



**CALIFORNIA STATE SCIENCE FAIR
2009 PROJECT SUMMARY**

Name(s) Timothy A. Westerfield	Project Number J2038
Project Title Does Growing Bell Peppers in Soil or Hydroponically Produce Better Results?	
Abstract Objectives/Goals To determine whether growing plants hydroponically outperforms traditional growing methods. Methods/Materials Fifty bell pepper seeds planted in a #Rapid Rooter# rooting system. After the sprouts had roots extending beyond the rooting plug, twelve similar sized plants were chosen to complete the experiment. Six bell peppers were planted in 15cm square pots with potting soil and six bell pepper plants were grown hydroponically in Rockwool growing cubes. A pH testing kit with base and acid was used to maintain proper pH level of the water prior to adding Flora Nova One-Part Growth Plant Food. A grow light was used to supplement the natural light from the window where the plants were placed. Results The hydroponically grown plants grew taller with longer, wider leaves during the experiment. Overall health of the hydroponically grown plants was superior to the plants in potting soil. None of the plants reached the flowering or fruiting stage. Conclusions/Discussion My conclusion is that the hypothesis was correct. Growing bell pepper hydroponically produces better results than growing them in potting soil.	
Summary Statement Testing to determine if growing bell peppers hydroponically will produce better results than planting them in a traditional growing method.	
Help Received Travis Notarianni of Discount Hydroponics of Riverside helped me in selecting the supplies for my project. My father helped by reviewing my report and assisting me with the display board preparation.	