p-Pred (vi)*	*Suc-Pred (vii)*	*Fail-Pred (viii)*	*LL (ix)*	*% Correct (x)*	*HL Stat (xi)*
1	1	3	4	0.25	0.20	0.78	3.22	-2.29	75.00	0.08
3	29	45	74	0.39	0.40	29.44	44.56	-49.55	60.81	0.01
5	15	8	23	0.65	0.64	14.78	8.22	-14.86	65.22	0.01
	45	56	101			45.00	56.00	-66.70	62.38	0.10

Interpretation of Logistic regression table

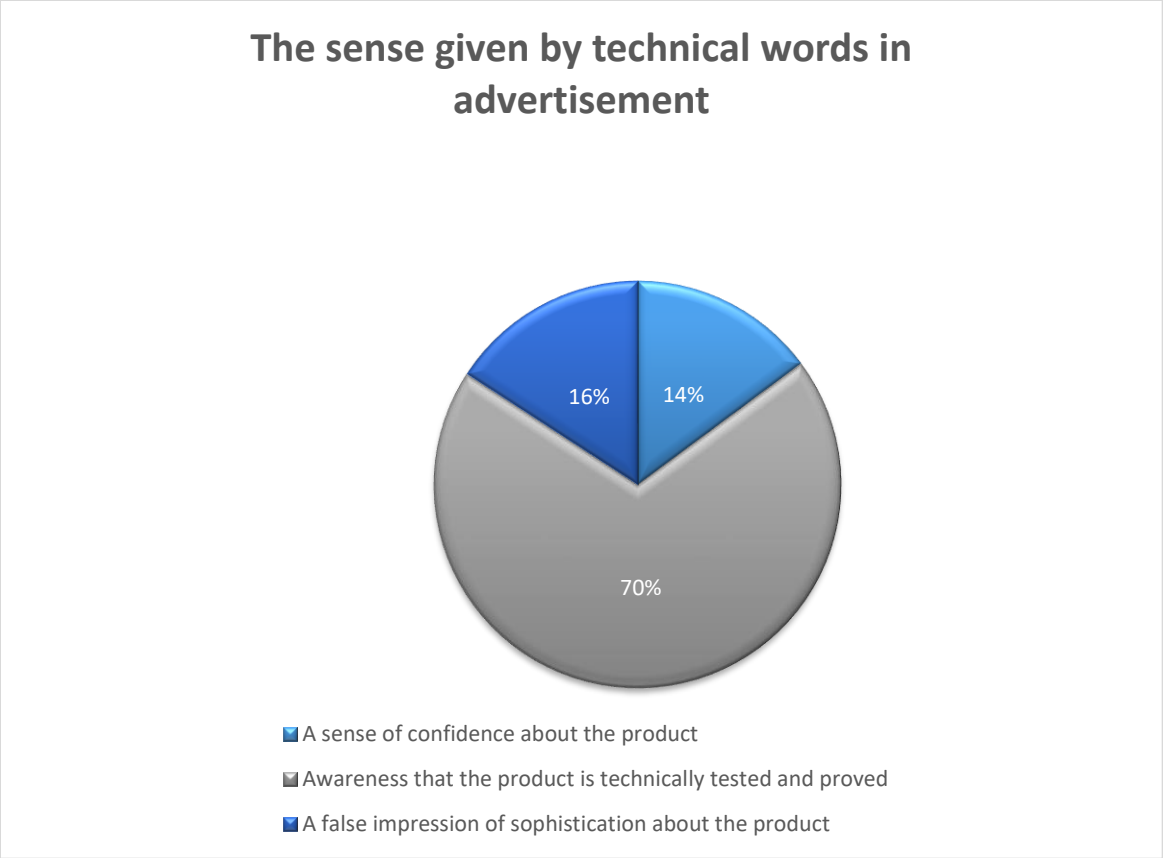
- As mentioned earlier the first column (i) represents the number of times technical words in an advertisement is noticed by individuals. The responses obtained from the respondents were always, sometimes, never which were quantified for research purpose as 5, 3, 1.
- The columns (ii) and (iii) represent number of times the respondent has noticed the technical words in the advertisements and ended up in buying the product and vice versa.
- The column (iv) provides the total value of such observations. T
- he column (v) gives the probability of success of respondents noticing the technical words in advertisement and them preferring to buy the same of data obtained from the respondents is tabulated.
- The column (vi) is the probability for success predicted based on the logit regression model formulae.
- Based on the predicted probability for success the success and failure for conversion is predicted in (vii) and (viii).
- The % of the prediction correctness is presented in column (x)

