

# BOOK OF RECOMMENDATIONS

Pierre Menhem Furkan Bucak Hugo Lefebvre Imène Mehaddene Elisa Okyere Darkoh Darron Perera David Pikusa Mohamed Sissoko Henoc Massamba Jean Guylane Memiaghe Duy Phuong Pham Ha Phuong Dinh Emanoel Shkodrov Tsvetelina Stefanova





DUT MMI 2021/2022

# PREFACE

In this recommandation book, we will see how to set up a multilingual marketplace to donate second-hand hardwares.

Indeed, we want to create a place where solidarity and sharing are welcome, to help people and environment. DigiDo also allows third-party shippers to sell low-cost products.

# SUMMARY

## I. Introduction

## II. Communication plan

Target survey Communication campaign : Web communication Print communication Communication actions : Promotional spots Events

## III. Tree structure

### **IV. Technical solutions**

Required bases Targeted platform Naming convention Minimum access configuration User Logged user Seller Donor

## V. Operating

Website tree structure Detailed pages Marketplace Product page Terms and fees Corresponding page Trade page Subscription/sign in overlay User feedback User account

## VI. System and browsing

Graphic approach Users interactions Published offer Respond to an offer Chat about an offer Transaction rules Donation Sale

#### VII. Website management

Modules management Create an offer Report an offer Ordering Data protection

## **VIII.** Conclusion

**IX. Annexes** Team description Glossary A lot of companies are throwing away their electronic equipment before their end of life, and renewing it too often. These practices lead to a questioning about electronic waste. Indeed, each year, companies are throwing away 145k tons of business and industrial wastes, which gradually destroys the environment.

To counter this problem, we are making up DigiDo: a digital second-hand electronic equipment redistributing platform.

We will allow associations, small companies, educational institutions, and people who cannot afford digital equipment to recover computer equipment from companies, administrations and individuals who wish to get rid of their used hardware. This aims to give used equipment a second life and provide a second-use to hardware.

We have got two main goals: we are wanting to satisfy donors' needs and expectations, as well as the people who order the equipment. With this platform we hope to massively develop this practice.

# **II. COMMUNICATION PLAN**

# **TARGET SURVEY**

We have 2 main targets: companies and administrations wishing to donate their equipment and all the organizations that receive it

As for donors, our main target is administrations and companies in any sector of activity, even if those in the field of technology will have more digital material to provide us. First companies because it is a customer who can bring a lot of material. We target companies of any size, turnover and seniority. The main thing is that the donated material must be reusable.

We also target people fond of new products and technologies who often change their equipment even if what they already have is not used.

To recover the material, we target associations, non-profit organizations, schools and small businesses that need this material. Our target remains all those organizations that do not necessarily have the means to buy computer equipment because it is too expensive for them. Of course, we target individuals who cannot afford computer equipment, such as students, who are often short of money.

For our communication strategy to work, we will respect the publication «codes» of each social network. We will therefore make sure to use # to increase our visibility on Twitter and Instagram. We will produce short and concise text content and we will multiply the type of content: link, video, photos, visual, computer graphics, GIF...

Regular posts, consistent feed and educational content will be the basis of our web communication strategy.

The redistribution of used computers is not rooted in mentalities. To highlight this practice and make our platform known, we want to organize awareness campaigns, to give real visibility to this measure which would have the immediate effect of significantly reducing the digital division. We could offer mini interviews with professionals from the IT field and with members of our agency to talk about our mode of operation. These will be posted on our Instagram, Facebook and Twitter to inform Internet users. This content is attractive and interesting because it triggers the curiosity of Internet users thanks to a dynamic and colorful montage.

Finally, we design monthly newsletters to inform our customers of the latest news.

# COMMUNICATION CAMPAIGN WEB COMMUNICATION

In terms of digital communication, we want to be present on a multiple social networks, with a view to complementarity and to reach as many people as possible. We want to introduce our platform to as many companies as possible in order to rally a large number of organizations to our cause. Social networks are a key step in our digital development so we will be present on Facebook, Linkedin and Instagram. The advantage of Facebook is its very large community made up of all age groups. In addition, thanks to the Facebook settings, it is easy to promote a business and optimize its notoriety. The goal of LinkedIn is to simplify the connection of professionals in order to build a network and expand it. This is perfect because the majority of Digi-Do's target uses Linkedin. Twitter will allow us to share information with our community about our platform, its news and its organization. Finally, we will use Instagram to put a visual on our digital platform and inform Internet users about how DigiDo works. This simple and regular way to communicate feeds our brand image and will effectively complement the action of our website.

#### **PRINT COMMUNICATION**

The print side of our communication campaign physically reaches our targets. Flyers that include QR codes redirecting to the DigiDo website, business cards handed over to companies.

