

THE ROLE OF INFORMATION IN MARKETING DECISION

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Abstract

The study examines the role of information in marketing decisions. The problem of inadequate marketing information has made marketing of products unprofitable and very complex companies are exposed to a lot of losses of financial resources ranging from embezzlement to other anomalies. The objective of the study is to examine the role of information in marketing decision. It used a sample from Nigerian Brewery Plc workers, such as, Sales Manager, Sales Executives, Sales Representatives, Area Sales Manager and Marketing Officers. The study sourced primary data through the use of questionnaire and interview method from the management staff and sales/marketing officers of Nigerian Brewery Plc to investigate the role of information in marketing decision. Secondary sources were; textbooks, sales document, journals and internet facility. The study used statistical tools of frequency table and percentage to present its data, while the chi-square research technique was use to analyze and interpret collected data with reference to our stated hypothesis. It was revealed that the role of information is indispensable in marketing decisions for better performance and higher profitability. Besides, our findings also revealed that proper and effective information management and utilization promote better marketing decisions in organization. The paper therefore recommended that organization should integrate all types of information gathering and management application into marketing policies and operations to maximally make accurate and reliable marketing decision. This can be achieved using information, communication and technology to improve on marketing decision which will in turn reduce information distortions and increased an improved marketing decisions and successes.

Keywords: Information, Marketing, Decision

Introduction

Marketing activities are directed toward planning, promoting, and selling goods and services to satisfy the needs of customers and the objectives of the organizations (Harmon, 2003). Marketing covers all operations in the process of causing goods and services to move from where they are produced to the hands of the ultimate users. The operation includes market research, product selection and design, selection and methods of distribution, personal selling, advertising and other promotion methods, pricing and planning of overall market strategy. Marketing is as much an attitude as a definable function. Thus, attitude linked with clear objectives based on sound market intelligence, approach to all levels of identification and satisfaction of customers' needs resulting in efficient selling of goods and services.

Considering the enormous activities of marketing that require constant and continuous decision making, one can agree with me that proper and adequate correct information are needed. The role of information in marketing decision cannot be overemphasized. As Buel (1966:118-119) stated, to manage a business well is to manage its future and to manage its future is to manage information. He stated further that the marketing system as of now is suffering under what I can refer to as "4C" syndrome, that is costliness, complexities,



competition and conflict operations are becoming very difficult in a very dynamic environment, characterized by continuous and discontinuities. In such a system, there is no substitute for accurate timely cost-effective, relevant and flexible information acquisition and dissemination system. Marketing decision made without information is like groping in the dark. Too much information could be just as dangerous as too little information. In the same vein, one thing worse than no information, is wrong information (Buel, 1966).

Modern marketing decision recognizes the necessity for myths and pitfalls of the marketing information system. Anyway, for marketing decision to be effective and efficient, the relevant organization must appreciate the need for information system with a well-established set of objectives guiding its installation and use. Modern marketing decision recognizes the importance of doing things in a logical and systematic and sequential fashion. Marketing requires conscious efforts in a well-defined direction where decisions are taken based on well researched facts, resulting from the interpretation of raw data into usable information. Modern marketer sees marketing decision as interdependence, but indispensable part of the total organizational system. The modern marketing approach to decisions recognizes the role of information systems approach to marketing where all customers impinging activities must be properly integrated and co-ordinated. The modern marketing decision must have a reasonable appreciation of vital information of financial, production, personnel, research and development, purchasing and other functions of the enterprise and their interrelations with one another and for marketing relationships to be effective and efficient.

Statement of the Problem

Marketing information is the lifeblood of marketing process; marketing decision won't be taken in the absence of marketing information (Sultan, 2012). Marketing decisions are affected by many internal and external environmental variables, so the marketing decision maker needs a great deal of information related to these variables, to predict their directions and their expected effects on the internal activities of the organization and the market, in order to make the rational marketing decisions in an uncertainty environment facing the marketing administration. As such, the role of information in marketing decision cannot undermine considering the fact that the marketing success in the organization depends basically on the availability and the accuracy of marketing information from its multiple sources. Therefore, this study seeks to proffer answers to the following identified research questions:

1. Does information plays any role in marketing decision?
2. Can marketing decision impact on the performance of an organization?
3. Are there situations in an organization that could result in wrong marketing decision?

