



**CALIFORNIA STATE SCIENCE FAIR
2015 PROJECT SUMMARY**

Name(s) Bailee A. Poole	Project Number 35039
Project Title Investigating if Equine Chiropractics Affects Stride Length and Flexibility	
<p style="text-align: center;">Abstract</p> <p>Objectives/Goals The purpose of my science project is to determine if equine chiropractics affects stride length and flexibility. I will be testing to see if there is a change in horses' stride length and flexibility before and after chiropractic adjustments.</p> <p>Methods/Materials The materials used for my investigation included twelve horses, an equine chiropractor, a rake, and two yardsticks. First, I ranked a dirt path that was used for the horse to walk through. Next, I walked the horse through the path and measured the distance between two steps of the same foot. For my investigation, the left hind foot was used for all trials. After measuring the horse's stride length, the chiropractor adjusted the horse. Adjustments were made to the neck, upper back, lower back, poll, and all four legs. After the adjustments, the dirt path was raked again. The horse was walked through the path and I measured the length between the two steps of the left hind foot. This process was repeated for all twelve horses.</p> <p>Results After completing my investigation, I found that the chiropractic adjustments lengthened the equines' stride, therefore increasing flexibility. The average length of the equines' stride before chiropractic adjustments was 67.5 inches. The average stride length after equine adjustments was 70 inches. This means that there was an average increase of 2.5 inches, or 3.703%.</p> <p>Conclusions/Discussion After completing my investigation on whether equine chiropractics affects stride length and flexibility, I found that equine chiropractics lengthens stride length, therefor increasing flexibility. My results show that chiropractic adjustments lengthen the horses' stride in comparison to the horses' stride length without equine chiropractics. The average increase in stride length was 2.5 inches or 3.703%. This may seem like a small number, yet two and one half inches is a significant change in a horse's stride length. Because equine chiropractics lengthen the horse's stride, the horses will become more flexible after chiropractic adjustments.</p>	
Summary Statement My project is determining the effects of equine chiropractics on the equine's stride length and flexibility.	
Help Received Mom drove me to meet with chiropractor as well as helped assemble board. Dr. Alyx Debenedetto chiropractically adjusted the horses that were used in project.	