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Impact of CRM technology on sales process behaviors: empirical results from US, Europe, and Asia

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ABSTRACT

Purpose: The diffusion of customer relationship management (CRM) systems across the globe, over the last decade, has created a need to improve the understanding of the impact of technology on the sales process from a global perspective. The authors examine how CRM technology impacts the sales process (creating opportunity, managing opportunity, and managing relationships) in three regions of the world (US, Europe, and Asia).

Methodology/Approach: The differences among US respondents (n = 789), European respondents (n = 327), and Asian respondents (n = 91) were explored. A multivariate analysis of variance (MANOVA) was conducted on creating opportunity, managing opportunity, and managing relationships, with dichotomized CRM effectiveness and geography (US/Europe/Asia) as factors.

Findings: The MANOVA revealed a significant influence of CRM effectiveness, but a non-significance for geography and a non-significance for the interaction between CRM effectiveness and geography. This pattern of results suggests that CRM effectiveness leads to significant differences in sales processes; however, these influences are not qualified by the geography to which the firm belongs. Ensuing univariate Analysis of Variances (ANOVAs) revealed a significant influence of CRM effectiveness on creating opportunity, managing opportunity, and managing relationships, but not for firm-geography or its interaction with CRM effectiveness. Post hoc tests revealed that firms high on CRM effectiveness were better at creating opportunity, managing opportunity, and managing relationships. Differences in CRM effectiveness lead to significant differences in sales processes; however, these influences once again are not qualified by the geography to which the firms belong.

Originality/Value Contribution: This study provides several contributions to the stream of research focused on CRM globally. First, due to globalization, CRM use and process can be more standardized across regions and cultures. With the evolution of technology such as Web 2.0 and cloud computing, barriers to communicating and exchanging information, regardless of time zone or location, have been decreased. A US firm's use of a CRM platform can essentially capture the same information on a client that a firm in Europe or Asia also manages. CRM's ultimate measure of success is for the buyer-seller relationship process to positively impact the level of business conducted.

KEYWORDS

CRM; sales process; global; sales performance; sales technology

Introduction

Global sales organizations invest millions of dollars annually to implement sales force technology that enhances productivity, communications, and customer relationships (Jelinek et al. 2006; Tanner et al. 2005). According to Gartner, worldwide sales technology investment totaled \$26.3 billion in 2015, which grew over 12 percent from 2014 (Gartner 2016). The importance of technology, specifically customer relationship management (CRM) technology, has grown with the strategic emphasis international firms now place on building buyer-seller partnerships (Cannon and Perreault 1999). Sales technology literature has focused mostly on the

impact different antecedents have on sales technology adoption (Hunter and Perreault 2007; Rodriguez and Honeycutt 2011). Other research has looked at how these innovations help a business development executive increase organizational performance (Rodriguez, Peterson, and Krishnan 2012). Although scholars argue about the long-term importance of sales technology (Rapp, Agnihotri, and Forbes 2008; Tanner et al. 2005), research on the impact of CRM from a global perspective is limited. In today's global environment, sales organizations need to understand not only how CRM can benefit an organization, but also how CRM meets the needs of a specific region's sales process.

The notion of sales forces managing customer relationships, more than selling products, will bolster the importance of CRM effectiveness in the future. Many CRM research studies have used data from the US (Kumar, Sunder, and Ramaseshan 2011), so very little is known of the potential differences that are found on the global scene. In fact, empirical data on CRM across the world is essentially nonexistent, save Kumar, Sunder, and Ramaseshan (2011), who pieced together information from various industry sources and consultant reports. They found that CRM technology was introduced in North America in 1998, Europe in 1999, and the Asia-Pacific region in 2004, essentially by ascertaining when software licenses were granted from the major providers. However, in the last decade since CRM's diffusion around the globe, our understanding of how it affects the sales process is still relatively meager considering the amount of time and money spent on this tool. According to Gartner Research, investment in CRM technology market is expected to reach \$36 billion by 2017 (Gartner 2016).

