

# SWGFAST

## Quality Assurance Guidelines for Latent Print Examiners

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Friction ridge examinations are based on the following premises:

The fundamentals of the science of friction ridge individualization (identification) are permanence and individuality. The comparison and individualization of two areas of friction ridge impressions are based on the examination of infinite combinations of ridge structure, individual ridge appearance, minutiae, spatial relationships, pores, and other details.

There is no scientific basis for requiring that a minimum number of corresponding friction ridge details be present in two impressions in order to effect individualization.

1. Fundamental Principles of Quality Assurance in Friction Ridge Examination
  - 1.1 Latent print examiners must be trained to competency before beginning independent casework.
  - 1.2 All individualizations (identifications) must be verified by another qualified latent print examiner.
2. Friction Ridge Examination
  - 2.1 Definitions and Conclusions
    - 2.1.1 Analysis

Analysis is the assessment of a friction ridge impression to determine suitability for comparison.
    - 2.1.2 Comparison

Comparison is the direct or side-by-side observation of friction ridge detail to determine whether the detail in two impressions is in agreement based upon similarity, sequence and spatial relationship.
    - 2.1.3 Evaluation

Evaluation is the formulation of a conclusion based upon analysis and comparison of friction ridge impressions.
    - 2.1.4 Individualization (Identification)

Individualization is the result of the comparison of two friction ridge impressions containing sufficient quality (clarity) and quantity of friction ridge detail in agreement.

Individualization occurs when a latent print examiner, trained to competency, determines that two friction ridge impressions originated

from the same source, to the exclusion of all others.

#### 2.1.5 Exclusion (Non-identification)

Exclusion is the result of the comparison of two friction ridge impressions containing sufficient quality (clarity) and quantity of friction ridge detail which is not in agreement.

Exclusion occurs when a latent print examiner, trained to competency, determines that two friction ridge impressions originated from different sources.

#### 2.1.6 Inconclusive

Inconclusive evaluation results when a latent print examiner, trained to competency, is unable to individualize or exclude the source of an impression.

Incomplete or unclear known friction ridge impressions may result in the inability to reach either an individualization or exclusion decision.

Inconclusive evaluation results must not be construed as a statement of probability. Probable, possible or likely individualization conclusions are outside the acceptable limits of the friction ridge individualization science.

#### 2.1.7 Verification

Verification is the independent examination by another qualified latent print examiner<sup>1</sup> resulting in the same conclusion.

2.1.7.1 All individualizations must be verified.

2.1.7.2 Exclusion or inconclusive results may be verified.

### 2.2 Errors

#### 2.2.1 Erroneous Individualizations

An erroneous individualization is the incorrect conclusion that two friction ridge impressions originated from the same source. An erroneous individualization is the most serious error a latent print examiner can make in casework.

#### 2.2.2 Erroneous Verifications

Verification of an erroneous individualization is equal to having effected the original erroneous individualization.

#### 2.2.3 Clerical or Administrative Errors

Clerical or administrative errors are not erroneous individualizations, for example, writing the wrong finger number.

#### 2.2.4 Missed Individualizations

A missed individualization is the failure to make an individualization when, in fact, both friction ridge impressions are from the same source. This is not an erroneous individualization.

### 2.3 Conflict Resolution

Each agency should define in writing the procedures to resolve conflicting conclusions.

### 2.4 Corrective Actions

The agency is responsible for writing and enforcing policy to handle errors. When preparing written policy governing errors, a variety of corrective actions should be included. The corrective actions should be appropriate to the level of the error, the skill level of the examiner, and the circumstances.

## 3. Quality Manual

A Quality Manual(s) must be maintained. A Quality Manual(s) must contain documentation of all significant aspects of friction ridge impression development and examination procedures, as well as any related documents or laboratory records that are pertinent to the examination and interpretation of results. Documentation must exist for the following topic areas as applicable:

### 3.1 Methods and Procedures for Friction Ridge Impression Development

This document must describe in detail the procedures currently used for the development of friction ridge impressions. Revisions must be clearly documented and appropriately authorized.

### 3.2 Formulary for the Preparation and Procedures for the Storage of Chemicals

If chemicals are obtained commercially, a list of suppliers and complete ordering information must be included.