# COMMUNICATION ACTIONS PRINT COMMUNICATION

#### -Promotional spots

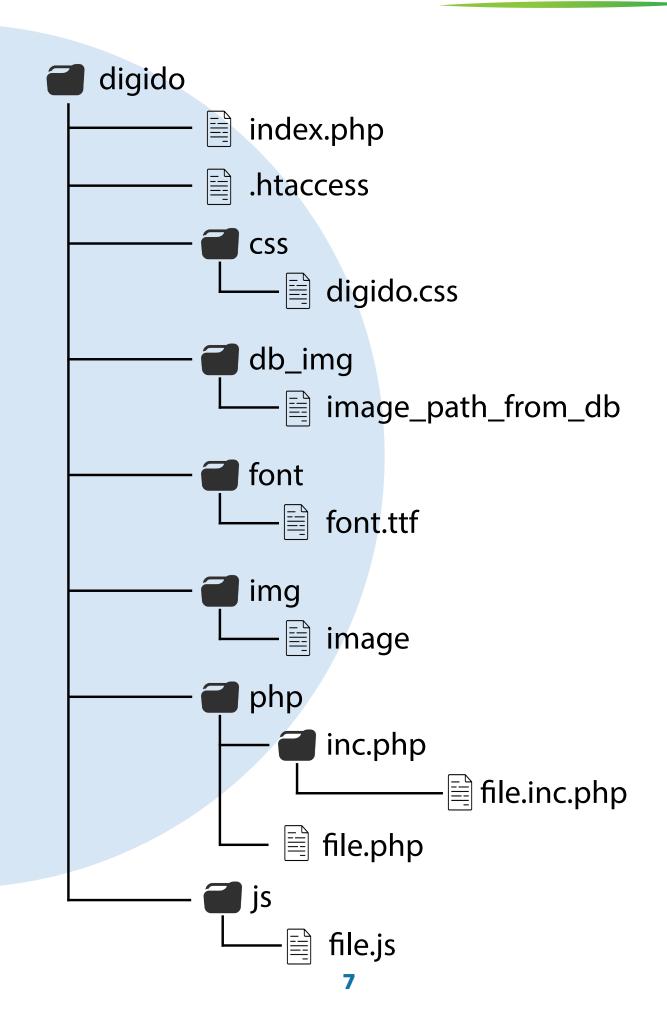
Potential sponsors from IT companies can also be an important extension of our visibility. Private individuals can also donate to DigiDo, something worth mentioning. That is why we have communication mediums ready for them. Advertisement on buses, subway station walls and highway billboards. It is a way to spread awareness about the digital fracture topic and increase our chances of receiving IT equipment.

#### -Events

The event is also a communication sector that allows you to discover your project, enthuse potential customers and reassure your partners.

To promote our project we will organize a launch party the day before the opening of the platform. In a warm but professional atmosphere, we will prepare a buffet and a conference. We will invite powerful companies in the world of tech and / or computing with their founders. They will be able to talk about the merits of our company and say that they will be users of our platform. During this event and throughout our communication, we will highlight the waste that our company avoids on the planet and the benefits it offers to each type of company. The purpose of this event is to make DigiDo known and to open us up to a network of potential customers.

# III. TREE STRUCTURE



# **IV. TECHNICIAL AND SOLUTIONS**

# **REQUIRED BASES**

### **TARGETED PLATFORM**

DigiDo aims to be used on a computer with a browser, the website isn't expected to be used on mobile at all. It's entirely mouse navigable.

#### **NAMING CONVENTION**

-Root directory: digido
-Tree structure directories : css, db\_img, font, img, php, inc.php, js
-Main program files : index.php, digido.css, unidice.js
-PHP page files : formed like « page.php »
-PHP included files : formed like « page.inc.php »

### **MINIMUM ACCESS CONFIGURATION**

The rights on DigiDo are divided into the four following categories:

#### **USER**

Reading: Marketplace, donation page, product page, terms and fees, subscription/sign-in overlay Writing: none Executing: Marketplace, subscription/sign-in overlay

#### **LOGGED USER**

Reading: Marketplace, donation page, product page, terms and fees, corresponding page, trade page, user feedback, user account Writing: User account Executing: Marketplace, trade page, user feedback, user account

#### SELLER

Reading: Marketplace, donation page, product page, terms and fees, corresponding page, user feedback, user account Writing: product page, user account Executing: Marketplace, user feedback, user account, corresponding page