Objectives of the Study

The main purpose of the study is to find out the relationship between information and marketing decision. While the specific objectives are as follows:

1. To investigate the role of information in the marketing decision making of organizations.
2. To examine the impact of marketing decision on the performance of an organization.
3. To examine the situations that could compel wrong marketing decision in an organization.

Statement of Hypotheses

The hypotheses that shall guide this study are as stated below:

1. **H₀:** Information does not play any role in marketing decision in an organization.
2. **H₀:** Marketing decisions does not impact on organizational performance.
3. **H₀:** There are no situations that could compel wrong marketing decision in an organization.

Conceptual and Theoretical Framework

According to the Nigerian College of Accountancy (2010) lecture note; information can be defined as data that have been processed in such a way as to be useful to the recipient. That is, information is knowledge and understanding that is usable by the recipient. It describes good information as that which is relevant, understandable, reduces uncertainty, aids monitoring and control, a means of communication, supplement the memory and aids simplification (NCA, 2010). This implies that information is crucial to realizing the aims and objectives for setting up any organization.

The Concept of Marketing Information System

According to Sultan (2012), marketing information system plays an important role in raising the efficiency of economic performance to the companies in highly competitive markets, through providing the necessary information for the various administrative levels. The success of the marketing process depends to a large extent on the marketing information system and the success in each elements of this system. Marketing information system has been needed by marketing management for the purpose of identifying, measuring, and forecasting marketing opportunities, besides, analyzing of market segments.

Marketing information system consists of people, facilities, and integrated procedures that used to provide management with accurate and regulated information about the environment-related marketing, which helps decision makers to hunt opportunities and build strategies and marketing plans. Kotler realizes that marketing information system is a compound network, composed of interrelated-relations between people, machines, and procedures to provide a flow of structured information, relying on the internal and external sources of the institution that directed mainly to the formation of marketing decisions base (Kotler, 2002).

Despite the fact, that there are large and variety numbers of marketing information system definitions, but all of them are focused in one sense which is: the marketing information system is a structure composed of personnel, equipment, that ensuring the flow of internal and external information, which allows the spread and control of the organization's external environment, and the rationalization of marketing decisions. Marketing information system consists of:

Internal records: The data collected in the form of database about the daily operations of the companies that produce medicines (under study), and includes the necessary data records to obtain information regarding the scale of activity and the current performance in sales, cost, inventory and cash flow, etc.



Marketing intelligence is the means by which management can keep in contact with new knowledge of competitors emerging conditions.

Market Research: Is the process of collecting and analyzing of data for the purposes of identifying and resolving problems related to companies marketing services and marketing opportunities, it's a planned and managed activity on a scientific basis to ensure efficiency in dealing with those problems and opportunities. Marketing information system is designed properly to solve many information problems facing the administration, like the wrong kind information, in the wrong location, at the wrong time, and the insufficient correct type of information, in the correct location, at the right time (Terrence, Denise & Geoffrey, 1995).

Marketing information system can support managers in their marketing decision making by providing them with internal linking and operational integration between departments or sections. It also can increase the ability to respond to the Organizational dynamic system environment, allows the most efficient handling, and organize and store data. Effective marketing information system helps in directly developing and improving the work service as a part of the product itself, or indirectly through increased responsiveness to the needs of the client.

Organizations could benefit greatly from the analysis of customer data to determine their preferences to improve marketing support decision. Managers face environmental variables and fast competition, which requires them to be more competitive through better decision-making. The decision can be regarded as an outcome of the production activity; its input includes the individual's intellectual efforts or marketing group. The modern developments in computer technology have provided computer-based techniques to manipulate the development of decision support systems (DSS) that can play an important role in the progress of the company [Alexandra, 2005].

There are many opportunities for the applications of information systems in the field of marketing. Information systems help the company to manage the increased flow of information, and improved their quality. There is an increasing interest in the use of marketing decision support systems, which designed for the use in complex marketing decision-making problems [Talvinen, 1995]. The marketing information system is the system that includes individuals, equipment, and procedures for the collection, classification, conservation, analysis, evaluation, and distribution, the accurate and timely required information to marketing decision-makers. It also defined as a set of procedures and methods for the analysis of the planned and systematic information for the use in decision-making. This definition has been developed in 1969 through the division of marketing information to planning, control, and research information [Li, Mcleod & Rogers, 1993].

