

Factors Influencing Customer Relationship Management System Adoption

in Palestinian Small and Medium Enterprises:

Experts Verification using Interquartile Range

العوامل المؤثرة في تبني نظام إدارة علاقات العملاء في المؤسسات الصغيرة والمتوسطة
الفلسطينية: التحقق من الخبراء باستخدام النطاق الرباعي

Omar Salah^{1*}, Qadri Alzaghal²

عمر صلاح^{1*}، قدري الزغل²

^{1,2}Palestine Technical University Kadoorie, Tulkarm, Palestine

^{2,1}جامعة فلسطين التقنية - خضوري، طولكرم، فلسطين

Received: 26/06/2021

Accepted: 20/09/2021

Published: 30/12/2021

Abstract: Customer relationship management (CRM) refers to the practices, strategies, and technologies used by firms and businesses to manage and analyze customer interactions and data through the customer lifecycle. The main purpose of this study is to explore the influences of determinant factors on CRM adoption in Palestinian small and medium enterprises. This article summarizes the findings of previous studies that analyze the challenges associated with CRM utilization and Adoption. More than 100 studies were examined to find the primary variables for effective CRM adoption in various regions to discover the main aspects that influence the success of CRM adoption. The findings of this study show that the compatibility, information technology infrastructure, complexity, relative advantage, security, top management support, information policies, employee engagement, financial resources, customer pressure, and competitive pressure may all be used to predict CRM adoption among Palestinian SMEs. The study has implications for policymakers and top-level managers of SMEs to structure their activities in relation to CRM adoption based on the level of the factors examined.

Keywords: Palestine; Small and medium enterprise, Customer relationship management system, Customer-organization relationship, Interquartile Range.

المستخلص: تشير إدارة علاقات الزبائن (CRM) إلى الممارسات والاستراتيجيات والتقنيات التي تستخدمها الشركات والأعمال لإدارة نشاطات الزبائن وتحليل بياناتهم من خلال دورة حياة الزبون. الغرض الرئيسي من هذه الدراسة هو استكشاف تأثير العوامل المحددة على تبني إدارة علاقات الزبائن في الشركات الفلسطينية الصغيرة والمتوسطة. تلخص هذه المقالة نتائج دراسات سابقة لتحليل التحديات المرتبطة باستخدام وتبني نظام إدارة علاقات الزبائن. تم فحص أكثر من 100 دراسة للعثور على المتغيرات الأساسية لتبني نظام فعال لإدارة علاقات الزبائن في مناطق مختلفة لاكتشاف الجوانب الرئيسية التي تؤثر على نجاح تبني إدارة علاقات الزبائن. تبين نتائج هذه الدراسة أن التوافق، والبنية التحتية لتكنولوجيا المعلومات، والتعقيد، والميزة النسبية، والأمن، ودعم الإدارة العليا، وسياسات المعلومات، ومشاركة الموظفين، والموارد المالية، وضغط العملاء، والضغط التنافسي يمكن استخدامها جميعها للتعويض باعتماد نظام إدارة علاقات زبائن بين الشركات الفلسطينية الصغيرة والمتوسطة. يوجد لهذه الدراسة بعض الآثار لصانعي السياسات والمدبرين رفيعي المستوى في الشركات الصغيرة والمتوسطة لتنظيم أنشطتهم فيما يتعلق بتبني إدارة علاقات الزبائن بناءً على مستوى العوامل التي تم اختبارها.

* Corresponding Author E-mail: so.salah@ptuk.edu.ps

الكلمات المفتاحية: فلسطين، المؤسسات الصغيرة والمتوسطة، نظام إدارة علاقات الزبائن، العلاقة بين المؤسسة والزبائن، النطاق الرباعي.

INTRODUCTION:

Companies that utilize Customer Relationship Management (CRM) as a business strategy grow faster than those that do not. This is due to the initiative's goal of improving customer relationships, which leads to increased revenue, optimal profit, increased productivity, and increased customer pleasure. CRM can also integrate a company's whole marketing operations and automate specialized customer-organization relationships. Companies should strive to embrace a system such as CRM in order to be more successful and efficient in today's modern world when corporate operations are reliant on technological improvements. CRM, as a system, offers numerous unrivaled benefits and should be seen as an investment worth making in the long run. Many studies have proven that CRM adoption provides benefits to enterprises in different ways. For instance, CRM is used in caregivers' medical fields for customized patient service, service quality, patient satisfaction, and mutual benefit maximization (al-Munawar & Anshari 2011). Bank managers use the initiative to focus on profitable customers and enhance their customer service (Iriqat & Daqar 2017). In the fashion industry, companies use the initiative to manage existing customers to survive in the economy (Ko et al., 2008). CRM is used in the pharmacy sector to maintain a sustainable and profitable relationship with customers (Ammari & Soliman 2016). This indicates that CRM works towards reinforcing the buyer-seller relationship.

Moreover, successful CRM adoption can give numerous benefits to small and medium-sized companies (SMEs), such as handling customer problems in a timely manner, increasing customer satisfaction by assigning an expert to solve concerns and inquiries. (Rahimi & Kozak 2016). Managers can use CRM to develop higher customer satisfaction levels by delivering product performance that meets and exceeds the latter's expectations. This, in turn, enables firms to increase profitability, heighten customer relationships, collect accurate customer information, and manage customer relationships efficiently by focusing on customer loyalty. These could lead to retaining loyal customers that can maintain the lifetime value of the firms (Elkordy 2014; Mokhtar, Mansyur & Sjahrudin 2019).

MATERIAL AND METHODS:

Small and Medium-Sized Enterprises (SMEs):

There is no universal definition of the term that everyone can agree on. Varied academics, experts, and schools of thought have different notions about capital layout, the number of employees, sales turnover, and fixed capital investment used to define and categorize the concept. (Gbandi & Amissah 2014). SMEs are classified based on a set of quantifiable indicators. (Berisha & Pula 2015). These firms are at the center of entrepreneurial activity and innovation since they play an essential role in the economies of rising nations by creating job opportunities and accelerating economic development.

However, there are different criteria for S.M.E. definition based on the institution, country, or industry. The main factor differentiating a large business from the small one is the number of employees in the enterprise (Berisha& Pula 2015). This is shown in Table 1.

Table (1): Number of employees in different scales by countries

Country	Micro	Small	Medium	Large
EU country, Iceland, Norway	1–9	10–49	50–249	250+
Australia	0–9	10–49	50–199	200+
Canada	0–9	10–49	50–499	500+
Japan	4–9	10–49	50–249	250+
Turkey	1–19	20–49	50–249	250+
USA	1–9	10–99	100–499	500+

It is crucial for SMEs to implement CRM practices if they wish to achieve a competitive advantage over their rivals. Suppose managers of SMEs only focus on enhancing their products/services as it forms one of the fundamental features of the production concept. In that case, they could neglect customer needs and their relationships (Mohamad et al., 2014). This could prompt the customers to shift loyalties to another firm.

Characteristics and Significance of SMEs:

The economic core of a country is formed by SMEs, which drive the growth of its employment rate and development (Ramayah et al., 2016). SMEs are crucial players in the economy, even though their marketing techniques are distinct from their large-sized counterparts. Moreover, SMEs performance is an extensive concept that displays the outcome of the organizations’ operational activities.