The purpose of this research is to ascertain how CRM usage may differ in sales processes around the world. This study examines how selling organizations in the US, Europe, and Asia compare in their use of CRM. This research specifically looks at how CRM impacts several areas of the sales process: Creating Opportunities, Managing Opportunities, and Managing Relationships. In this article, we first discuss factors that impact the use of CRM in organizations across different countries. We then review the scant research on CRM in Europe and Asia, and the findings regarding US studies. Finally, we present our model and measure the relationship of CRM with different aspects of the sales process and compare the differences of the three regions.

Conceptual background and research questions

Customer relationship management

Hansotia states “at the heart of CRM is the organization's ability to leverage customer data creatively, effectively and efficiently to design and implement customer-focused strategies” (2002, 121), in order to

increase the breadth, depth, and length of the relationship with the client. Initially, CRM was considered an information-technology customer solution to collect and track details on buyer–seller conversations. Today, CRM has evolved into a holistic approach to help manage long-term, profitable customer relationships increase the flow of business processes and customer loyalty (Pedron et al. 2016). The aim is to have improved data and information regarding the customer, from a host of different inputs, not just from the sales force, to improve relationships and cocreate value with clients. It is much more than a tactical information plan: if done correctly, the organization works as one customer-centric marketing entity (Williams 2014). In fact, Cambra-Fierro, Edgar Centeno, and Vazquez-Carrasco (2016) noted that while technology is obviously important, they found that employees and leadership are influential important components in determining the success for a CRM system.

Previous research on sales technology use and adoption has primarily been based on the Technology Acceptance Model (TAM) (Davis 1989) and Diffusion of Innovations (Rogers 1962). TAM is an information systems theory that states that when users are faced with a new technology, individual behavioral intention to utilize technology is determined by perceived usefulness and expected ease of use (Venkatesh and Davis 2000). Diffusion of innovation also impacts perceived ease of use of technology since specific characteristics speed up an innovation's acceptance. The theory applies to the acceptance of new ideas and technologies throughout cultures. Both theories provide an initial starting point for research in the acceptance and usage of technology from a cross-cultural perspective.

Ahearne, Jelinek, and Rapp have reported in past studies that CRM systems improve the sales professional's ability to communicate clearly with clients and “improve the ability to win business” (2005, 380). Sales-based CRM technology tools are designed to help sales professionals manage customer relationships (Hunter and Perreault 2007) by improving communication, learning more about the clients' needs, and creating customized solutions for the customer. A key benefit of CRM is the ability to cross-reference customers within divisions of a company and to recognize other

sales opportunities (Widmier, Jackson, and Brown McCabe 2002). It is important to understand that the adoption of CRM is more than technology; it involves people, processes, and different cultures as well (Pedron et al. 2016).

International organizations implement different types of technologies that enable their salespeople to sell more effectively by forging closer, strategic relations with clients. To fully experience the benefits of CRM, organizations need to understand the potential differences in how countries and cultures manage client relationships. In the next section, we discuss CRM use from a cross-cultural perspective and the differences in managing customer relationships.

Cultural differences in CRM perspectives

Adoption of CRM systems appears to be ubiquitous in North America, while it is still in its infancy in many Asia-Pacific firms (Kumar, Sunder, and Ramaseshan 2011). While technology can move at lightning pace and regions can close a gap quickly, it appears this disparity continues to exist. Gartner (2014) found that North America continued to feed the overall growth in the CRM market expenditures with 52.9 percent, with Western Europe at 15.2, accounting for nearly 80 percent of the growth. The Asia region experienced double-digit growth rates, but is still emerging in its use versus the other two areas.

CRM has been conceptualized on three different levels: company-wide, functional usage, and customer-facing (Buttle 2004). From a global perspective, organizations in other countries differ in their use of CRM in these areas. Past literature has supported that culture plays a large role in CRM adoption (Pedron et al. 2016). Successful implementation and use of CRM require an in-depth understanding of a firm's workflows and unique, local business processes (Pedron et al. 2016; Shumanov and Ewing 2007). IBM's Global Services study on CRM found several firm-level differences in the successful use of CRM (Lavalle and Sheld 2004). In the US, for example, CRM value proposition was found to be the greatest challenge, whereas, in Europe, customer data integration and process were firms' biggest concerns.

