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Marketing technology for adoption by small business

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The adoption of technology for marketing is essential for the survival of small businesses and yet little is understood about owner-manager practice in this area. This paper aims to address that gap through a qualitative study of 24 owner-managed small businesses operating in the visitor economy. It found that there was a strong appetite for the adoption of technology for marketing and a clear recognition of its opportunities particularly related to how it could create a stronger market orientation and more agile marketing, adhering to the principles of effectual reasoning. However, the ability to take advantage of these opportunities was constrained by a lack of knowledge and in particular an inability to measure the return on investment. While the wider implications of the study are limited by the niche sample, a planning model for the adoption of technology for marketing is presented which can be tested through future research.

Keywords: small businesses; entrepreneurial marketing; digital marketing; effectuation; market orientation

Introduction

The Internet has the potential to transform small and medium enterprise (SME) marketing in a number of areas including customisation, customer relationship marketing, access to new markets, business-to-business collaboration, co-creation of the product with customers and improving internal efficiency (Ansari & Mela, 2003; Barnes et al., 2012; Harrigan et al., 2010; Harris & Rae, 2009). Industry sources such as the consulting firm McKinsey noted in 2011 that SMEs who have a strong Web presence grow twice as quickly as those who have no or minimal presence.

According to Kim, Lee, and Lee (2011), 'all firms that utilise the unique value of Web 2.0 through superior management skills, innovation, and business process reengineering are likely to enjoy sustainable competitive advantage' (p. 158). However, despite the importance, the evidence suggests that SME adoption of the Internet is limited. Only one-third of SMEs in the UK have a digital presence according to trade organisations such as the Federation of Small Business, with established businesses finding the challenge of integrating fast moving technology into their business 'daunting', while other industry sources (i.e. Sage UK, the accountancy software firm), found that in 2014 three quarters of British SMEs do not use social media to engage with local consumers. It is clear that SMEs are facing barriers, which are preventing them from fully harnessing the potential of the Internet for marketing (Kim et al., 2011).

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This study focuses on the owner-managers of small and micro enterprises (1–49 employees as defined by the European Commission), with evidence suggesting that this subgroup warrant unique investigation within the SME population. There were 5 million micro enterprises in the UK in 2014, accounting for 96% of all businesses and for 92.4% of all enterprises in the 28 EU member states in the non-financial business sector. The Federation of Small Business recommends that the Office of National Statistics extend its 'Information and Communications Technology (ICT) Activity of UK Businesses' study to include micro enterprises. The European Commission has set new financial thresholds in its definition of small businesses to begin to encourage Europe-wide measures to address the problems micro enterprises face. The paper's principal contribution to theory in the field of services research lies in the development of a planning model for the adoption of technology for marketing by small businesses. This model, which can be tested through future research, is derived through the research undertaken for this study.

Jones, Simmons, Packham, Beynon-Davies, and Pickernell (2014) argue that because of size and resource issues, micro enterprises cannot be studied in the same vein as larger SMEs and they 'would be expected to exhibit unique attitudes and strategic responses towards ICT adoption' (2014, p. 289). Barnes et al. (2012) remind us that small businesses are not little big businesses. Simmons, Armstrong, and Durkin (2008) single out the role of the owner as having more significance in a micro enterprise than in their larger counterparts. Citing Standing, Vasudavan, and Borberly (1998), Ritchie and Brindley (2005) point out that the rate of technology adoption in a micro enterprise is highly dependent on the passion and interest that the owner-manager has for technology. However, despite their economic significance and their unique characteristics, in particular the central role of the owner, there is a limited body of research into how owner-managers are adopting technology for marketing and relatively little empirical research into the attitudes of owners in this area.

In order to address these gaps in knowledge, the objectives of this exploratory study are as follows: firstly, to review the current literature on the adoption of technology for marketing by small businesses and owner-managed businesses in particular. Secondly, to empirically investigate marketing technology for adoption by small business. Thirdly, to understand the barriers which prevent adoption of technology for marketing. Fourthly, to identify ways in which small businesses can be more effectively supported in their use of technology for marketing and to identify future directions in this field so as to test the model presented in this study.