SMEs in developed nations have a greater likelihood of being highly specialized compared to those in the developing ones (Sultan, 2014). They are extensively acknowledged as the economic growth drivers and major contributors to sustainability in most countries, including the Middle Eastern and other developing countries. This is because SMEs play a crucial role in the uplifting of overall living standards, which leads to the mitigation of poverty by creating job opportunities (Ashraf et al. 2015). In the case of OECD countries, SMEs constitute 95% of the total number of enterprises (al-Rousan & Jones 2016). As such, SMEs involvement in global economic activities is crucial as they have the upper hand when it comes to competitiveness.

Besides large-sized organizations, SMEs are also convinced that IT is important for business activities. Thus, it is a must to leverage IT to increase productivity, obtain a competitive advantage, enhance management performance, save operational costs, and, ultimately, add values to the product or service both locally and internationally (Yahaya, 2016). Based on empirical findings, SMEs could not obtain competitiveness and maintain their profitability if they do not adopt technology at the appropriate levels in the market (Maduku, Mpinganjira & Duh 2016).

CRM and the Development of SMEs:

Customer Relationship Management (CRM) can contribute to the performance of SMEs through the use of technology (Nguyen & Waring 2013). In light of this, SMEs are increasingly applying CRM to increase the competitive advantage upon which they can plan for long-term opportunities (Mohamad et al. 2014) and in the current dynamic economy environment (al-Shawi, Missi & Irani 2011).

CRM studies have been carried out focusing on major firms, with only a few tackling CRM adoption among SME (Lukkari 2011; Nguyen & Waring 2013). SMEs have been striving to adopt CRM to obtain an advantage in the markets upon which they can base their sustainable business perspective in the face of the dynamic market (Mohamad et al., 2014). In this realm, CRM can positively contribute to SMEs by assisting them in relationship management (Newby, Nguyen & Warin 2014).

The development of CRM applications has highlighted a trend where SMEs are increasingly embracing CRM adoption for their survival and competitive advantage in the global market (Fazlzadeh, Tabrizi & Mahboobi 2011; Bukola, Abosede & Adesola 2019). Although CRM adoption may be advantageous to SMEs, empirical studies on the rates of CRM success among SMEs have highlighted more negative than positive results (Nguyen & Waring 2013). Also, studies of this context have reported mixed results as to the level of success of SMEs in light of CRM adoption (al-Shawi, Missi & Irani 2011; Soltani & Navimipour 2016).

In a related study, Kyengo, Ombui, and Iravo (2016) emphasized CRM as an invaluable business strategy that SMEs should adopt for their daily customer dealings. CRM has been found to benefit not only customers but all stakeholders, including employees and investors. Both Mozaheb et al. (2015) and Ngah, Zainuddin, and Thurasamy (2014) reported a significant CRM–SMEs market performance relationship.

Adoption:

The growing demands for technology over the last thirty years, especially with the growing failures of system adoption, has changed the focus to system prediction. (Zabadi 2016). Adoption is how a person decides whether or not to accept or reject a new idea or innovation. (Roger, Singhal & Quinlan 2014). The term reflects the willingness to come up with great. (Information Resources Management Association, 2018).

CRM adoption refers to a company's desire to implement CRM in order to achieve various goals such as improving customer relationships, understanding customer needs, boosting customer loyalty, and generating revenue. (Chen, Zhang & Zhao 2017). Zabadi (2016) indicated that one of the major challenges organizations face in I.S. adoption is user acceptance/rejection of technology rejection occurs due to a lack of knowledge of new technology among adopters, a failure to predict the consequences of the innovation, or the technology's status-conferring aspect. (Rogers, Singhal & Quinlan 2014). The Adoption of a CRM system is utilized to give staff the ability to handle client information. (Al-Weshah, Al-Manasrah & Qatawneh 2018).

Critical Success Factors:

To define the critical success factors (CSFs) in a CRM adoption, it is required to determine the meaning of a success factor. A success factor is the restricted number of areas that effectively enhance the organization's consistent performance. (Meyliana et al., 2017). CSF comes from a method focusing on critical factors of the organization's success (Meyliana, Hidayanto & Budiardjo 2016). Such a success factor flows down from the top and develops on one another, beginning with the shared mission and vision and flowing down to the relevant processes and relationships (Mollenhauer, 2009). CSF is a concept that is mainly dependent on the industry type. For example, CSFs of retail firms may differ from that of a wholesaler in the same industry. As a result, determining 20% of the critical success factor is required to identify approximately 80% of the organization's performance. (Wronka, 2013).

Daniel has first introduced CSF and was later built on and popularized after a decade by Rockart (Mindtools, 2017). Ever since then, CSF has been extended to assist in the implementation of business strategies and initiatives. CSFs reflect the organizational areas or projects that can bring about its success. As such, it is important for management to focus on them for the creation of high-performance levels (Jahangirian et al, 2017). Also, critical success factors can take the form of events, situations, conditions, or activities that need critical attention due to their importance to the corporations with negative and positive effects. CSFs can have an internal and external focus, according to the I.S. (Boon, Corbitt & Coulthard 2005). According to CSF theory, the use of carefully selected critical performance indicators/measures is important for the organization's strategic and operational management. (Bai & Sarkis 2014). The critical success factor is used to identify those factors that can bring about a successful project to achieve a specific success level (Boon, Corbitt & Coulthard 2005).

Methodology:

As a theoretical framework, this study offers a wide range of frameworks and models. Several variables are proposed as technology enablers/inhibitors (i.e., CRM). Adoption and application among SMEs, academicians in the business field were asked to validate and confirm that the selected factors were suitable for business. Then, the researcher sent the email interview to 10 experts in Palestine to identify the main factors that may explain the effect of CRM adoption on organizational performance. This approach is useful when the researcher does not know what essential variables to examine (Creswell, 2013).

The criteria for obtaining technological, organizational, and environmental factors were adopted by Mukred et al. (2018). As a result, the procedures outlined below were used to narrow down the list of broad variables into the 32 factors (see Table 1).

- For CRM factor extraction, a thorough literature research was conducted.
- The variables were classified according to their relative importance as revealed by the study results or the frequency with which they were identified.
- The elements identified in the theoretical analysis and literature review were distributed to the selected CRM experts in SMEs, and the experts are free to add factors (if any).

The selected experts were required to have ample experience in CRM and a good knowledge of IT. The data were collected using semi-structured interviews from 10 experts in Palestine. The ranking sheet used a scale of 1 to 5 ('strongly disagree' to 'strongly agree'). The aim of this task was to review the critical success factors identified in the literature review and also to explore other factors that have not been mentioned in any previous studies. The experts were allowed to make a suggestion to add new additional factors for the conceptual framework, together with the rationale behind the chosen factors

After a panel of experts gave their opinions, the consensus among the answers was measured using the Interquartile Range (IQR). IQR is a widely used technique for determining agreement and is frequently used in assessing expert opinion, especially in studies using the Delphi technique (von der Gracht, 2012). The Delphi technique collects data from respondents with domain expertise for practice-related topics to collect perspectives and demonstrate the convergence of views. (Dutt & Chauhan, 2019).

The three phases of the research methodology are discussed in detail in the following sections:

Factors Affecting CRM Adoption in SMEs:

Many indicators of CRM and technology had been established. These aspects were classified as technological, organizational, or environmental in various settings. The following subsections discuss the factors affecting CRM adoption.

