

Implementation of Digital Marketing as A Strategy to Improve Marketing and Sales

Wahyu Supriyatin ^{a,1,*}, Kausar Japa Wisesha ^{b,2}

^{1,2} Gunadarma University, Indonesia

¹ ayu_ws@staff.gunadarma.ac.id; ² wkausarjapa@gmail.com

* corresponding author

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ABSTRACT

Marketing a product is one of the main strategies for industry performers. The growth of technology makes industry performers need to innovate and change their product selling strategies. The ups and downs of the economic condition forced some industries to make changes so that their industry can survive and compete with others. Jersey Bolaku is one of the distributors that sell both conventional and custom jerseys. In marketing their product still using the conventional way, where customers have to come directly to see the product and make transactions. In marketing their product is still used from mouth to mouth. In doing input in and out for the goods movement admin is still manual and logs it on the logbook Where all transactions that take place used conventional methods. The purpose of this research is to create an e-commerce website that is used to market products using digital marketing. Remarketing strategies from conventional into a digital way. The method used is the SDLC with a prototyping model. And for data collection used qualitative methods by directly asking the sources involved in it. Steps in the prototyping model are identifying the system and user requirements, determining programming languages, designing user interfaces, making prototypes, evaluating and improving the applications before being tested and implemented. Before being implemented The website has been tested using black-box testing. The testing is done to see the functionality of each button. The website has been successfully implemented for admins and customers using a web browser on PC and smartphone. Admin and customers conduct trials related to the website functionality in terms of information, convenience, user-friendliness, and usability. They find it helpful after accessing the website, all transactions become easier and faster. The website is hosted with the URL address <http://jerseybolaku.epizy.com/>.

1. INTRODUCTION

To increase sales turnover, attract customer attention and retain customers are some of the important things that industry players must do during increasingly competitive business conditions and the world (Oktaviani & Rustandi, 2018) . All business performers need to survive in business competition, as a form of business fulfillment of customer needs (Hawkins & Mothersbaugh, 2010; Kent et al., n.d.). In a pandemic situation, business doer must change their business process to survive and operate (Himawan et al., 2014). Customers can easily transact and see the marketed products, without being afraid or insecure to go out and meet many people (Nugroho, 2016). Business doer will still be able to pay the employees and increase the profitability of their business.

Customer satisfaction to bought marketed products is a form of customer response to the attributes and utility of a product or service (Rapitasari, 2016). The customers are more satisfied with the products being marketed with the ease of transactions offered by the business doer, the increase of sales turnover, and survive amid uncertain conditions.

JerseyBolaku is one of the distributors that sell conventional and custom jerseys. Distros are located in Jatiasih Bekasi, they sell and buy products offline, we're all buying and selling activities are carried out directly at the shop. The Customers if they want to see the collection must come directly. Marketing used conventional methods, such as word from mouth to mouth, social media, and brochures. Conventional marketing made a little share of the market that need to reach and Technology innovation carried out to broader product marketing strategy by using digital marketing strategies.

Technology innovation has resulted in more advanced facilities, where these facilities can be used by various industry players to develop customer-oriented business ventures (Oktaviani & Rustandi, 2018). The form of technology innovation that applied in marketing strategy was digital marketing (Kent et al., n.d.; Xu et al., 2019). Customers who are used to using advanced technology, make digital marketing strategies easier to do. The forms of digital marketing strategies that have been carried out by industry players are included promoting and selling products in digital form, using social media such as Instagram, desktop-based applications, icon-based applications, or website-based applications.

Digital marketing is one of promotional activity and market search through media online as a marketing strategy and by utilizing various strategies as promotions, including through social networks (Puspitasari et al., 2019). In the world of marketing, the digital era is widely used by business doers to be able to maintain their business activities (Hidayah, 2020). Digital marketing also makes it easier for the business doer to monitor all activities that occur and makes it easier for business owners to control the customer needs and desires. Customers can easily find the desired product information and make transactions if they want to buy the product (Puspitasari et al., 2019).

JerseyBolaku distro uses digital marketing as a marketing strategy by creating an e-commerce website that is connected to social media. The purpose of this research is to market the products from the JerseyBolaku distro which were originally from conventional digital ways. Customers who initially need to come to the distro to view products and transact, now access they can do it anywhere and anytime using a smartphone. Customers are made easier because just by accessing the JerseyBolaku website, they can view all products and make transactions. The business owners with this research have made it easier to see the report sales transactions both daily, weekly, monthly, and yearly. The owner can also control the incoming and outgoing products day by day.

