ForensiKit

Fingerprinting with Ink

Book em, Officer

This activity works best with multiple participants.

Materials needed:

- Pen and paper or digital alternative to document your findings
- An internet-connected device to access fingerprint analysis guidance at https://forensikit.com/fingerprinting-with-ink/
- 1. Fingerprint each person in your group using the procedure on the other side of this document.
 - For adults, use the FD-258 fingerprint cards included in your ForensiKit.
 - For children, use the Child Identification fingerprint cards included in your ForensiKit. (Up-to-date Child Identification cards are useful in case of emergency.)
- 2. Use the Linen Tester to get a closer look at each fingerprint.
- Document the categories (loops, whorls, and arches) and features (core, delta, ridge end, bifurcation, island, and crossover) you see in each print.
 - You can use this information in the next activity.
- 4. If the other members of your group are part of your biological family, are there any common fingerprint features shared among family members?

Match that print

This activity works best with multiple participants.

Materials needed:

- Pen and paper or digital alternative to document your findings
- An internet-connected device to access fingerprint analysis guidance at https://forensikit.com/fingerprinting-with-ink/
- 1. Give each person a balloon and ask them to put a unique mark on it for identification later.
- 2. Ask each person to use an ink strip to put their fingerprint on their balloon.
 - For best results, make sure the balloon surface is flat when applying the inked fingerprint.
- 3. Wait 30 seconds for the ink to dry completely.
- 4. Inflate the balloons and mix them up so you don"t know whose is whose.
- 5. Compare the enlarged fingerprint on each balloon to the fingerprint cards you made in the previous activity.
- 6. Match each balloon to a person in your group.
- 7. Check the identification marks on the balloons to verify your findings.

Get more fingerprinting with ink activities and tips at https://forensikit.com/fingerprinting-with-ink/

Procedure

- Read the Fingerprinting Directions on the envelope containing the fingerprint cards.
- 2. Wash hands with soap and water or use a lint-free cloth to wipe fingertips with rubbing alcohol.
- 3. Rolled fingerprints
 - a. Gently peel back the clear covering on one of the small disposable ink strips, and follow the instructions in the "Applying Ink" section of the Fingerprinting Directions.
 - b. When the finger is inked, follow the instructions in the "Rolled Fingerprints" section of the Fingerprinting Directions.
 - c. Repeat for each finger and thumb.
- 4. Flat fingerprints
 - a. Gently peel back the clear covering on one of the large disposable ink strips, and follow the instructions in the "Applying Ink" section of the Fingerprinting Directions.
 - b. When the finger is inked, follow the instructions in the "Flat Fingerprints" section of the Fingerprinting Directions.
 - c. Repeat for the fingers and thumbs.
- 5. Use the hand cleaner to remove the ink from fingers.

Did You Know?

The technique of fingerprinting is known as dactyloscopy [dak-t*uh*-los-k*uh*-pee].

In the United States, there is no minimum number of points for a match. The goal is to match as many points as possible: usually 8-12.

From the beginning, fingerprint analysis was painstakingly done by hand.

Now, digital scanners capture fingerprint images as each finger is placed on either an optical or silicon reader surface.

- » The reader converts the scan into digital data patterns.
- » Computers then map points on each fingerprint and compare them to others for similarity within the database.

Other than humans, only gorillas, chimpanzees and koalas have fingerprints. The koala's is so similar to a human's that they're difficult to tell apart.

Some people are born without fingerprints. There are three genetic conditions that can prevent fingerprints from forming.

