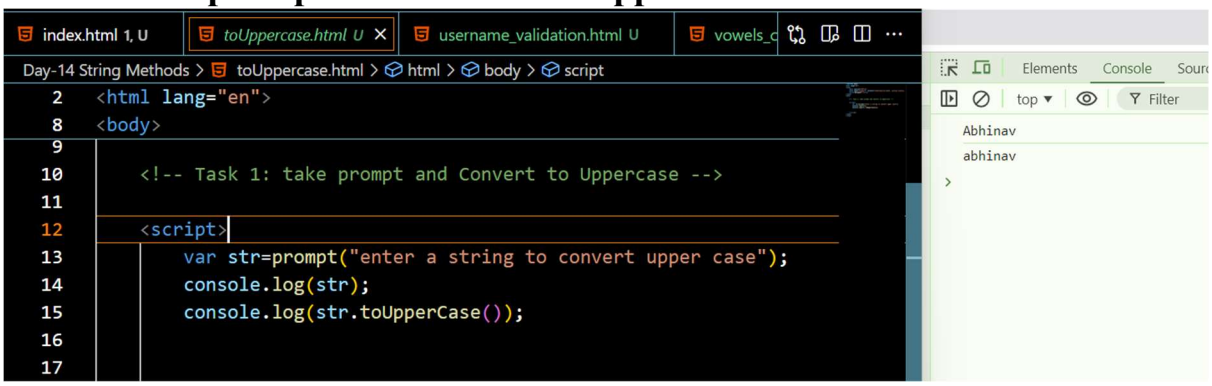
Template literals
Template literals allow you to embed expressions and variables directly within the string using ${}. This makes string interpolation more intuitive and readable.

```
let a = 5;
let b = 10;
let result = `The sum of ${a} and ${b} is ${a + b}.`;
// result is "The sum of 5 and 10 is 15.
```

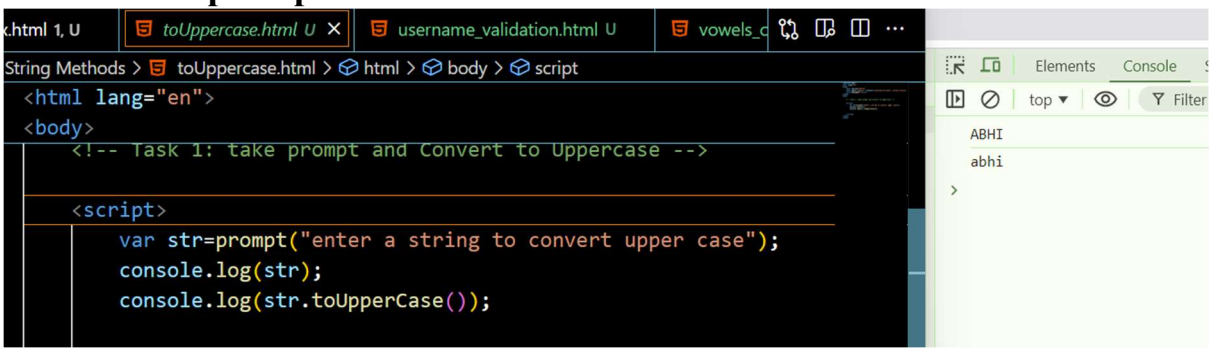
TASKS:

Basic level:

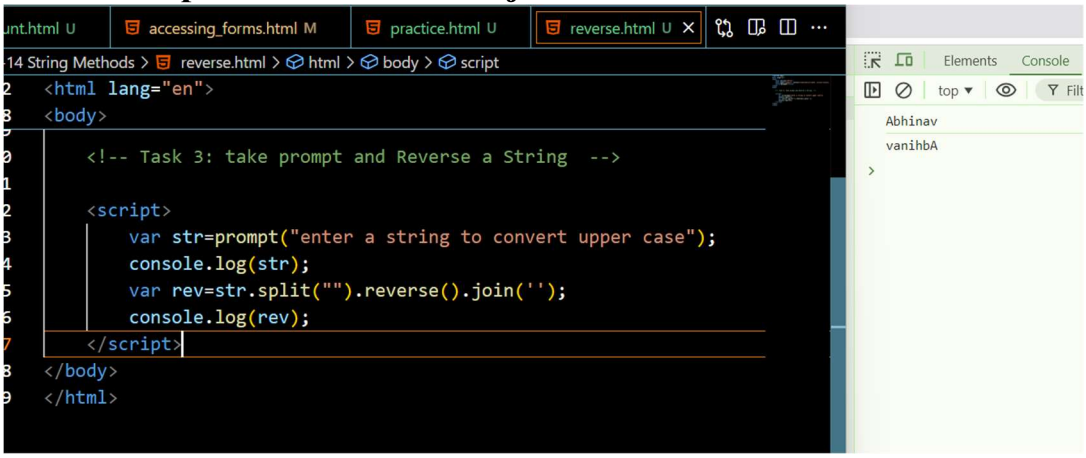
Task 1: take prompt and Convert to Uppercase