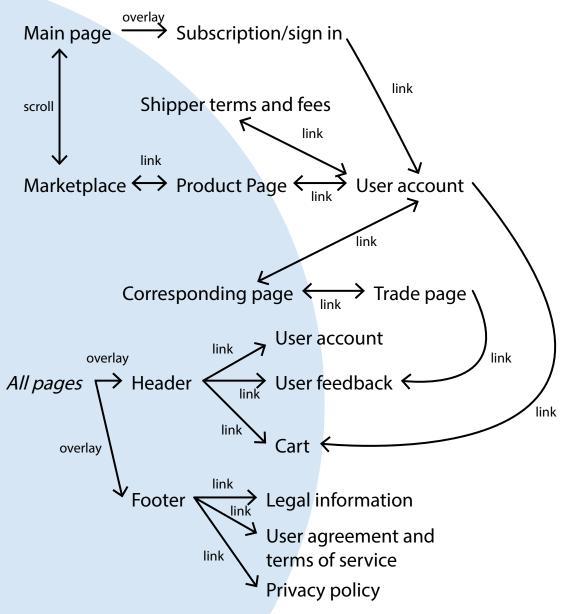
#### DONOR

Reading: Marketplace, donation page, product page, terms and fees, corresponding page, user feedback, user account Writing: donation page, user account Executing: Marketplace, user feedback, user account, corresponding page

Executing: Marketplace, user feedback, user account, corresponding page



# **WEBSITE TREE STRUCTURE**



## **DETAILED PAGE**

Each page has a header with the logo, marketplace, home, account, feedback and cart buttons.

The footer is always at the bottom of the page too, with links to legal information, user agreement and terms of service, privacy policy and disconnect button.

#### **MARKET PLACE**

The marketplace is on the main page. This is a scrolling area with a short description of the items.

#### **PRODUCT PAGE**

The donation page is a sheet that fully describes an item. It shows the product picture, name, description, if it's given away or sold, the price if needed, the number of items, and the condition of the product (or the average condition if there are many of them). At the bottom of

the page are the report button and the add to cart button. If the owner of the product is the connected user, there is also a delete button.

#### **TERMS AND FEES**

This page describes the terms and fees of a 3rd-party seller. It can be edited when on a «seller» account. The terms and fees of a seller describes the rules of all the trades done with them, but cannot go in any other way than the DigiDo's terms of service.

#### **CORRESPONDING PAGE**

The corresponding page is a user-to-user chat, destined to discuss the offer with the donor or seller. It allows only to send messages and the emoticon «Deal» which is an automatic link to the discussed product's trade page.

#### **TRADE PAGE**

The trade page is where the user enters their name, address, contact, and banking information to order a product. The banking info are not displayed and is encrypted.

The total cost, the maximum delivery date and the HumanIT contact to report a problem are displayed above the confirmation button.

#### **SUBSCRIPTION/ SIGN IN OVERLAY**

This overlay is fixed on the right side of the main page. It asks the user to subscribe to the website, but can be switched to a sign in interface.

#### **USER FEED BACK**

This page is a survey asking the user about their experience. The answers are directly sent to HumanIT email.

#### **USER ACCOUNT**

On this page all the user information is displayed. If the account owner is the connected user, they are able to edit their profile. Displayed information on individual accounts :

Profile picture (default: our mascot)

Name

Address

Contact

List of published products

Displayed information on shippers accounts : Profile picture (default: our mascot) Name Company address Contact Registration number in the trade register or the register of trades The VAT identification number List of published products

#### CART

All the products added to cart are displayed here like they are in the marketplace. The deleted offers are automatically removed from the cart. Each item has at its bottom a "remove" button.

# **VI. SYSTEM AND BROWSING**

## **GRAPHIC APPROACH**

We chose to bring a family graphic approach to the project. Indeed, thanks to the rounded typography of the logo (Arial Bounded MT Bold) with dynamic colours (blue, green and white), while remaining in the theme of technology and the environment, we aim to attract all types of customers.

### **USERS INTERACTIONS**

On DigiDo, users are often meant to interact for trading products. There are three kinds of interactions:

### **PUBLISH AN OFFER**

Users can describe the product they want to sell or give away in a sheet they create on their account. They can publish this product offer on the marketplace in order for other users to see it.

#### **RESPOND TO AN OFFER**

When users are on an offer page that suits them, they can respond to this offer. The offer will be then accessible in their responded list.

#### **CHAT ABOUT AN OFFER**

After responding to an offer, users can chat with the publisher in the chat accessible from the product page. When the discussion is over, the publisher can decline the offer or send a "Deal" emote if the two of them get along, which is clickable and allow the client to go on the trade page to buy the product.

# **TRANSACTION RULES**

Trades on DigiDo are ruled by our terms of services. Here are some specific rules for the two kinds of transactions.

## DONATION

Users on DigiDo are allowed to massively give away products. Over a batch of ten products, the condition is no more supported by us, only the number of items sent..