From a customer perspective, there are a number of characteristics that are different across borders that need to be captured in a CRM system:

buying habits, product preferences, depth of relationship, sales cycle, and privacy levels (Cline 2005). Another important factor that differs across countries is the level of repeat purchases made by current customers. Iacobucci et al. (2003) found a stronger relationship between customer service and repeat business for collectivistic cultures (i.e., Asia) versus individualistic cultures (i.e., US, most of Europe). Other target marketing activities such as direct mailing, advertising, and public relations also differ from region to region or even country to country. The level of relationship developed with customers can vary as well. Organizations may emphasize selling activities, such as customer acquisition versus customer retentions strategies, which focus on up-selling and cross-selling to existing clients.

Internally, within global firms, tension always exists when centralizing or decentralizing CRM deployment. Centralized, as defined by Cray (1984), is where decisions are solely made by the parent company. Decentralized, on the other hand, is where the decisions are managed locally within a country or a subsidiary of the parent company. Centralizing may provide more standardization in workflow, but communication may be hindered at the local level due to differences in processes, local regulatory restrictions, or overall corporate culture (Ramaseshan et al. 2006). Decentralization provides a level of autonomy to countries and subsidiaries, but standardized reporting on client activity or sales forecasting may be challenging to create due to lack of adopted standardized procedures. Some empirical evidence suggests that a decentralized method for CRM use is more effective in managing customer relationships locally (Ozsomer and Prussia 2000). The next section outlines the research questions of the study and the model to be tested as it relates to CRM and the sales process.

Research questions

Sales organizations operating in different countries and cultures need to consider the potential challenges in adopting and implementing CRM. Sales organizations also face significant external

pressures when using their CRM systems, i.e., technological, economic, social, and regulatory factors (Ramaseshan et al. 2006). All these cultural and regional influences may impact CRM effectiveness as it relates to sales process behaviors: creating opportunities, managing opportunities, and managing relationships. Although organizations conduct business in today's global environment, there is very limited research on measuring the differences in how CRM is used. Therefore, we posit these research questions.

RQ1: Across the three regions of the world (US, Europe, and Asia), are there differences in the use of CRM?

RQ2: Are there significant differences between the US, Europe, and Asia regarding CRM usage and creating opportunities, managing opportunities, and managing relationships?

Firms need to be effective at collecting, comprehending, and using information about customers to improve the sales process and, as a result, enhance sales performance. The benefit of this research is to help organizations understand CRM utilization differences and how they may potentially impact sales process behaviors. If managers can more fully understand how CRM systems are used across the world, it may help in managing global sales forces more effectively.

Theoretical model development

The current study evaluates the relationship between CRM effectiveness and the sales process from a global perspective. The process in customer acquisition generally entails a number of steps: lead generation, qualification of prospects, evaluation of solutions, and closing the sale. Organizations that follow a disciplined sales process are more effective at selling and helping firms achieve successful sales performance (Leigh and Marshall 2001). Past studies have also shown that matching an organization's business process with CRM technology maximizes CRM usage (Pedron et al. 2016). The conceptual model below, see Figure 1, provides a linear sequence of the sales process: from opportunity creation, to managing

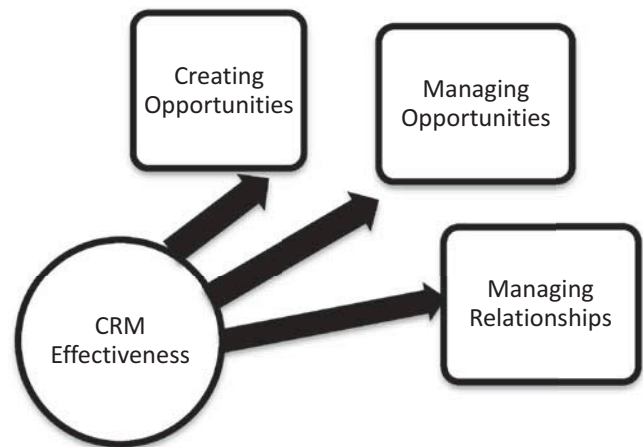


Figure 1. Conceptual model of CRM effectiveness influence on sales process.

opportunities, to managing the relationships after the customer has been acquired, and is based on the Miller Heiman International selling process (Heiman 2016).

