Category

-name: String

+getName() : String;
+setName(name:
String):void;

Product

-name:String
-quantity:int
-category:Category
-price:float

+getName():String;
+setName(name:String):void;
+getQuantity():int;
+setQuantity(quantity:int):void;
+getCategory():Category;
+setCategory(category:Category):void;
+getPrice():float;
+setPrice(price:float):void;

Main

+main(args: String[]):void;

ShopService

-categories: Category[]
-products: Product[]
-numberOfCategories
-numberOfProducts
-categoriesCapacity
-productsCapacity

+getProductsCapacity():int;
+setProductsCapacity(productsCapacity:int):void;
+getCategoriesCapacity():int;
+setCategoriesCapacity(categoriesCapacity:int):void;
+getCategories():Category[];
+setCategories(categories Category[]):void;
+getProducts():Product[];
+setProducts(products Product[]):void;
+getNumberOfCategories():int;
+setNumberOfCategories(numberOfCategories:int):void;
+getNumberOfProducts():int;
+setNumberOfProducts(numberOfProducts:int):void;
+addNewCategory(category:Category):void;
+addNewProduct(product: Product):void;
+displayAllTheProducts():void;
+displayAllTheCategories():void;
+displayAllTheProductsFromACategory(nameOfTheCategory:String):void;
+searchAProductByName(nameOfTheProduct:String):void;