Car Dealers’ Perception towards Digital Signage and Its’ Descriptors: An Evidence from National Car Showroom

Nur Hazwani Zolkifly¹, Hazliza Haron² and Md Nasarudin Hussin³

¹,²Faculty of Business Management, Universiti Teknologi MARA Perak Branch, Perak, Malaysia,
³Faculty of Business Management, Universiti Teknologi MARA, Shah Alam, Selangor, Malaysia

Corresponding Author: nurha743@perak.uitm.edu.my

Abstract— Due to tough economic conditions, Malaysian car markets were experiencing a slowdown. Car makers, including national cars were facing huge sales fluctuations. This pressure car dealer to use various marketing methods, including digital signage to obtain sales. However, digital signage has been underutilized by car dealer despite of its potential to generate sales in other retail formats. Therefore, this paper aims to determine the perception of digital signage in car showrooms through car dealers’ perspectives. By means of semi-structured interviews which were conducted between June 2017 and August 2017, car dealers from North, Central and South Malaysia were interviewed to gain insight of their perceptions toward digital signage in their showrooms. The findings revealed that car dealers have mixed perceptions towards the functions of digital signage to automotive retails. However, digital signage has the potential to positively contribute to automotive sales with given conditions that four identified descriptors met suggested criteria. These findings shall be found useful to car dealers and digital signage suppliers in learning the issues, descriptors and potential of digital signage implementation in car showrooms. As a result, the research outcomes can be used in a wider context of improvements in determining whether digital signage contributes to sales by examining each descriptor from customers’ perspectives.

Keywords— digital signage; car showrooms; automotive retails; Malaysian cars; qualitative study

1. Introduction

Digital signage (DS) generally refers to an electronic or digital screen which shows promotion, giving information and usually relate to sales. It’s also known as “Digital Media Advertising”, “Digital Signage Networks” and “Retail Digital Media” within the industry [1]. In this study, the digital signage is defined as a remotely-controlled electronic screen placed at the car dealership which usually shows car promotions and commercials. Previous studies on digital signage were closely related with shopping malls and other retail formats (see [2], [3], [4], [5], [6], [7], [8], [9], [10]). It has been proven by their findings that digital signage has significant and moderating effects on customers’ behavior, namely perception on store environment and image, purchase, time spent, store loyalty and patronage. Despite of its’ potential, there is a lack of empirical study related to digital signage of automotive retail. Judging from the literature accumulated in journals and proceedings, it can be argued that studies on digital signage is limited to retail stores and shopping malls. Furthermore, it has been a concern among other academicians to extend the study in other retail situations and formats (see [2], [4], [7], [10]). Hence, this becomes the motivation for this study.

2. Overview Landscape of Digital Signage in Car Showroom

Car dealers have long adopted traditional advertising methods in their showroom by using printed brochures, posters and static signage [11]. Assistant Manager of Network Planning and Development from a national car company agreed that the same implies with national car dealers which adapt the traditional and proven way of marketing inside their showroom. National car dealers in this study refer to car sellers of the first Malaysian car brand. In this digital era, relying solely on traditional advertising campaigns are probably insufficient. Besides, the customer is getting more technology-savvy in their automobile purchase whereby majority of them wanted a digital experience like interactive touch display and virtual test drive at the dealership [12]. Theoretically, car showrooms which have DS should be able to elevate showroom image, gain higher customer engagement, gain cost-efficiency
of promotional materials, gain defensive marketing capabilities and ability to create sales out of the service area [11]. From observations, DS (in various forms) are existed in car showroom, especially those who are full-fledge. The DS is usually placed at main entrance, customer lounge, near the car display or facing the main street. The content consisting of advertising is typically provided by HQ. Unfortunately, the preliminary interviews conducted with national car dealers reveal that there is a lack of awareness on the potential of the DS towards sales. Therefore, this phenomenological study is conducted to discover and understand the perception of local car dealers towards DS in their showrooms. Hence, the objective of this study is to qualitatively examine car dealers’ reactions to digital signage of car showroom in more depth.