In order to address these objectives, this study explored the adoption of technology for marketing by 24 small owner-managed tourism-related businesses operating in the visitor economy. Tourism has been identified as a sector worthy of investigation owing to its reputation for being 'dynamic in website adoption' (Simmons, Armstrong, & Durkin, 2011, p. 552), although this study goes beyond a website focus. Tourism-related small businesses are heavily reliant on the Internet in a market where customer relationships are increasingly mediated online. These businesses are challenged with promoting an intangible service where the information they provide online is often the only tangible representation of the service that the customer will experience at the point of decision making and purchase. The seasonality of demand and the perishable nature of the product compound these challenges.

The paper is structured as follows. Firstly, the literature is reviewed to identify the issues, which small business owner-managers face, related to technology for marketing adoption. Secondly, the methodology is described. Thirdly, the findings are presented and then discussed within the context of the literature. Fourthly, an empirically informed

model is presented, to guide the adoption of technology for marketing by small business owner-managers. Finally, conclusions are reached and areas for future research are suggested.

Small business adoption of technology for marketing

There are a growing number of studies in the literature related to the adoption of technology for marketing by small businesses (Bulearca & Bulearca, 2010; Durkin, McGowan, & McKeown, 2013; Harris & Rae, 2009; Kim et al., 2011; McGowan & Durkin, 2002; Simmons et al., 2008, 2011) and some focusing on micro enterprises in particular (Barnes et al., 2012; de Berranger, Tucker, & Jones, 2001; Bharati & Chaudhury, 2006; Dandridge & Levenburg, 2000; Jones et al., 2014; Rhodes, 2009; Wolcott, Kamal, & Qureshi, 2008). The following review of this literature is structured according to themes, which essentially represent the main issues impacting on the adoption of technology for marketing by small business owner-managers.

The first of these relates to the highly influential role played by the owner: 'in order to understand micro-enterprises' ICT adoption, researchers need to appreciate the attitudes of owner/managers which determine their strategic response' (Simmons et al., 2008, cited in Jones et al., 2014, p. 286). Fillis and Wagner (2005) identify the level of entrepreneurial orientation of the key decision maker as instrumental in determining the adoption of e-business. In addition to attitudes and orientation, McGowan and Durkin (2002), in their study of entrepreneurial small firms, found that the competency of the owner in the areas of vision, value, technical ability and control, coupled with the extent to which customers, collaborators, and competitors are using the Internet, influences adoption.

Secondly, and related to the first theme, there is more likely to be successful adoption of technology where the owner perceives it as an enabler of the business and can see its longer term benefits. Simmons et al. (2011) refer to this as having an eVision, which is directly dependent on the owner having a clear perception of the benefits. Martin and Matlay (2003) found that small businesses could see the benefits of websites, viewing them as 'essential marketing tools' that provide access to new customers, build stronger links with existing customers, access niche markets and 'change customers perceptions of the firm's products or services' (Martin & Matlay, 2003, p. 23). Jones et al. (2014) found that micro enterprises were more likely to adopt technology where they could see a close fit with their business model. The term Web 2.0, originally coined by O'Reilly (2007), is often used (Barnes et al., 2012; Hinchcliffe, 2010; Kim et al., 2011) to denote a shift from 'a business-centred to a user-centred model' (Kim et al., 2011, p. 157).

The third theme concerns the link between market orientation and technology adoption. While there is a link between a strong marketing orientation and business performance (Kara, Spillan, & DeShields, 2005), there is less clarity about the role played by technology in enabling that orientation in small businesses. Peltier, Zhao, and Schibrowsky (2012) suggest that the link between marketing orientation and the successful adoption of new technology is unclear. However, a number of studies have concluded there is a positive link between market orientation and technology adoption among small businesses (Coviello, Milley, & Marcolin, 2001; Polo Peña, Frías Jamilena, & Rodriquez Molina, 2011). Simmons et al. (2011) draw on Pelham and Wilson's (1996) small business (i.e. targeted marketing; understanding of customer needs; creating customer value; response time to negative customer feedback; sharing customer information across the organisation; and internal strengths and weaknesses and competitor analysis) and market orientation is

central to their website optimisation model. However, they acknowledge that the link between market orientation and developing an online value proposition 'is an area that requires a more developed understanding from the small business perspective' (Simmons et al., 2011, p. 537).

