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OUTLINE
Module 2: Helium Neon Lasers - First lab period

- We want to get familiar with the equipment for this experiment. Finding out how to align things and what not to move will help us be faster in the next sessions

- Once we are familiar with the setup, we want to work on an alignment strategy so that we know exactly what to do and in what order to make the laser work
    - A big part of the overall alignment process depends on the mirrors

- There is a stability condition that depends on the mirror separation
    - In our case, check that the mirror separation meets with this condition

  We think that this part will be the one that takes the least time to complete, because the separation can be calculated without having the laser work

- Placement and alignment of the adjustable mirrors - look for different mode patterns
    - Make the laser work correctly and align
    - Take pictures of the different mode patterns with the video camera
        - Patterns will consist of one bright spot (00) or dark and bright fringe patterns that divide the visible laser beam into different parts

  We believe that this step will be what will take up most of our time in this lab session because of the precision needed for the laser to work and for the beam to display the mode patterns

- If the laser was aligned correctly: Measurement of the spectrum of light produced in the gas discharge

- Home: Analysis