**DRILL: Am I Biased?**

For each of the following scenarios, call out the potential biases in the proposed experiment. Do your best to try to discover not only the bias, but the initial design. There is plenty of room for interpretation here, so make sure to state what assumptions you're making.

* You're testing advertising emails for a bathing suit company and you test one version of the email in February and the other in May.
  + Potential bias: contextual biased and outside factors because the setting and timing of the test isn’t consistent. The effects of advertising swimsuits in February during winter may have a different outcome than when it is done during May at the beginning of summer.
* You open a clinic to treat anxiety and find that the people who visit show a higher rate of anxiety than the general population.
  + Potential bias: The size of the sample and the random split method. The treatment is based on a non-randomized sample and the size of the population is limited to patients who are being treated for anxiety.
* You launch a new ad billboard based campaign and see an increase in website visits in the first week.
  + Potential bias: Testing methods, outside factors and bias based on setting. Launching a new ad billboard sees an increase in website could be influenced by how it was testing and the outside factor. Placing the ad on a billboard may increase website visits due to visitors being curios about the site but not necessarily interested in the site.
* You launch a loyalty program but see no change in visits in the first week.
  + Potential bias: random bias and sample size, the study probably only included loyalty members and not random enough sample or big enough size.