



**CALIFORNIA STATE SCIENCE FAIR
2012 PROJECT SUMMARY**

Name(s) Lillie M. Meyer	Project Number J1920
Project Title The Germination Rate of Different Aged Ranunculus Tubers	
Abstract Objectives/Goals The purpose of this project is to determine if older ranunculus tubers can still germinate as well as younger ones. Methods/Materials There were 20 tubers from each year being tested, 2005/06 - 2011/12. Before planting the tubers they were soaked in water for 1 hour. 140 four inch pots were used with one tuber in each pot. Each pot was marked 1 through 20 along with the year of the tuber. Each pot was filled with moist soil up to one inch below the rim of the pot. Each tuber was planted one inch down in the soil of the pot and was covered with soil up to the rim of the pot. After all of the tubers were put into pots they were separated into their groups by year. Results Results started to be recorded when the tubers began to germinate showing growth above the soil line. The year 2011/12 had 18 out of 20 tubers germinate, year 2010/11 had 12 out of 20, year 2009/10 had 6 out of 20, year 2008/09 had 11 out of 20. The remaining years 2005/6 - 2007/08 had no tubers germinate. Conclusions/Discussion My conclusion validated my hypothesis that the newer the tubers the higher the chance they had to germinate. This information is useful to gardeners to determine how long ranunculus tubers can be stored and still remain viable.	
Summary Statement To determine if the age of a ranunculus tuber effects its germination rate.	
Help Received My father helped me set up the experiment and plant the tubers. My Mother obtained the tubers for me along with getting me access to talk to Fred Clark of The Flower Fields. She also let me use her greenhouse for the experiment. My science teacher Patricia Young spent extra time with me after school	