The fourth theme pertains to the barriers to adoption of technology for marketing, including resource factors (e.g. time and money) and these limitations are well documented in the small business literature (Barnes et al., 2012; Street & Cameron, 2007; Wymer & Regan, 2005). Perhaps more troublesome is the proposition, as Bharadwaj and Soni (2007) found, that small business disengagement with e-commerce was a perception of it lacking strategic importance. A further potential barrier is the challenge that small businesses face in integrating 'traditional marketing practices with new web-based opportunities' (Simmons et al., 2008, p. 364) and the opportunity cost whereby small businesses may view investment in online marketing at the expense of more traditional marketing.

A related barrier is the limited extent to which small businesses experiment with technology in view of the resource implications (Simmons et al., 2008, p. 358). This has a knock-on effect insomuch that if small businesses fail to test how the adoption of technology can add value to their marketing, they are less likely to identify the full costs and benefits and consequently be less inclined to incorporate it into their overall business strategy. This failure to test and experiment is compounded by the lack of measurement; for example, Sellitto, Andrew, and Burgess (2003) found that while small businesses had a general purpose for their online presence, they had no specific goals for their website. A lack of goal setting and measurement of the impact of the Internet on marketing may breed further 'scepticism' (Kim et al., 2011, p. 170).

Fifthly, small businesses tend to opt for a just doing approach rather than for formal planning (Chaston, Badger, Mangles, & Sadler-Smith, 2003; Jones, Hecker, & Holland, 2003). This has led recently to studies exploring the way in which effectuation might help to provide insights into technology adoption by small businesses (Fischer & Reuber, 2011). 'Effectual logic is the name given to heuristics used by expert entrepreneurs in new venture creation' (Read, Sarasvathy, Dew, Wiltbank, & Ohisson, 2011, p. 7). The relevance of effectuation, which 'evokes creative and transformative tactics' (Read et al., 2011, p. 7), as a lens through which to view technology for marketing adoption is of particular interest in the context of digital media where the opportunities for customer engagement are significantly greater than they were through more traditional media. Furthermore, this engagement is highly measurable, whereby almost all forms of online customer engagement can be tracked and analysed and the insights used to feed back into marketing activity. The contribution of effectual logic to the field of small business use of technology for marketing is discussed later in the paper after the findings are presented.

A sixth and final theme is the growing number of studies focusing on the adoption of the wider online marketing mix and Web 2.0 applications by SMEs (Barnes et al., 2012; Bulearca & Bulearca, 2010; Durkin et al., 2013; Harris & Rae, 2009; Kim et al., 2011) as opposed to only the website which traditionally has been the focus. This transition from a website-specific focus to an expanded range of technologies such as mobile apps, application programme interface, social networks and analytics has created a complex land-scape, which is increasingly challenging for small business owner-managers to navigate.

Obtaining a clear view of the costs and benefits in this new era and setting measurable goals as part of a wider strategy becomes considerably more difficult. This is in part because in a multichannel environment, where the creation and distribution of content that influences the customer is increasingly created and shared by other customers, many elements of online marketing are beyond the control of the business. This 'earned media' (Chaffey &

Ellis-Chadwick, 2012), also referred to as 'user-generated content' (Kim et al., 2011), is growing in influence (Dhar & Chang, 2009). Qualman (2013) coined the term Socialnomics to capture the power and influence of this type of content. The magnitude of this change has led the Marketing Science Institute to argue that a major shift is needed to embrace these new themes. Despite increasing coverage in the literature relating to digital marketing by small businesses, there remains a lack of conceptual and empirical studies (Kim et al., 2011) to explain how they make sense of this turbulent technological environment (Peltier et al., 2012).

Methodology

In order to address the objectives of the study and to provide more insights into the themes discussed above, a qualitative methodology was deployed and data obtained from a convenience sample of 24 owner-managed tourism-related enterprises (Table 1 for a profile of the owner-managed businesses). A qualitative methodology is appropriate considering the exploratory nature of the study. The enterprises that comprised the sample were part of a wider 60-strong SME cohort, comprising both owner-managers and managers, that applied to be part of a university-led project investigating the adoption of technology for marketing; therefore, this was a group that was using technology to support their marketing but were interested in exploring opportunities in more depth, thereby providing a rich information source.