Literature Review

Digital Marketing

Digital marketing is interactive and integrated marketing that makes it easier for customers to interact with industry players (Puspitasari et al., 2019). Digital marketing does not focus on technology but focuses on humans (marketers) on how to understand humans (customers) and how to use technology to build relationships with other humans (customers) to increase sales (Rapitasari, 2016). Where to carry out a marketing strategy, business people do not have to use conventional media but can use digital media (Hidayah, 2020). Problems that arise when implementing a digital marketing strategy include product, price, place, and promotion (Rachmawati, 2018). Digital marketing makes marketing trends shift and shift from what was originally conventional (offline) to digital (online) (Oktaviani & Rustandi, 2018). Digital marketing is more prospective because it allows customers to obtain all information about products and transact through internet media (Rachmawati, 2018).

E-Commerce (Electronic Commerce)

E-Commerce is a method of selling products directly and promoting using internet media, both B2C (Business to Consumer) and B2B (Business to Business) (Alfiah et al., 2020). E-Commerce is the distribution, purchase, sale, marketing of goods and services by consumers through electronic media such as the internet, WWW or computer networks (Himawan et al., 2014; Nugroho, 2016). E-Commerce applies the concept of buying and selling where the sale of goods is carried out on the World Wide Web and the way for consumers to buy goods online (Alfiah et al., 2020). E-Commerce involves electronic fund transfers, automated inventory management systems and automated data collection systems (Himawan et al., 2014; Nugroho, 2016).



Fig. 1. E-Commerce Illustration Chart (Source : [9])

SDLC (System Development Life Cycle) - Prototyping Method

SDLC is one of the cycles used by analysts in developing systems. Prototyping is a software development method with a physical model of the system's work and is the beginning of a system (Purnomo, 2017). A system with a prototyping development model allows users to know how the system is running (Nugraha & Syarif, 2018). The prototyping method produces a prototype system that will be used as a liaison between developers and system users to interact in the system development process (Purnomo, 2017). The purpose of making a prototype is to get an overview of the application that is designed to be evaluated by the user (Nugraha & Syarif, 2018). Figure 2 is a step-by-step prototyping model.

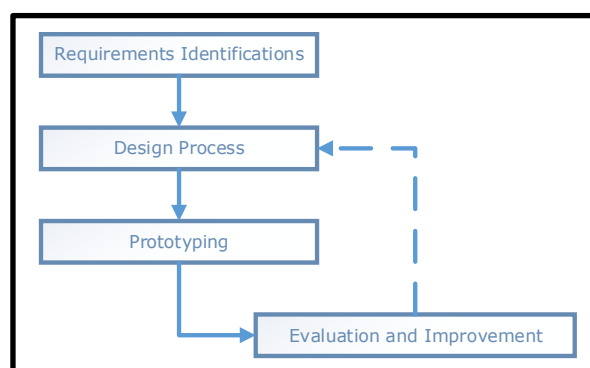


Fig. 2. Prototyping steps (Source : [11])

2. METHOD

The research method used is the SDLC (System Development Life Cycle) method with a prototyping development model. The prototyping model is used because it brings closer and involves users in evaluating the system before launching the system. Users are involved in the system development process and interact with the prototype developed by the developer. So that the failure of the system created can be minimized. The website is created and developed by using the Indonesian language. An overview of the stages of research carried out can be seen in Figure 3. The stages of research carried out include :

1. Identify needs, both users need as system users and the needs of the hardware and software that will be used. User identification is done by direct interviews with users, namely admins and customers. Identify hardware and software by conducting a direct survey to the location of the distribution by looking at the hardware supporting components available in the distribution.
2. Determining the programming language used, is carried out after a direct survey by looking at the condition of the hardware supporting the distribution and the ability of the admin during the interview process.

3. Designing the interface, creating the user interface of the system based on the user experience by admins or customers in transactions.
4. Make a system prototype, design a new system that is made by simulating the admin and customers so that it can be evaluated.
5. Evaluate and repair the system, the steps were taken after the user operates ,a nd see the prototype if it is felt that there are still bugs from the system.
6. Launching the system, implementing the system to the user so that it can be used as a means of digital marketing for the Jersey Bolaku distribution.

