**Chapter 12: CSS Targeting Elements**

**Your name:**

**Objective:** Demonstrate your understanding of CSS selectors and how to target HTML elements using different methods.

**Instructions:** Complete the following tasks to show your knowledge of CSS targeting and styling. Write your answers inside this document using a different color. (No it does matter what color; I need to be able to read it!)

**Part 1: Basic Selectors (30 points)**

What is the difference between a class selector and an ID selector?   
Provide an example of each.

The difference between a class selector and an ID selector is…

You would want to place an ID selector on an element you want to make unique changes to. You would use a class selector on a group of elements that you want all to have the same changes to.  
An example of a class selector is…

All cards in a div that need to be the same size.

An example of an ID selector is…

The div that contains the cards.

Write the CSS selector that would target:

All paragraph elements  
p {  
/\* Add your desired styles here \*/  
}

Elements with the class "highlight"

.highlight {}

The element with ID "header"

#header {}

All list items inside an unordered list

ul li {}

**Part 2: Advanced Selectors (40 points)**

Create CSS rules using these combinators:

Target all direct child elements of a div  
div > \* {}

Select all paragraph elements that come immediately after headings  
h1 ~ p {}

Target all elements with the class "box" that are inside elements with the class "container"  
.container .box {}

Write CSS rules for these pseudo-classes:

Make links turn red when hovered over  
a:hover {color: red;}

Style the first paragraph of an article differently  
article p:first-of-type {}

Change a button's background color when it's clicked  
button:active{}

Style every odd-numbered row in a table  
table tr:nth-child(odd) {}

**Part 3: Practical Application (30 points)**  
Given this HTML structure:

<nav class="menu">

<ul>

<li><a href="#">Home</a></li>

<li><a href="#">About</a></li>

<li><a href="#">Contact</a></li>

</ul>

</nav>

Write CSS rules to:

Style the navigation menu with a dark background

.menu {background-color: black;}

Make menu items display horizontally

.menu ul {display: flex;}

Add hover effects to the links

a:hover {}

Style the active link differently

a.active {}

Add a subtle transition effect when hovering over links

a {transition: color 0.2s ease;}

**Bonus Challenge (+10 points):**  
Create a CSS rule that targets the last child of a parent element, but only if it's a paragraph element.

p:last-child {}

**Submission Guidelines:**

Submit your work as a single CSS file

Include comments explaining your code

Test all your selectors to ensure they work as intended

Note: Remember to validate your CSS using a CSS validator before submission.

/\* this will select the menu class and set the background color to black \*/

.menu {

background-color: black;

}

/\* this will select the menu class and set the color to white \*/

.menu ul {

display: flex;

}

/\* this will set all links to red on hover \*/

a:hover {

color: red;

}

/\* this will set all links to blue on active \*/

a.active {

color: blue;

}

/\* this will set color transitions to take 1 second and ease in \*/

a {

transition: color 1s ease;

}

/\* this will set the last child element of paragraph to green \*/

p:last-child {

color: green;

}