



**CALIFORNIA STATE SCIENCE FAIR  
2008 PROJECT SUMMARY**

<b>Name(s)</b> <b>Samantha Jean Beckett</b>	<b>Project Number</b> <b>J1903</b>
<b>Project Title</b> <b>The Effect Six Different Brands of Chocolate Have on the Glossiness of Handmade Candies</b>	
<b>Abstract</b> <b>Objectives/Goals</b> The objective of this experiment was to learn which one of six different chocolate brands results in handmade molded candies with the glossiest surface. <b>Methods/Materials</b> Six brands of raw chocolates were carefully melted and molded into candies, categorized and photographically recorded for evaluation. A reflective spot meter was used to make readings of reflective values before photographs and a digital color spot meter was used after image capture to gather data which was then graphed and evaluated. <b>Results</b> The results showed that the six brands of raw chocolates were quite different. Luminance values (fL) were; Wilton 64.122, Guittard 61.696, Ghirardelli 58.459, Nestle's 39.865, Raley's 42.934, and See's 53.800. Luminance values range from 0-black to 100-white and were taken with a 1 pixel digital color meter. <b>Conclusions/Discussion</b> In conclusion, one of the least expensive chocolates (Wilton Melt n Mold) was the glossiest and other, well known, more expensive raw chocolates (such as Nestle's) did not mold well for high reflective values. This experiment could provide information that would be very valuable to both advertisers of chocolates and photographic stylists that are employed to make foods look great for photography.	
<b>Summary Statement</b> The objective of this investigation was to learn what brand of chocolate resulted in handmade molded candies with the highest reflective value (glossiness).	
<b>Help Received</b> Mom helped collect and purchase materials needed and she supervised the melting of chocolate on the cooktop. Dad helped initial set-up of photographic and computer equipment.	