Solution Review: Using Conditions on Arrays

Here we'll discuss the solution to using conditions on arrays.

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we'll cover the following ^
• Solution
• Explanation
```

Solution

```
import numpy as np

x = np.linspace(0, 2 * np.pi, 20)
y = np.sin(x)

arr1 = y[(y > 0.7) | (y < -0.5)]
arr2 = y[(y > -0.5) & (y < 0.7)]

print(arr1)
print('----')
print(arr2)</pre>
```

Explanation

- In line 3, we have created an equally spaced array with 20 values ranging from 0 to 2π .
- In line 4, we have used x to generate y using the np.sin function.
- In line 6, we have used the \parallel operator to filter for elements that satisfy the condition $y>0.7,\ y<-0.5$
- In line 7, we have used the & operator to filter for elements that satisfy the condition -0.5 < y < 0.7

In the next chapter, we will learn about plotting.