

CHAPTER V

IMPLEMENTATION AND TESTING

5. 1 Implementation

First, we need to make sure that make sure we update the latest web browsers already installed like Firefox, Chrome, Opera and any other. After that, open the html file in a folder Peraga HTML5 with the name simulasi.html.

This is a step by step with the program code after the application is opened through a web browser :

5.1.1 First Page Application

Starting page application code in HTML file. In this page will appear mulai as a start button to start application to go to next view of main menu page.

```
1<!DOCTYPE HTML>
2<html>
3<head>
4 <meta charset="UTF-8">
5 <link rel="stylesheet" type="text/css" href="style.css">
7 <title>Peraga(Simulasi) Pengiriman Panganan Pecahan</title>
8 <script type="text/javascript" src="simulasi.js"></script>
9
10</head>
11
12<body>
13 <canvas id="cavas" width="800" height="450"></canvas>
14 <div id="but1" class="imgbutton" onclick="mulai()">&#9633; Mulai</div>
15 <div id="board" style="display:none"></div>
16 <div id="menu" style="display:none"></div>
17 <div id="menu2" style="display:none"></div>
18 <div id="load" style="display:none"></div>
19 <div id="guide" style="display:none"><p><b>H&nb>
20 <font face="Comic Sans MS" color="black">
21 Cara bermain:<br/>
22 Pilih pecahan Pizza yang kamu inginkan<br/>
23 dengan cara tekan tombol menu tulang dibawah <br/>
24
25 tombol [1/2] untuk pecahan setengah dari pizza<br/>
26 tombol [1/3] untuk pecahan seperiga dari pizza<br/>
27 tombol [1/4] untuk pecahan seperempat dari pizza<br/>
28 tombol [1/5] untuk pecahan seperlima dari pizza<br/>
29 tombol [1/6] untuk pecahan seperenam dari pizza<br/>
30 </font></p></div>
31 <div id="arrows" style="display:none"></div>
32 <div id="juzepizza" style="display:none">
33 </div>
```

Figure 5.1.1 Starting page application code

5.1.2. The Main Menu

The main menu of the application to select fractions.

Menu1 for half fraction, menu2 for one third fraction, menu3 for one fourth fraction, menu4 for one fifth fraction, menu5 for one sixth fraction.

That menus will guide user to next page view appropriate fractions were selected by user on main menu.

```
103 <div id="menutama" style="display:none">
104   <div id="menu1" class="menu" onclick="per2()">>1/2</div>
105   <div id="menu2" class="menu" onclick="per3()">>1/3</div>
106   <div id="menu3" class="menu" onclick="per4()">>1/4</div>
107   <div id="menu4" class="menu" onclick="per5()">>1/5</div>
108   <div id="menu5" class="menu" onclick="per6()">>1/6</div>
109
110   <div id="refresh" class="menu" height="30px" width="100px" onclick="location.reload()">Mulai lagi</div>
111 </div>
112
113 <audio id="backsound" >
114   <source src="sound/01-main-theme-overworld.mp3" type='audio/mp3'>
115 </audio>
116 <script>
117   var backsound = document.getElementById("backsound");
118   document.getElementById("backsound").play();
119   document.getElementById("backsound").volume=.1;
120   var canvas = document.getElementById("canvas");
121   var ctx = canvas.getContext("2d");
122
123 //---style judul---
124   ctx.fillStyle = "#IFFD00";
125   ctx.font = "bold 130px Sawasdee";
126   ctx.textBaseline = "top";
127   ctx.shadowColor = "#707070";
128   ctx.shadowOffsetX = 5;
```

Figure 5.1.2 Main menu code

5.1.3 Fraction One Half

Page of fraction one half. Consists of two images are images with id “pizza” and “pizza1” are taken from the css file. And onclick towards function hitungper2 with value a and b inside it.

```
<div id="per2" style="display:none">
  <div id="pizza" onclick="hitungper2('a');"></div>
  <div id="pizzal" onclick="hitungper2('b');"></div>
</div>
```

Figure 5.1.3 Fraction one half code

Figure above is a JavaScipt file, it includes all function to generate click function, calculate the calculation of fraction, produce the background and sound mouse if mouse click in button or images of pizza.

