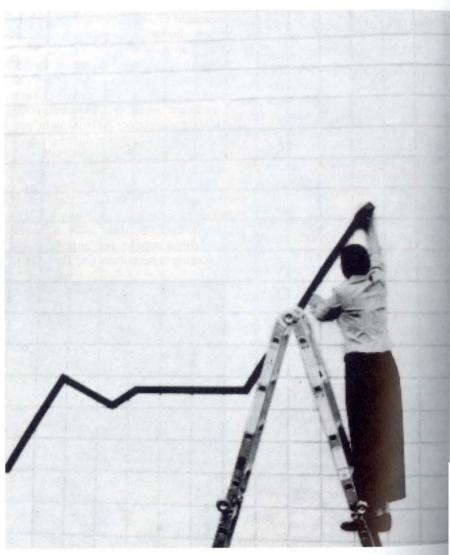
# ACCOUNTANT

# **Error: What Error?**

Over the years research has become more popular locally and various entities have made increasing use of it. It can also be said that popular television programmes like 'Xarabank' and newspapers have also 'discovered' the drawing ability that viewers and readers can bestow from their basic 'thirst to know'.



Prof. Albert Caruana holds a Ph.D. in Marketing and lectures at the Centre for Communication Technology at the University of Malta. He is the author of numerous papers in peer



reviewed academic journals that include the Journal of Business Research, European Journal of Marketing and the Journal of Services Marketing amongst others. Managers are continuously faced with the need to make decisions that have a customer impact. A basic tenet of marketing is that good decisions require an understanding of customers. The question is of course how on earth do you understand the customer? The spontaneous yet somewhat naive reply to this question is market research. Yet there are innumerable situations where businesspersons have made critical business decisions without ever undertaking research. Many times they rely on a 'gut' understanding of customers, often based on their market experience. This in effect is a dis-

Market research is undoubtedly one of the important building blocks in marketing as it provides a useful input for effective decision-making

## ACCOUNTANT

tilled, albeit perhaps not a very scientific, approach to market research that can still be quite effective.

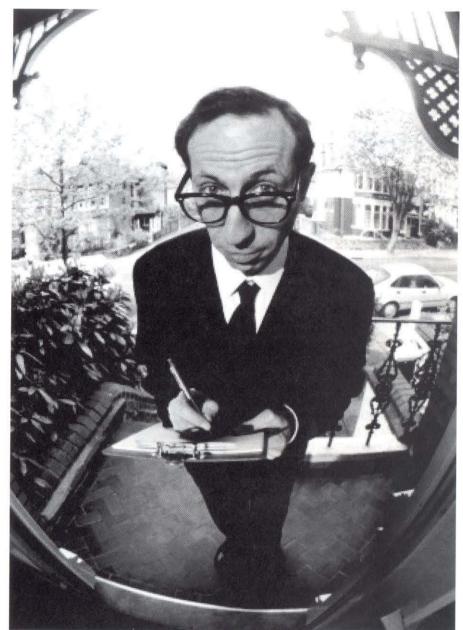
#### ASKING THE 'RIGHT' QUESTIONS

Market research is undoubtedly one of the important building blocks in marketing as it provides a useful input for effective decision-making. While a 'gut' feeling grounded in an understanding of human behaviour is indispensable, it may at times not be sufficient. One of the most challenging aspects of market research involves asking the 'right' question. This requires a good understanding of what makes consumers 'tick' and we in marketing have borrowed from various disciplines to build theoretical models that explain consumer activities.

A failure to ask the right questions that helps management address the problem being encountered will undermine the entire research process. An example may help explain things better. Let us say a firm faces a decline in market share - a problem – what research questions do you need to ask to collect data that when analysed can help you make an informed choice? Well, much depends what you believe to be behind the problem. The decline in market share is a symptom and like the medical doctor, you as the researcher, must look for the cause. If the researcher and the firm's management think it is a decline in the image of the firm or its products with customers that is resulting in the loss of market share, then you have a clear researchable issue that can enable the formulation of relevant questions. If the research focus is not clear it will matter little that one undertakes significant care in the data collection process and makes use of some of the more sophisticated statistical techniques for analysis. The net result will still be 'Garbage in, sophisticated garbage out'!

#### No such thing as error free RESEARCH

The point to remember in research is that there is no such thing as error free research. Indeed, the research process is a never-ending struggle



### Indeed, at times, attempts to improve return rates by giving some sort of inducement - chance to win a holiday, discount voucher or whatever - actually introduces another error

involving tradeoffs that need to be made to reduce error in the knowledge that you can never completely eliminate it. When one looks at much of the commercial research undertaken it becomes clear that much of the focus is often directed at reducing sampling errors. This involves concern with such things as sample frames, sample size and

designing and selecting the questionnaire. While these are useful pursuits there is a critical need to also tackle non-sampling errors that include non-response and measurement error. In much of the commercial research these aspects tend to be given less importance or totally ignored, especially in the case of the latter. However, failure to consider

