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## Two sides of market orientation and the link to performance

Tim Coltman

*University of Wollongong*, [tcoltman@uow.edu.au](mailto:tcoltman@uow.edu.au)

Timothy M. Devinney

*Australian Graduate School of Management*, [timdev@agsm.edu.au](mailto:timdev@agsm.edu.au)

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### Abstract

The impact of a market-oriented strategy on business performance remains an open question. One of the reasons for this is that virtually all the work conducted in marketing has viewed market orientation as a reflective unidimensional structure. In this study we demonstrate that two measures of market orientation (i.e., reactive and proactive) are related, but essentially separate constructs. The results show that proactive market orientation has a significant and positive mediating effect between resources and performance while reactive market orientation appears to be losing its effectiveness.

### Keywords

Two, Sides, Market, Orientation, Link, Performance

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# Two Sides of Market Orientation and the Link to Performance

Dr Tim Coltman

*School of IT and CS, University of Wollongong, Australia*

Email: tcoltman@uow.edu.au

Professor Timothy M. Devinney

*Australian Graduate School of Management, Sydney, Australia*

Email: T.Devinney@agsm.edu.au

## ABSTRACT

The impact of a market-oriented strategy on business performance remains an open question. One of the reasons for this is that virtually all the work conducted in marketing has viewed market orientation as a reflective unidimensional structure. In this study we demonstrate that two measures of market orientation (i.e., reactive and proactive) are related, but essentially separate constructs. The results show that proactive market orientation has a significant and positive mediating effect between resources and performance while reactive market orientation appears to be losing its effectiveness.

*Key Words: market orientation, performance*

## INTRODUCTION

The market orientation concept has long been a cornerstone in marketing strategy. It stipulates that organisations should allocate resources to the systematic gathering and analysis of customer and competitor information, and to make use of this knowledge in guiding a customer linking strategy (Hunt and Morgan 1995 p.11). For marketer's the emphasis placed on maintaining a market orientation is not surprising as the main tenets of this view—customer-oriented thinking, customer analysis and understanding—are truly fundamental to the discipline. However, despite the concept's apparent credibility, the academic literature has suffered from diverse and inconsistent measures and practitioners have still not fully capitalised on the notion (Mason and Harris 2005).

From the outset, market oriented research has been supportive of the proposition that market-oriented organisations achieve better *performance outcomes* than less market-oriented firms. A review of 50 studies by Langerak (2003) confirms that 52 percent reported a positive bottom-line

improvement in performance by deploying a market orientation. This direct relationship has also been found in an Australian context (Dawes 2000).

Yet, a closer look at the empirical evidence indicates that the predictive power of market orientation is still an open question (Langerak 2003). For example, Agarwal and Erramilli (2003) report no direct relationship, while Grewal and Tansuhaj (2001) encounter mixed results. These inconsistent findings imply that either the theory underpinning market orientation does not hold generally or the measures used to operationalise the construct are incorrect. In this paper we draw on a recent study of 100 Australian companies to show that current scales may not be completely valid and we utilise a more accurate measure of market orientation to develop a greater understanding of its impact on performance.

## **THEORETICAL BACKGROUND**

Conceptually, scholars have measured market orientation from behavioural and cultural perspectives. The cultural stream describes market orientation as a culture that commits the organisation to the continuous creation of superior value for customers (Deshpande *et al.* 1993). However, culture is a difficult domain to define and measure and, as a consequence, most of this research has typically measured market orientation in terms of behaviours.

The behavioural stream of research describes market orientation in terms of specific behaviours related to the organization-wide generation, dissemination and responsiveness to market intelligence (Kohli and Jaworski 1990). To measure market orientation from a behavioural perspective two highly cited scales have been developed: (1) the MARKOR scale and (2) the MORTN summary scale (Deshpande and Farley 1998). However, the original conceptualization of market orientation by these authors is based on a set of activities that compose the attribute. Hence, as defined, this implies that market orientation is a formative construct, yet it is continually measured reflectively in the academic literature.

