CONSOLIDATED PRE-BID MEETING QUERIES & RESPONSES

S/N	Page No.	Reference	Description/ RFP Technical Specification	Bidder Queries	Bank Remarks
1	3	2	**Background**	EOI specifies Fingerprint based authentication as one of the requirements on mobile devices. Please note that it is mentioned in EOI "All customers having finger print embedded smart phone irrespective of the operating system should be able to use this feature". This does indicate that Bank is unaware of the fact that embedded fingerprint sensors on mobile devices do not provide any means or mechanisms for mobile apps to read the fingerprint of users. The built-in fingerprint sensors (on mobile devices) do not provide mobile applications a copy/ reference of the captured/ registered fingerprints and therefore the requirements of Bank cannot be met unless a specialized hardware attachment is provided to every end user OR, the fingerprint is captured using the normal mobile device camera. Neither of these approach are viable in either a business point of view (provisioning of hardware, scaling of solution, cost) or security point of view (ordinary camera of mobile devices are	(i) As per the security norms of the bank, no personal and/or sensitive information like biometrics could be stored on the mobile device and must be stored on the server side only. (ii) Few applications of the bank are allowed to be used in Rooted Devices which do not provide security standard of a non-rooted device. Hence, storage of biometrics on mobile device is not permitted. The use cases of solution is inclusive of but not limited to (a) providing biometric authentication for end users for limited functionalities in mobile applications. (b) Authenticating internal employees accessing sensitive information of the bank…etc

				unable to deliver the Scan DPCM, DPI requirements consistently. Can we have some more details in the "Use Case" scenario that Bank is thinking of achieving	
2	**12**	**Annexure B**	**Technical Specification / Parameters**	There are no specific details provided for Face biometric authentication. Are there any specific technical requirements?	The technical specifications provided is not limited to fingerprint but all biometric authentication. In case of any specific clarification on Face biometric technical requirements, please elaborate on the specific points to clarify.
3	**18**	**2B 1**	**Expectation from Participants / Bidders:** **Brief Requirements**	Different devices have different APIs that need to be installed so that they can be utilized, so devices should be defined because plug and play device integrations efforts will be high.	The solution must support all fingerprint scanner devices (compliant with ISO 19794-2 / ISO 19794-4 standards) since bank has multiple fingerprint scanner devices used in different use cases and bank might see it fit to use the biometric solution in any use case in the future. So, list of supported devices cannot be defined.
4	**18**	**2B IV**	**Expectation from Participants / Bidders:** **Brief Requirements**	What are the total number of channels that need to be integrated with SSO feature?	The number of channels to be integrated with SSO will be decided based on the scope of implementation, which will be decided at a later stage of the procurement process.
5	**18**	**2B V**	**Expectation from Participants / Bidders:**	Is bank expecting unregistered devices for Bio metric authentication because currently Bio metric devices used for EKYC are registered devices that send	There is no limitation from bank side to use Registered / non-Registered Finger scanner devices. Any device compatible

			Brief Requirements	encrypted PID blocks that can only be decrypted at UIDAI end only	with your solution and adhering to market standards.
6	**18**	**2B VII**	**Expectation from Participants / Bidders:** **Brief Requirements**	Is bank expecting Bio metric authentication on top of existing applications that are provided by other vendors	Biometric Authentication might be used as a Step-Up authentication (or) introduced for a new feature. The specific use case for usage of the Biometric authentication will be later decided by the bank based on its requirements.
7	**18**	**2B VIII**	**Expectation from Participants / Bidders:** **Brief Requirements**	Tablets, Laptop, Desktops will require separate Bio metric devices for Authentication, but clarity is required smartphone devices as to how smartphones finger scanners can be used to authenticated applications login.	The solution need not be limited to following suggestions but some suggestions include Smartphone devices can exploit the built-in fingerprint scanners (or) any external fingerprint scanner connected through OTG cable (or) fingerprint can be captured using a mobile phone camera…etc.
8	11	Point 9	**Annexure (A) – Eligibility Criteria**	We, Network People Services Technologies Pvt Ltd, are working as Mobility Solution provider from last 4 years & providing Mobile Banking, IMPS, UPI & AEPS service to One Public Sector bank & 4 Cooperative banks. We are in process to implement the similar bio metric authentication solution for mobile banking for one of our client (Public Sector Bank). Earlier We had also served SBI by providing Production support for SBI Bank Freedom Application.	The committee may discuss amending the eligibility requirement after discussing in pre-bid meeting. You will be informed of the changes if any accordingly.