# ACCOUNTANT

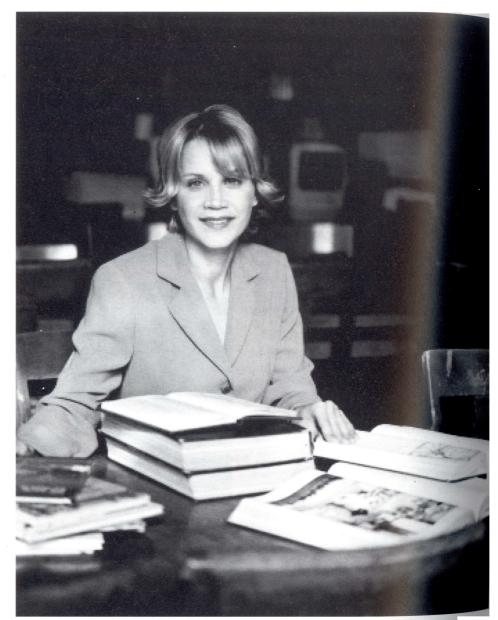
these aspects is just as likely to put into serious question the results of the research.

#### LOW RESPONSE RATES DO NOT NECESSARILY INVALIDATE RESULTS

Non-response error is the error that creeps in when the researcher is unable to locate the identified respondent in a chosen sample. This may arise from the respondent not being at home when the researcher calls. Worst still, it also results when the respondent is located but is unwilling to participate. Such an error is particularly significant in postal surveys where the return rates are relatively low. Often you are doing well if you achieve a 25 percent return with household surveys and 15 percent return with corporate respondents. The assumption often made is that such 'low' returns indicate unreliable results.

There is no doubt that the higher the completed return rate the happier you as the researcher will be but even high return rates offer no guarantee of better representation. Indeed, at times, attempts to improve return rates by giving some sort of inducement - chance to win a holiday, discount voucher or whatever- actually introduces another error. In such circumstances it is very likely that the sample is not typical of the population and will include an over-representation of those in the population motivated by such inducements. More is not necessarily better! It is possible that results from a 15 percent response rate can be as accurate, or more accurate, than those from a 60 percent return. The real point is whether those that have replied are significantly different from those that have not!

How do you determine this? The simplest way to derive some comfort of the representitiveness of your sample is to compare your sample demographic characteristics with those of the population you are investigating when, and if, this is known. Alternatively, there are a few statistical techniques one can use to deal with the issue. Without comfort in this area generalisations from the



sample to the population are rather questionable.

# ARE YOU OBTAINING A TRUE' SCORE?

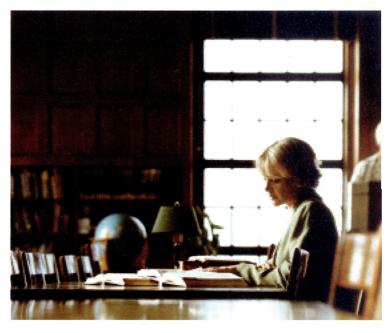
Another major area of concern is that relating to measurement error. At the end of the day, what are we trying to do when we ask questions? Essentially we ask questions to which we hope respondents provide a 'true' score. The key issue here is validity that includes reliability. Reliability represents the extent to which questionnaires or measures are free from random error that results from activities that include carelessness and aye-saying by respondents. In market research, questionnaires are our measuring Reliability represents the extent to which questionnaires or measures are free from random error that results from activities that include carelessness and aye-saying by respondents



instruments because for the marketer these are equivalent to the rulers, thermometers and other measurement instruments used in the physical sciences. It is therefore critical that the reliability of the measures used is assessed. In recognition that it is not possible to have complete reliability when dealing with measures of human behaviour, researchers have developed statistical techniques to determine the degree of reliability of an instrument. An instrument is deemed to be acceptable for research purposes if it exceeds a broadly agreed threshold.

However, an instrument can be reliable without being valid in the sense that it may not be measuring what it purports to be measuring. You may think that you are measuring respondents' perception about the environment and what you are really measuring may be political party loyalty! Repeating the research over time may give you a similar and therefore a reliable score but you may not be measuring what you think you are. In such circumstances, the research lacks validity. Validity is a broad area in its own right and suffice it to say here that we can distinguish among content, predictive and construct validity. While content validity essentially involves a subjective assessment of the questions or items in a questionnaire, predictive and the various types of construct validity requires statistical assessment.

If you have read so far you are probably starting to wonder if it is worth bothering with market research. To which I hasten to answer with an emphatic yes! Conducted with care and with full knowledge of its possible limitations research can provide very useful insights that can improve decision making and identify opportunities in the market that can be profitably pursued. ◆



# Your Bank in the Mediterranean

Malta

OLKSBANK

Do you need a reliable, competent banking partner in Malta? Volksbank Malta Limited offers full financial services to Customers not resident in Malta.

- Private Banking
- Home Loans
- Corporate Banking
- Trade Finance
- Financial Engineering



For further information or appointments kindly contact Volksbank Malta Limited 53 Dingli Street Sliema SLM 09 - Malta Tel.: +356 - 336 100 Fax.: +356 - 336 090 E-mail: info@volksbank.com.mt Website: www.mt.volksbank.at

# **Trust is our Commitment**