**Procedure for suppliers
sharing Test Report of Field Testing
(Operational Environment) and Laboratory Testing**

(Authentication)

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STQC - IT Services

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1.0   Introduction

For Quality Assessment of Biometric Devices, False Rejection Rate (FRR) Testing is an important validation test of Image Quality. To define a device this Testing require three critical components sensor-extractor and processes all the three variables are critical and requires control for successful completion of the test. Out of these three variables the control of first two i.e. sensor and extractor is relatively easy. However, since control of processes are human based and interactive in natures with respect to man-machine interface, It requires careful definition. To establish the equivalence of two different combinations where sensor   and extractor are fixed it is required that processes of both the organisation should be established as equivalent to draw a conclusion that similar FRR will be achieved by two different organisation having the same device (sensor/extractor).

The procedure to use a particular process with the combination of sensor-extractors is defined by OEM   and transferred to supplier. During FRR Test it is the responsibility of supplier's representative   (participating   in   the   test)   to follow the same. The FRR Testing requires participation by a large   number   of residents (5000 +). This activity requires adequate planning and execution to get test results with a high level of confidence.

2.0   Reference

NIST Special publication 800-76-2 – Biometric Specification for Personal Identity Verification

3.0   Scope

Scope of this procedure is
(a) define a procedure to establish equivalence of finger print capture processes of different suppliers using the same device (Model) so that FRR report can be shared by these suppliers
(b) In addition to (a) above this procedure also define sharing of laboratory test report by different suppliers.

2.0   Procedure

FRR testing procedure has been developed jointly by C-DAC, UIDAI and STQC. As per this   procedure FRR report is the property of the supplier who is participating in the test. During the test   Efforts are made that a large number of suppliers can participate so that whole activity can be efficient.
Since this activity cannot be done very frequently, there is a requirement to use FRR results by another supplier who is not able to participate in the test but is interested to supply the device (senor/extractor) which has been tested in the market, till next FRR exercise is carried out. Supplier need to apply for participating in the next forthcoming FRR testing coordinated by C-DAC, UIDAI and STQC. The test charges towards FRR testing to be deposited at CDAC .After satisfactory FRR testing supplier shall apply afresh for independent certification.

Following conditions apply:

- Supplier (Applicant)who is interested to get the certification based on the FRR Test Report of another supplier shall sign an agreement, where both parties shall

agree that the certification of supplier B (candidate supplier) is dependent on the Certification of Supplier A (already certified). In case of supplier A withdraws his certificate, gets cancelled or suspended, certificate of supplier B will also cease to exist automatically.

- There shall be an agreement that supplier A will transfer his process documentation to Supplier B, Train the personnel of Supplier B and establish one to one equivalence of process of Supplier A and Supplier B. The common processes should include atleast the following activities and task.

1) Attending official should inspect finger of the person to be authenticated and ensure absence of any foreign material on the finger surface.
2) Attending Official should ensure imaging surface of the sensor is clean
3) Generally Finger Print Scanners are designed for indoor use. Internal lighting is installed for finger illumination and image capture and it does not require external light. If external lighting is unavoidable, such as strong overhead light, procedure should suggest to make cover to minimize the influences.
4) After making several fingerprint scan or when the scanning window is dirty, procedure should specify use of cloth, lint free tissue paper etc. with suitable amount of cleaning agent e.g. alcohol to clean it.
5) Dry finger is always a problem for optical finger print scanner. The process should include mechanism to moisturize the finger skin with wet tissue in order to get best images.
6) Safety precaution like "Do not dismantle or alter this device. Electric shock or damage may occur" and "Do not use this device" in places where flammable or explosive gas may be in the air. A fire or explosion may occur.
7) Conditions for sending device to customers support centre like "If there is water or foreign matter inside the device, disconnect the USB cables immediately and contact the customer support center".
8) Sharp changes in temperature can generate moisture within the device and can result in poor performance. Idle period is recommended after substantial changes in temperature.
9) Correct driver and software should be installed properly before inserting Finger Print Scanner into the computer.
10) Whenever the scanner is not working properly, procedure should specify the instruction "not try to repair it."

The Certification Body should be satisfied while ensuring that two processes are established as equivalent. During surveillance visit the assessor shall take detailed noting of the processes performed by both the suppliers separately and do correlation study. If any, differences are observed that should be brought to the notice of the Supplier B for necessary corrective actions. Certification Body may try to get Feedback from UIDAI-CIDR about the estimated FRR of Supplier B over a period of time.

Sharing of Laboratory Testing Report

Laboratory Test Reports (consisting of functional, Image Quality, Environmental, EMI/EMC Test Report etc.) are the property of the supplier who has applied, submitted the samples for testing and paid the test charges. There could be situations when more than one supplier are interested to get the same product (Make and Model No.) Tested and Certified. STQC policy is

a) to encourage suppliers to share the test charges internally and agree for a common test report to ensure economy of demonstration of compliance.

b) In case there is no internal agreement they can have separate test charges with separate test report though STQC does not encourage that

c) In case a supplier apply later on when already testing of the same device by another supplier is over still they can have agreement and authorization to use the same test report. Supplier who applies later on need not pay any test charges to STQC in case he produces authorization of use of test report of the previous supplier.

d) Both the supplier shall maintain test reports and annual test records which will be checked during surveillance visit.