There is a considerable interest in the marketing information system comparing with the other information systems in other fields such as production, finance, and personnel; it is based on the exceptional attention which related to two key properties of the marketing function: the importance of marketing function and its complexity. Marketing information system has been viewed as the main step towards the integrated marketing as a result of the lack of control over the elements of the marketing environment, and the problems of marketing [Raymond and John, 2001].



Theoretical framework

Many concepts and theories exist to address the role of information in marketing decision. Some of these theories are on information approach, marketing approach and decision-making approach of organizations. For this study, the study considered ideal and relevant to present fundamental concepts on the study and systems theory.

Marketing concept holds that in modern business enterprises, marketing is central to the firms operation. According Ezeokafor (1994) management should begin with marketing and work backwards. All facets of the business, be they production, finance, engineering, should be oriented to the demands of market. As managerial efforts in all functional areas are directed to the task of serving market opportunities, marketing becomes a philosophy of action utilized to achieve corporate growth. This position becomes more crucial because we attempt to satisfy our market under conditions of intense competitive choice, where the potential buyer goes through of complex evaluation process influenced by several factors before he purchases. The achievement of corporate goal therefore is intricately moved around the creation and retention of satisfied customers. The organization as a whole must systematically respond, not just to their changing needs and tastes by proper marketing decision using available information. The firm must be considered, not just as a producer of products, but as a provider of customer crating value satisfaction. The creation of satisfied customers of the true purpose of business in the wider application of marketing philosophy, it characterizes a democratic society. The higher the degree of consumer orientation, the more the buyer enjoys freedom of choice in the marketing place. Research for consumer preferences results in competitive advantage consumers become the electorate whose preferences determine what is to be offered on the market. As a philosophy of business, marketing implies a co-ordinated effort. This in turn recognizes the existence of a related or integrated system.

According to the systems theorists, “a system is essentially an assemblage of things interconnected or interdependent, so as to form a complex unity” (Koontz et al 1982:70). An important element in the systems approach is the emphasis on input-output-analysis. Worthy of note is that a system needs support from its environment in order to survive the system approach recognizes variety and offers away of interrelating differences by reconciling them within the whole this is an approach which emphasized theory and conformity. Relating this systems theory to marketing decision, it emphasizes inter-relationships among:

- (a) Actions of marketing managers
- (b) Firm’s total marketing effort
- (c) The internal organization of the marketing department.

In this way, we conceive the firm as a total system of management action with each functional department as a subsystem. Marketers must integrate successfully the subsystems by proper information utilization during decision making to achieve optimum results.

According to Cundiff et al (1980), marketing as a business has developed as a result of recognizing that the success of an organization often depends upon decision which requires knowledge of the organization’s customers and the needs of these customers. In the short-term, these decisions are likely to be concerned with meeting the needs of customers effectively. In the long-term, they are likely to focus more on the organizations need to respond to the ever changing expectations of customers and the users of its products and services and what has already been introduced as the marketing environment. Included within the marketing



information category is information such as who the organization expects to have as its customers, estimates, how many are customers of the competition, how much they will pay for the product or service and how customers might learn about the availability of the product or services.

According to Adcock et al (1993), it is useful to classify marketing information in terms of three main categories. These respectively relate to:

1. The client, customers or users served by an organization.
2. The product or services being provided, and
3. The environment in which the product or services are produced, provided, supplied and used.

Donnelly et al (1970) said information processing is designed to improve the overall quality of the information. There are five supporting services of information processing in marketing decision. According to the writers, the first is evaluation which involves determining how much confidence can be placed in a given piece of information such factors as source credibility, reliability and validity of the data must be determined. Second information processing service is that of abstraction. This involves editing and condensing incoming information in order to provide the executive with only that information which is relevant to his particular task.

Once information has been gathered, the service of indexing is very important. The purpose of indexing is very important. The purpose of indexing is to provide classification for storage and retrieval purposes. Fourth information processing service is that of dissemination which entails getting the right information to the right decision maker at the right time. Indeed, this is the overriding purpose of an information system. The final information processing services is that of storage. Every information system must provide efficient storage of data in order that it can be used again if needed.