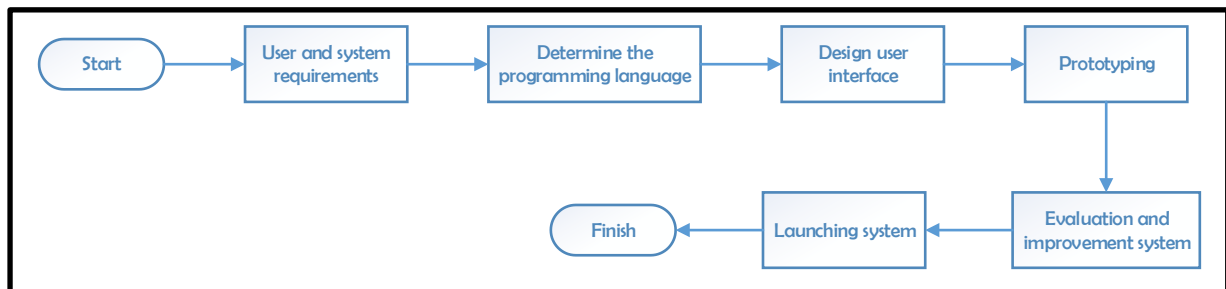


Fig. 3. Step by Step Research (Source : Research Data 2021)

Planning Stage

Planning is the initial stage before creating and developing the system. Planning is done by identifying needs, both user requirements and system hardware and software requirements, determining the programming language used. Planning is carried out so that system development is following the marketing strategy and objectives to be achieved so that it can reach more customers.

Stages of Analysis and Design

The analysis is carried out by the system developer after identifying the needs and problems. The analysis was carried out by direct observation to distributions and interviews with business owners and customers. The analysis was conducted to find out how the conventional system has been running so far. The design of the user interface uses UML (Unified Modeling Language) diagrams, namely use case diagrams, activity diagrams, and class diagrams.

Implementation Stage

After the system is ready, then the implementation and testing of the system are carried out. Testing is carried out by users, both customers, and admins. To see if the new marketing strategies are implemented and make it easier for customers and admins to transact. Implementation and testing are carried out before launching the system. Testing is carried out to see if there are still errors in the running application. Testing is carried out using black-box testing to see the functionality of each button in the application. In addition, the application has been tested using one PC and two smartphones. Testing from the user side was carried out by two admins and five customers. Testing from this side to see whether the information provided is appropriate, the application is easy to use, how the user interfaces looks and the functionality of each button is.

3. RESULTS AND DISCUSSION

Jersey Bolaku's marketing strategy is to create a website where it can be used by business doer (admins) and customers (users) anywhere and anytime. Admin or user must log in first before accessing the website. The design of the user interface in the research uses object-oriented, namely use case diagrams, activity diagrams, and class diagrams. Figure 4 is an admin use case diagram, the admin must log in first to be able to access the website. Admin has four cases in the system, admin can update the product, can view daily sales, admin can view sales reports according to the period of sales and admin can view customer data who bought the products.

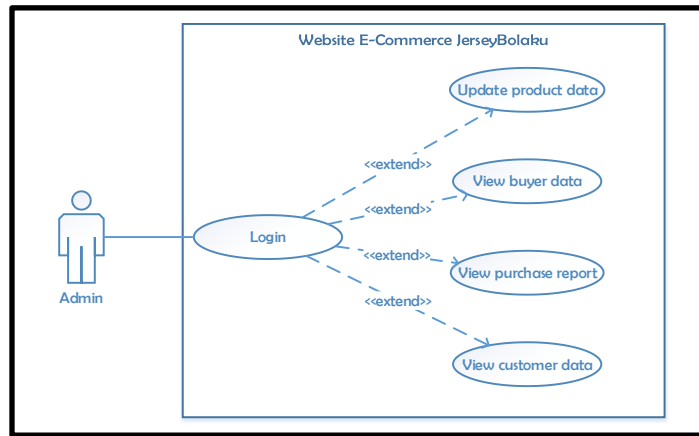


Fig. 4. Admin Use Case Diagram

Source : Data processed by Ms. Visio, 2021 Research Data

Fig. 5 is the user use case diagram, the customer must register first to be able to make a transaction. Customers can see all the products, can see the shopping cart if they have made a purchase, and check out the items they purchased. Customers can view shopping lists and check the status of purchased products.