Opportunity Creation – The first step in customer acquisition is creating opportunities through prospecting. These activities, which occur in the initial contact with a prospect, include cold calling, performing research on clients, and generating and qualifying leads (Moncrief and Marshall 2005). Prospect initiation can sometimes be the most challenging step in the sales process (Heinonen and Michelsson 2009). Sales professionals need to continue prospecting efforts due to turnover in customers and consistent pressure from the competition. An important and challenging step in the sales process is identifying qualified prospects with potential buying power. Opportunity creation is highly complex as organizations need to analyze customer information, buyer profiles, and segmentation data in order to decide which markets to target and which clients to pursue.

Opportunity Management – Once a prospective customer has been qualified as a fit for the sales organization, the next step in the sales process is to manage the sales opportunity, in order to ensure probability of closing the sale. Opportunity management involves a number of details from the sales process perspective: gaining deeper understanding of needs, connecting with key influencers, and providing a solution that meets the prospect's

needs. It is important for sales professionals to invest time in this step to ensure an increased probability of closing the sale. Opportunity management can present a number of challenges within the sales process: a longer sales cycle, a more complex buying process, and an increased number of decision makers involved. Sales professionals need to maintain ongoing communication and collaboration with not only external buying influences but also internal resources, to ensure the product/service is an ideal solution for the customer.

Managing Relationships – Morgan and Hunt (1994, 22) define relationship marketing as “all marketing activities directed towards establishing, developing, and maintaining successful relational exchanges.” The objective of relationship marketing practice is to create stronger customer relationships in order to increase up-selling and cross-selling opportunities (Crosby, Evans, and Cowles 1990; Morgan and Hunt 1994). The CRM literature has supported that technology enables sales professionals to better track customer conversations and, therefore, improves their ability to communicate with customers more efficiently (Ahearne, Jelinek, and Rapp 2005). Hunter and Perreault’s (2007) study also provides evidence that the use of sales technology for communicating information increases an organization’s ability to propose customized and integrative solutions.

Methodology

Data collection

To examine the research questions, data was gathered in conjunction with Miller Heiman, a global leader in sales performance consulting. Respondents were offered an executive summary of the results and a copy of the findings from the previous year’s study in return for their participation in the survey. Participants who responded to email invitations were business executives in revenue-generating roles across job functions: notably different levels in sales and marketing, including vice presidents and CEOs. Data was collected using an emailed link to an online survey, supported by two reminder emails. In all, 15,110

Table 1. Respondent job titles.

Job Description	Percent
C-Level Executive	8.4
President/GM	8.1
Sales VP/Director	25.7
Sales Manager	18.2
Sales Representative	9.1
Marketing	3.6
Training	2.8
Human Resources	.9
Business Development	11.2
Account Management	7.9
Sales Operations	3.3
Customer/Client Service	.8
Missing	.1
Total	100.0

individuals clicked on the link; 1,699 respondents completed the 130+ item survey, yielding an 11.2 percent response rate. Research on survey responses suggests the response rate of this study is on par with web-based data collection, typically 6–15 percent (Lozar Manfreda et al. 2008). The sample size shown in Table 1 is lower ($n = 1207$), as many respondents were not from the three regions under study and some records were not usable because of missing data on the dependent variables. Early and late respondent means were compared to assess nonresponse bias (Armstrong and Overton 1977). No significant difference between the respondents was evidenced.

Sample description

Respondents hailed from a range of industries (see Table 2). A considerable portion of the sample, 7 percent or more in each category, worked in consulting, professional services, technology-software, business services, and manufacturing. Health-care consumables, technology-hardware, industrial and chemical, and technology services were also well represented in the sample (4 percent–7 percent). The remainder of the sample came from numerous other industries. Approximately 46 percent of the respondents worked for organizations employing 24 or less salespeople, 18.5 percent for those employing 25–99 salespeople, 18 percent for those employing between 100 and 499 salespeople, and 17.5 percent for those employing 500 or more salespeople.

The sample includes global diversity with respondents from 40 different countries,

Table 2. Industry profiles of respondents.