Technological factors:

There are a number of factors related to the technological context (see Table 2). This context provides the internal and external technological adoption factors whether or not it is intended to be used, presently being used or left for future use in organizations (Ahani, Rahim & Nilash 2017; al-Rousan & Jones 2016). Additionally, technological factors play a significant role in new technology adoption, as evidenced by San-Martin, Jiménez & López-Catalán (2016). Many studies revealed the significant influence of technological factors in CRM technology adoption by SMEs (Hasani, Bojei & Dehghantanha 2017). Rogers (2003) opined that the most suitable technological contexts are explained by DOI theory and TOE. Framework (Hoti, 2015).

Mixed findings were reported on the same factors among different study contexts; for instance; Chavoshi, Tze and Jee (2015) revealed that 'relative advantage', compatibility, complexity and observability (technological characteristics) do not affect CRM adoption, while Šebjan, Bobek & Tominc (2014) argue that these factors affect the Adoption and use of CRM system. Furthermore, different studies mentioned different technologies factors; for instance, al-Harbi, et al (2016) focused on technology readiness; Ahani, Rahim & Nilash (2017) on the revealed cost; Seyal, Rahman and Awg Mohammad (2007) indicated perceived advantage; Hasani, Bojei and Dehghantanha (2017) revealed the perceived ease of use; and Chavoshi, Tze and Jee (2015) focused on switching cost. Table 2.10 contains the technological factors, as shown in the Literature.

Table (2): Technological factors from the Literature

Technological Factors	Source
-----------------------	--------

Factors Influencing Customer Relationship Management System Adoption in Palestinian Small and Medium

Experts Verification using Interquartile Range :Enterprises

Relative advantage	Alzaghal & Mukhtar, (2018) Chang et al. (2017); Ahani, Rahim and Nilash (2017); Mangula, Weerd and Brinkkemper (2017); al-Rousan and Jones (2016); Awa, Ukoha and Emecheta (2016); Wang et al. (2016); Maduku, Mpinganjira and Duh (2016);
Compatibility	Ahani, Rahim and Nilash (2017); Hasani, Bojei and Dehghantanha (2017); Awa, Ukoha and Emecheta (2016); sChavoshi, Tze and Jee (2015); al-Hammadi, et al (2015); Oh and Yoon (2014); Šebjan, Bobek and Tominc (2014); al-Shamaila, Papagiannidis and Li (2013);
Complexity	Chang et al. (2017); Ahani, Rahim and Nilash (2017); Hasani, Bojei, and Dehghantanha (2017); Wang et al. (2016); Wilson, Khazaei and Hirsch (2016); Alrousan and Jones (2016); Maduku, Mpinganjira and Duh (2016); al-Harbi, et al (2016); Hoti (2015); al-Hammadi, et al (2015); Ahmad et al. (2015); Chavoshi, Tze and Jee (2015); Nguyen and Waring (2013); Ramdani, Chevers and Williams (2013); Sanayei, Ansari, and Ranjbarian (2010)
Trialability	Chang et al. (2017); Mangula, Weerd, and Brinkkemper (2017); Hasani, Bojei, and Dehghantanha (2017); al-Rousan and Jones (2016); Chavoshi, Tze, and Jee (2015)
Observability	Chang et al. (2017); Mangula, Van De Weerd and Brinkkemper (2017); Alrousan and Jones (2016); Hoti (2015); al-Hammadi, et al (2015); Chavoshi, Tze and Jee (2015); Nguyen and Waring (2013); Ramdani, Chevers, and Williams (2013)
Technology readiness	al-Harbi, et al (2016); Techakriengkrai and Tan (2015); Oliveira and Martins (2010); Croteau and Li (2003)
Cost	Ahani, Rahim and Nilash (2017); Awa, Ukoha and Emecheta (2016); Ramayah et al. (2016); Shah Alam, Ali and Mohd (2011); Tornatzky and Klein (1982)
Security	Frygell, Hedman, and Carlsson (2017); Ramayah et al. (2016); Shah Alam, Ali and Mohd (2011); Boon, Corbitt, and Coulthard (2005)
Reliability	(alzaghal et al., 2020) Veraki and To (2017); Brockman, Park and Morgan (2017); Awa, Ukoha, and Emecheta (2016); Abou-Shouk, Lim and Megicks (2016); Nedra and Soliman (2016); Khan, Abbas, and Iqbal (2016); (Gao et al. (2015); Venturini and Benito (2015); (Goudarzi, Ahmad and Soleymani 2013); Laohasirichaikul, Chaipooirutana, and Combs (2011); al-Shawi, Missi and Irani (2011); DeLone and McLean (2003)
Trust	Gamayanto and Christian (2018); Sou and Huang (2018); Iriqat and Daqar (2017); Alzaghal & Mukhtar (2017) Veraki and To (2017); González-Benito, Venturini and González-Benito (2017); Hsu, Islam and Yang (2016); Williams, Ashill and Naumann (2016); Soltani and Navimipour (2016); Bahri and Nusair (2015); Sulaiman, Baharum and Ridzuan (2014); Wrobel, Marcel and Simon (2013);
Switching cost	Meyliana et al. (2017); Iriqat and Daqar (2017); Chavoshi, Tze, and Jee (2015); el-kordy (2014); Reimann, Schilke, and Thoma (2009)
Perceived Usefulness	Awa, Ukoha and Emecheta (2016); Rondan-Cataluña and Arenas-Gaitán (2015); Williams, Rana and Dwivedi (2015); Šebjan, Bobek and Tominc (2014); Sanayei, Ansari and Ranjbarian (2010);
Perceived Ease of Use	Awa, Ukoha and Emecheta (2016); Rondan-Cataluña and Arenas-Gaitán (2015); Williams, Rana and Dwivedi (2015); Šebjan, Bobek and Tominc (2014); Ghobakhloo et al. (2012);

Organizational Factors:

Organizational factors are related to the structure, operation, human, and management aspects of the organization, either directly or indirectly. (SMEs), which cover the skills of I.C.T. staff, the skills of I.C.T. management, the size of the organization, and internal barriers (al-Shawi, Missi & Irani 2011). The factors are the drivers for the success of CRM implementation (Šebjan, Bobek & Tominc 2014; Lawson-Body et al. 2017). Without these factors, employees' ability to coordinate the CRM system within organizational requirements could be prevented (Rigo et al., 2016).

Moreover, organization context has many factors such as 'top management support' and I.S. knowledge of employees (Ahani, Rahim & Nilash 2017); organizational size and customers relationship levels (Chavoshi, Tze & Jee 2015), and 'top management,' 'financial resources and capabilities of employees (Maduku, Mpinganjira & Duh 2016). Organizational context has an impact on CRM adoption (Steel, Dubelaar & Ewing 2013). It refers to the organizational characteristics and internal resources (Hoti 2015). Meanwhile, organizational characteristics refer to the demographic features of the organization, including its size, employees acknowledge, expertise, and location (Hasani, Bojei & Dehghantanha 2017).

'Top Management Support' is one of the important organizational context factors for CRM adoption. (Soltani & Navimipour 2016; Ahani, Rahim & Nilash 2017). This factor has a beneficial effect on change resistance mitigation, improved employee motivation to become more customer-centric, and supports the practical part of I.T. management (Bohling et al., 2006). The following Table 3 has the organizational factors, as revealed in the Literature.