The research design for the entire project included three phases: the first was exploratory designed to investigate levels of adoption of technology for marketing; the second was

Case	Business type	Employees FT and PT
A	Tourist attraction	25
В	Bed & breakfast	1
С	Tourist attraction	4
D	Holiday accommodation/property agency	20
Е	Hotel	9
F	Bed & breakfast	1
G	Sightseeing tours	30
Н	Self-catering accommodation	10
Ι	Wine education and training	3
J	Retail/restaurant/online sales/public garden	30
Κ	Hotel & restaurant	35
L	Professional conference organisers	2
М	Sightseeing tours	1
Ν	Adventure sports/outdoor education	40
0	Bed & breakfast	1
Р	Outdoor activities	5
Q	Self-catering accommodation	1
Ŕ	Self-catering accommodation	1
S	Corporate yacht charters	17
Т	Tourist attraction	45
U	Outdoor activities	6
V	Hotel	25
W	Self-catering accommodation	1
Х	Visitor accommodation and activities	1

Table 1. Profile of owner-managed businesses.

an action research phase whereby the participating businesses undertook online marketing campaigns; the final phase reflected on the outcomes and the learning that took place. This paper reports on the first phase of the project where the data were gathered through a number of methods: firstly, each business completed an application form, which asked for information relating to them as individuals (e.g. reasons for applying, previous experience, personal professional development, and attitudes to technology) and their business (size, current adoption of technology for marketing, digital marketing goals, key strengths and weaknesses).

Secondly, participants met twice in smaller clusters of 10 to discuss the challenges and opportunities surrounding technology for marketing and their attitudes and opinions. The first half-day cluster meeting was facilitated at the university and participants were asked to outline their priorities for digital marketing and the challenges they faced. This enabled a wider discussion and at times the facilitators would prompt and probe along the themes identified in the previous section of this paper. The second meeting was self-organised by each cluster, lasting on average 90 minutes, and built on the themes and ideas discussed at the first meeting. Participants were tasked with refining their digital marketing priorities in order to provide a focus for the meeting and to lead into the second action research phase.

A number of measures were built into the research design to enhance trustworthiness and authenticity of the study. Firstly, the first group discussion was facilitated by the project lead at the university and an external consultant who specialises in marketing for small businesses. This ensured a practitioner perspective that was important in communicating the purpose of the study in terms that owner-managers could relate to. It also provided a quality check on data collection and interpretation and the identification of key themes. We were aware of the importance of creating a space that would allow the participants to openly share their experiences, concerns and objectives relating to technology adoption. The facilitation by a consultant experienced in working with small business owners helped to ensure a level of empathy which proved effective in encouraging owners to express their viewpoints. The interaction that took place among the owners was also instrumental in developing a free flow of conversation and additional insights that may not have been possible in an individual interview. Secondly, the first group discussion was captured on video, which enabled the research team to capture important visual indicators. Thirdly, a member of the research team attended the cluster meetings and used participant observation as a quality check. Fourthly, additional rigour was added through the feedback which businesses provided via blog posts on the website supporting the study and through a private discussion forum on LinkedIn. Fifthly, the group discussion at the cluster meeting in particular featured a high level of peer-to-peer interaction, which facilitated clarification.

Data management and analysis

The application forms and transcripts of the group discussions were uploaded to NVivo, a qualitative data analysis package that enables coding, querying, visualising, and reporting on the data (Bazeley & Jackson, 2013). A subset of the data was established for the 24 owner-managers, which forms the basis for the analysis in this paper. The text was coded and analysed 'to form concepts (thematic analysis) and identify relationships (semantic analysis) between concepts' (Verreynne, Parker, & Wilson, 2013, p. 410).

The second step was the process of 'going on with coding' (Bazeley & Jackson, 2013, p. 95) whereby a structured coding system (thematic framework) was created where the

parent nodes represented themes central to the study and the child nodes, sub-themes. This paring-down process provided 'conceptual clarity' (Bazeley & Jackson, 2013, p. 97). While the thematic framework was informed by the literature (deductive reasoning), the process also enabled the identification of concepts that emerged from the data (inductive reasoning) and these are discussed as follows.

Findings

A number of themes and sub-themes emerge from the research with the businesses, which provide valuable insights into owner-manager adoption of technology for marketing. The dominant theme in terms of the amount of text references (denoted in parentheses) coded to it, is market orientation (83), followed by strategy and vision (56), barriers to technology for marketing adoption (46), measurement (39), owner profile (20), collaboration (17), and benefits (12).