Industry	Percent
Business Services	9.4
Construction	1.8
Consulting & Professional services	12.2
Consumer Products	2.9
Education	2.7
Energy (Oil/Gas)	3.0
Energy (Other)	2.1
Finance & Insurance	6.7
Government	1.6
Health care – Capital	4.1
Health care – Consumables	4.1
Hospitality & Food Service	1.5
Industrial & Chemical	2.9
Manufacturing	10.4
Media	1.1
Pharmaceuticals	2.3
Technology – Hardware	7.5
Technology – Software	11.1
Telecommunications	6.6
Transportation	2.6
Utilities	0.8
Wholesale	1.1
Missing	1.8
Total	100

indicating representations from the US ($n = 853$, 64.7 percent), Europe ($n = 351$, 26.6 percent), and Asia ($n = 114$, 8.7 percent). Males comprised 77.5 percent of the total number of respondents. The sample is also diverse with respect to job descriptions of the respondents. Sales vice presidents and sales directors constituted the largest percentage of respondents in the sample (25.7 percent), followed by sales managers (18.2 percent). Other categories of respondents who represented over 5 percent of the sample were business development managers (11.2 percent), sales representatives (9.1 percent), presidents (8.1 percent), C-Level executives (8.4 percent), and account managers (7.9 percent) (see Table 1).

Data analysis

Using the large data set, each of the constructs was formed with notable face validity and Cronbach's alphas. The available data set, with over 130 items, provided considerable flexibility to operationalize the constructs used in the study. Confirmatory factor analysis was used to distill the measures and to assess validity. Using standard psychometric protocols, some items were dropped and some measures adjusted. Similar measures have been used in the related literature (e.g.,

Rodriguez, Peterson, and Krishnan 2012). Opportunity creation (Cronbach's alpha = .80), opportunity management (Cronbach's alpha = .83), and managing relationships (Cronbach's alpha = .84) were each operationalized as a five-item measure (Appendix). CRM effectiveness (Cronbach's alpha = .93) was operationalized as a three-item measure (Appendix). The CRM effectiveness scores showed considerable variability ranging from 3 to 21, with a median score of 12. Respondents were categorized as high or low on CRM effectiveness via a median split.

The differences between US respondents ($n = 853$, usable 789), European respondents ($n = 351$, usable 327), and Asian respondents ($n = 114$, usable 91) were explored. A multivariate analysis of variance (MANOVA) was conducted on creating opportunity, managing opportunity, and managing relationships, with dichotomized CRM effectiveness and geography (US/Europe/Asia) as factors. The MANOVA revealed a significant influence of CRM effectiveness (Wilk's lambda = .928, $F(3, 1201) = 30.78$, $p < .001$), but a non-significance for geography (Wilk's lambda = .996, $F(6, 2398) = .72$, $p > .63$) and a non-significance for interaction between CRM effectiveness and geography (Wilk's lambda = .994, $F(6, 2398) = 1.16$, $p > .33$). This pattern of results suggests that CRM effectiveness leads to significant differences in sales processes; however, these influences are not qualified by the geography to which the firm belongs.

Ensuing univariate ANOVAs (Table 2) revealed a significant influence of CRM effectiveness on creating opportunity ($F(1, 1201) = 67.25$, $p < .001$), managing opportunity ($F(1, 1201) = 57.22$, $p < .001$), and managing relationships ($F(1, 1201) = 63.70$, $p < .001$), but not for firm-geography or its interaction with CRM effectiveness.

Post hoc tests (Table 3) revealed that firms high on CRM effectiveness were better at creating opportunity (Means 20.32 vs. 17.35; $t = 11.72$, $p < .001$), managing opportunity (Means 24.58 vs. 21.59 $t = 9.77$, $p < .001$), and managing relationships (Means 24.52 vs. 21.18; $t = 10.72$, $p < .001$).

This pattern of results provides evidence in answering the research questions raised in this paper. Specifically, differences in CRM effectiveness lead to significant differences in sales processes; however, these influences are not qualified by the geography to which the firms belong.

Table 3. Summary of results.