3. Literature Review

The DS is an emerging mode of advertisement by retailers over the past few years. Marketers are moving from the physical display of information (such as brochures, posters, banners, magazines, etc.) into digital displays (such as touch screens, mobile apps, LED advertising, etc.) and research shows that DS affect many aspects of consumer attitudes towards the advertisement (eg. [3], [4], [6]). It is a form of advertising method that utilizes private screen network to display product or company information to the public with the aim to enhance consumers’ shopping experience in a store. Its importance has been widely recognized by past research as growing at an accelerating rate [13], [14]. This is especially observable in the United States (see [15]) and in the European market [13], [14]. Importance has been widely recognized by past research as growing at an accelerating rate [13], [14]. This is especially observable in the United States (see [15]) and in the European market [13], [14].

DS has been reported to be an effective form of media [16] and improves consumers’ buying mood in retail malls [5]. In-store atmosphere has an enormous impact on retail patronage [17], [18]. The positive feelings emerging during consumers’ interaction with the environment lead to positive shopping outcomes [18]. Past studies have examined the influence of store atmospheres stimuli such as lightening, colours and product display among others (eg. [19], [20], [21]). Few prominent studies in this area had considered the effect of using DS in retail malls onto buyers’ in-store experience. Ref. [4] studied the effect of DS on consumer buying behaviour; focusing on their affective and cognitive reactions. The study incorporated brand experience construct such as affective and intellectual dimensions to see whether it can result in compelling in-store experience. From the study, it was found that DS with pleasing stimuli affects the affective experience more highly than intellectual experience. On the other hand, advertisements that contain more text-based features affect intellectual rather than affective experience.

In the same area, Ref. [3] in his earlier study investigates the effect of DS on the hedonic and utilitarian consumer experience in the shopping mall. The result indicates a positive effect towards the ad when respondents were exposed to in-store digital signage. Specifically, consumers who were exposed to affect component increases consumers’ attitude towards the advertisement rather than the intellectual component. The findings also have proven that exposing consumers to both affective and intellectual components increase consumers’ expected spending. These studies imply that DS has its benefits to both retailers and consumers; it not only conveys company or product content but an embedded affective or entertainment element in the DS improves consumers’ shopping mood [5].

Interactions between consumers and products on retail settings are continuously receiving attention among researchers. Ref. [18] adopted the Stimulus-Organism-Response (S-O-R) to examine the consumers’ purchase intention when they are exposed to multichannel environment in a retail setting. Previous studies that use the S-O-R paradigm to investigate the influence of store atmosphere on consumers purchase behavior are abundance (eg. [22], [23], [24], [25]). Ref. [18] findings show that a combination of both traditional (such as layout, product display, colour and lights, etc) and technological elements such as interactive touch screen displays can motivate consumers to shop at a certain store. They posit that the perception of consumers towards a retail environment is characterized by a high number of different channels for purchasing.

On a distinct perspective, Ref. [10] have considered the impact of DS onto retail sales. The study compares between different retail formats: hypermarkets, supercenters, supermarkets and convenience stores in a large Swedish grocery
conglomerate where digital displays are evident at all stores. Their findings reveal a difference of sales impact across the retail formats under study. Sales had increased; more stock keeping units (SKU) were purchased and more time was spent in the hypermarket relative to supercenters. Further, the research also provides evidence that digital displays does not impact supermarket sales, but resulted in lower sales in the smaller stores.

In the context of automotive retails, the DS has been deployed by Audi, Hyundai and BMW. Audi, for example, has a power wall (a large LED display screen) with an interactive kiosk which allow customers to configure their cars [26]. Hyundai has also introduced digital car showroom (located at major shopping centers) which has interactive screens where customers can see the list of potential cars and adjusted its specifications [27]. These emerging trends in US, UK and Australia led to promising potentials of DS technology in Malaysian car showrooms.

In summary, there are some growing interests as well as benefits of using a DS for marketing purposes. As can be seen there are more loopholes in which further study should be done to have a deeper understanding of the efficiency of DS in marketing. For example, the context of research has been focusing on retail outlets; much is not known about the effect of DS on other types of store such as product showrooms, public and private hospitals to name a few.

4. Methods

This study employed phenomenological design whereby “perception is regarded as the primary source of knowledge, the source that cannot be doubted” [28]. Five participants were selected based from selected criterion which are; they must be a car dealer of national makes. Car dealers refer to “a person or business which sells cars”. Secondly, the unit of analysis is bound to only Malaysian first national car maker. Thirdly, all participants are working in 4S car dealership. Within the automotive industry, 4S showroom which represents Sales, Service, Spare part, Spray and body painting are considered as full-fledge dealers and enjoy certain privilege. As shown in Table 1, these five interviewees represent North, Central and South Malaysia.