Observations and Analysis

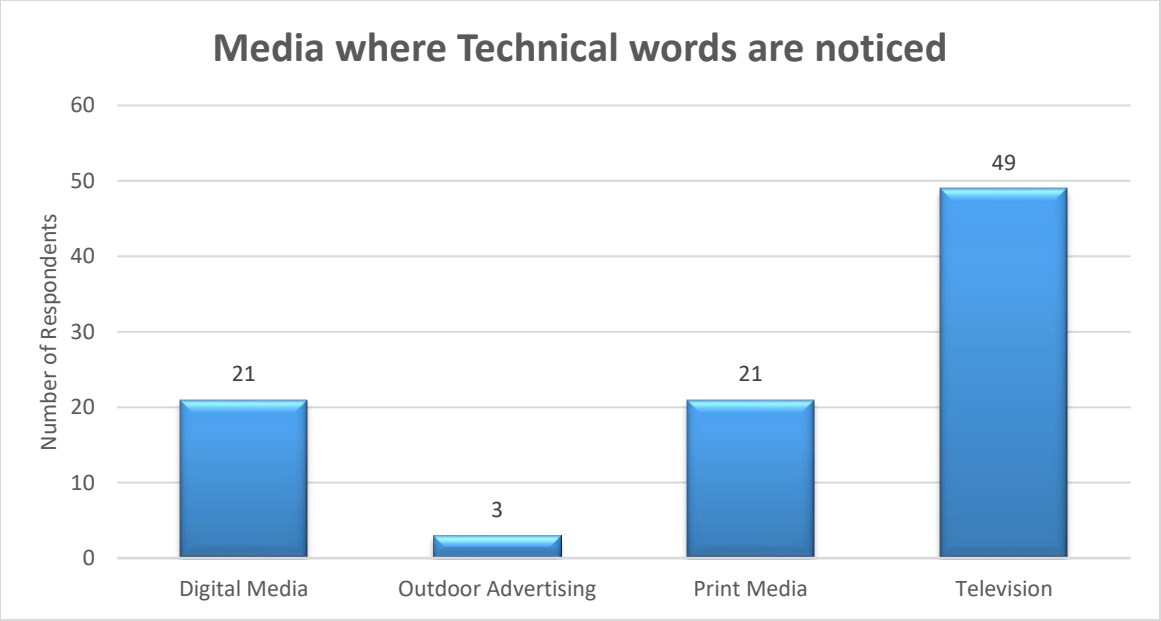
x	*Observed Probability of preferring to buy*
1	0.25
3	0.39
5	0.65