Table (3): Organizational factors form the Literature

Organization factor	Source
Top management support	Salah et al. (2021) Mukred et al. (2018); Ahani, Rahim and Nilash (2017); Raut et al. (2017); Mangula, Van De Weerd and Brinkkemper (2017); Meyliana et al. (2017); Wilson, Khazaei and Hirsch (2016); Rahimi and Gunlu (2016); Nizar and Budiardjo (2016); Awa, Ukoha and Emecheta, (2016); Rigo et al. (2016); Asrar and Anwar (2016); Wang et al. (2016); Maduku, Mpinganjira and Duh (2016); Laketa et al. (2015); Chavoshi, Tze and Jee (2015); al-Hammadi, et al (2015); Ramdani, Chevers and Williams (2013);
Staff I.C.T. skills	"Olszak and Kisielnicki (2018); Grassian et al. (2015); Newby Nguyen and Warin (2014); Šebjan, Bobek and Tominc 2014; Ghobakhloo et al. (2012); al-Shawi, Missi and Irani (2011) "
Information policy	Mukred et al. (2016); Grassian et al. (2015); Braman (2011); Mallett et al. (2011); Bwalya (2009); Oliver (2008); Orna (2008); Riyaz (2009); Andry (2004)
Internal barrier	Abualrob and Kang (2016); Almabhohu & Alzaza (2015); Šebjan, Bobek and Tominc (2014); al-Shawi, Missi and Irani 2011; Oecd (2000) "
Size	"Mangula, Van De Weerd and Brinkkemper (2017); Raut et al. (2017); Ramayah et al. (2016); Wang et al. (2016); Newby, Nguyen, and Warin (2014); Mohamad et al. (2014); al-Shamaila, Papagiannidis and Li (2013); al-Shawi, Missi and Irani (2011); Lawson-Body et al. (2011); Oliveira and Martins (2011) " "
Financial support = Financial resource	"Baidoun et al. (2018); Fouad and al-Goblan (2017); Hasani, Bojei, and Dehghantanha (2017); Maduku, Mpinganjira and Duh (2016); Ramayah et al. (2016); Hoti (2015); Šebjan, Bobek, and Tominc (2014); Mohamad et al. (2014); Iriana, Buttle, and Ang (2013); Peltier et al. (2013); Ramdani, Chevers and Williams (2013); Ghobakhloo et al. (2012); Harrigan, Ramsey

	and Ibbotson (2012); Oliveira and Martins (2011); Riyaz (2009); Ramdani, Kawalek and Lorenzo (2009); Hoon Yang, et al. (2007); Zhu and Kraemer (2005) "
Organizational structure	"Zerbino et al. (2018); Meyliana et al. (2017); Alem, Rashid, and Tahir (2017); Mohammed, Rashid and Tahir (2017); Kyengo, Ombui and Iravo (2016); Asrar and Anwar (2016); Nizar and Budiardjo (2016); Ghalenoioe and Sarvestani (2016); Duwailah and al-Debei (2015); Laketa et al. (2015); el-Kordy (2014); Šebjan, Bobek, and Tominc (2014); Wright (2013); Zeynep and Toker (2012); Ghobakhloo et al. (2012); Akroush et al. (2011); Oliveira and Martins (2011); Aurora and Padilla (2011); Abdullateef et al. (2010); Lin and Kuan (2010), Hoon Yang et al. (2007); Teo, Devodoss and Pan (2006); Yusof, Paul, and Stergioulas (2006); Payne (2005); Dedoussis (2004); Chen and Popovich (2003); Rogers (2003); Curry and Moore (2003); al-Vesson (2002)."
Cost	Raut et al. (2017); Ahani, Rahim and Nilash (2017); Varajão and Cruz (2016); Ramayah et al. (2016); al-Rousan and Jones (2016); Maduku, Mpinganjira, and Duh (2016); Newby, Nguyen, and Warin (2014); Rahimi and Gunlu (2016); Venkatesh et al. (2016); Mohammed, Rashid, and Tahir (2014); al-Shawi, Missi and Irani (2011); Yang (2012); Yusof, Paul, and Stergioulas (2006)
Innovativeness	Valmohammadi (2017); Ramayah et al. (2016); Wang et al. (2016); Hoti (2015); Newby, Nguyen, and Warin (2014); Šebjan, Bobek, and Tominc (2014); al-Shamaila, Papagiannidis, and Li (2013); Fazlzadeh, Tabrizi, and Mahboobi (2011)
Manager's attitude	"Ramayah et al. (2016); al-Rousan and Jones (2016); Nguyen and Waring (2013); Shah Alam, Ali and Mohd (2011) "; Faed, Radmand, and Talevsk (2010)
I.T. infrastructure	Nam, Le, and Le (2018); Mukred et al. (2018); Diffley and McCole (2015); Elkordy (2014); al-Shamaila, Papagiannidis, and Li. (2013); Kim et al. (2011); Sen and Sinha (2011); Rapp et al. (2010); Payne (2005)
Employee engagement	Zerbino et al. (2018); al-Shourah, al-Assaf, and al-Tawalbeh (2018); Jamali and Carroll (2017); Beglari (2017); Wright (2013) Nguyen and Waring (2013); Ncube and Jerie (2012); Ernst et al. (2011); Markos and Sandhya (2010); Foss, Stone, and Ekinci (2008); Avery, Mckay, and Wilson (2007); JoAnn (2006); Payne and Frow (2006) Reinartz, Krafft and Hoyer (2004); Robinson, Perryman, and Hayday (2004); Harter, Schmidt, and Hayes (2002)

Environmental Factors:

In businesses, environmental concern has become an integral part, posing a challenge for management and researchers to examine the inclusion of environmental concepts into business processes and operations. Several studies have been dedicated to green practice adoption, but only a few have focused on organizations (Piaralal et al., 2015). Previous research on innovation considers the environment an influential factor in adopting innovation among organizations (Nghah, Zainuddin & Thurasamy 2014), with the environmental context reflecting how organizations carry out their business processes. These include industry characteristics, government regulation, and infrastructure support (Troshani, Jerram & Hill 2011).

As shown in previous studies, the effects of external environmental factors are not under the organization's control, although they have the potential to affect the way it does its business (Ramayah et al., 2016). The following Table 4 summarizes these environmental factors as revealed in the Literature.

Table (4): Environment factors from the Literature

Environmental Factors	Source
-----------------------	--------

Customers Pressure	Ngah, Zainuddin and Thurasamy (2017); Hasani, Bojei and Dehghantanha (2017); "Ahani Rahim and Nilashi (2017); Ramayah et al. (2016); al-Rousan and Jones (2016); Hoti (2015); Kumar et al. (2015); Sila (2013); Abdul Hafaz et al. (2014); Wu and Wu (2005).
Competitive pressure	Cruz-Jesus, Pinheiro and Oliveira (2019) "; Hasani, Bojei, and Dehghantanha (2017); Ahani Rahim and Nilashi (2017); Ramayah et al. (2016); al-Rousan and Jones (2016); Wang et al. (2016); Ahmad et al. (2015); al-Hammadi, et al (2015); Abdul Hafaz et al. (2014); Hoti (2015); Kumar et al. (2015); al-Shamaila et al. (2013); Buttle and Ang (2013); Sila (2013); Lawson-Body et al. (2011); Oliveira and Martins (2010); Pan and Jang (2008); Wu and Wu (2005)
Governmental support	Hasani, Bojei, and Dehghantanha (2017); al-Rousan and Jones (2016); Ahani Rahim and Nilashi (2017); Ramayah et al. (2016); Kumar et al. (2015); al-Hammadi, et al (2015); Hafaz, Zainuddin and Thurasam (2014); Troshani, Jerram and Rao hill (2011)
Market scope	al-Shamaila, Papagiannidis and Li (2013).
Supplier efforts	al-Shamaila et al. (2013)
Computing support	Hoti (2015); al-Shamaila, Papagiannidis and Li (2013)
Venture Capitalists Support	Hasani, Bojei and Dehghantanha (2017)
Crowdfunding Support	Hasani, Bojei and Dehghantanha (2017); al-Hammadi, et al (2015)
Industry characteristics	Troshani, Jerram and Rao hill (2011); Azadegan and Teich (2010)
Government regulation	Azadegan and Teich (2010); Sin Tan et al. (2009)
Technology turbulence	Powell et al. (2018)
Environmental hostility	Chavitoshi, Tze and Jee (2015)
Information intensity	Wang et al. (2016)
Critical mass	Wang et al. (2016)
External change agent	Ahmad et al. (2015)
Pressure from a trading partner	Ahmad et al. (2015); Sila (2013)
Network infrastructure	Sin Tan et al. (2009)