<table>
<thead>
<tr>
<th>Identity</th>
<th>Role held during interview</th>
<th>Gender</th>
<th>Location</th>
</tr>
</thead>
<tbody>
<tr>
<td>CD01</td>
<td>General Manager</td>
<td>Male</td>
<td>North Malaysia</td>
</tr>
<tr>
<td>CD02</td>
<td>Sales Advisor</td>
<td>Male</td>
<td>North Malaysia</td>
</tr>
<tr>
<td>CD03</td>
<td>Sales Advisor</td>
<td>Male</td>
<td>Central Malaysia</td>
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<tr>
<td>CD04</td>
<td>Sales Advisor</td>
<td>Male</td>
<td>Central Malaysia</td>
</tr>
<tr>
<td>CD05</td>
<td>Sales Advisor</td>
<td>Female</td>
<td>South Malaysia</td>
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The interviews were conducted by using face-to-face and phone interviews. A set of semi-structured questions were used comprises of the following open-ended questions:

- Are you aware of a digital signage’s presence in your showroom?
- Can you explain the functions and benefits of digital signage in your showroom?
- Do you think digital signage helps you to improve sales? Why?
- Based from your observation, is there any problem with the current digital signage?
- In your opinion, what can you suggest to improve digital signage in the future?

Other questions related to alternative marketing strategies used by car dealers were also asked primarily as ice-breaking cues that prompted the interviewees to talk about their perception towards digital signage of a respective car showroom. Each interview was recorded and transcribed for analysis. All the recordings were transcribed and analyzed according to seven steps procedure recommended by [28].

5. Findings

5.1 Digital Signage Presence and Awareness of Its’ Functions

Awareness of DS functions at car showrooms are still at infancy even though most of the car dealers are aware of its presence. CD01 admitted using DS in his showrooms based on his statements “I have it but I don’t think its effective”. CD03 mentioned that “Yes, we have installed digital signage which has promotion and advertisements inside the showroom”. CD05 was also aware with the presence of DS whereby in her showroom, it is in
the form of legged screen and placed near the car display. Meanwhile, CD02 states that “Not yet but my boss plans to install them soon. It will be placed outside or facing the street. For now, we have a television screen at the customer lounge. There are some advertisements and product promotions inside the showroom though”. Similarly, CD04 pointed that since the showroom is new, they haven’t managed to install them yet. But he admitted that DS is available in stores. Furthermore, the placements, functions and forms of DS varied between showrooms. When asking about standardization, most of them agreed that HQ provides standardized content of promotional tools in the form of flyers, bunting, brochures and banners. However, only CD02 did mention the video content that they use in their showroom are provided by HQ. Some car showroom even makes an effort of installing flag to announce new arrived model (CD01). Furthermore, he states that HQ provides banner, bunting, brochure but not flyers. With regards to functions, CD01 did agree that these promotional items are helpful for explanation and image. He responded that “When people see it, they will know whether we’re having any test drive and so on. Most importantly, we want people to be aware. So, regardless of its [DS] presence or not, the aim is to at least get some awareness”. In sum, car dealers are mutually agreed that DS are used for promotions in their showroom. Moreover, car dealers admitted trying any promotion strategies including DS as promotional tools to attract customers. Thus, DS in various forms presence at their respective showrooms.

5.2 Perceptions towards Digital Signage of Car Showroom

5.2.1 Positive Views

Three out of five car dealers agreed that DS helps them to attract customers. CD02 supports that DS is useful and helpful to car dealers. His statements are “Easy to explain to walk-in customers. Let’s say if customers would like to know about certain model, sales advisor can directly explain by using the screen because it has car colours and other information”. Regarding usefulness of DS, he states that “So far it is kind of helpful. With digital signage, it gets easier to make customer understand. It also helps to make the explanation easier”. CD03 share positive perceptions towards DS which can be observed by his statements: “It is quite useful because the showroom is near the main road. So, when the screen shows advertisements and sometimes when the road is jammed, road users can view the content. So, it is kind of helpful. The content also can be updated monthly. When the road is jammed, DS can entertain bored road users whose stuck in the road”. With the right DS placements, it does create some awareness towards potential customers. CD04 said this statement to support his perceptions toward DS: “It helps a lot. It’s in digital form so people can decide what’s came out of the screen and indirectly gives information on products. But the content is up to the dealership whether they wanted to include advertisement and so on. It is really good like television ads which helps to support sales. Yeah, it’s good like television ads”.

