

Column Class

- Constructs an ArrayDeque with a type attribute
- Column Name
- Type of items that go into the column attribute
- Has Method to check if adding an object is allowed based on stored column type

Table Class

- Implements a LinkedHashMap
 - Keys are an array of column names
 - Values are ArrayDeque's corresponding to columns
- Table name attribute
- LinkedHashMap<Strings, ArrayDeque>
- Methods:
 - Join (Searches for common columns, finds common values, creates a new table and calls filter on this new table)
 - Helper Methods:
 - Find common columns
 - Find common elements inside of each columns
 - addRow(adds a row from a column)
 - Filter (filters table elements based on a condition)

```
public class Table {  
    private class column<A> {  
        ArrayDeque<A> values;  
        String name;  
        public column(String name){  
            this.values = new ArrayDeque<A>();  
            this.name = name;  
        }  
    }  
    private LinkedHashMap<String, ArrayDeque> values;  
    private String name;  
    public Table(String name, ArrayDeque<String> columnNames){  
        for (String s: columnNames) {  
            column c= new column<>(s);  
            values.put(s,c.values);  
        }  
    }  
    public void addRow(ArrayDeque items){  
    }  
}
```