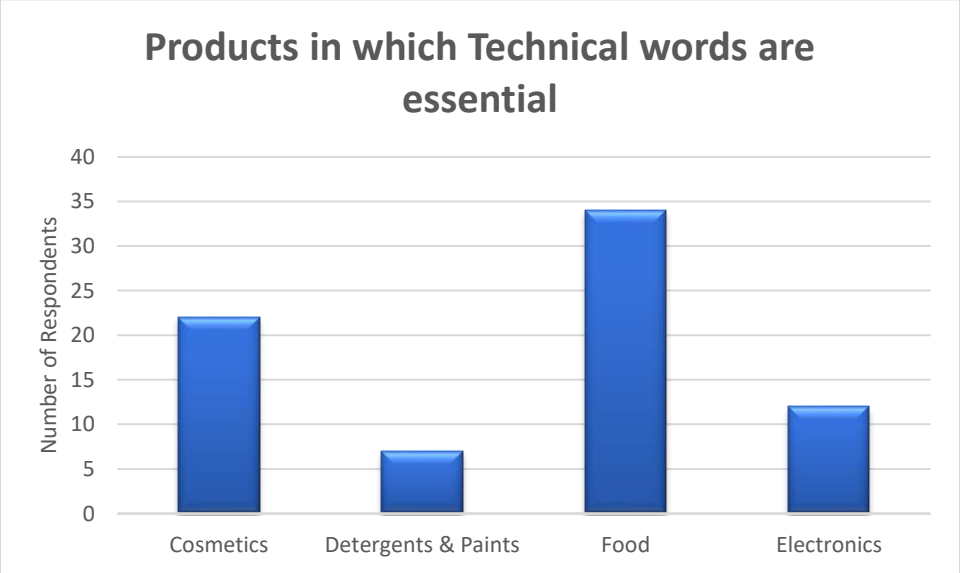
It has been clearly observed from the tabulation and graph that as the individuals start noticing the technical words more often they in turn tend to buy the product. The graph shows an increasing trend, as the number of times an individual notices technical words in the advertisement increases the probability of the person choosing the product increases.



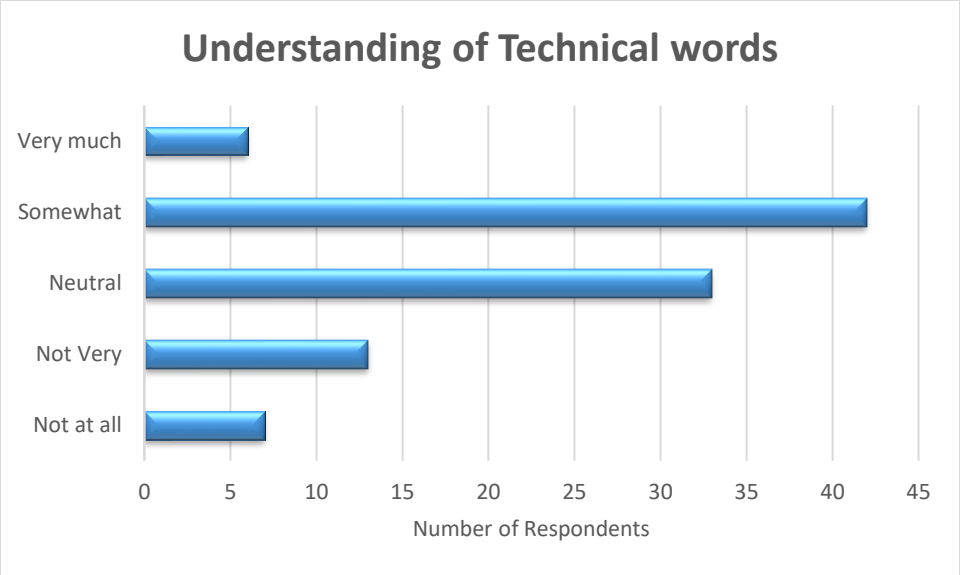
The technical words has been used in advertisements with an attitude to persuade the consumers in choosing the product which showcases the best about it. However, it is not always as expected by the advertisers. When asked about the kind of feeling such technical words imparts in the minds of the audience, it has been identified that about 70% population believes that the product is trustworthy as it has undergone the technical tests or has complied with the standards. 14% population believe that such technical words brings in a confidence about the product in the consumer's mind. However, 16% population feels that's it is a false indication of sophistication about the product to overprice them.



This graph indicates the media in which the technical words are mostly noticed by the consumers. It has been noticed that the technical words has been highly observed in television followed by digital media and then print media. A very meagre population notices technical words in outdoor advertisements.



This graph indicates that the consumers notice technical words more in the products in following order Food > Cosmetics > Electronics > Detergents & Paints. Moreover these are the four essential products which needs to be projected in terms of technical jargons.