The market orientation sub-themes are as follows: Unique Selling Proposition (USP) (28), targeting (19), customer insight (12), customer conversation (10), linking channel to customer (9), customer retention (6), product–market match (6), customer database (5), and customer journey (3).

Three of these sub-themes are listed by Pelham and Wilson (1996) in their market orientation framework, namely target marketing, creating customer value (coded to USP), and understanding customer needs (coded to customer insight). However, three further themes which Pelham and Wilson identified were not referred to by owners (i.e. response time to negative customer feedback, sharing customer information across the organisation and competitor analysis). This suggests a number of missed opportunities for owner-managers as social media sites such as Twitter and Facebook can provide highly responsive customer service channels. The transparency of the Internet enables competitor analysis, for example, Facebook Insights allows Facebook Page owners to view analytics of five other pages. In addition, the increasing range of free or low-cost applications in the cloud facilitates the sharing of information between staff, which can enable the more flexible working practices characteristic of small businesses (e.g. homeworking, seasonal staff).

The research with the business owners identified a number of additional sub-themes, which indicates that they have a level of market orientation and, importantly, demonstrates an awareness of how technology can facilitate that. One example is customer conversation:

I think the idea of a conversation with people through digital ... I'm finding more and more now Facebook is a conversation. (Jackie, owner-manager, Tourist attraction, 45 employees)

Having a conversation with customers did not exist as a marketing concept five years ago and is a product of the Web 2.0 era, particularly the interactivity afforded by social media, which in addition to communication also provides the opportunity to gain customer insight:

So for me, Twitter's not just a one-way thing, I'm learning a lot about our market through it as well. (Karen, owner-manager, Self-catering accommodation, 1 employee)

Simultaneous reference to more than one market orientation theme is a pattern that emerged from the data and demonstrates a sophisticated level of owner-manager knowledge and an understanding of how the adoption of technology can facilitate that orientation:

Tim (owner/manager, Sightseeing tours, 30 employees) and I are obviously in a similar business, but very different, but I think the word experience, which is a word I've tried to use, we've got the semi retired market and we've also got the dynamic hen and stag market as well, and I think trying to get through to both those markets which are both very fertile I

think is an interesting ... and that's where I think Facebook, and that's where I'll be focusing on trying to get those two markets addressed. (Andy, owner-manager, Sightseeing tours, 1 employee)

The owners demonstrated an awareness of the importance of communicating their USP online but were challenged as to how to achieve this:

We are a very visual business – plants, flowers, food, growing vegetables so there is always a story to tell – how can we make the most of this on line and increase visitors and sales? (Patrick, owner-manager, Public garden, 30 employees)

This relates to one of the barriers to adoption of technology for marketing that emerged during this study, namely the difficulty owners perceive in creating online content, particularly in social media channels. The reference to storytelling in the quote above is an emerging trend (Black & Kelley, 2009; Tussyadiah & Fesenmaier, 2008) and the opportunity to utilise customers' stories which are readily available online may help to provide small business owners with ideas for communicating their USP online.

The concept of the online customer journey emerged from the data and while it demonstrates an awareness of customer behaviour on the one hand, the growing complexity of that journey represents a significant issue for owner-managers:

We had this conversation as well, we started to talk about measuring, and the challenges in the good old days, someone could ring up your staff and do a holiday booking and say where did you find us, and they'd say oh we saw your advert in whatever newspaper, oh great, there you go. Since Google and websites and things like that it's the routes they take to actually end up on your site. I completely agree with what you guys were saying about trying to find that route of how they made their journey actually into your company is almost impossible nowadays. (Des, owner-manager, Holiday property agency, 20 employees)

The nostalgic reference to 'the good old days' when traditional advertising was relatively easy to measure coupled with the reference to the 'impossibility' of finding the route they took to the company underlines the challenges which owner-managers face in attributing the business they gain from digital marketing and accurately measuring return on investment (ROI).

Measurement emerged as a strong theme and represents both an aspiration and frustration for owner-managers:

In our case most of our enquiries still come over the phone, even though people go to the website first. This makes tracking conversions rates tricky and would like to find ways of better monitoring our online impact and some tighter goals to aim for. (Sam, owner-manager, Outdoor activities, 5 employees)

But I think it's really understanding the measurement of that and what our engagement is, and ultimately what that puts on the bottom line. I think that's a key message for us. We do lots of things and I haven't got the slightest idea what works. (Jackie, owner-manager, Tourist attraction, 45 employees)

One of the advantages of online marketing is the ability to measure customer interactions more accurately than is possible with traditional marketing practices (e.g. print, television, and radio). Most online marketing channels come with their own analytical tools that allow a range of important marketing metrics to be captured. However, a combination of lack of time and knowledge of how to use these tools and integrate the information they provide into their marketing represents a significant barrier to further adoption of technology for marketing by owner-managers.

