

CSI Hawai'i

How can you identify someone by examining his or her footprints?

The scene on Sunrise Beach one Sunday morning surprised everyone who saw it. All the litter had been cleared and placed in the garbage cans. The only residue left behind were footprints, thought to be of those who cleaned up the beach. The neighborhood board wanted to thank the people who cleaned up the beach, but all the one witness who saw what happened could say was that a boy and a girl left the scene. The witness could not provide any further description.

The board wondered what inferences they could make about the people responsible by examining their footprints.

Several relationships exist between lengths of some parts of the human body with others. How might the length of a footprint provide additional information about that person?

1. Collect data from your classmates on the length of their footprint and their height.
2. Input your data into a graphing program and find a line of regression.
3. Create a report to help the neighborhood committee identify possible people who cleaned the beach. Use your data, findings, and other relevant observations.



From: Olson, J., Olson, M., Slovin, H., Venenciano, L., & Zenigami, F. (2015). *A modeling approach to algebra, second edition* (p. 50). Honolulu, HI: University of Hawai'i at Mānoa, Curriculum Research & Development Group.