Figure 5.1.3 JavaScipt Fraction one half code

```

166 window.onload = function() {
167     document.body.style.backgroundImage = "url('img/pizza.png')";
168     document.getElementById("pizza").style.cursor = "pointer";
169     document.getElementById("pizza").style.position = "absolute";
170     document.getElementById("pizza").style.left = "50%";
171     document.getElementById("pizza").style.top = "50%";
172     document.getElementById("pizza").style.width = "200px";
173     document.getElementById("pizza").style.height = "200px";
174     document.getElementById("pizza").style.backgroundColor = "#F0F0F0";
175     document.getElementById("pizza").style.borderRadius = "50%";
176     document.getElementById("pizza").style.boxShadow = "0 0 10px 2px #8B4513";
177     document.getElementById("pizza").style.filter = "dropShadow(0 0 10px 2px #8B4513)";
178     document.getElementById("pizza").style.transition = "all 0.5s ease-in-out";
179 }
180
181 document.getElementById("pizza").onmousedown = function() {
182     document.getElementById("pizza").style.backgroundColor = "#FFA500";
183     document.getElementById("pizza").style.borderRadius = "50% 50% 50% 50% / 0 0 0 0";
184     document.getElementById("pizza").style.filter = "dropShadow(0 0 10px 2px #8B4513)";
185     document.getElementById("pizza").style.boxShadow = "0 0 10px 2px #8B4513";
186     document.getElementById("pizza").style.transition = "all 0.5s ease-in-out";
187 }
188
189 document.getElementById("pizza").onmouseup = function() {
190     document.getElementById("pizza").style.backgroundColor = "#F0F0F0";
191     document.getElementById("pizza").style.borderRadius = "50%";
192     document.getElementById("pizza").style.filter = "dropShadow(0 0 10px 2px #8B4513)";
193     document.getElementById("pizza").style.boxShadow = "0 0 10px 2px #8B4513";
194     document.getElementById("pizza").style.transition = "all 0.5s ease-in-out";
195 }
196
197 document.getElementById("pizza").onmouseover = function() {
198     document.getElementById("pizza").style.backgroundColor = "#FFA500";
199     document.getElementById("pizza").style.borderRadius = "50% 50% 50% 50% / 0 0 0 0";
200     document.getElementById("pizza").style.filter = "dropShadow(0 0 10px 2px #8B4513)";
201     document.getElementById("pizza").style.boxShadow = "0 0 10px 2px #8B4513";
202     document.getElementById("pizza").style.transition = "all 0.5s ease-in-out";
203 }
204
205 document.getElementById("pizza").onmouseout = function() {
206     document.getElementById("pizza").style.backgroundColor = "#F0F0F0";
207     document.getElementById("pizza").style.borderRadius = "50%";
208     document.getElementById("pizza").style.filter = "dropShadow(0 0 10px 2px #8B4513)";
209     document.getElementById("pizza").style.boxShadow = "0 0 10px 2px #8B4513";
210     document.getElementById("pizza").style.transition = "all 0.5s ease-in-out";
211 }
212
213 document.getElementById("pizza").ondblclick = function() {
214     alert("click!");
215 }
216
217 document.getElementById("img").style.position = "absolute";
218 document.getElementById("img").style.left = "50%";
219 document.getElementById("img").style.top = "50%";
220 document.getElementById("img").style.width = "200px";
221 document.getElementById("img").style.height = "200px";
222 document.getElementById("img").style.filter = "dropShadow(0 0 10px 2px #8B4513)";
223 document.getElementById("img").style.backgroundColor = "#FFDAB9";
224
225 
```

Figure above is a CSS file, it serves to get a file file image width and height, display of images and all appearance in this from the computer. Then CSS function serves to set position, application.

Figure 5.1.3 CCS Fraction one half code

```

169 app.css
170
171 pizza{
172     position: absolute;
173     left: 50%;
174     top: 50%;
175     width: 200px;
176     height: 200px;
177     background-image: url('img/pizza.png');
178     background-position: center;
179     background-size: 100%;
180     border-radius: 50%;
181     border: 2px solid #8B4513;
182     filter: dropShadow(0 0 10px 2px #8B4513);
183     box-shadow: 0 0 10px 2px #8B4513;
184     transition: all 0.5s ease-in-out;
185 }
186
187 #img{
188     position: absolute;
189     left: 50%;
190     top: 50%;
191     width: 200px;
192     height: 200px;
193     filter: dropShadow(0 0 10px 2px #8B4513);
194     background-color: #FFDAB9;
195     border-radius: 50%;
196     border: 2px solid #8B4513;
197     transition: all 0.5s ease-in-out;
198 }
199
200 
```

5.2 Testing

Users start the application. And the click mulai button. Suppose a user selects fraction one half.



Figure 5.2 Fraction one half interface

Then users clicked the image one piece of pizza from the fraction. Automatically, the value of the Jumlah sisa pizza will change according to the final results of fraction.



Figure 5.2 The rest half of the fraction one half

Image slices of pizza was gone, the calculations already show the final result. When a user wants to play with the same fraction or another fractional, that users can click on the fraction button available on the yellow main menu.

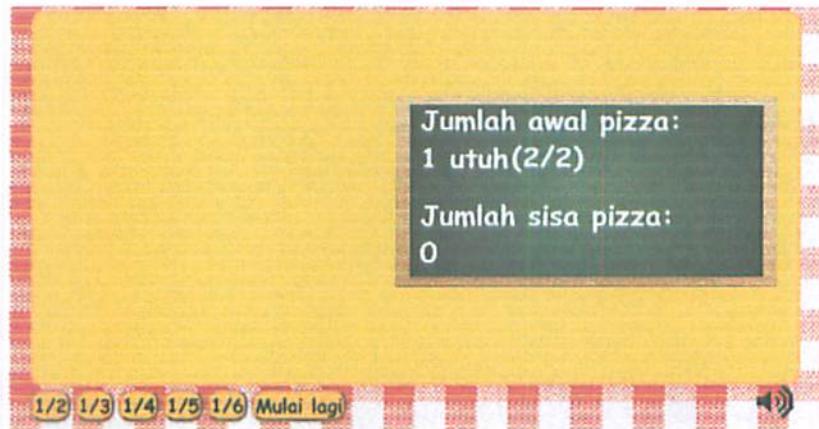


Figure 5.2 The rest fraction depleted of the fraction one half

5.3 Interface

5.3.1 First page Window

Users can click mulai button to start application. To turn backsound users can click the audio button (the speaker).



Figure 5.3.1 First Page interface

5.3.2 Main Menu Window

The main menu page. In this menu users can choose fraction on the menu button that has been available. Or click mulai lagi button to start an application from the beginning (refresh).



Figure 5.3.2 Main menu interface

5.3.3 Fraction One Half Interface

When the user selects fraction one half ,would look like this.



Figure 5.3.3 Fraction one half interface