According to Donnelly et al (1970), information utilization dictates that the marketing information unit must assist in more than just information gathering and processing. It must provide addition support in aiding the executive in utilizing the information. This means that the organizational unit must include specialists in statistics, psychology, economics and operation research in order to determine executive needs and interpret research results. It is a waste of both time and money to collect redundant or superfluous information. The marketing information unit within the organization does not focus on specific problems. Instead, it acts as a thermostat that monitors the external operating environment and facilities information such as who the organization expects to have as its customers, estimates how many are customers of the competition, how much the will pay for the product or service and how customers might learn about the availability of the product or services.

White More et al (1990) said that information can be classified according to three different levels as follows:

1. Symbolic: At this most basic level, the focus is limited to accurate encoding, transmission and decoding data as a string of symbols.
2. Semantic: The level build upon the symbolic level by examining the semantic context within which the flow data occur the symbols must represent a vocabulary and be a format that is understood by the recipient.
3. Effective: This is a behaviourist interpretation of information. It presumes symbolic and semantic accuracy and further stipulates that the received message can only be



identified as information if it has some impact on the decision process. If information is not useful it is no information. This is as much restrictive perspective of information but it is consistence with the idea that information must tell the receipt something new. According to Donnelly and Irance (1970), qualities of information include “accuracy, verifiability, completeness, relevance and timeliness”. The accuracy quality of information refers to the degree to which information is usually assumed to be accurate unless it is presented otherwise. Sometimes, it is not economically feasible to collect information that is hundred percent accurate. The timelessness of information up to data information on today’s market trends may be of significant value to an executive. The same information will have less values in a month and probable no value in a year. The computer has contributed more toward improving the other information qualities. The power of today’s computer has made it possible for managers to have the right information at the right time.

The relevance quality of information refers to the appropriateness of the information as overload that occurs when the volume of available information is so great that the decision maker cannot distinguish. Relevant information overload is the accumulation of information that is not relevant to particular decision. Appleby (2003) wrote that information is collected by everybody through the media and people pick out those items that interest them. In business, certain information is needed and it is important that it is known where to find it and how to collect; careful planning is needed of the study and the precise formulation of its purpose, scope and objectives. Data taken from a company’s internal records for instance production, marketing and finance data is specific to the business itself. External data is that obtained from outside the organization for instance public and government. This could be information on population, unemployment or finance. These are type of sources of information for marketing decision of the company.

Vroom and Yetton (cited in Croft, 1996) described decision making as a “resolution to adopt a particular course of action in preference to alternative policies”. Similarly, Bedein (1986) defines decision making “as the act of choosing between two or more alternatives”. Decision making therefore entails identifying alternatives and selecting the one adjudged the best. The process of identification and selection of alternative courses of action can occur under different conditions. It is worthy to note that decision making is often a conscious and deliberate action.

According to Etzioni (1968) decision making is the most deliberate and voluntarist aspect of societal conduct. Relating decision making to marketing, there are key areas in which marketing managers have to make decisions that correspond to the four components of the marketing mix namely: product, price, distribution and promotion (Anyade 2003).

Research Methodology

The Research Design

The approach adopted in the execution of the study was a survey design. The researcher chose survey design as it is one method where a group of people is studied by collecting information from them. Moreso, this type of design specified how the researcher’s data were collected and analyzed. So, the design was specified to use questionnaire and oral interview. This survey was used by the researcher to source for his primary data.

Research Sample and Sampling Techniques

The researcher sampled a total of one hundred and twenty (120) persons, with a total of 25 senior staff and a total of ninety five (95) middle and junior staff categories of the Nigerian Brewery Plc. Our focus was to seek their opinion on what role do they think information plays in the marketing decisions of organizations. The researcher sampled this number because it was not possible to use the entire population of the Nigerian Brewery Plc for this research, but rather we are more interested in seeking the opinion of those staff that deals in information handling and processing and that have the basic knowledge of what marketing decision really entails.

In the choice of the sample population for this study, the researcher used simple random sampling technique. The technique provided each member of the entire target population equal and independent chance of being selected or included in the sample. Another reason why the researcher chose the technique is that it is a simple and easy probability sampling technique in terms of conceptualization and application. The researcher shared the questionnaire in the staff offices and at their duty posts, likewise the oral interview.