5.2.2 Negative Views

Two out of three car dealers have certain doubts, thus developing negative perceptions toward DS. CD01 believes that DS were not effective in attracting potential customers in his showroom even though he uses them. This can be proved by his statements “I have used it but I don’t think it is effective. So, I cannot tell you whether it is effective or not. I just guess that when the screen is working constantly, people would see but no one gives any feedback. So, I just used it anyway. I think at first, people look at the screen, but after some time, it may not be effective anymore”. In sum, the effects of DS when it is existed or not exist are unidentifiable. There is no evidence to support the effects of DS to automotive sales when it is existed. Thus, it forms some negative perceptions towards DS functions in general. CD05 shares the same perceptions with CD01. She gives following statements “Not useful. If the screen is inside the showroom, then it is not useful. Even walk-in customers do not pay attentions to the screen. If the DS is place outside, maybe it has some effects. For instance, at the city center or near the traffic light, maybe people can view them. It cannot catch attention of people on the go [passers-by] if placed wrongly. Besides, walk-in customers usually ask for explanations directly from sales advisor”. It can be concluded that with wrong placements, DS does not give much influence.
5.2.3 Perceptions on Digital Signage Descriptors

Evaluation of the perceptions indicates these descriptors namely content, placement, size and number. DS was particularly valued when it has following criteria:

Though CD01 disagree with the effectiveness of DS in general, he acknowledged that moving content able to attract customers. In similar voice, CD05 states that the content should focus on the manufacturing process of the car to improve customers’ perception of quality and safety. Moreover, she suggested that the content includes car functions and demonstrations which can also improve brand image. Her explanation is “For those people who do not have time to visit showroom, its best that the screen show how the car is manufacture, car functions, safety features and how the safety specifications are made. Sometimes people fear problems like engine safety which involves large cost of repair. It should only display the car benefits to customers”. Similarly, CD02 suggested that the contents must be informational like car specifications, sales advisor contact numbers and product information. These contents can assist sales advisors in giving product information to potential customers at the dealership. “Contents like HVS should be included so that customer can know about recent technology by car manufacturer” explained CD02. Meanwhile, CD03 and CD04 have similar perceptions on durations of the content. CD03 suggested that the durations of the ads must be short but effective while CD04 relates to the advertisement. He explained that “It must have product information, benefits, specifications and safety. It’s up to the dealership though. Besides, the advertisement should be short but compact. No swirling stuffs and very basic, informative content. As long as people get it [understand]”. In sum, the content should be moving, informative which highlight product benefits and specifications and short duration so that viewers are attracted.

The second frequently mentioned descriptor is placement. CD01 believes if the DS is placed on the customer/service lounge, it does give some exposure. However, he did not see this effectiveness on walk-in customer since their numbers are quite small. In contrary, CD03 confidently agreed that their current DS at the showroom which were placed facing the main street are effective in attracting passers-by. “It should be place outside [facing the main street], inside and at the main entrance. Some are even placed at the center of the showroom which is good because people can read them as well” CD03 suggested. Similarly, CD04 shares the same opinions based on the following statement “It should be place inside the showroom for customers in waiting [customer lounge]”. Meanwhile, CD05 explained that the placement of the screen influences its’ effectiveness. She highlighted that if the screen is placed inside the showroom, it’s ineffective since only walk-in customers can view them. Therefore, she suggested the screen to be placed inside and outside of the building. In sum, the placements of the screen are highly influenced by who is the target audience, what the screen intended to do and the amount of exposure.

In terms of size, only two dealers acknowledged it as important descriptor. CD04 recognized that size of the screen must be large to be effective. CD03 explained that “For size [of DS], it should be readable. Not so small but not so large. In short, it must be visible”. It can be concluded that the screen size is appropriate when it is visible and readable.

Apart from all the above-mentioned descriptors, number of DS was also mentioned by one car dealer. CD02 believes that the effectiveness of DS relies on the number. “Should increase the number of screens let’s say, two to three televisions so that customer will not crowding at only one place. Because sometimes, they look or make discussion at various places at the showroom” he explained. Hence, higher number of screens can ensure wider exposure to audiences which in this context, potential customers.