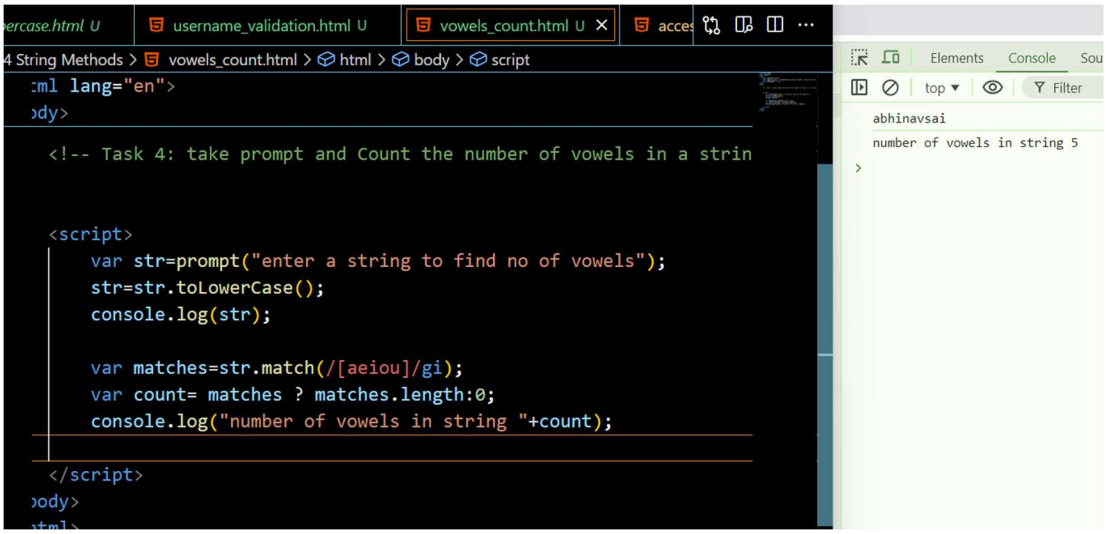
Task 2: take prompt and Convert to Lowercase



Task 3: take prompt and Reverse a String
hints: use split and reverse and join method



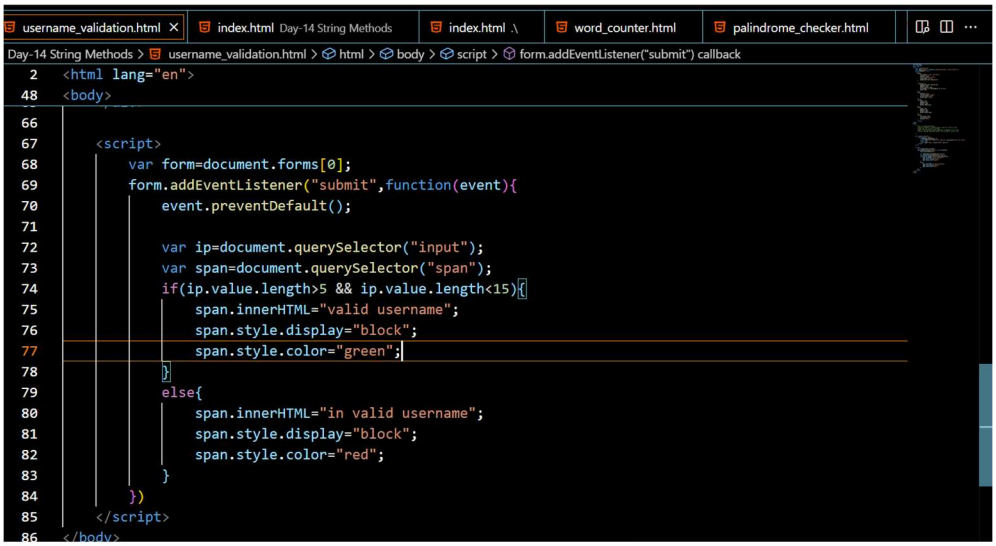
Task 4: take prompt and Count the number of vowels in a string--hints use match method



Advanced

Task 1: Username Validation

Scenario: Validate a username based on specific criteria. Task:
Prompt the user to enter a username.
Check if the username contains characters in between 5 to 15 long.
Display a message indicating whether the username is valid or not.