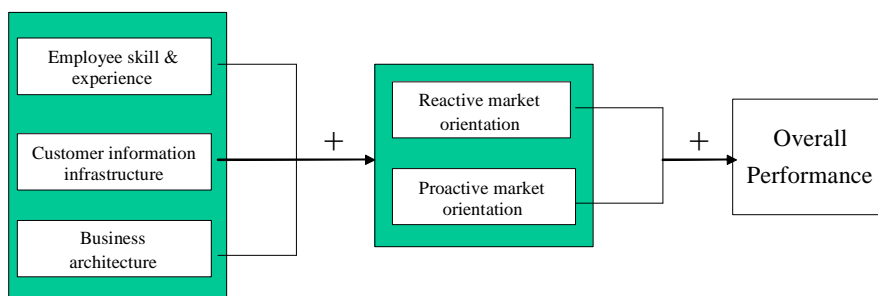
The distinction between formative and reflective constructs is important because it is fundamental to content validity and construct measurement. In the case of formative measures, the use of factor analysis and coefficient alpha to select and delete items is irrelevant and scales based on this logic may be invalid. What is relevant for formative measures is that the domain underlying the

measure is spanned as completely as possible. This point is particularly relevant given the MORTN scale's failure to include intelligence related activities that support a proactive market orientation. For example, all ten items in the MORTN scale are concerned with a customer's expressed needs. Indeed, Narver, Slater and MacLachlan (2000) argue that criticism surrounding market orientation has resulted from confusion surrounding the meaning of the term and, consequently, the way it is measured. Hence, minor modifications to the previously published market orientation scales are theoretically valid and should be encouraged.

### MODEL and INSTRUMENT DEVELOPMENT

The focus for modelling the impact of market orientation on the performance of the firm was derived originally from a theory of competitive advantage developed by Day and Wensley (1988). Their model has become a benchmark in marketing for researchers seeking to explain performance differences between companies (Hunt and Morgan 1995). The advantage of this approach is that it allows us to evaluate the deterministic relationship that sources of advantage (i.e., customer relating capabilities) has on strategy (i.e., market orientation) and subsequent performance. Importantly, the model clearly recognises the mediating impact that market orientation has on overall performance (see Figure 1).

**FIGURE 1**– Mediating effect of market orientation



To ensure our model was useful, both theoretically and practically, construct validity was established based on two key attributes: (1) a multidimensional and balanced assessment of overall performance was required, and (2) all measures incorporated a competitive assessment element.

Drawing on the resource based view of the firm we identify three key customer focussed capabilities: (1) skills and experience at converting data to customer knowledge, (2) level of customer

information infrastructure, and (3) alignment of incentives, customer strategy and structure. Additionally, it has been proposed that customer focussed capabilities are best seen as a higher order capability that contributes positively to firm performance (Day 2002). Each item—measured on a seven point likert scale—required respondents to compare capabilities to their direct competition. The importance of this is that capabilities need to be superior to the competition if they are to contribute positively to competitive advantage.

Narver et al. (2000) hold that measures of market orientation must take into account the two forms in which customers needs and solutions exist: expressed (reactive market orientation) and latent (proactive market orientation). All items for the reactive market orientation construct were taken from the MORTN scale (Deshpande and Farley 1998), while measures of the reactive market orientation construct were derived from recent work by Narver *et al.* (2000). The measures used in this study are summarized in Table 1. The lead question is “taking the perspective of your most profitable customer segment, how would you compare your business to your three nearest competitors on the following attributes.”

**TABLE 1** – Measures of market orientation

<b>Reactive</b> <i>(Based on MORTN)</i>	<b>Proactive</b> <i>(Based on Narver et al. 2000)</i>
Least/most responsive to individual customer needs	Worst/best at predicting new market developments
Most/easiest to do business with	Worst/best at discover unarticulated (latent) customer needs
Worst/best at sharing customer experiences across business functions	Worst/best at brainstorming how customers might better use products and services
Least/most trusted	Work/best at working closely with lead users
Worst/best at helping customers to help themselves	
Worst/best at driving business objectives by customer satisfaction	

Business *performance* is the dependent variable in this study, yet the many ways in which it is measured suggests that care be taken to conceptualise and measure performance. A three-dimensional approach is applied based on a balanced scorecard view of performance that includes: (1) financial measures such as return on investment, (2) customer satisfaction including sales growth, (3) business process improvement as reflected in the reduction in cost of transacting with customers, and (4)

innovation or success generating revenue from new products. Each measure was based on the lead question “Relative to the highest performer in your industry, how has your business performed over the last three years”.