5.3 Digital Signage Potentials and Pitfalls

From the responses, it can be concluded that DS has slight potentials given that it has accurate contents, placements, size and even number which match with their target audience, type of information and the amount of exposure. Since there is minimum empirical evidence to support the DS contribution towards sales, the effects are subjective and unidentifiable. CD04 explained “The effect is subjective so it’s very hard to tell. But it [DS] must be there”. However, there are slight potential based from this statement “If there are constant exposure of it [DS] towards customer, then maybe it will create positive effect in the long
run” CD05 suggested. Indirectly, it can be said that the effects cannot be observed in a short amount of time. Further, by tailoring the contents to build product image, positive perceptions can be created among customers. As recommended by CD03 “Currently we only have a usual one [DS]. It only shows very common content. It can be improved”. When concerning sales, most dealers talk about word-of-mouth and sales skills to guarantee sales success. Hence, DS was perceived to share similar functions with pamphlets, brochures and the like. Besides, cautious must be given to wallpaper effect. As mentioned by CD01, when the screen was first installed, it manages to attract viewers, but the effectiveness is decreasing throughout time. 

In summary, the study has elicited several key findings pertaining to car dealers’ perception towards digital signage comprising of the functions, acceptance, descriptors, potentials and drawbacks- see list in Table 2.

**Table 2. Summary of Key Findings of Car Dealers’ Response Towards DS**

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<th>Key findings</th>
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<tr>
<td>The DS has promotional and informational functions</td>
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<td>Moderate positive views on DS since it is useful for information, can update</td>
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<tr>
<td>Slight disagreement towards DS due to lack of empirical evidence</td>
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<tr>
<td>Effectiveness of moving, shorter and informative content</td>
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<td>Effectiveness of outdoor DS and in customer/service lounge</td>
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<td>Importance of proper DS screen size</td>
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<td>Effectiveness of increasing number of DS</td>
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<td>Constant exposure of DS may influence customer attitude in the long run</td>
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<tr>
<td>Improvements of DS descriptors (eg. content) to fully utilize the screen</td>
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<td>Risk of wallpaper effect, immeasurable results and relying on traditional</td>
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<td>marketing methods</td>
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6. **Discussion and Conclusion**

The study has demonstrated that car dealers have moderate positive views on DS of car showroom. The study covered the full-fledge car dealerships which were limited to national car brand. Car dealers believe that DS can be helpful as promotional and informational tools whereby it creates awareness, assists sales people in giving explanations and persuade customers. Some negative views, however were expressed contributed by lack of empirical evidence to support DS contribution directed towards sales or as a mediating factor towards sales. Nevertheless, the negatives were not viewed as the total objection to the DS per se. The result of this study suggests that DS screens containing dynamic, informative and shorter content can enhance its effectiveness in the car showroom. Indeed, Malaysian car brands recorded more quality problems as compare to non-national brand [29], thus requires more informative content to convince customer rather than entertaining content. Secondly, since the dealership visit trend are decreasing by year [30], DS should be placed outdoors other than customer/service lounge to attract passers-by. Moreover, the role of DS may be further enhanced by adopting the right screen size and number of screen.

The DS technology in Malaysia is still in infancy thus may prohibit the potentials of DS in car showroom. However, despite of slow adoption of DS technology in the Malaysian car showroom as opposed to US, UK or Australia, DS anticipated some potentials in automotive retails. The DS has the potential to positively contribute to automotive sales with given conditions that, (1) the descriptors, i.e. content, size, placement and numbers need to be refined and (2) long-term exposure of DS towards the potential customers. Theoretically, DS presented various potentials in automotive retails provided that the risk associated with DS deployment is taken into consideration. However, the study is subject to limitation. The samples were limited to a small number. Thus, the findings may not be generalized to the practitioners unless more samples are included. However, since this research focuses on 4S or full-fledge car dealership, the responses collected may capture some core concept of the phenomenon in the automotive retail industry. Moreover, the key findings may serve as a basis for further empirical investigation. Future research is recommended to examine whether DS contributes to sales by examining each descriptor, increase the number of samples and investigate this phenomenon from customers’ perspectives.

**Acknowledgments**

The authors gratefully acknowledge the industry experts for sharing their insights. Gratitude is also
due to the review teams of 6th International Conference on Marketing & Retailing (InCOMAR 2017) for the helpful comments.

References


of Service Marketing, 27(4), 259-270.