There have been few studies on the role of information culture, particularly the Adoption of I.S. (Osubor & Chiemeke 2015). Previous research did not consider the significance of information culture in the Adoption of CRM in SMEs. Information culture has often been mentioned with organization performance (Mukred, Singh & Safie 2013; Choo, 2013). The factors discussed in this section are commonly used in CRM adoption in general but not in Palestine. Palestine has its factor, which is yet to be identified.

The selected experts were required to have ample experience in CRM and a good knowledge of I.T. The data were collected using semi-structured interviews from 10 experts in Palestine. The scale on the ranking sheet ranged from 1 to 5 ('strongly disagree' to agree strongly'). The goal of this job was to go over the essential success elements found in the literature review and look into other factors that had not been included in prior research. The experts were allowed to provide suggestions for new additional factors. for the conceptual framework, together with the rationale behind the chosen factors.

DEFINITION OF OPERATIONAL CONSTRUCTS:

The definition of terms usually varies among studies based on the research domain and context. It is essential to define the operational constructs for the terms used in this paper to give the same meaning to different readers. The following table (table 5) defines the variables used in this study.

Table (5): Operational construct definition

Construct	Definition	Source
“Technological context	Technological context is referred to as “innovation characteristics in some studies of organizational adoption.”	(Ngah, Zainuddin & Thurasamy 2014; Salah et al. 2019)
“Organizational context “	Organizational context refers to the number of factors that related to the business entity structure, operations, workforce, and management, which cover benefits, scope, skills of management staff, the size of the organization, and internal barriers	(al-Shawi, Missi & Irani 2011; Olushola & Abiola 2017).
Environmental context	The environment context is the area within which the firm conducted its business, its industry, and government dealings	(Li 2008)
“Information culture “	information culture is a culture wherein value and use of information arises in accomplishing successful operational and strategic success	(Oliver, 2011).
Compatibility	Compatibility refers to the degree to which an innovation is perceived to be consistent with existing values, past experiences, and needs of potential adopters	(Valmohammadi 2017).
IT infrastructure	IT Infrastructure in IT is the whole collection of hardware, software, networks, data centers, facilities, and relevant equipment used for the development, testing, monitoring, managing, and supporting IS in an enterprise	(Duncan 1995; Laan 2013).
Complexity	Innovation complexity refers to the level to which innovation is viewed as being difficult to understand and use	(Rogers 2003; Salah et al., 2019)
Relative advantage	Relative advantage is described as the level to which innovation is viewed as being superior to the idea that came before it	(Rogers 2003)
Security “	Security refers to the ability to protect consumers’ information and transaction data to ensure their privacy. It is a level to which a user is convinced that IT will be free of risk	(Shin 2010; Wang et al. 2014).
Top management support	Top management support is described as the level of support and understanding of top management concerning the functioning of IS and its contribution to its activities	(Ragu et al. 2004).

Information policies	Information Policies, as described as a group of interconnected laws, guidelines, principles, regulations, rules, and procedures that guide the management and monitoring of the information lifecycle	(Nguyen & Waring 2013)
Financial resources	'Financial resource' is a term covering all financial funds of the organization.	(Al Jowaidi 2015)
Employee engagement	Employee engagement is described as the involvement and satisfaction of the employees as well as enthusiasm towards their work achievement	(Harter, Schmidt & Hayes 2002)
Competitive pressure	Competitive pressure refers to the level of competitiveness in the industry within which the organization operates	(Sin et al., 2016)
Customer's pressure	Customer pressure (CP) is the end consumers' (primary stakeholder group) requests and requirements for the firm to enhance its environmental and social performance	(Ueki, 2016)
Attitude toward adoption technology	Attitude refers to the positive/negative perceptions of behavior and factors influencing the interests of the individual	(Hasani, Bojei & Dehghantanha 2017)
Information integrity	Information integrity is defined as the information used in such a manner that is trustful and principled at the levels of individual and organization	(Choo, 2013)
Information sharing "	Information sharing reflects the willingness to provide information to others suitably and collaboratively; this behavior is well recognized by top management, particularly when it concerns internal information sharing	(Choo, Bergeron & Detlor 2008)

RESULTS AND DISCUSSION:

IQR is a measure of variability based on the distribution of data settled into quartiles. It divides the data into four equal parts, and the dividing values are called the first quartile (Q1), second (Q2), and third (Q3). The IQR score for each proposed factor is calculated and justified to maintain or abort the factor. According to von der Gracht (2012), factors with an IQR score equal to one or less (≤ 1) should remain while factors with an IQR score greater than one (> 1) is eliminated. The factors based on the calculation of the IQR is as shown in (Table 6). According to the experts, the results demonstrate that the IQR of the 14 recommended factors is less than the stipulated value, which is one, indicating that it is significantly relevant.

Table (6): Factors verification by a panel of experts

Factor	EXP1	EXP2	EXP3	EXP4	EXP5	EXP6	EXP7	EXP8	EXP9	EXP10	IQR		
											Medium	Q1	Q3 (Q3- Result Q1)

Factors Influencing Customer Relationship Management System Adoption in Palestinian Small and Medium