However, there was an appetite among owner-managers to test and learn and to experiment with online marketing channels and, equipped with the knowledge, to realise tangible benefits: When it started, I think we spent about £70 a month on ad words and we were doing things like things to do in Bournemouth. But what was happening is, we'd watch them land on the page and with analytics you can see how many land on the page and then how many drop off. And then we were looking back at the data and analytics, so we were getting rid of key words, so we only end up with about five or six for each ad campaign. And now it's down to about £9. But we were picking up the right contacts. (Andy, owner-manager, Outdoor activities, 6 employees)

Owner-managers expressed more interest in measuring the impact of their current online marketing and obtaining a better focus rather than developing long-term strategy:

We were talking about putting a strategy plan together, but actually it's got to be more focused now, actually saying right, this month what we're trying to get out of it. Is it number of likes we're trying to get, is it number of bookings, and actually number of reviews at the end of it, and actually start to say right, this month we are focusing on this and that's got to be our goal, because otherwise you can get lost amongst it all. (Olivia, owner-manager, Hotel, 25 employees)

The goal of setting a longer term strategy or plan was referred to frequently in the application forms, however, subsequent discussions revealed that shorter term tactical issues were of more importance to owner-managers.

Discussion of findings

The findings indicate that small business owner-managers have a positive attitude and a real appetite for adopting technology for marketing, associating it with an opportunity to engage with customers at a deeper and more interactive level. There is clear recognition among owner-managers that the adoption of technology for marketing is beneficial although this did not extend to the level of recognising fit with their business model (Jones et al., 2014). In addition, there is an awareness of how the adoption of technology for marketing can facilitate a clear market orientation (Coviello et al., 2001).

The findings also reveal a number of Web 2.0 market orientation concepts (i.e. online customer journey and online conversations) that go beyond current frameworks (Pelham & Wilson, 1996), and offer potential for owner-managers to shift from 'a business-centred to a user-centred model' (Kim et al., 2011, p. 157). This is in line with the open and collaborative approach advocated by Harris and Rae (2009) using Web 2.0 tools, for example, Twitter, as a two-way channel for communicating and listening to the customer (Bulearca & Bulearca, 2010). However, there is also an opportunity for owner-managers to adopt technology to gain competitor insight and to share information across the organisation (Pelham & Wilson, 1996).

However, the ability for owner-managers to turn this positive view of adopting technology for marketing into a clear plan is hindered by a lack of technical competency (McGowan & Durkin, 2002), particularly the inability to set and measure goals (Sellitto et al., 2003). This acts as a barrier to realising the full benefits of the adoption of technology for marketing and consequently developing an eVision (Simmons et al., 2008). The data do not support the findings of Bharadwaj and Soni (2007) that small business disengagement with e-commerce was a perception of it lacking strategic importance. On the contrary, these owner-managers were very aware of the importance of technology-enabled marketing, explaining in large part their frustration at not being able to implement and measure it more fully.

It has been documented for some time that owner-managers tend to do rather than plan (Chaston et al., 2003). They adhere more to the principles of effectuation (Read et al., 2011), namely seeking to control and shape an unknown and unknowable future rather

than to predict it. This is particularly relevant in the fast moving Web 2.0 landscape in which owner-managers must compete and where prediction is increasingly difficult. The owner-managers in this study are challenged by customer engagement online and find their inability to understand and control it stressful. However, with the requisite technical skillset, there are opportunities in this new landscape. The means (who I am, what I know, and who I know), which an entrepreneur has at his or her disposal, is the starting point in the effectual cycle (Sarasvathy, 2001). Online customer engagement generates a large amount of data that can provide the owner-manager with additional means (what they know, who they know), which enable them to set new goals (Fischer & Reuber, 2011). For example, at an operational level, customer feedback via social media can alert an owner-manager to opportunities for improving their service offer. At a more strategic level, digital marketing analytics can help an owner-manager to identify new customer segments to target, including goals to reach that segment and indicators to measure those goals.

