



If you were to click  
randomly — you'd hit  
each color  $\frac{1}{8}$  of  
the time (no matter  
what the background  
color)

8 colors

8 dots of each color

red	green	blue	pink	
+ 6	+ 5	+ 7	6	...

Based on the statistical analysis of your data, it appears that dots are less likely to be "eaten" when they match the background color.

- GENES
1. What makes the dots ("bugs") different colors? (Biologically)
  2. Over time, what is happening to whatever makes the "bugs" different colors?

	<u>Green</u>	<u>Red</u>	<u>Blue</u>	<u>Black</u>
<u>start</u>	8	8	8	8
		$\frac{8}{32} = 25\%$		
<u>end</u>	16	3	0	2
	green $\frac{16}{21} = 76\%$ ↑	red ↓	number of blue genes ↓	black ↓

Gene frequency: the percentage of organisms in a population that have a gene of a certain type

We can (and do) observe changes in gene frequencies over time.