## **RESULTS**

A two-step approach to data analysis was performed that: (1) includes a detailed assessment of the measurement model, and (2) includes an analysis of the relationships between constructs. To ensure the validity of each measure, key informant bias, common method bias, convergent and discriminant validity were examined. For the sake of brevity a short summary is provided. Senior managers were targeted from three functional areas (IT, marketing, and strategy), reducing the impact of *key informant bias*. Additionally, t-tests based on differences in the degree of market orientation and performance between top management and middle management suggest that informant bias is not a concern in this study.

To determine *convergent validity* for the reflective measures, factor analyses on the underlying questionnaire items were performed. The results indicate one dimension for each reflective construct, making it legitimate to regard them as unitary. We also computed the average variance extracted by these items using confirmatory factor analysis. The fact that these average variances are all above 0.7 indicates adequate convergent validity for their underlying items. Further, the fact that they are higher than the correlations between the various constructs indicates adequate discriminant validity between these constructs.

Furthermore, *discriminant validity* was also assessed by comparing the variance shared by these constructs, as measured by the squared correlation between them, with the AVE by each constructs measurement items. In other words, the amount of variance captured by the construct (through its indicators) was demonstrably closer to its measurement items than to another construct. The clear distinction between each construct indicates that we are tapping into distinct and different concepts.

### ***Confirmatory Test for Formative and Reflective Indicators***

In this study an assessment of reflective versus formative scales is desirable. To conduct such an assessment, Bollen and Ting (2000) suggest employing the vanishing tetrad test. Vanishing tetrads

were calculated for each of the constructs using a modified CTA-SAS program (Ting 1995). The results reported in table 2 show that those scales that have been conceptualised as formative scales should be measured accordingly. An exception was performance where the construct was hypothesised as formative but appears as reflective in the tetrad test—see non-significant chi-square statistic. There may be several reasons for this exception. One possibility for this contrary result is that respondent’s may have developed a feel for overall performance in their organisation. Therefore, the responses to each of the balance scorecard dimensions will each reflect this general level of performance. Another possibility is that the performance scores are simply capturing error in the measures or natural inter-correlation. In other words the construct could be formative but measurement error and inter-correlation does not allow for sufficient differentiation between construct items.

It is worth noting that the results confirm a formative structure for reactive market orientation. This finding has important implications because virtually all the work conducted in marketing has viewed market orientation as a reflective structure and sought to select and delete items based on factor analysis and coefficient alpha scores.

**TABLE 2 – Test of causal indicators**

Constructs	$\chi^2$ (Df)	Df	Significance
Performance	1.94	2	0.37
<i>Reactive Orientation (F)</i>	<i>9.46</i>	2	<i>0.01</i>
Proactive Orientation	4.13	2	0.12
Customer Relating Capability	0.76	2	0.68

*Note:* N=96; (F) = Formative items in italics.

### ***Mediating Impact of Market Orientation on Performance***

Our model predicts that both reactive and proactive market orientation mediate performance. To test for mediation, a series of three regression models are estimated (Judd and Kenny 1981). The first equation regressed the mediator (i.e., market orientation) on the independent variable (i.e., CRM capability). The second regressed the dependent variable (i.e., performance) on the independent variable. The third equation regressed performance on both market orientation and customer relating capability.



Table 3 presents the regression results. The regression models for proactive market orientation (PMO) indicate that: (1) the effect of CRM capability on proactive market orientation is positive and significant ( $\beta=0.33$   $p=0.000$ ), (2) the effect of CRM capability on performance is positive and significant ( $\beta=0.28$   $p=0.000$ ), and (3) both CRM and proactive market orientation on performance is positive and significant. Additionally, all conditions held in the predicted direction and the effect of CRM capability in the third equation ( $\beta=0.22$   $p=0.08$ ) was less than in the second ( $\beta=0.28$   $p=0.000$ ). These results provide statistical verification that proactive market orientation partially mediates performance.

