```
import java.util.Random;
/**
 *  Computes some statistics about families in which the parents decide
 *  to have children until they have at least one child of each gender.
 *  The program expects to get two command-line arguments: an int value
 *        that determines how many families to simulate, and an int value
 *  that serves as the seed of the random numbers generated by the program.
 *  Example usage: % java OneOfEachStats 1000 1
 */
public class OneOfEachStats {
        public static void main (String[] args) {
                // Gets the two command-line arguments
                int T = Integer.parseInt(args[0]);
                int seed = Integer.parseInt(args[1]);
                // Initailizes a random numbers generator with the given seed value
      Random generator = new Random(seed);

        double rnd = generator.nextDouble();
        int counter = 0;
        int children2 = 0;
        int children3 = 0;
        int childrenmax = 0;
        boolean b = false;
        boolean g = false;
        double avrage = 0;

         // main loop runs the amount of times the user sets
         for(int i = 0;i < T; i++){
                  //while loop runs the test to see how many children are in the family to have a boy
and a gril
                while(!b || !g){
```

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                if(rnd > 0.5){
                        b = true;
                }
                else{
                        g = true;
                }
                counter ++;
                rnd = generator.nextDouble();
        }

        //puts the amount of kids in a family in their catagory
        if(counter == 2) children2 ++;
        if(counter == 3) children3 ++;
        if(counter >= 4) childrenmax ++;

        // resets the varubals so that the test can run again
        rnd = generator.nextDouble();
        b = false;
g = false;
        avrage = avrage + counter;
counter = 0;



        }
        // printing the results of how many families are in each category
        avrage = (double)avrage/(double)T;
        System.out.println("Avrege: " + avrage + " children to get at least one of each gender.");
        System.out.println("Number of families with 2 children: " + children2);
        System.out.println("Number of families with 3 children: " + children3);
        System.out.println("Number of families with 4 or more children: " + childrenmax);
```

```
        // determens and prints the most fruquent catagory of family
        if((children2 > children3) && (children2 > childrenmax)){
                System.out.println("The most common number of children is 2.");
        }
                else{
                        if(children3 > childrenmax){
                                System.out.println("The most common number of children is
3.");
                        }
                        else{
                                System.out.println("The most common number of children is
4 or more children.");
                        }
                }
}
}
```