Experts Verification using Interquartile Range :Enterprises

Compatibility	5	5	5	5	4	5	4	5	5	5	5	5	5	0	High
Relative advantage	5	5	5	5	5	5	5	4	5	5	5	5	5	0	High
Complexity	5	5	5	5	5	4	5	4	5	5	5	5	5	0	High
IT infrastructure	5	5	5	5	4	5	5	4	5	5	5	5	5	0	High
Customer's pressure	5	5	4	5	5	4	5	5	5	5	5	5	5	0	High
Competitive pressure	5	5	5	5	5	4	5	4	5	5	5	5	5	0	High
Employee engagement	5	5	5	5	5	5	4	5	4	5	5	5	5	0	High
Top management support	5	5	5	5	4	5	5	5	5	5	5	5	5	0	High
Financial resources	4	5	5	5	5	4	4	5	5	5	5	4.25	5	0.75	High
Security	5	5	5	5	5	4	5	4	5	5	5	5	5	0	High
Information integrity	4	5	4	5	5	3	5	5	5	5	5	4.25	5	0.75	High
Information policies	5	5	5	4	5	5	4	5	4	5	5	4.25	5	0.75	High
Attitude toward adopting technology	5	5	5	5	4	3	5	5	5	5	5	5	5	0	High
Information sharing	4	5	5	5	4	3	5	5	5	5	5	4.25	5	0.75	High
Trialability	3	1	4	1	2	4	1	4	1	2	2	1	3.75	2.75	Low
Governmental support	4	1	4	1	2	2	1	1	2	4	2	1	3.5	2.5	Low
Observability	5	1	4	1	2	2	1	2	2	4	2	1.25	3.5	2.25	Low
Technology readiness	4	1	4	1	2	4	1	4	1	2	2	1	4	3	Low
Cost	1	4	4	1	2	4	1	3	1	2	2	1	3.75	2.75	Low
Reliability	2	2	4	1	2	4	1	4	1	1	2	1	3.5	2.5	Low
Trust	4	2	1	1	2	4	1	4	1	5	2	1	4	3	Low
Switching cost	4	2	1	1	2	2	5	1	1	4	2	1	3.5	2.5	Low
Perceived usefulness	3	1	5	1	2	5	1	5	1	2	2	1	4.5	3.5	Low
Perceived ease of use	5	2	1	1	2	2	5	1	2	5	2	1.25	4.25	3	Low
Staff ICT skills	5	1	1	1	1	2	5	1	1	5	1	1	4.25	3.25	Low
Internal barrier	4	1	2	1	1	2	1	4	1	5	1	1	3.5	2.5	Low
Size	5	2	2	2	4	4	2	1	1	1	2	1.25	3.5	2.25	Low
Organizational structure	5	1	2	2	4	1	1	2	4	1	2	1	3.5	2.5	Low
Innovativeness	4	2	2	2	2	5	1	4	1	1	2	1.25	3.5	2.25	Low
Manager's attitude	4	2	1	2	1	4	2	1	2	4	2	1.25	3.5	2.25	Low

The variables were divided into four categories: technological, organizational, environmental, and information culture. As stated in Table 7, the resulting factors were aggregated into fourteen factors:

Table (7): Summary of factors obtained from Literature

Context	Factors
"Technological Factors"	"Compatibility
	IT infrastructure
	Complexity
	Relative advantage
	Security"
"Organizational Factors"	"Top management support
	Information policies
	Financial resources

“Environmental Factors”	Employee engagement” “Competitive pressure Customers pressure”
“Information Culture”	“Attitude toward adoption technology Information integrity Information sharing”

Finally, the study's conceptual framework was developed through a process of verification by a panel of experts to ensure that it met the purpose of the study, apply the right factors and theories, and fit the context of the study. This verification process involved two experts from Palestinian SMEs to assess the suitability of the study context and two academics to evaluate the suitability of the theory and factor selection. All experts appear to agree on these factors suggested.

CONCLUSION:

Successful CRM adoption can give numerous benefits to the performance of small and medium-sized organizations (SMEs), such as answering customer problems in a timely manner, increasing customer satisfaction by selecting an expert to resolve concerns and enquiries, and so on. Identifying the aspects that can contribute to a CRM's success or failure is becoming increasingly important. This article contributes to the field of knowledge by identifying the elements that influence CRM adoption. This study can add to the body of knowledge by filling gaps in prior work by introducing a new component. This would contribute to developing fresh insights into CRM adoption among SMEs in developing countries, particularly Palestine. The findings can also be compared to other studies done in different contexts to better understand how context influences employees' intentions toward CRM adoption in Palestinian private enterprises. This study also provides practitioners with critical elements for CRM adoption based on successful implementation in the context of Palestinian SMEs.

ACKNOWLEDGEMENTS:

The author would like to thank Palestine Technical University-Kadoorie for their financial support in conducting this research.

REFERENCES

- Abdullateef, A. O., Sanuri, S., Mokhtar, M., & Yusoff, R. Z. (2010). The impact of CRM Dimensions on Call Center Performance. *OR Spectrum*, 10(12), 184–194.
- Abou-Shouk, M. A., Lim, W. M., & Megicks, P. (2016). Using competing models to evaluate the role of environmental pressures in e-commerce adoption by small and medium-sized travel agents in a developing country. *Tourism Management*, 52, 327–339.
- Abualrob, A. A., & Kang, J. (2016). The barriers that hinder the adoption of e-commerce by small businesses: Unique hindrance in Palestine. *Information Development*, 32(5), 1528–1544.
- Ahani, A., Rahim, N. Z. A., & Nilashi, M. (2017). Firm Performance through Social Customer Relationship Management : Evidence from Small and Medium Enterprises. 2017 International Conference on Research and Innovation in Information Systems (ICRIIS).
- Ahmad, S. Z., Abu Bakar, A. R., Faziharudean, T. M., & Mohamad Zaki, K. A. (2015). An Empirical Study of Factors Affecting e-Commerce Adoption among Small- and Medium-Sized Enterprises in a Developing Country: Evidence from Malaysia. *Information Technology for Development*, 21(4), 555–572.
- Akroush, M. N., Dahiyat, S. E., Gharaibeh, H. S., & Abu-Lail, B. N. (2011). Customer relationship management implementation. *International Journal of Commerce and Management*, 21(2), 158–190.
- Al-Weshah, G. A., Manasrah, E., & Al-Qatawneh, M. (2018). Customer relationship management systems and organizational performance: Quantitative evidence from the Jordanian telecommunication industry. *Journal of Marketing Communications*, 1–21.
- Alem, A., Rashid, B., & Tahir, S. (2017). The Mediating Role of Customer Orientation Strategy on the Relationship between CRM Technology and Hotel Performance. 1(5), 63–81.
- Alhammadi, A., Stanier, C., & Eardley, A. (2015). The Determinants of Cloud Computing Adoption in Saudi Arabia. *Computer Science & Information Technology (CS & IT)*, 55–67.
- Alharbi, F., Atkins, A., & Stanier, C. (2016). Understanding the determinants of Cloud Computing adoption in Saudi healthcare organizations. *Complex & Intelligent Systems*, 2(3), 155–171.
- Aljowaidi, M. A. (2015). A Study of e-Commerce Adoption Using the TOE Framework in Saudi Retailers : Firm Motivations, Implementation and Benefits.(Degree of Doctor of Philosophy), RMIT University, Melbourne Australia.
- Almabhoh, A., & Alzaza, N. S. (2015). Barriers to Adoption of Cloud Computing in the Palestinian Industries. *European Journal of Computer Science and Information Technology*, 3(4), 43–57.
- Almunawar, M., & Anshari, M. (2011). Improving customer service in healthcare with CRM 2.0. *GTSF Business Review (GBR)*, 1(2), 228–234.
- Alrousan, M., & Jones, E. (2016). Affecting E-CoA Conceptual Model of Factorsmmerce Adoption by SME Owner / Managers in Jordan M. *International Journal Business Information Systems*, 21(3), 269–308.
- Al-Shamaila, Y., Papagiannidis, S., & Li, F. (2013). Cloud computing adoption by SMEs in the north east of England. *Journal of Enterprise Information Management*, 26(3), 250–275.
- Al-Shawi, S., Missi, F., & Irani, Z. (2011). Organizational, technical and data quality factors in CRM