Factor	Wilks' Lambda	F	Hypothesis df	Error df	Sig.	
Geography	0.996	0.72	6	2398	0.63	
CRM Effectiveness	0.928	30.78	3	1199	0.00	
Geography * CRM Effectiveness	0.994	1.16	6	2398	0.33	
Tests of Between-Subjects Effects						
		Type III Sum of Squares	df	Mean Square	F	Sig.
Geography	Create Opportunities	54.41	2	27.2	1.36	0.26
	Manage Opportunities	55.23	2	27.62	0.97	0.38
	Manage Relationships	24.96	2	12.48	0.42	0.66
CRM Effectiveness	Create Opportunities	1348.76	1	1348.76	67.25	0.00
	Manage Opportunities	1633.48	1	1633.48	57.22	0.00
	Manage Relationships	1914.85	1	1914.85	63.7	0.00
Geography * CRM Effectiveness	Create Opportunities	5.68	2	2.84	0.14	0.87
	Manage Opportunities	56.95	2	28.48	1.00	0.37
	Manage Relationships	130.02	2	65.01	2.16	0.12
Error	Create Opportunities	24085.95	1201	20.05		
	Manage Opportunities	34288.19	1201	28.55		
	Manage Relationships	36101.46	1201	30.06		
Total	Create Opportunities	465116	1207			
	Manage Opportunities	692629	1207			
	Manage Relationships	682769	1207			

Discussion and managerial implications

The objective of this paper was to detect any potential differences of CRM amongst three regions: US, Europe, and Asia. Although past studies have shown that CRM implementation and use are more pervasive in countries such as the US (Shumanov and Ewing 2007), CRM appears to be incorporated into the sales process without regional differences being a significant component. Our findings did show that firms utilizing CRM, high on CRM effectiveness, had a higher correlation with the three areas of the sales process of creating opportunity, managing opportunity, and managing relationships. Specifically, though, the findings fail to support CRM differences as they relate to these steps in the selling process based on different global locations. The results of this initial study do not support conventional wisdom that business is, generally, heavily affected by cultural and regional differences. Numerous research studies have shown that the sales process has unique aspects around the world. This study has found that CRM is not one of the elements that vary within sales process behaviors. It is overstating the results to suggest that technology trumps expected regions' nuances in the selling process, yet is a viable explanation in this circumstance.

This study provides several contributions to the stream of research focused on CRM globally. First, due to globalization, CRM use and process can be more standardized across

regions and cultures. With the evolution of technology such as Web 2.0 and cloud computing, barriers to communicating and exchanging information regardless of time zone or location have been decreased. A US firm's use of a CRM platform can essentially capture the same information on a client that a firm in Europe or Asia also manages. In short, CRM can be viewed as a macro-level process (Lambert 2010). CRM's ultimate measure of success is for the buyer-seller relationship process to positively impact the level of business conducted. The goal is the growth in profitability of an individual customer over time. Increasing joint profitability through the coproduction of value (Grönroos 2011; Vargo and Lusch 2004) is the potential benefit of a systematic CRM process.

Second, from a CRM perspective, creating opportunities, managing opportunities, and managing relationships appear to be more standardized than most might have thought. This study supports the notion that companies in different countries follow similar CRM activities as pertains to managing the sales process and relationships. This is remarkable given that Desai, Sahu, and Sinha (2007) noted that "Asian markets have been one of the most volatile and dynamic markets of the world with a growing disposable income, shift in consumption patterns, global competition, software revolutions, and growing rates of

technology adoptions” (p. 46). It is important to first define and understand each region’s business process in order to ensure successful CRM use (Pedron et al. 2016).

Third, if CRM’s effects on the selling process are not different across specific regions of the world, management may consider standardizing if they operate in multiple areas. CRM implementation is a complex initiative, and failure of these initiatives is quite frequent (Pedron 2016). Implementing a centralized approach for CRM deployment enhances control of client information and internal collaboration (Clemmons and Simon 2001). Overall, “a well-implemented CRM system should facilitate timely, accurate, and seamless intra-organizational collaboration across different departments” (Peterson, Rodriguez, and Krishnan 2011, 63).

Fourth, senior sales management should note that the study showed no differences between the regions across the world. Hence, it did not account for individual firm CRM prowess. Since no differences were found concerning CRM and the sales process variables by region, there are obviously other variables that may differentiate between firms in the selling process, which might include IT resources, sales personal capabilities, and culture. CRM as a holistic construct, however, did not affect the selling process variables.