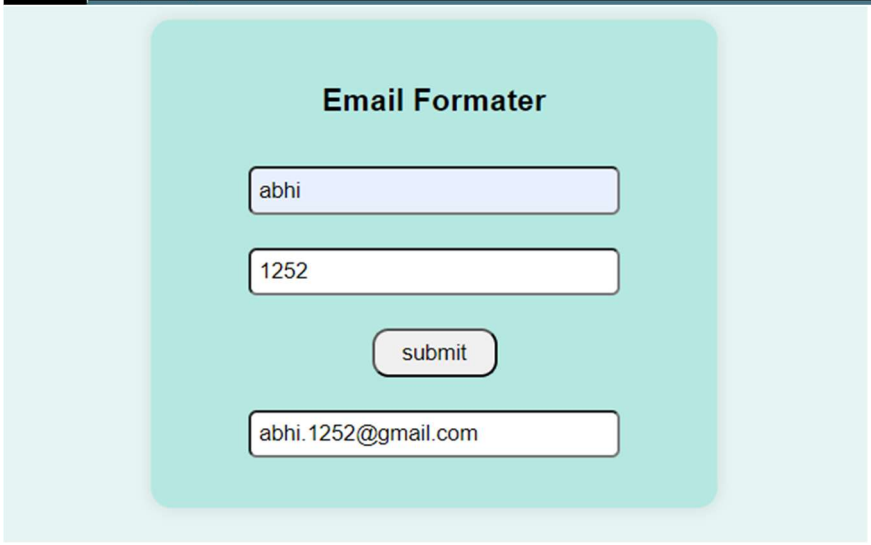
Task 2: Email Formatter

Scenario: Format an email address. Task:
Prompt the user to enter their first and last name.
Convert the names to lowercase and concatenate them with a dot in between.
concat “@gmail.com” to the result and display the formatted email address.
inp: jenny and joy
out: jenny.joy@gmail.com

username_validation.html | email_formatter.html M | index.html Day-14 String Methods | index.html .\ | word_counter.html

Day-14 String Methods > email_formatter.html > html > body > div.container > form#fm > input#user.text

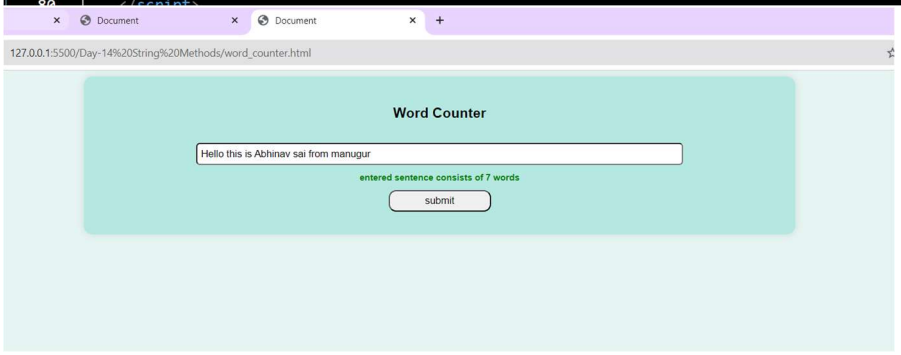
```
2   <html lang="en">
48  <body>
59      <div class="container">
60          <form action="" id="fm">
61              <h3>Email Formater</h3>
62              <input type="text" class="text" id="user" placeholder="Enter First name" >
63              <input type="text" class="text" id="user" placeholder="Enter Last name" >
64              <span></span>
65              <input type="submit" value="submit" id="sub">
66              <input type="text" class="text" id="user" placeholder="your genrated email will display he
67          </form>
68      </div>
69      <script>
70          var form=document.forms[0];
71          form.addEventListener("submit",function(event){
72              event.preventDefault();
73
74              var ip1=document.querySelectorAll("input")[0];
75              var ip2=document.querySelectorAll("input")[1];
76
77              res=`${ip1.value}.${ip2.value}@gmail.com`;
78              var ip3=document.querySelectorAll("input")[3];
79              ip3.setAttribute("value",res);
80          })
81      </script>
```



Task 3: Word Counter

Scenario: Count the number of words in a sentence. Task:
Prompt the user to enter a sentence.
Split the sentence into words and count them.
Display the word count.
Hint: use split and length method

```
48  <body>
58
59      <div class="container">
60          <form action="" id="fm">
61              <h3>Word Counter</h3>
62              <input type="text" class="text" id="user" placeholder="Enter a sentance to find no of wor
63              <span></span>
64              <input type="submit" value="submit" id="sub">
65          </form>
66      </div>
67      <script>
68          var form=document.forms[0];
69          form.addEventListener("submit",function(){
70           event.preventDefault();
71
72           var ip=document.querySelector("input");
73           var count=ip.value.split(' ').length;
74           var span=document.querySelector("span");
75           span.innerHTML=`entered sentence consists of ${count} words`;
76           span.style.color='green';
77           span.style.display='block';
78
79          })
```



Task 4: Palindrome Checker

Scenario: Check if a given string is a palindrome. Task:
Prompt the user to enter a string.
Check if the string reads the same forwards and backwards.
Display a message indicating whether the string is a palindrome
Hints : use split,join, reverse method in arrays

inp:john
out: not a palandrome

inp:dad
out:it is a palandrome

```
<script>
    var form=document.forms[0];
    form.addEventListener("submit",function(){
    event.preventDefault();

    var ip=document.querySelector("input");
    var rev=ip.value.split('').reverse().join('');
    var span=document.querySelector("span");

    if(ip.value == rev){
        span.innerHTML="given word is palindrome";
        span.style.color='green';
        span.style.display='block';
    }
    else{
        span.innerHTML="given word is not a palindrome";
        span.style.color='red';
        span.style.display='block';
    }
   })
</script>
```