Implementation of the Membership Method in Developing a Digital Marketing Website for Secanggan Village Sea Products

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ABSTRACT
The problem that occurs for fishermen is that it is difficult to reach a wide range of purchases, and then the price of fish becomes very cheap when the fish catch is large and becomes expensive when the fish catch is small. This can be overcome by processing it so that it has a higher selling value and is more durable. If the fish has been processed to make it more durable, a digital marketing promotion website is needed. A digital promotional website can increase the income of Secanggang Village BUMDES through the use of digital technology to connect marine products with a wider market. The research method used is waterfall with the PHP programming language and MySQL database. The application includes literature studies to understand the concepts of digital marketing, e-commerce, and the benefits of promotional websites in developing local businesses. Digital marketing promotional websites are built with features that support e-commerce activities, such as product catalogs, ordering features, and online payments. During the development process, testing and evaluation were carried out to ensure the functionality and responsiveness of the website and to collect input from potential buyers and BUMDES regarding the user experience. The digital marketing promotional website creates new business opportunities for BUMDES in Secanggang Village, increases sales turnover of marine products, opens wider market access, and empowers the local economy in a sustainable manner.

Keywords:
Agile Scrum
Digital Marketing
Secanggang Village
Website Development

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1. INTRODUCTION
Secanggang Village is one of the villages in Secanggang sub-district, Langkat Regency, North Sumatra Province, Indonesia. The Secanggang Village area has the potential for marine products. However, the process of buying and selling marine products is still carried out around Secanggang Village, and even
if they are sold outside Secanggang Village, they use middlemen whose prices are cheaper. Scrum is a software development framework designed to manage complex projects with a focus on adaptive product development and the delivery of value to customers. Secanggang Village has a village owned enterprise (BUMDes), where BUMDes was formed to improve the welfare and income of its community. BUMDes requires developing the local economic potential of Secanggang village. BUMDes acts as an economic institution that manages and develops various village potentials, including the potential of marine products found in Secanggang Village. Even though it has abundant potential, Secanggang Village BUMDes still faces several challenges in developing their fisheries and marine products business. One of them is limited access to a wider market to market their products. The lack of adequate exposure and promotion means that Secanggang Village's seafood products cannot reach their optimal potential. So a website-based information system is needed as an innovative solution to expand market access and increase exposure to marine products, which are the potential of Secanggang Village. The Secanggang Village Digital Marketing promotional website, Secanggang Village BUMDes, can effectively introduce and market Secanggang Village seafood products to potential buyers inside and outside the village area. This website can be a representative forum for presenting information regarding the product types, quality, and selling value of Secanggang Village seafood products [1][2]. This research uses the Agile Scrum method to build a digital marketing promotional website as an effective and efficient promotional medium [3][4]. Scrum is a software development framework that falls under the Agile methodology [5][6][7][3]. It is designed to manage complex projects with a focus on adaptive product development and the delivery of value to customers [8][9][10]. Increased promotions have an impact on increasing sales, thereby increasing Secanggang Village BUMDes income. It is hoped that with this website, Secanggang Village seafood products can be more easily accessed by potential buyers, increase market awareness and interest in these products, and have a positive impact on local economic development and the welfare of the Secanggang Village community as a whole. There have been many studies that prove the role of information systems, whether website [11], Android [12][13] or desktop-based applications [14], can help increase income programs in many villages [15][11][16][17][18]. The participation of village officials and village communities is needed in realizing the goals of the program [19][20][21].

2. RESEARCH METHOD
The method used in building the Secanggang Village Sea Products Digital Marketing Website Application is as shown in Figure 1 below:

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Figure 1. Research Framework

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This research was conducted based on the needs of Secanggang Village users. The following are user needs according to observations in the website-based digital marketing promotion application for marine products at BUMDes Secanggang village, as shown in Table 1 below:

Table I. User Requirement

<table>
<thead>
<tr>
<th>No.</th>
<th>User</th>
<th>Requirement System</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>1.</td>
<td>Member</td>
<td>Registration as a Member Selling marine products in Secanggang Village</td>
<td>Prospective members first fill out the member form, where you just need to fill in your name, address and telephone number where you can be contacted, and then each prospective member will get a member number which will later be used to log in and upload photos of fish for sale and seafood from Secanggang village.</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Input seafood products</td>
<td>Input photos of Secanggang village seafood products as well as product narratives and prices.</td>
</tr>
<tr>
<td>2.</td>
<td>Buyer</td>
<td>Registration as a buyer</td>
<td>Prospective buyer members first fill out the buyer member form, where you only need to fill in your name, address and telephone number where you can be contacted, and then each prospective member will get a member number which will later be used for every login to make transactions.</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Transaction</td>
<td>Consumer users can carry out the transaction menu for purchasing marine products on the Website-based Digital Marketing Promotion Application.</td>
</tr>
<tr>
<td>3.</td>
<td>Admin</td>
<td>Managing Data Member</td>
<td>Admin manages every member data of seller users and buyer users. The digital marketing promotion application for BUMDES Secanggang Village marine products is website-based.</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Managing Data Transaction</td>
<td>Website-based sales and purchase transaction data for marine products in Secanggang Village can be managed by admin, starting from adding marine product data, editing, updating data</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Managing Data Secanggang Village Sea Products</td>
<td>Admin can update Sea Products data in Secanggang Village which is input by the Seller.</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Report</td>
<td>Admin can create reports – overall report on internal activities waste bank includes:</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>- Seller member data reports</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>- Buyer data reports</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>- Transaction data reports</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>- Seafood data report in Secanggang Village</td>
</tr>
</tbody>
</table>

In this research, the Unified Modelling Language system design tool was used. The following is the use case diagram for the digital marketing promotion website of sea products bumdes Secanggan village
3. RESULTS AND DISCUSSIONS

The program is run using a web browser. In this test the author uses the Google Chrome web browser and after the web browser is running, type in the address bar [http://bumdessecanggang.my.id/] to go to the main page of the digital marketing promotion website for marine products to increase the income of village BUMDes:

In the Secanggan Village BUMDes sea product promotion digital marketing website application, there are several features that can optimise promotion and sales of marine products, which makes it easier for users to choose products.

Crab Selling Feature

The Crab Selling Feature Menu specifically displays crab information from Secanggang Village, as shown in Figure 2.

![Crab Selling Feature](image)

**Figure 1. Home Page**

![Home Page](image)

**Figure 2. Crab Selling Feature**

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Shrimp Selling Feature
The Shrimp Selling Feature menu specifically displays information about shrimp sold from Secanggang Village, as shown in Figure 3. Shrimp is one of the superior products in Secanggang Village.

Fish Selling Feature
Fish sales featuresThe Fish Selling Feature Menu specifically displays information on fish sold from Secanggang Village, as seen in Figure 4. This makes it easier for customers to choose various types of fish offered in the system based on the type and price of the fish.

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Transaction Features
The transaction feature contained in the secanggang village bumdes sea product promotion website digital marketing website application is one of the features in the application so that consumers can directly select features to make purchase transactions in the application, as shown in Figure 5.

Figure 5. Transaction Features
Additional features include information and tip features. This feature displays some information and tips for cooking the products offered and several tips that can be a reference for consumers in choosing fish, shrimp, and crab so that consumers can use information such as Figure 5.

Figure 6. Information and Tips Features

4. **CONCLUSION**

The results of research on the application of the sea product digital marketing promotion website application to increase the income of secanggan village bumdes can be concluded as follows:

1. **Increase in BUMDes Income:**
   It’s quite likely that BUMDes income in Secanggan Village will rise if the research’s implementation of a digital marketing promotional website and successful tactics is successful. The revenue information gathered following the strategy’s implementation can be used to gauge this.

2. **Enhanced Community Involvement:**
   This could be a good outcome if the digital marketing promotional website is successful in piquing the public's interest in participating in BUMDES events. Participation in BUMDES initiatives may rise as a result of increased community involvement.

3. **Effectiveness of Digital Marketing:**

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The results of this study may also indicate how successful promotional websites and digital marketing are in reaching the objective of raising sales. This can include metrics related to digital marketing and ROI (return on investment) research.

4. Findings from the research may also involve identifying elements that help or impede the effective execution of a promotional website for digital marketing. This can support planning for the future.

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REFERENCES