The delivery of donated products is supported by DigiDo. The two parties must provide their real contact and address. The delivery will be carried on in the 30 days following the order.

Offers are saved in our database for 40 days. If a client complains about an inaccurate donation during this time, the donor's account can be deleted.

In case of problems with the products or the delivery, DigiDo is never responsible.

A donation can't lead to a marketing exchange. If DigiDo is aware that the two parties had a money exchange after a trade, the two accounts are deleted and taken to court for "Unfair competition". Clients have a right of withdrawal until 40 days. The return of delivered products requires extra costs.

## SALE

Third-party shippers are allowed to sell low-cost hardwares on DigiDo. The sold products have to cost less than 80% of the new product or to be refurbished hardwares.

The delivery of sold products is fully supported by the shipper. The two parties must provide their real contact and address. The delivery has to be carried on in the 30 days following the order. Offers are saved in our database for 40 days. If a client complains about an inaccurate donation during this time, we reserve the right to take the shipper to court for "Offense of deception on goods". After this delay, this is all between the shipper and the client.

In case of problems with the products or the delivery, DigiDo is never responsible.

Clients have a right of withdrawal until 40 days. The withdrawal or return costs are determined by the shipper's terms and fees.

When the offer is a massive sale, we check all the products to see if they fit with their description. If not, we reserve the right to cancel every transaction.

# **VI. WEBSITE MANAGEMENT**

# **MODULES MANAGEMENT**

### **CREATE AN OFFER**

On their account, users can create a new offer. This opens a form with all the fields required for the product description. User information are all sent to the database. Unfinished sheets can be registered as a draft, in order to be published later.

### **REPORT AN OFFER**

When a user sees a suspicious offer, which doesn't fit with our rules, they can report it with a button at the top of the offer. The offer and the account will be then examined by the website moderators, and then the offer or the account may be deleted.

#### ORDERING

When ordering a product, users have to fill an ordering form. Their account information will automatically fill a part of it, but they will have to authorize access to their adress and banking information. The payment, if needed, will be put on the seller's cashpot. This money can be transfered from the cashpot to the bank at anytime. The adress information will be sent to the offer's publisher in order for them to send the products.

### **MULTILINGUAL VERSIONS**

Since DigiDo is an international website, it has to be multilingual. The main language will be English, and a language switch will allow users to change it to French or Vietnamese. The product sheets, accounts and corresponding page contents will not be translated.

# **DATA PROTECTION**

To complete their subscription, users have to accept our privacy policy. The sent data is kept in our database. Users' information can be displayed on their profile and are accessible by the other users and the shippers to facilitate transactions.

# **VIII. CONCUSION**

To sum up, DigiDo will accompany the users who want to give away their hardware, and help those equipment to find a new owner instead of being crushed in the middle of their lives.

In this prototype, users and shippers will be allowed to publish offers, respond to them, add them to their cart, and chat with each other. Our communication campaign will permit us to raise public awareness about electronic waste and hardware durability. This will draw them to our service where they will be guided by our promotional video to donate and shop in the best conditions.



## **TEAM DESCRIPTION**

#### **TEAM LEADER**

Hugo Lefebvre

#### **RESPONSIBLE FOR WEB SERVER ACCESS**

Pierre Menhem

#### **CHARGED FOR AUDIOVISUAL CREATION**

Elisa Okyere Darkoh

#### **DESIGN FIELD**

-Elisa Okyere Darkoh: Motion designer / Charged for audiovisual creation -Darron Perera: Print graphic designer / Web graphic designer -Tsvetelina Stefanova: Web graphic designer -David Pikusa: Trailer director -Ha Phuong Din: Video Editor -Mohamed Sissoko: Digital graphic designer + Web graphic designer

#### **DEVELOPMENT FIELD**

-Hugo Lefebvre: Full-stack web developer + Information system manager + Team Leader -Emanoel Shkodrov: UX/UI web developer -Ha Phuongng Dinh: Web Designer, UX/UI web developer -Duy Phuong Pham: Web Designer, UX/UI web developer -David Pikusa: Full-stack web developer -Pierre Menhem: Full-stack web developer + Information system manager + Responsible for web server access

#### **COMMUNICATION FIELD**

-Imene Mehaddene: Marketing campaign planner / Communication leader -Furkan Bucak: Community manager / Communication assistant

# **GLOSSARY**

Refurbished: A product restored to like-new condition. Factory-refurbished or manufacturer-refurbished products are likely to be the best refurbs. Items refurbished by a third party might have just been given a quick once-over before being put up for sale.

Second-hand: owned or used by someone else before you

Third-party shipper: A third-party shipping company is also referred to as a 3PL. They help shippers handle some or all aspects of their shipping needs including handling the point-to-point movement of cargo on behalf of the clients they serve.