Presentation and analysis of data

Presentation of data

In all, a total of 120 questionnaires were administered, however a total of 105 questionnaires were duly filled and returned. All the data collected from primary source through questionnaire and oral interview were statistically presented and analysed. Frequency and tabular percentage forms were used for data presentation while Chi-square t-test was used test and analyse some selected hypotheses as not all were analysed due to time constraints. The data for this study is hereby presented and analyzed below using the Simple Percentage and the Chi-Square statistical technique for test of Hypotheses.

Table 1: Sex Distribution of the Respondents

Gender	No of Respondents	Percentage (%)
Male	72	68.6%
Female	33	31.4%
Total	105	100

Source: Field Work, 2014

The Table above shows that 72 respondents representing 68.6% of the total respondents are male while 33 respondents representing 31.4% are female.

Table 2: Age Distribution of Respondents

Age Distribution	No of Respondents	Percentage (%)
18-25	15	14%
26-30	45	43%
31-40	30	28%
41-50	10	10%
50 and above	5	5%
Total	105	100

Source: Field work, 2014

The Table above show that 15 respondents representing 14% of the total respondents are between 18-25 years, 45 respondents representing 43% of the total respondents are between 26-30 years, 30 respondents representing 28% of the total respondents are between 31-40 years, 10 respondents representing 10% of the total respondents are between 41-50 years while 5 respondents representing 5% of the total respondents are 50 years and above.

Table 3: Respondents' response on whether they agree that there is a relationship between information and marketing decision.

Option	Respondents		Total	Percentage (%)
	Male	Female		
Strongly Agree	55	22	77	73%
Agree	13	5	18	17%
Strongly disagree	2	3	5	5%
Disagree	1	2	3	3%
Undecided	1	1	2	2%
Total	72	33	105	100

Source: Field Work, 2014

From the table above, it shows that 77 respondents representing 73% strongly agreed that there is a relationship between information and marketing decision, 18 respondents implying 17% agreed to that as well; but 5 respondents representing 5% strongly disagreed, 3 respondents representing 3% merely disagreed while 2 respondents representing 2% were undecided.

Table 4. On whether they agree that information play any role in marketing decision making in the Nigerian Breweries Plc

Option	Respondents		Total	Percentage (%)
	Male	Female		
Strongly Agree	62	25	87	82%
Agree	5	4	9	9%
Strongly disagree	2	3	5	5%
Disagree	1	1	2	2%
Undecided	2	-	2	2%
Total	72	33	105	100

Source: Field Work, 2014

The result in table above indicates that 87 respondents strongly agreed that information plays important role in marketing decision making in the Nigerian Breweries Plc representing 82%, 9 responses from respondents merely agreed which amount to 9%, 5 respondents strongly disagreed which indicated 5%, 2 respondents representing 2% disagreed while 2 respondents representing 2% were undecided.

Table 5: On whether they agree that marketing decisions can impact on the performance of Nigerian Breweries Plc

Responses	Respondents		Total	Percentage (%)
	Male	Female		
Strongly Agree	47	12	59	75%
Agree	18	15	33	12%
Strongly disagree	3	3	6	6%
Disagree	3	2	5	5%
Undecided	1	1	2	2%
Total	72	33	105	100

Source: Field Work, 2014

The table above indicates that 79 respondents representing 75% strongly agree that marketing decisions can impact on the performance of Nigerian Breweries Plc, 13 respondents agree to it representing 12%, 6 respondents strongly disagree account to 6% and 5 respondents representing 5% disagree while 2 responses which indicate 2% are undecided.

Table 6: On whether they agree that situations in the Nigerian Breweries Plc could sometimes result in wrong marketing decisions

Option	Respondents		Total	Percentage (%)
	Male	Female		
Strongly Agree	45	14	59	56%
Agree	12	8	20	19%
Strongly Disagree	10	3	13	12%
Disagree	3	5	8	8%
Undecided	2	3	5	5%
Total	72	33	105	100

Source: Field Work, 2014

The Table above shows that 59 respondents believed that situations in the Nigerian Breweries Plc could sometimes result in wrong marketing decisions representing 56%, 20 respondents agreed to this as well representing 19%, 13 respondents strongly disagreed representing 12%, 8 respondents representing 8% disagreed as well while 5 respondents representing 5% were undecided.

Analysis of data

In analysing our data, we shall recall our statement of hypotheses one, two and three with references to the presented tables above that have direct bearing on stated objectives and hypotheses.