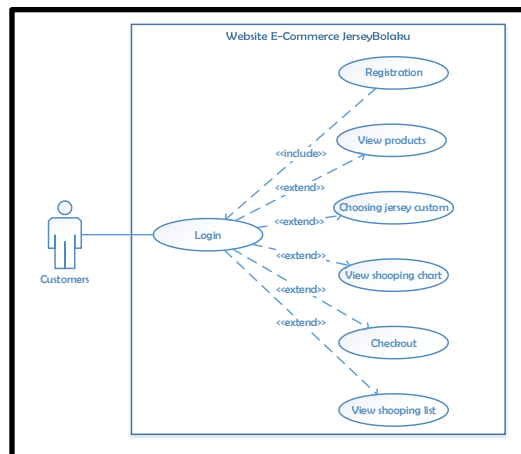


Fig. 5. User Use Case Diagram

Source : Data processed by Ms. Visio, 2021 Research Data

Fig. 6 is an admin activity diagram, they can take actions such as making changes to data products, viewing data purchasing product, customer transaction, and viewing sales report data in a period.

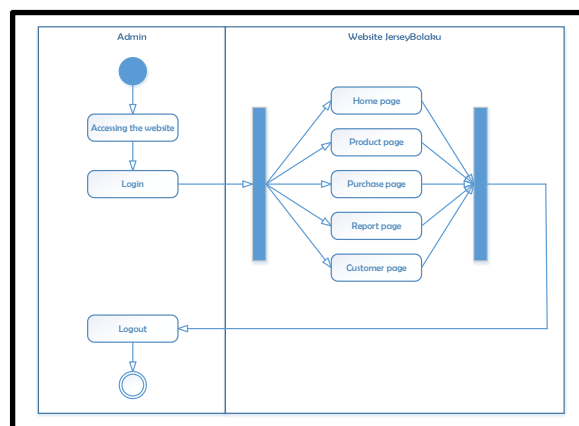


Fig. 6. Admin Activity Diagram

Source : Data processed by Ms. Visio, 2021 Research Data

The user activity diagram shows the activities carried out by customers on the website as shown in Fig. 7. Customers can do transactions if they have registered. Customers who haven't registered and

don't have an account can't make a transaction. After logging in, customers can view the product, buy products, check out products in the shopping cart and make payments for purchased products.

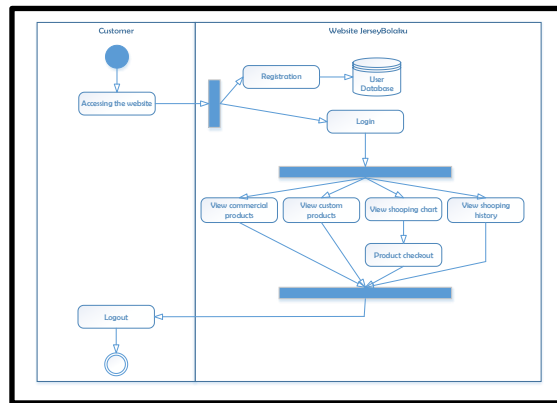


Fig. 7. User Activity Diagram

Source : Data processed by Ms. Visio, 2021 Research Data

The website had a database that's described using a class diagram as shown in Fig. 8. The website has seven interconnected tables, namely the admin table, postage table, customer table, payment table, purchase table, product_buying table, and product table.

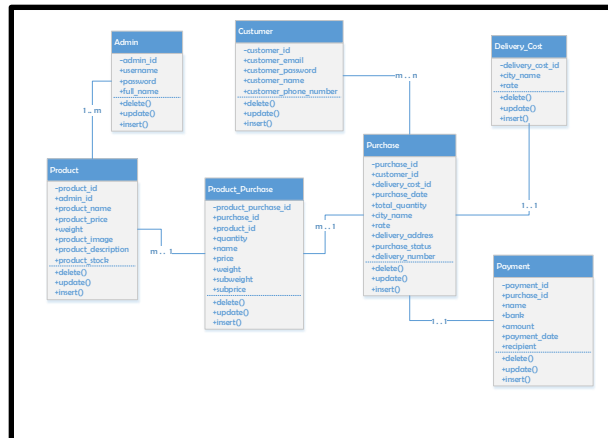


Fig. 8. Class Diagram

Source : Data processed by Ms. Visio, 2021 Research Data

Table 1 shows a test table for the JerseyBolaku website on several devices. All content in the system was successfully tested without errors, only appearance was different between using a PC and a smartphone. Table 2 shows a test table for several users in terms of information provided, interface display, application usability and ability to use.