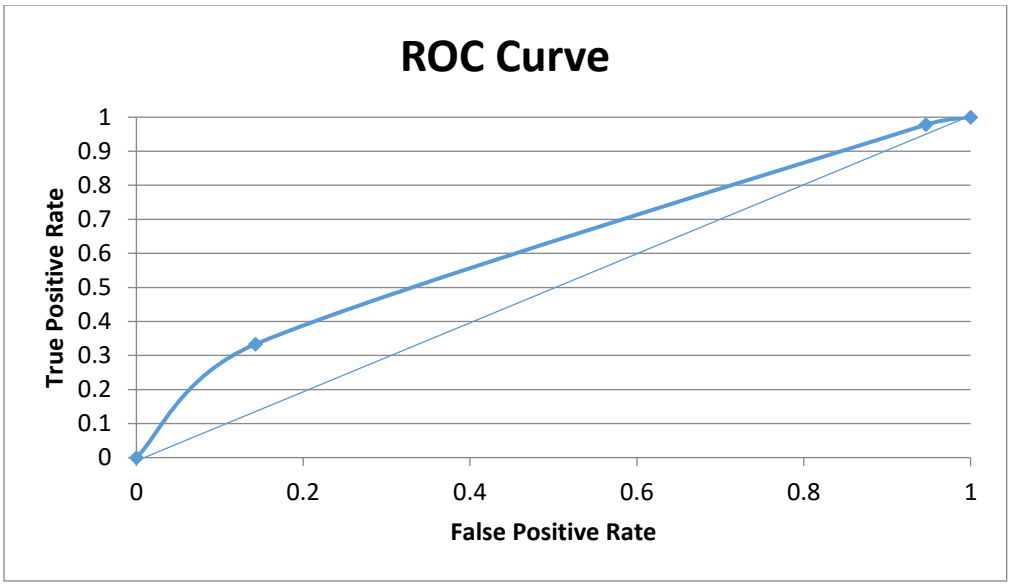


Since the study was conducted amongst the professional education students, it has been observed that they have a decent understanding of the technical words used in the advertisements. Since the study is limited to the students of professional education institute, it can be said a fair representation of similar population rather than about the entire target audience of any product.

ROC Curve

- An ROC curve demonstrates several things:
- It shows the tradeoff between sensitivity and specificity (any increase in sensitivity will be accompanied by a decrease in specificity).
- The closer the curve follows the left-hand border and then the top border of the ROC space, the more accurate the test.
- The closer the curve comes to the 45-degree diagonal of the ROC space, the less accurate the test.
- The slope of the tangent line at a cutpoint gives the likelihood ratio (LR) for that value of the test. You can check this out on the graph above. Recall that the LR for T4 < 5 is 52. This corresponds to the far left, steep portion of the curve. The LR for T4 > 9 is 0.2. This corresponds to the far right, nearly horizontal portion of the curve.
- The area under the curve is a measure of text accuracy. This is discussed further in the next section

p-Pred	*Failure*	*Success*	*Fail-Cum*	*Suc-Cum*	*FPR*	*TPR*	*AUC*
			0	0	1	1	0.053571
0.195271	3	1	3	1	0.946429	0.977778	0.785714
0.397809	45	29	48	30	0.142857	0.333333	0.047619
0.642656	8	15	56	45	0	0	0
							0.886905



Conclusion

This continues to be an evidence against those who say that advertisements should be made simple. With the growing competitiveness amongst products, the situation is more complex for the advertisements to be kept simple. Negative attitudes towards products with technical words arise only at extreme conditions where the product provided is no match to the product promised. In ads for products and services where the overriding goal is to convey information about the product, then a limited degree of syntactic complexity will not decrease the understanding of that information or the attitudes toward those advertisements.

The positive effect of moderate complexity in persuasion using technical jargons in advertisements appear to be caused by the increased cognitive expectations to outrun amongst the competitor's products. It would be essential in future research process to identify at which point the increased cognitive effort becomes futile or dissident.

Reference

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