Original Task Courtesy of Dane Ehlert

6.RP.A.3

<u>7.G.B.4</u>

The Nardo Ring is a high speed test track in Italy. Use this link to a video and Google Maps to get an idea of what it looks like...

Watch from :30 to :50
Nardo Ring

Today, witness a race between my old high school car, the <u>Chevy Celebrity</u>, and the new <u>Shelby</u> <u>Cobra Mustang</u>. As you can tell from the pictures, my old ride will need a slight head start to keep this race close.

Chevy Celebrity Speed - 40 mph (if it doesn't fall apart first)
Shelby Cobra Speed - 90 mph

Race Track Specs

How to Use This Map:

The large orange dot is the Shelby Cobra, which is at the starting line and finish line. The large light blue dot is the Celebrity, which is where the head start is at. The race is going counter-clockwise on the track. You can take the slider on the left hand side labeled **r orange** and move the orange line to see the angle it makes with the starting line, or the green line (the angle measurement is also displayed on the right hand side).

<u>Map</u>

- Q1- Who wins the race? Use appropriate minutes to convey your answer.
- Q2- At what degree does the Celebrity need to be placed at so the race is a tie (or as close to a tie as you can get)?
- Q3- How much less space is contained inside the track at the old 1910 <u>Los Angeles Motordrome</u> than the Nardo Ring? The Motordrome is 1 mile around the track.