On a business-to-business level, owner-managers in this study demonstrated a keen interest in forming partnerships and recognised that collaboration could provide an advantage for their business. While the relationships were initially formed face to face, a number of owner-managers in this study continued to interact with each other via Twitter after the project had finished. This highlights the opportunity for small business owner-managers to create clusters and to explore the co-creation of products and experiences with partners in that cluster. It is instructive that the strongest networks within the study were those comprising owner-managed micro firms, which, as indicated above, extended networking beyond the confines of the study through exchanges on Twitter. In one case two micro firms, a small bed & breakfast and a cycle hire company, discussed business collaboration in a face-to-face meeting outside the study. Micro firm owner-managers were particularly keen in learning from other participants' experiences in implementing technology, lending credence to the importance of peer-to-peer exchange. The role of the owner-manager is often an isolated one, particularly in a rural setting, and the opportunities to discuss technology adoption with their peer group are very limited.

However, while effectuation provides an interesting lens through which to view ownermanager adoption of technology for marketing, it does not equate to 'not planning'. Not having preset goals does not mean 'not having goals' and this study has demonstrated that goals are vital for the successful adoption and measurement of technology for marketing. However, in keeping with the principles of effectual reasoning, it is more appropriate to think in terms of shorter, more adaptive, planning cycles, informed by insight through measurement. A key implication of this research therefore is the requirement for small business owner-managers to improve their technical competency in order to realise the full benefits, particularly in terms of more agile and user-centred, data-driven marketing.

This study demonstrates that owner-managers require new skillsets in order to overcome the barriers to adopting technology for marketing. They mirror those in social media customer relationship marketing, including an ability to analyse data, measure ROI, integrate customer touch points and create engaging content (Malthouse, Haenlein, Skiera, Wege, & Zhang, 2013). Malthouse et al. (2013) identified the need to change the culture of the organisation and provide the workforce with the required skillset including data analysis (data scientists), interpretation, and business intelligence. This presents a daunting challenge but is imperative to address if micro firms are going to realise the benefits of more agile marketing. Owner-managers of micro firms tend to learn through doing, adhering to the principles of effectual entrepreneurship as opposed to formal planning. However, in today's complex digital environment that learning process is more difficult. The following section presents a model to facilitate a test-and-learn approach for micro firm marketing. The willingness of owner-managers to collaborate in and beyond this study presents an opportunity for them, collectively, to share the knowledge and insights they gain from testing this model within business clusters. Equally, collaboration presents an opportunity to enhance the service offer and develop a more unique experience for the customer.

Practical implications of the study

This section prescribes an empirically informed model (Figure 1) to guide owner-manager adoption of technology for marketing; it is divided into three interconnected phases, with each phase tied to the findings of the study.

In phase 1, owner-managers develop a clear market orientation through customer targeting and identifying their USP(s). This includes reading content that customers create about the business in order to obtain the customer's perspective on the value provided by the experience, accessing digital marketing channels analytics to understand consumer online behaviour and data mining of customer databases. This will help businesses to create customer personas which are used in human-centred design and marketing (Chaffey, 2010; Hisanabe, 2009) and go beyond traditional socio-demographic market segmentation methods that are being challenged in marketing (Valos, Ewing, & Powell, 2010). The findings of this study demonstrate that owner-managers are aware of the broad segments that they are targeting but lack deeper insights into online customer behaviour which is inhibiting their ability to communicate their unique propositions. The realisation among participants in this study of the need to embed analytics in their strategy can be harnessed to enable this phase of the model.

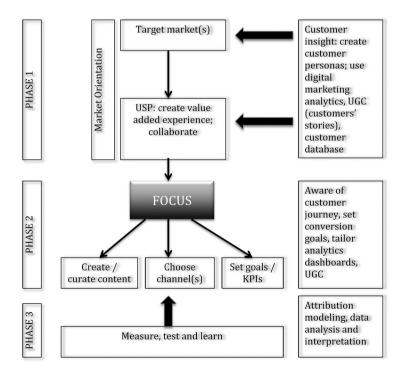


Figure 1. Technology for marketing adoption model for small businesses.