- adoption - SMEs perspective. *Industrial Marketing Management*, 40(3), 376–383.
- Al-Shourah, S., Al-Assaf, H., & Al-Tawalbeh, M. (2018). Roles of Top Management and Customer Orientation in Enhancing the Performance of Customer Relationship Management (CRM) in the Hotel Industry. *6(3)*, 233–239.
- Al-Vesson, M. (2002). Understanding Organizational Culture. <https://doi.org/10.4135/9781446280072>
- Alzaghal, Q., & Mukhtar, M. (2017). Factors affecting the success of incubators and the moderating role of information and communication technologies. *International Journal on Advanced Science, Engineering and Information Technology*, 7(2), 538–545.
- Alzaghal, Q., & Mukhtar, M. (2018). Moderating effect of information and communication technology tools on the relationship between networking services and incubator success. *Journal of Engineering and Applied Sciences*, 13(14), 5746–5755.
- Ashraf, T., Hassan, U., Ghafoor, S., & Aslam, N. (2015). Strategic entrepreneurial decision-making in small firms. *American Journal of Social Science Research*, 1(2), 85–89.
- Asrar-ul-Haq, M., & Anwar, S. (2016). A systematic review of knowledge management and knowledge sharing: Trends, issues, and challenges. *Cogent Business & Management*, 3(1), 1–17.
- Avery, D. R., McKay, P. F., & Wilson, D. C. (2007). Engaging the Aging Workforce: The Relationship Between Perceived Age Similarity, Satisfaction With Coworkers, and Employee Engagement. *Journal of Applied Psychology*, 92(6), 1542–1556.
- Awa, H. O., Ukoha, O., & Emecheta, B. C. (2016). Using T-O-E theoretical framework to study the adoption of ERP solution. *Cogent Business & Management*, 3(1), 1–23.
- Azadegan, A., & Teich, J. (2010). Effective benchmarking of innovation adoptions: A theoretical framework for e-procurement technologies. *Benchmarking: An International Journal*, 17(4), 472–490.
- Bahri-Ammari, N., & Soliman, K. S. (2015). The effect of CRM implementation on pharmaceutical industry's profitability: The case of Tunisia. *Management Research Review*, 39(8), 854–878.
- Bahri-Ammari Nedra, & Nusair, K. (2015). Key factors for a successful implementation of a customer relationship management technology in the Tunisian hotel sector. *Journal of Hospitality and Tourism Technology*, 6(3), 271–287.
- Bai, C., & Sarkis, J. (2014). Determining and applying sustainable supplier key performance indicators. <https://doi.org/10.1108/SCM-12-2013-0441>
- Baidoun, S., Lussier, R. N., Burbar, M., & Awashra, S. (2018). Prediction model of business success or failure for Palestinian Small Enterprises in the West Bank. *Journal of Entrepreneurship in Emerging Economies*, 8(2), 148–167.
- Beglari, S. (2017). Effective Competitive Strategies of U.S. In Vitro Device Manufacturers. College of Management and Technology. (Doctoral dissertation, Walden University). Retrieved from: <https://scholarworks.waldenu.edu/dissertations/4270/>.
- Berisha, G., & Pula, J. S. (2015). Defining Small and Medium Enterprises : a critical review. *Academic Journal of Business, Administration, Law and Social Sciences*. 1(1), 17–28.
- Bohling, T., Bowman, D., LaValle, S., Mittal, V., Narayandas, D., Ramani, G., & Varadarajan, R. (2006).

- CRM implementation: Effectiveness issues and insights. *Journal of Service Research*, 9(2), 184–194.
- Boon, O., Corbitt, B., & Coulthard, D. (2005). A customer relationship management case study: critical success factors in action, in *I.T. and Value Creation: PACIS 2005, the Ninth Pacific-Asia Conference on Information Systems Bangkok, Thailand, 7 - 10 July 2005*, PACIS, Bangkok, Thailand.
- Braman, S. (2011). Defining Information Policy. *Journal Of Information Policy*, 5(1), 8–27.
- Brockman, B. K., Park, J. E., & Morgan, R. M. (2017). The Role of Buyer Trust in Outsourced CRM: Its Influence on Organizational Learning and Performance. *Journal of Business-to-Business Marketing*, 24(3), 201–219.
- Bukola, A. A., Abosede, A. G., & Adesola, M. A. (2019). Customer Relationship Management and Small and Medium Enterprises Performance: Pragmatic Evidence from Oyo State, Nigeria. *Asian Journal of Education and Social Studies*, 5(2), 1–9.
- Bwalya, K. J. (2009). Factors Affecting Adoption of e-Government in Zambia. *The Electronic Journal of Information Systems in Developing Countries*, 38(1), 1–13.
- Chang, H. H., Huang, C. Y., Fu, C. S., & Tse Hsu, M. (2017). Information Technology & People Article information : *Information Technology & People*, 28(2), 366–382.
- Chavitoshi, M., Tze, A., & Jee, M. H. (2015). A CRM adoption model for Malaysian telecommunication and finance companies. *Journal of Information Systems Research and Innovation*, 9(2), 119–125.
- Chen, I. J., & Popovich, K. (2003). Understanding customer relationship management (CRM). In *Business Process Management Journal*, 9(5), 672-688.
- Chen, Q., Zhang, M., & Zhao, X. (2017). "Analysing customer behaviour in mobile app usage", *Industrial Management & Data Systems*, 117 (2), 425-438.
- Choo, C. W. (2013). Information culture and organizational effectiveness. *International Journal of Information Management*, 33(5), 775–779.
- Choo, C. W., Bergeron, P., & Detlor, B. (2008). Information Culture and Information Use: An Exploratory Study of Three Organizations. *Communications in Information Literacy*, 3(2), 80–90.
- Creswell, J. W. (2013). *Qualitative, Quantitative, and mixed methods approach*. SAGE Publications, United States of America.
- Croteau, A.-M., & Li, P. (2003). Critical Success Factors of CRM Technological Initiatives. *Canadian Journal of Administrative Sciences / Revue Canadienne Des Sciences de l'Administration*, 20(1), 21–34.
- Cruz-Jesus, F., Pinheiro, A., & Oliveira, T. (2019). Understanding CRM adoption stages: empirical analysis building on the TOE framework. *Computers in Industry*, 109, 1–13.
- Curry, A., & Moore, C. (2003). Assessing information culture - An exploratory model. *International Journal of Information Management*, 23(2), 91–110.
- Dedoussis, E. (2004). A cross-cultural comparison of organizational culture: evidence from universities in the Arab world and Japan. *Cross-Cultural Management: An International Journal*, 11(1), 15–34.

