CALIFORNIA STATE SCIENCE FAIR
2005 PROJECT SUMMARY

Name(s)
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Project Number
J1020

Project Title
Family Fingerprints

Abstract

Objectives/Goals
The purpose of my project is to see if heredity affects an individual's fingerprints.

Methods/Materials
I used 3 families, 30 blank white index cards, and an ink pad. I filled out cards for each person and took their fingerprints. I identified the print patterns and compared the parents' fingerprints with those of their children.

Results
In the first family, one child had 5 print patterns in common with at least one parent, and the second child had 4. In the second family, one child had 4 in common, and the second child had 2. For the third family, both children had 4 print patterns in common with the parents.

Conclusions/Discussion
On average the children had 4 out of 5 print patterns in common with their parents. Heredity does have an effect on the patterns in fingerprints. Sure, there are differences, but some of the basic patterns are the same. With genetics, traits are passed on to children, traits including basic fingerprint patterns.

Summary Statement
My project shows that fingerprint patterns are affected by heredity / genetics.

Help Received
I received help from three families who let me take their fingerprints.