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| Keywords/Questions:   * Class * Object | Notes: One of the popular programming paradigms. It uses the concept of classes to group related data and functionality. It is analogous to functional programming. Functions inside classes are called methods. Methods can be accessed using the dot notation. With OOP, you can build as many objects as needed. The ‘this’ keyword is used to refer to the current object that has been instantiated. This way we don’t have to write custom methods for every object we instantiate. |
| Summary​: Object Oriented programming is one of the most popular programming paradigms used. | |

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| |  |  | | --- | --- | | Topic/Title: **Object Oriented Programming** | **Classes** | |  | | | |
| Keywords/Questions:   * Class * Constructor | Notes​: Classes are essentially blueprints that can be used to create objects of a particular type repeatedly. The constructor function assigns passed in parameters to future instances of the class. It is always called during instantiation. The JS syntax is;  class ClassName{  constructor(prop1, prop2) {  this.prop1 = prop1;  this.prop2 = prop2;  }  method1{  …  }  } |
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| |  |  | | --- | --- | | Topic/Title: **Advanced JavaScript** | **De-structuring Arrays and Objects** | |  | | | |
| Keywords/Questions:   * De-structuring | Notes​: De-structuring is likened to copying an item which becomes independent of the original.  E.g. let {PI} = Math; The PI property of the Math object is assigned to the PI variable. |
| Summary​: De-structuring is used to extract certain properties from an object. This extracted property is different from the actual property of the object. | |

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| |  |  | | --- | --- | | Topic/Title: **Advanced JavaScript** | **‘for of’ Loops and Objects** | |  | | | |
| Keywords/Questions:   * Iterable | Notes​: This type of loop cannot directly work on an object, because an object is not an iterable. See Example 1 in the forOfLoop.js file. There are certain in-bult methods that take objects as parameters. These include; **Object.keys()**, **Object.values()**, and **Object.entries().** The .keys() method takes an object as a parameter and returns all the property names of the object. See Example 3 in the forOfLoop.js file.  The .values() method returns all the property values of the object. See Example 4 in the forOfLoop.js file.  The .entries() method returns an 2-member array containing each property of the object with its corresponding value nested inside another array. Thus, an array of arrays. See Example 5 in the forOfLoop.js file.  With these as a basis we can now loop through any object’s property keys and values. See Example 6 in the forOfLoop.js file.  **‘for in’ Loops vs ‘for of’ Loops**  ‘for in’ loops loop over objects and their prototypes. ‘for of’ loops loop over only the objects. See Example 7 in the forOfLoop.js file. The former are unreliable, while the latter is reliable. |
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