Phase 2 of the model provides owner-managers with a focus for customer acquisition and retention, building on the customer insight gained in Phase 1. However, this study suggests that owner-managers do not pay sufficient attention to engaging with repeat customers. This is a missed opportunity as it is less costly to retain existing customers and there are opportunities to engage more effectively with them based on customer knowledge (Harrigan et al., 2010; Payne & Frow, 2005; Sigala, 2006). While owner-managers in the study were broadly aware of the opportunities that social media offered for customer engagement, for example, through the concept of conversation, they were not clear on how to utilise and measure it. One of the participants quoted earlier (Patrick, owner-manager, public garden, 30 employees) referred to the difficulty he had in telling his story. However, there is an opportunity for small businesses to build a narrative from the perspective of their customers by curating the content that they create. For example, Storify (www.storify.com) provides a platform for small businesses to find and present user-generated content to their target audiences on their own online marketing channels, as part of an overall content marketing strategy (Valos et al., 2010). The small business owner-managers in this study recognised the need for this longer term approach to online customer relationship building, referring to softer metrics that are needed to measure interactions (e.g. retweets and replies on Twitter, comments on Facebook, follows on Pinterest). This demonstrates a good understanding of the concept of the customer journey and concurs with Valos et al. (2010), who found that marketers are more accepting of soft attitudinal measures alongside harder quantitative measures (e.g. of sales).

Phase 3 is a test-and-learn phase, designed to encourage owner-managers to monitor closely the impact of their marketing and to refine their goals. This study has demonstrated that the ability to closely measure impact is central to owner-managers retaining a clear focus. It is also central to them taking more control of their future which is a concept tied to effectuation. Sarasvathy's (2001) research found that successful entrepreneurs created rather than predicted the future. Prediction, in this increasingly complex digital landscape, is challenging for large organisations and beyond the scope of smaller enterprises. Creating a test-and-learn culture among smaller enterprises offers the potential for them to identify new goals based on the extended means (who they know and what they know) they have at their disposal. This extended means is enabled by better knowledge of customer, the ability to create new customer-focused products and services, enabled where appropriate through value-added partnerships with other service providers. The findings reveal that owner-managers are more comfortable with shorter term planning cycles and this model is designed to enable more agile marketing (Breur, 2011; Chaffey, 2010). However, the lack of knowledge and, in some cases, confidence, of owner-managers is a barrier to achieving a higher level of agility and gives credence to the caution sounded by Valos et al. namely that marketers need more 'sophisticated campaign measurement systems' (2010, p. 369).

Consequently, all phases of the model require that owner-managers develop technical skills to support their ability to track and measure online customer engagement (Chaffey & Patron, 2012; Soonsawad, 2013).

Conclusions and future research

This study has explored the adoption of technology for marketing by 24 small business owner-managers using a qualitative methodology. The study has illustrated that, while the speed of technological innovations pose a knowledge gap for some owner-managers, they are aware of the importance of adopting technology for marketing and recognise the opportunities it affords. The owner-managers that participated in this study displayed a willingness to embrace technology and their current adoption of technology for marketing revealed interesting insights into the ways in which it could enable their businesses to be more competitive.

However, this predisposition towards technology was hindered and tempered by a lack of both technical and marketing competency, which, in today's digital environment, are increasingly interconnected. Our study, in common with Chaffey (2010), highlighted the difficulties of measuring ROI in marketing technology and the 'dearth of research or frameworks for analytical approaches to assess and plan investment in digital media' (Chaffey, 2010, p. 191).

This study has identified several potentially interesting questions for further research that would enrich our understanding of owner-manager technology adoption and help to improve practice in this area.

Firstly, how can effectuation, which most owner-managers tend towards, be enabled by the wealth of online marketing analytical data that is available? This of course is dependent on the technical ability of owner-managers to gather and use this data effectively, which brings into focus a second question: how might owner-managers best acquire those skillsets? A promising line of inquiry suggested by this study is to explore the role that small business networks could play in enabling owner-managers not only to acquire the knowledge in the short term but to sustain it in the longer term. This is particularly important given the speed of technological change. Thirdly, we have proposed a model based on the generalisations we can derive from the analysis of the 24 businesses in this study. Clearly, additional research is required to now further test the model and its wider applicability to other industry sectors outside the wider service economy represented in this study. Finally, and returning to effectuation, a further area for research would be to measure the impact that this model has on the performance of owner-managed enterprises in a number of areas, for example, business agility, innovation, entrepreneurship, and business growth.

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