The results for reactive market orientation (RMO) indicate that: (1) the effect of CRM capability on reactive market orientation is positive and significant ( $\beta=0.21$   $p=0.004$ ), (2) the effect of CRM capability on performance is positive and significant ( $\beta=0.28$   $p=0.000$ ), and (3) only CRM capability is significant ( $\beta=0.28$   $p=0.001$ ). However, the effect of reactive market orientation on performance was negative and not significant ( $\beta=-0.01$   $p=0.912$ ).

**TABLE 3 – Mediator hypothesis testing**

	Reactive Market Orientation			Proactive Market Orientation		
	Equation 1 on RMO	Equation 2 on Performance	Equation 3 on Performance	Equation 1 on PMO	Equation 2 on Performance	Equation 3 on Performance
Intercept	2.51**** (0.33)	1.83**** (0.35)	1.86**** (0.45)	2.92**** (0.42)	1.83**** (0.35)	1.34**** (0.43)
CRM Capability	0.215*** (0.08)	0.28**** (0.07)	0.28**** (0.08)	0.33**** (0.09)	0.28**** (0.07)	0.22**** (0.08)
RMO			-0.01 (0.11)			
PMO						0.16* (0.08)
R <sup>2</sup>	0.09	0.14	0.13	0.13	0.14	0.17
R <sup>2</sup> (Adj)	0.08	0.13	0.11	0.12	0.13	0.15

*Note:* standard error in parentheses. \*  $p < 0.10$ ; \*\*\*  $p < 0.01$ ; \*\*\*\*  $p < 0.001$

Although this implies that reactive market orientation is not a mediator, the results should not be seen as conclusive. As expected, there is a moderate correlation between reactive market orientation and performance (0.347) that results in multicollinearity and reduced power in the third equation. Additionally, all mediators are likely to be measured with error and therefore produce an

underestimate of the mediation effect and an overestimate of the independent variable effect (Judd and Kenny 1981).

## **DISCUSSION**

For five decades, conventional wisdom in strategic marketing has argued that customers are the foundation of an organisation. Logically, this implies that for a business to maximize its economic value the business must be oriented totally to “finding customer needs and filling them” rather than to “making products and selling them.” However, in spite of all the helpful frameworks, scholarly testimony, and inspiring examples the benefits of a market orientation are still in doubt.

Scholars have begun to question prior assumptions regarding the unidimensional nature of market orientation. They argue that in the majority of empirical studies there has been an over emphasis on “responsive market orientation” in which a business responds to the expressed needs of its target customers. This study has demonstrated empirically that two measures of market orientation (i.e., reactive and proactive) exist; a major step forward in the marketing literature as virtually all the work conducted to date has viewed market orientation as unidimensional. Although PMO and RMO are related, they are essentially separate constructs. In addition, using the vanishing tetrad test, we hint that the structure of at least one of these constructs—reactive market orientation—is formative, rather than reflective. The implications of this are that traditional scale procedures such as MARKOR and MORTN, that select and delete items based on coefficient alpha scores are most likely creating constructs that are not as valid as they should be. This finding supports the concern raised by Rossiter (2002) with the way market orientation is measured.

Lastly, the study suggests that in modern business environments companies need to distinguish reactive from proactive market orientation. Those companies that base their strategy on responding to the expressed needs (i.e., reactive market orientation) of their customers appear to be losing their effectiveness. One reason for this is that customer expectations have evolved to the point where they now expect companies to do more than just respond to expressed needs. This situation was found in a recent meta analysis (Kirca, Jayachandran and Bearden 2005) where the authors suggest that in service sectors market orientation is increasingly seen as a failure prevention (or “hygiene”) factor as distinct to manufacturing sectors where market orientation is considered to be a success

inducing factor. Further, the positive mediating effect of proactive market orientation on performance implies a shift in interpretation from effect to cause. Companies such as Ritz Carlton, Pioneer Hi-Bred International, BP Nutrition and Tesco have been showcased not for their response to a customer's expressed needs but for their ability to proactively capture, understand and leverage customer information. The possession and ability to enact this type of market orientation is where resources should be directed.

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