				So we kindly request you to consider our experience and allow us for participation.	
9	10	Point 5	**Annexure (A) – Eligibility Criteria**	Bidder should have min. net worth of Rs.5.00 Crore in each of the last three financial years. We kindly request you to change the clause as follows- "Bidder should have min net worth of Rs 1 Cr for each of last three financial years"	The committee may discuss amending the eligibility requirement after discussing in pre-bid meeting. You will be informed of the changes if any accordingly.
10	12	Bullet Point 17	**Annexure (B) – Technical Specification / Parameters**	Both, Android (Marshmallow onwards) and iOS, do not allow the Fingerprint data to leave the device. Please refer to below link for more details on this https://infinum.co/the-capsized-eight/android-fingerprint-security Fingerprint data is always stored in secure area where Apps do not have any access. With this it will be not possible to do server based matching of the Fingerprint as App will never have access to Fingerprint data on the device. Instead we would suggest that Biometric to be stored on Mobile device itself and match is done there, whereas Server will only verify the result using PKI technology & FIDO along with that it is coming from right device, user, App etc. A private/public key-based authentication solution using electronic signatures, prevents data	Bank is looking for a solution, which allows to store the individual bio-metric data at server end only.

				forgery/manipulation and ensures non-repudiation.	
11	12	Bullet Point 17	**Annexure (B) – Technical Specification / Parameters**	Storing of Biometric data on servers pose a threat to privacy of users as these servers will be accessed from public internet. This provides opportunity to hackers to make attacks to the server with biometric data. Also, every time Biometric authentication is done by the user, the biometric data will travel over the internet, giving opportunity to hackers to attack. Samsung SDS suggest that Biometric data to be stored securely on the device itself, whereas Server verifies the result (as explained above)	Bank is looking for a solution, which allows to store the individual bio-metric data at server end only.
12	16	Point 11	**Annexure (C) – Scope of Work (A)**	What are the back-end systems with which the Server connect to? Please provide the details.	The bank has multiple back-end systems which includes but not limited to Core Banking Solutions, Enterprise Service Bus (ESB).etc. Based on the requirement, the solution's server component has to be integrated with bank's back-end systems.
13	12	Bullet Point 10	**Annexure (B) - Technical Specification / Parameters**	Please provide the details of existing SSO solution being used?	Details will be shared after finalization of application.
14	16	Point 12	**Annexure (C) – Scope of Work (A)**	Does the solution need to support HA and DR?	Yes, the solution is expected to support High Availability (HA) network load balancing and Disaster Recovery (DR) setup.

15	**6**	**Section 10**	**Process after submission of EOIs**	Once EOI have been submitted and evaluated is it SBI's intention to move to an RFP process for suppliers or will the contract be awarded post selection of the EOI, with paperwork signed?	Please refer to Page No. 7 for "**Process after submission of EOIs**".
16	**6**	**Section 10**	**Process after submission of EOIs**	When is the target start date for SBI deployments of key use cases?	Solution is proposed to be implemented immediately after completion of procurement process.
17	**12**	**Annexure B**	**Technical Specification / Parameters**	Hardware scanner Requirements – Outside of the Mobile Banking use case, can SBI elaborate on the Hardware scanner Use Cases?	Bank may use the solution on any use case as it considers fit, which includes but not limited to (1) Use of biometric authentication by employees accessing sensitive information (2) Usage of biometric authentication as Step up Factor for existing authentication techniques in applications like Loan Approval processing...etc.
18	**12**	**Annexure B**	**Technical Specification / Parameters**	Single Sign On (SSO) – Can SBI provide details of any SSO platform in use in the bank today?	Details will be shared after finalisation of application.
19	**12**	**Annexure B**	**Technical Specification / Parameters**	Voice Biometric requirements – Does SBI have a Voice supplier in use in the Banks today e.g. Nice Systems?	Details are not to be shared at this stage.
20	**16**	**Annexure C**	**Scope of Work**	Outside of the Mobile Banking use case, can SBI elaborate on key use cases both internal and external in order of priority?	Bank may use the solution on any use case as it considers fit, which includes but not limited to (1) Use of biometric authentication by employees accessing sensitive information (2) Usage of biometric authentication as Step up Factor for existing authentication