Table 1. User Test Table

Hardware	Laptop	Redmi 5 plus	iPhone 6s plus
Specifications	HP Laptop 14-cm0xx AMD Ryzen 5 2500U with Radeon Vega Mobile Gfx 2.00 GHz Web browser : Internet Explorer	Android Version 8.1.0 Web browser : Opera	IOS Version 11.4.1 Web browser : Safari
Content	✓	✓	✓
Interface	✓	✓	✓
Functionality	✓	✓	✓

Source : Research Data 2021

Table 2. End-User Test Table

User	Information	Interface	Usability	User Friendly
Admin 1	✓	✓	✓	✓
Admin 2	✓	✓	✓	✓
Customer 1	✓	✓	✓	✓
Customer 2	✓	✗	✓	✓
Customer 3	✓	✗	✗	✓
Customer 4	✓	✓	✓	✓
Customer 5	✓	✓	✓	✓

Source : Research Data 2021

Fig. 9 to 12, are the display of the JerseyBolaku website from the customer/user side. Customers need to log in if they want to transact, otherwise, they can view products only. Fig. 9 is the display of a collection, that can be purchased by customers. Customers can add to the shopping cart or view the details of the jersey size.

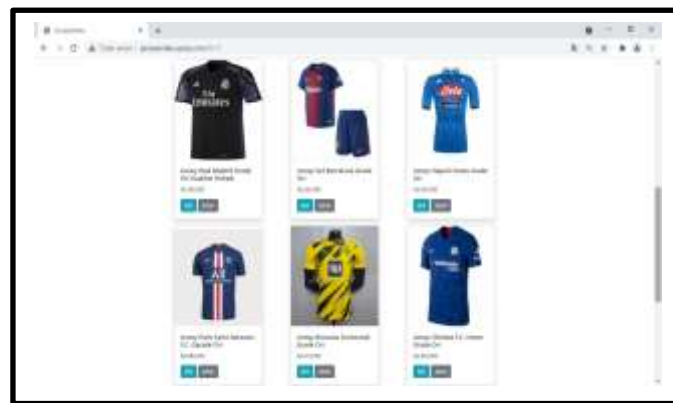


Fig. 9. User Jersey Product

Source : Data processed by PHP, 2021 Research Data

Fig. 10 is a view of the checkout cart page for the purchased products. Customers need to complete the data for the delivery process.

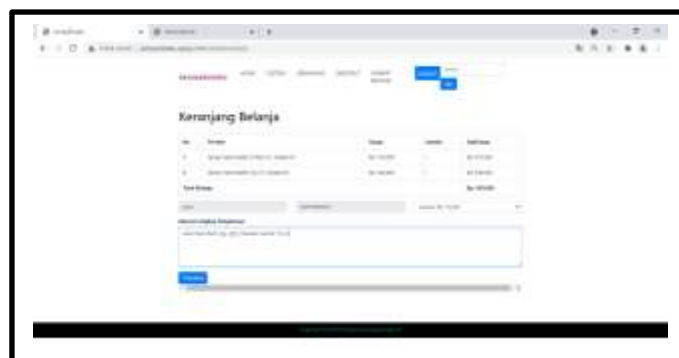


Fig. 10. Shopping Cart and Product Checkout Page

Source : Data processed by PHP, 2021 Research Data

The display of the payment receipt that the customer checked out and is ready to pay, Fig. 11. The note shows the account number to transfer for the nominal amount ordered by the customer.

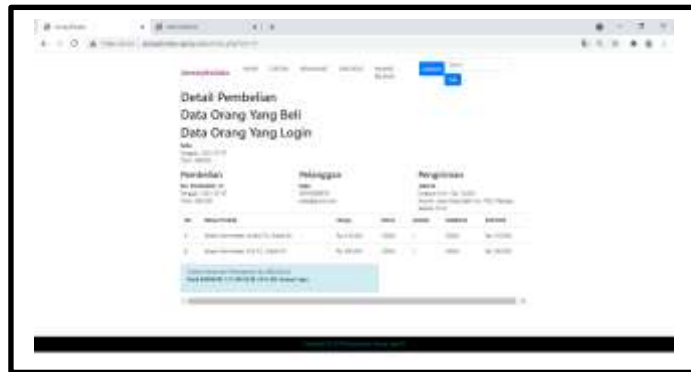


Fig 11. User Payment Notes

Source : Data processed by PHP, 2021 Research Data

Fig.12 shows a customer's shopping history page. Customers can view their payment receipts from the transactions that have been made, also can input payments, and view the attachment payments.