- DeLone, W. H., & McLean, E. R. (2003). The DeLone and McLean model of information systems success: A ten-year update. *Journal of Management Information Systems*, 19(4), 9–30.
- Diffley, S., & McCole, P. (2015). Extending customer relationship management into a social context. *Service Industries Journal*, 35(11–12), 591–610.
- Duncan, N. B. (1995). Capturing flexibility of information technology infrastructure: A study of resource characteristics and their measure. *Journal of Management Information Systems*, 12(2), 37–57.
- Dutt, H., & Chauhan, K. (2019). Using Flexibility in Designing CRM Solution. *Global Journal of Flexible Systems Management*, 20(2), 103–116.
- Duwaitlah, F., Ali, M., & Al-Debei, M. M. (2015). The Impact of CRM Infrastructural and Cultural Resources and Capabilities on Business Performance: An Application of the Resource-Based View in the Mobile Telecommunications Industry. 23rd European Conference on Information System (ECIS) Miiinster, Germany, Spring, 1–16.
- Elkordy, M. (2014). The impact of CRM capability dimensions on organizational performance. *European Journal of Business and Social Sciences*, 2(10), 128–146.
- Ernst, H., Hoyer, W. D., Krafft, M., & Krieger, K. (2011). Customer relationship management and company performance—the mediating role of new product performance. *Journal of the Academy of Marketing Science*, 39(2), 290–306.
- Fazlzadeh, A., Tabrizi, M. M., & Mahboobi, K. (2011). Customer relationship management in small-medium enterprises: The case of science and technology parks of Iran. *African Journal of Business Management*, 5(15), 6160–6168.
- Foss, B., Stone, M., & Ekinci, Y. (2008). What makes for CRM system success — Or failure? *Journal of Database Marketing & Customer Strategy Management*, 15(2), 68–78.
- Fouad, N., & Al-Goblan, N. (2017). Using customer relationship management systems at university libraries. *IFLA Journal*, 43(2), 158–170.
- Frygell, L., Jonas Hedman, L., & Carlsson, S. (2017). Implementing CRM System in a Global Organization National vs. Organizational Culture. *Proceedings of the 50th Hawaii International Conference on System Sciences*.
- Gamayanto, I. G., & Christian, H. (2018). The Development of Innovative CRM E-Commerce: The Case of Blibli.Com Indra, 9(1), 29–38.
- Gao, Y., Li, H., Luo, Y., Management, I., Systems, D., Kim, K. J., Shin, D., Hsu, L., Chih, W., & Liou, D. (2015). Value-focused objectives for CRM system adoption. *Industrial Management & Data Systems*, 116 (3), 526-545.
- Garrido-Moreno, A., & Padilla-Meléndez, A. (2011). Analyzing the impact of knowledge management on CRM success: The mediating effects of organizational factors. *International Journal of Information Management*, 31(5), 437–444.
- Gbandi, E. C., & Amisah, G. (2014). Financing options for small and medium enterprises in Nigeria. *European Scientific Journal*, 10(1), 327–340.
- Ghalenoioe, M. B., & Sarvestani, H. K. (2016). Evaluating Human Factors in Customer Relationship Management Case Study: Private Banks of Shiraz City. *Procedia Economics and Finance*, 36(16), 363–373.

- Ghobakhloo, M., Hong, T. S., Sabouri, M. S., & Zulkifli, N. (2012). Strategies for Successful Information Technology Adoption in Small and Medium-sized Enterprises. *Information*, 3(4), 36–67.
- González-Benito, Ó., Venturini, W. T., & González-Benito, J. (2017). CRM Technology: Implementation Project and Consulting Services as Determinants of Success. *International Journal of Information Technology & Decision Making*, 16(02), 421–441.
- Goudarzi, S., Ahmad, M. N., & Soleymani, S. A. (2013). Impact of Trust on Internet Banking Adoption : A Literature Review. *Australian Journal of Basic and Applied Sciences*, 7(7), 334–347.
- Grassian, E., Mizrachi, D., Roy, L., & Kos, D. (2015). The Third European Conference on Information Literacy (ECIL) October 19-22 , 2015 , Tallinn , Estonia Abstracts.
- Nguyen, T., & Waring, T. (2013). The adoption of customer relationship management (CRM) technology in SMEs. *Journal of Small Business and Enterprise Development*, 20(4), 824–848.
- Harrigan, P., Ramsey, E., & Ibbotson, P. (2012). Exploring and explaining SME marketing: Investigating e-CRM using a mixed methods approach. *Journal of Strategic Marketing*, 20(2), 127–163.
- Harter, J. K., Schmidt, F. L., & Hayes, T. L. (2002). Business-unit-level relationship between employee satisfaction, employee engagement, and business outcomes: A meta-analysis. *Journal of Applied Psychology*, 87(2), 268–279.
- Hasani, T., Bojei, J., & Dehghantanha, A. (2017). Investigating the antecedents to the adoption of SCRM technologies by start-up companies. *Telematics and Informatics*, 34(5), 655–675.
- Hoon Yang, K., Lee, S. M., & Lee, S. (2007). Adoption of information and communication technology. *Industrial Management & Data Systems*, 107(9), 1257–1275.
- Hoti, E. (2015). The Technological, Organizational And Environmental Framework Of Is Innovation Adaption In Small And Medium Enterprises. Evidence From Research Over The Last 10 Years Erind. *International Journal of Business and Management*, 3(4), 1–14.
- Hsu, C. S., Islam, M., & Yang, Y. F. (2016). Studies of CRM: management capabilities and the mediating role of customer satisfaction. *International Journal of Business Excellence*, 10(2), 264.
- Iriana, R., Buttle, F., & Ang, L. (2013). Does organisational culture influence CRM's financial outcomes? *Journal of Marketing Management*, 29(3–4), 467–493.
- Iriqat, R. A. M., & Daqar, M. A. (2017). The Impact of Customer Relationship Management on Long-term Customers' Loyalty in the Palestinian Banking Industry. *International Business Research*, 10(11), 139.
- Jahangirian, M., Taylor, S. J. E., Young, T., & Robinson, S. (2017). Key performance indicators for successful simulation projects ga. *Journal of the Operational Research Society*, 68(7), 747–765.
- Jamali, D., & Carroll, A. (2017). Capturing advances in CSR: Developed versus developing country perspectives. *Business Ethics*, 26(4), 321–325. <https://doi.org/10.1111/beer.12157>
- JoAnn C. Carland. (2006). *Journal of Organizational Culture, Communications and Conflict*. *International Urology and Nephrology*, 10(3), 567–570.
- Alzaghhal, Q., Sweis, K., Alzaghhal, F., Mudallal, E., RawhiAlarda, A., & Diab, N. (2020). The effect of using e-government on improving electronic services at Palestine Technical University–Kadoorie. *International Journal of Innovation, Creativity and Change*, 13(9), 377-403.

- Khan, S. A., Abbas, H. A., & Iqbal, M. S. (2016). Impact of CRM Efficacy on Organizational Performance in Pakistani Banking. 69–76.
- Kim, G., Shin, B., Kim, K. K., & Lee, H. G. (2011). Journal of the Association for Information IT Capabilities, Process-Oriented Dynamic Capabilities, and Firm Financial Performance. *Journal of Association for Information Systems*, 12(7), 487–517.
- Ko, E., Kim, S. H., Kim, M., & Woo, J. Y. (2008). Organizational characteristics and the CRM adoption process. *Journal of Business Research*, 61(1), 65–74.
- Kumar Piaralal, S., Nair, S. R., Yahya, N., & Karim, J. A. (2015). An Integrated Model of the Likelihood and Extent of Adoption of Green Practices in Small and Medium Sized Logistics Firms. *American Journal of Economics*, 5(2), 251–258.
- Kyengo, J. W., Ombui, K. & Iravo, M. A. (2016). Determinants of Customer Relationship Management Strategies on the Performance of Small and Medium Enterprises in Westlands Nairobi City. *International Academic Journals*, 2(1), 17–28.
- Laan, S. (2013). *IT Infrastructure Architecture - Infrastructure Building Blocks and Concepts*. (2)Edition.
- Laketa, M., Sanader, D., Laketa, L., & Mistic, Z. (2015). Customer relationship management: concept and importance of banking sector. *UMTS Journal of Economics*, 6(2), 241–254.
- Laohasirichaikul, B., Chaipoo Pirutana, S., & Combs, H. (2011). Effective customer relationship management of health care: a study of hospitals in Thailand. *Journal of Management and Marketing Research*, 6, 1–12.