Finally, although similar to their Asia-Pacific counterparts, European executives preferred to benchmark firms in North America to gauge the benefits of implementing a CRM system (Kumar, Sunder, and Ramaseshan 2011). Market pressures have made CRM a critical business process, with the need for cost efficiency and an ability to identify and improve relationships with certain profitable buyers in a global economy. It appears that CRM is being used in a similar manner in the selling process, regardless of the location in the world.

Limitations and future research

The interpretation of the results is subject to certain limitations. First, this is one of the first empirical studies looking at the global use of CRM simultaneously and is certainly embryonic in nature. This study attempts to start an important research pursuit focused on CRM usage across world regions, but there are certainly other covariates to incorporate. Although the sample size, industry variation, and regional

representation are very robust, additional sample size is always coveted. The collection of performance data, subjective or objective, is a key step in developing a deeper understanding of CRM. It must be noted that current models of CRM were mostly developed on the basis of empirical research with a preponderance of US respondents and a few other industrialized economies (Kumar, Sunder, and Ramaseshan 2011). Scholars may wish to take a deeper look into potential moderating effects, such as the size of the firm, level of the respondent within the company, or other context variables. It should be noted, and possibly considered for future research, that respondents held various job titles, and perhaps their differing perspectives (e.g., VP of Sales, CEO, sales development) affected the responses.

In the future, a need exists for a comprehensive metric to grasp CRM effectiveness, efficiency, and its impact on performance. This area is rather pristine and is promising for further research. Another avenue for research includes looking at how multinational corporations handle global CRM compatibility and internal conflict. Since this study is a brief cross-sectional snapshot in a very fluid and emerging phenomenon, this is merely one data point in understanding CRM usage.

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Appendix

# Opportunity Creation	Scale
1 We have a formalized value proposition that is very compelling to our prospects.	Seven-point scale (1 – strongly disagree, 7 – strongly agree).
2 Specific criteria have been established to define an acceptable prospect for our company.	Seven-point scale (1 – strongly disagree, 7 – strongly agree).
3 Our salespeople have a solid understanding of our customers' business needs.	Seven-point scale (1 – strongly disagree, 7 – strongly agree).
4 We consistently follow a standardized process to qualify opportunities.	Seven-point scale (1 – strongly disagree, 7 – strongly agree).
5 Our salespeople are always held accountable for converting leads to closed business.	Seven-point scale (1 – strongly disagree, 7 – strongly agree).
# Opportunity Management	Scale
1 We clearly understand our customers' issues before we propose a solution.	Seven-point scale (1 – strongly disagree, 7 – strongly agree).
2 Win or lose, we get accurate feedback on all proposals from our customers.	Seven-point scale (1 – strongly disagree, 7 – strongly agree).
3 When we give price concessions, we always get comparable value in return.	Seven-point scale (1 – strongly disagree, 7 – strongly agree).
4 When we lose a significant sales opportunity, we always know the reason why.	Seven-point scale (1 – strongly disagree, 7 – strongly agree).
5 Our salespeople immediately communicate with management when something unexpected happens to jeopardize a sale.	Seven-point scale (1 – strongly disagree, 7 – strongly agree).
# Relationship Management	Scale
1 We always review the results of our solution with strategic accounts.	Seven-point scale (1 – strongly disagree, 7 – strongly agree).
2 When we lose a strategic account, we always know the reasons why.	Seven-point scale (1 – strongly disagree, 7 – strongly agree).
3 We regularly engage our strategic accounts in our product/service planning process.	Seven-point scale (1 – strongly disagree, 7 – strongly agree).
4 We jointly set long-term objectives with our strategic accounts.	Seven-point scale (1 – strongly disagree, 7 – strongly agree).
5 Our salespeople are definitely effective at producing year-over-year revenue growth from existing customers.	Seven-point scale (1 – strongly disagree, 7 – strongly agree).
# CRM effectiveness	Scale
1 Our sales management team is highly confident in the data available from our CRM system.	Seven-point scale (1 – strongly disagree, 7 – strongly agree).
2 Our CRM system significantly improves the productivity of our salespeople.	Seven-point scale (1 – strongly disagree, 7 – strongly agree).
3 Our CRM system significantly improves the quality of interactions with our customers.	Seven-point scale (1 – strongly disagree, 7 – strongly agree).