Fig. 12. User Shopping History Page

Source : Data processed by PHP, 2021 Research Data

Fig. 13 to 15 is the appearance of the JerseyBolaku website from the admin side. Fig. 13 is a product page display that can be updated by the admin. Admin can perform actions like add data, change data and delete data products.

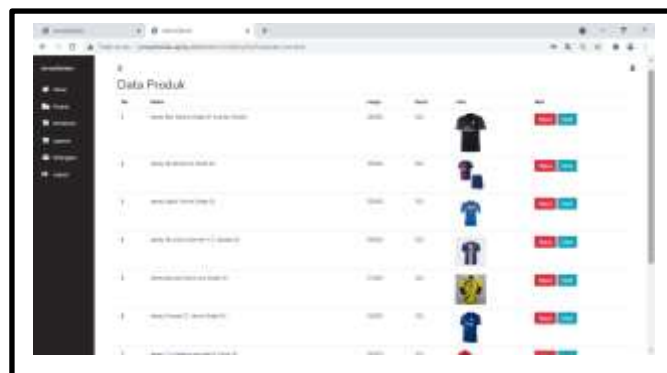
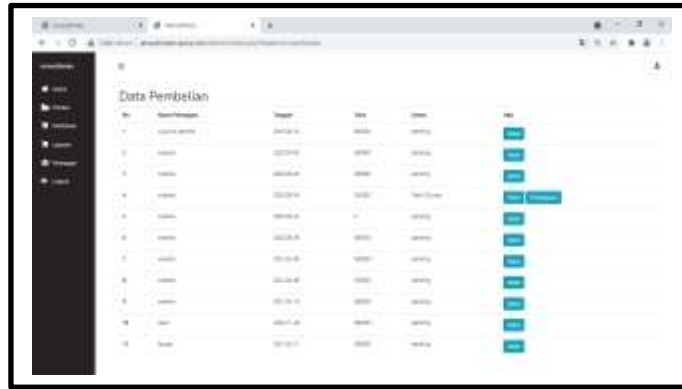


Fig. 13. Admin Product Data Page

Source : Data processed by PHP, 2021 Research Data

The status purchase can be seen in the form of customer status in Fig. 14. Admin can see which purchase transactions are still pending or have not been paid by the customer. Admin can also see which transactions have been paid and are ready for delivery.



ID	Nama	Tanggal	Status	Detail	Hapus
1	Detail	Hapus
2	Detail	Hapus
3	Detail	Hapus
4	Detail	Hapus
5	Detail	Hapus
6	Detail	Hapus
7	Detail	Hapus
8	Detail	Hapus
9	Detail	Hapus
10	Detail	Hapus

Fig. 14. Admin Purchase Data Page

Source : Data processed by PHP, 2021 Research Data

Admin can view sales reports based on the period, shown in Fig. 15. Admin can view sales reports and control the products sold every day.



ID	Nama	Tanggal	Status
1
2
3
4
5
6
7
8
9
10

Fig. 15. Admin Purchase Report Page

Source : Data processed by PHP, 2021 Research Data

The JerseyBolaku website is one of the marketing strategies carried out to overcome the problems of product sales and promotion. The website can be used as a substitute for direct transactions made by customers so it is more effective and efficient in line with previous research (Napitupulu, 2016; Setiyono et al., 2019). The appearance of the website is user-friendly and makes it easy for owners and customers to operate it. The owner needs detailed sales transaction reports, either daily, weekly, monthly, or yearly, so the display is made in a certain period. Customers can view products for sale, buy products by adding them to a shopping cart, and checkout to make the purchase payments. Customers can choose their payment method and desired courier.

4. CONCLUSION AND SUGGESTIONS

The JerseyBolaku website-based digital marketing strategy was successfully created and tested. The JerseyBolaku website succeeded in turning conventional transaction systems into digital ones. Customers and business owners are made easier with the digital system created. In addition, it makes it easier for business owners to control product transactions, it is also easier for customers to view products and make a transaction. It takes less time for customers to do the transaction. Customers don't need to come to the shop, customers just access via the URL address. Application development that needs to be done was adding payment methods such as using OVO, GoPay, Link Aja, or other payment methods that are not available. In terms of appearance, it is necessary to add a more interactive design so it can attract more customers.

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