### 3.3 Laboratory Safety Procedures

Laboratory safety procedures shall comply with state and federal guidelines. All chemicals and supplies must be stored, used, and disposed of under conditions recommended by the manufacturer and in a manner conforming to established safety requirements.

### 3.4 Material Safety Data Sheets

### 3.5 Evidence Handling Procedures

### 3.6 Proficiency Testing

### 3.7 Technical Case Review

### 3.8 Training and Competency Records

The agency shall maintain a current copy of in-service training records and

curriculum vitae for each examiner.

- 3.9 Equipment Calibration and Maintenance Logs
- 3.10 Method Validation Records
- 3.11 Policy and Procedure Manuals for Electronic Fingerprint Systems
- 3.12 Testimony Review
- 4. Latent Print Lifts and Photographs/Images

The following shall apply at the time of collection:

- 4.1 Latent print lifts shall include the following:
  - 4.1.1 Unique Case Identifier
  - 4.1.2 Date and Initials or Date and Personal Marking
  - 4.1.3 Impression Source (Description or Source Identifier)
- 4.2 Latent Print Lifts or Case Notes shall include the following:
  - 4.2.1 Scene Location or Address
  - 4.2.2 Significant information about the orientation and/or position of the latent print on the object through description and/or diagram(s)
- 4.3 Latent Print Photographs/Images or Case Notes shall include the following:
  - 4.3.1 Unique Case Identifier
  - 4.3.2 Date and Initials or Date and Personal Marking
  - 4.3.3 Impression Source (Description or Source Identifier)
  - 4.3.4 Scene Location or Address
  - 4.3.5 Significant information about the orientation and/or position of the latent print on the object through description and/or diagram(s)
  - 4.3.6 Scale Information

5. Evidence Handling Procedures

Evidence must be collected, received, and stored so as to preserve the identity, integrity, condition, and security of the item.

5.1 Chain of Custody

A clear, well-documented chain of custody must be maintained from the time that the evidence is collected or received until it is released.

5.2 Evidence Handling and Storage

Each agency shall prepare a written policy to ensure that evidence will be handled, processed, and preserved so as to protect against loss, contamination, or

deterioration.

## 6. Case Work Documentation and Report Writing

Procedures must be in place to ensure the accuracy and completeness of documentation.

### 6.1 Case Work Documentation

6.1.1 Documentation must be sufficient to ensure that any qualified latent print examiner could evaluate what was done and replicate any comparisons.

6.1.2 Verification of all individualizations must be documented.

### 6.2 Report Writing

Reports must contain the following:

6.2.1 Case Identifier

6.2.2 Identity of Examiner

6.2.3 Date of Report

6.2.4 Description of Evidence

6.2.5 Results of Latent Print Examination

## 7. Proficiency Tests

A proficiency test should be administered to each latent print examiner annually.

7.1 Proficiency tests may be purchased externally, developed in-house, or obtained from another agency.

7.2 The specific policies, procedures, and criteria for any corrective action taken as a result of a discrepancy in a proficiency test should be clearly documented in writing.

7.3 At a minimum, proficiency test records should include the date, examiner's name and test results.

## 8. Technical Case Review

8.1 Technical case reviews shall be conducted by another qualified Latent Print Examiner.

8.2 The specific policies, procedures, and criteria for any corrective action taken as a result of a discrepancy in a technical case review should be clearly documented in writing.

8.3 At a minimum, technical case review records should include the date, examiner and reviewer names, and findings.

## 9. Continuing Education

9.1 Examiner skills must be maintained by activities such as:

- 9.1.1 Receiving specialized training
  - 9.1.2 Attending educational seminars
  - 9.1.3 Reading professional publications
  - 9.1.4 Conducting and publishing research
  - 9.1.5 Completing self-study programs
  - 9.1.6 Instructing specialized classes or seminars
  - 9.1.7 Continuing formal education
  - 9.2 Agency management must provide the opportunity to comply with these requirements.
10. Testimony Review
- Agencies must have written procedures for review of testimony and should review annually the testimony of each examiner. Review may consist of:
- 10.1 Personal observation of testimony
  - 10.2 Testimony Evaluation Survey Form
  - 10.3 Verbal communication with court officials
  - 10.4 Review of written transcript, video, or audio recording of testimony