Recall statement of hypothesis one

Hypothesis one; H₀: Information does not play any role in marketing decision in an organization.

With reference to table 4.1.4 above, using the Chi-Square research technique formula to test our stated hypotheses, we have:

The formula for the computation of Chi-square (χ^2) is given below: the Chi-square method denoted by;
$$\chi^2 = \frac{\sum(f_o - f_e)^2}{f_e}$$

Computed result is presented in a tabular form as below:

Table 7

VARIABLES	N	T Cal.	T Crit.	df	Prob.	Remark
Male	72					
Female	33	8.77	5.99	4	0.5	Reject H ₀
Total	105					

Source: Researcher's χ^2 Calculation, 2014

Decision making: from the chi-square research technique, we observed that the calculated result is greater than the table result at the 5% level of significance i.e. $8.77 > 5.99$. Therefore, we reject the null hypothesis that Information does not play any role in marketing decision in an organization.

Recall statement of hypothesis two

Hypothesis two; H₀: Marketing decisions does not impact on organizational performance.

Using the Chi-Square research technique formula to test our stated hypothesis two with the content of table 4.1.8 as well, we have: The formula for the computation of Chi-square (χ^2) is

denoted by;
$$\chi^2 = \frac{\sum(f_o - f_e)^2}{f_e}$$

Table 8

VARIABLES	N	T Cal.	T Crit.	df	Prob.	Remark
Male	72					
Female	33	8.68	5.99	4	0.5	Reject H ₀
Total	105					

Source: Researcher's χ^2 Calculation, 2014

Decision making: from the Chi-square research technique, we observed that the calculated result is less than the table result at the 5% level of significance i.e. $8.68 > 5.99$. Therefore, we reject the null hypothesis that marketing decisions does not impact on organizational performance.

Recall statement of hypothesis three

Hypothesis three; H₀: There are no situations that could compel wrong marketing decision in an organization.

Using the Chi-Square research technique formula to test our stated hypothesis two with the content of table 4.1.9 as well, we have: The formula for the computation of Chi-square (χ^2) is denoted by;
$$\chi^2 = \frac{\sum(f_o - f_e)^2}{f_e}$$

Table 9

VARIABLES	N	T Cal.	T Crit.	df	Prob.	Remark
Male	72					
Female	33	7.78	5.99	4	0.5	Reject H ₀
Total	105					

Source: Researcher's χ^2 Calculation, 2014

Decision making: from the Chi-square research technique, we observed that the calculated result is less than the table result at the 10% level of significance i.e. $7.78 > 5.99$. Therefore, we accept the null hypothesis that there are no situations that could compel wrong marketing decision in an organization.

Findings

The result of presentation and analysis of data using statistical tools revealed much on the role of information in marketing decision as follows: it was found that:

1. The role of information to marketing decision is highly significant.
2. Contribution of information to marketing decision is high.
3. Information is necessary for marketing decision making.
4. Information has contributed significantly to marketing decision making.
5. Information and decision making can affect the organization performance significantly.
6. There are situations that could compel wrong marketing decision in an organization.

Discussions

The implications of the findings can be discussed as follows:

- i. We found that the role of information to marketing decision is highly significant the implication of this finding is that organizations must gathered enough information before making any effective and efficient marketing decision in order to succeed.
- ii. Secondly, we found that information has contributed significantly to marketing decision making. The implication of the finding is that companies should not only rely on the present but on the past contributions of information for future marketing decision making.
- iii. Thirdly, we also found that information is necessary for marketing decision making. The implication of the finding is that companies should not regard information as secondary matter during marketing decision making. This is because; there are situations that could compel wrong marketing decision in an organization.

Conclusion and Recommendations

Business organizations should develop and continue to apply culture of information gathering and utilization when making marketing decision. The importance of correct, accurate and relevant information in efficient and effective marketing decision cannot be overemphasized in the modern globalization era. Every organization should utilize modern information, communication and technologies as part of production inputs especially in matters concerning marketing decision. The marketing decisions drawn and based on information, communication and technologies can be easy ways of reaching potential and existing customers in a rapid method. The study recommends improvement, acquisition and utilization of both experts and modern information processing machines. It is such that, output and outcome when validated and reliable can be used for marketing decisions.

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