					techniques in applications like Loan Approval processing...etc.
21	**16**	**Annexure C**	**Scope of Work**	If existing Hardware scanners in use, can SBI provide a specification?	Without the specific use case, provision of specification will be arbitrary or will not represent the correct device.
22	**16**	**Annexure C**	**Scope of Work**	Can SBI provide the scale of each key use case in scope e.g. numbers of target Mobile Banking users in deployment in years 1, 2, 3 etc	Such details will be shared after selecting application.
23	4	Section 6	**Proposed Solution and Approach & Methodology**	Biometric solutions are based on statistical model and AI capabilities. The algorithms are probability based. So, how can any solution commit 100% accuracy? Ideally, it should be based on FA (False Accept) and FR (False Reject) range. Any idea on the range for this proposed solution?	Any web or mobile application used in BFSI sector should confirm to 100% accuracy. You could participate in the EOI process wherein evaluation committee could evaluate the FAR/FRR ratios to arrive at conclusion.
24	**10**	**Annexure A**	**Eligibility Criteria**	Can bidder be replaced with Bidder/OEM in the eligibility Criteria - Bidder should have the solution for providing solution to implement MultiModal Biometric Authentication (Recognition of Finger / Face / Voice) for Login and / or Authentication of transaction (Financial / Non-financial) for Mobilitychannel transactions (Mobile Banking / Wallet / UPI, etc.).	Bidder may participate in EOI, if they have valid agreement with OEM. In such case, eligibility criteria of bidder will be evaluated.
25	**11**	**Annexure A**	**Eligibility Criteria**	Can bidder be replaced with Bidder/OEM in the eligibility Criteria - Client references/Biometric Authentication related projects implemented in BFSI sector and contact details (email/ landline/ mobile) of customers for whom the Bidder has executed similar projects during the	Bidder may participate in EOI, if they have valid agreement with OEM. In such case, eligibility criteria of bidder will be evaluated.

				past three years. (Start and End Date of the Project to be mentioned) in the past	
26	**11**	**Annexure A**	**Eligibility Criteria**	Can bidder be replaced with Bidder/OEM in the eligibility Criteria - Bidder should have experience of minimum two years in providing the service/ solution.	Bidder may participate in EOI, if they have valid agreement with OEM. In such case, eligibility criteria of bidder will be evaluated.
27	**12**	**Annexure B**	**Technical Specification / Parameters**	The technical specs are singularly focused on finger print biometric. There is no mention of voice biometric and facial biometric specification. This section gives the impression that it is specific "finger print biometric" and not "multi modal biometric". Request inputs here	The technical specifications cover all biometric authentication. In case of any specific clarification on Face biometric technical requirements, you may elaborate on the specific points to clarify.
28	**16**	**Annexure C**	**Scope of Work – Point 9**	Response time for enrolment and / or authentication in the proposed solution should not exceed 2-3 seconds. Is this specific to fingerprint? What about voice biometric KPIs and facial biometric KPI?	This requirement is common to Voice and Face biometric also. In case of any specific clarification on any specific biometric technical requirements, you may elaborate on the specific points to clarify.
29	**17**	**Annexure C**	**Scope of Work – Point 18**	Details of hardware technical specification (including system software/OS) purported to be used for the software solution should be submitted along with the technical bid. Is this details need to be submitted along with technical bid of this EOI?	Yes, it is expected to submit all the hardware technical specifications along with the technical bid since the bid includes the cost(s) of the hardware and the supporting solution (including System software / OS)