REQUEST FOR PROPOSAL (RFP)

FOR

SUPPLY, INSTALLATION AND MAINTENANCE

OF

CHEQUE PROCESSING SYSTEMS

FOR

MICR CENTERS

HARDWARE PROCUREMENT SECTION
INFORMATION TECHNOLOGY DIVISION
HO: 5 SANSAD MARG,
NEW DELHI – 110 001

Bid Details

1	Date of commencement of download of Bidding Documents	07.03.2012
2	Last date and time for receipt of queries	20.03.2012 upto 16.00 hrs
3	Last date and time for Bid Preparation and Hash Submission	03.04.2012 upto 16.00 hrs
4	Last date and time for Bid Submission	04.04.2012 upto 16.00 hrs
5	Date and Time of Technical Bid Opening	Please refer tender schedule
6.	Place of opening of Bids	Punjab National Bank, Information Technology Division Head Office 5, Sansad Marg New Delhi – 110001
7	Address for communication	As above Tel:(011) 23766914 Fax:(011) 23321305
8	EMD	Rs.5.0 Lacs in the form of Demand Draft in favour of Punjab National Bank, IT Division payable at New Delhi. EMD should be **enclosed in Technical Bid**.
9	Cost of RFP	Rs.5000/- in the form of Demand Draft in favour of Punjab National Bank, IT Division payable at New Delhi. The DD should be submitted **in person** at the time of bid submission
10	Contact to Bidders	Interested Bidders are requested to send the email to kmyadav@pnb.co.in or itdhw@pnb.co.in or akwahi@pnb.co.in containing following information , so that in case of any clarification, same may be issued to them Name of company, contact person, Mailing address with Pin Code, Telephone No., Fax No., email address, Mobile No. etc.

INTRODUCTION

1.1 Punjab National Bank has setup 17 MICR centres with image based facility.

1.2 The Bank now proposes to setup another MICR Center at **Sholapur** and to replace the complete solution (hardware & Software) at other three centres namely **Agra, Allahabad and Varanasi.** The projected volumes, which the image based centers would be likely to process everyday ranges from a minimum of 10,000 cheques to a maximum of 30000 cheques.

1.3 The broad configuration and Terms & Conditions for supply of the system are embodied in this document.

Scope of work

1.4 To procure, implement and maintain complete end to end MICR cheque processing solution for the MICR centres at **Sholapur, Agra, Allahabad and Varanasi**.

1.5 To provide maintenance services and technical support for hardware and software installed at these centres.

1.6 The cheque processing software must conform to the SRS document and Memorandum of Procedure for MICR processing, firmed up by Reserve Bank of India. The Bank may also indicate further customisation requirements, which the vendor would have to do, as part of the total solution.

SYSTEM DESCRIPTION AND REQUIREMENTS OF THE SOLUTION

2.1 Technological Standards:

The solution offered must be a total solution consisting of Hardware configuration and customised software incorporating different technology options available. Besides the main application, the systems must be capable of supporting other capabilities and provide scalability to absorb future expansion of processing capabilities, atleast to the extent of double the projected volume.

2.2 The processing needs vary across the centers depending upon transaction loads and spread of bank/branch network. However, the average present volume in terms of number of instruments per day is as under:

Sl. No	CENTER	AVERAGE PROJECTED VOLUME	NUMBER OF BANKS
1	Agra	15000	40
2	Allahabad	13000	38
3	Varanasi	13000	39
4	Sholapur	11000	40

The solution must be capable of processing the said volume in the time window of 5 Hours. For the purpose, requisite hardware (reader sorters etc.) should be capable to sort the instruments atleast at @ 300 DPM with minimum 20 pockets.

2.3 The document sorting throughput to be achieved will be determined by the number of final sort groups or endpoints that are required. The banks participating in the clearing at the center have been indicated above. The document processing equipment must be specified with appropriate number of pockets and the pocketing strategy to achieve the performance as specified in this document.

2.4 Work flow.

Annexure 1 gives the workflow of Cheque Processing application.

2.5 Throughput

A data processing cycle may be defined as a complete work cycle starting from initial data preparation, data & image capture, intermediate processing and final document processing including generation of all outputs and reports. Items B.2 to B.6 in Annexure 1 constitute a data processing cycle. It excludes activities like receipt, final packing & delivery. It also excludes other data preparatory work such as encoding, and control data preparation.

2.6 Imaging

The solution offered should be fully image capable. The front images and back images should be captured at the time of Prime Pass of the each instrument. It should be possible to do reject repair & Balancing with the help of these images and without the need to physically handle the rejected instruments. It should be possible to query any image and associated data online for a period of Twenty One working days and with the help of archived images/data on any past date. The vendor should have implemented a total solution with Front and Rear Imaging in India, atleast at two centres and is satisfactorily running during the last two years. The system should be upgradable to UV image system. Following images should be captured at the time of prime pass

i. Gray Scale Front Image of the instrument
ii. Black and White Front Image of the instrument
iii. Black and White Reverse Image of the instrument

Parameters to be adopted for the images:

Image Type	Minimum DPI Format	Compression
Front GreyScale	100 DPI JFIF	JPEG
Front Black & White	200 DPITIFF	CCITT G4
Reverse Black & White	200 DPITIFF	CCITT G4

Features

The solution offered must have the features listed below:

- The solution should not have any software limitation or any other limitation and should be able to process higher volumes under extra-ordinary circumstances, or due to projected increase in volumes.[like annual 10% increase in volume, increase due to extension of clearing zone, sudden increase in volume on working days after consecutive holidays etc.]
- The work processes must be highly automated with minimal manual intervention.
- They must have adequate procedures for data validation, data integrity and process controls across systems.
- They must be user friendly.
- The entire system should be editable.
- Hardware and software to be installed at the proposed MICR centre should be compatible with the RBI Cheque truncation project.
- Hardware and software installed at the proposed MICR centre should be capable to handle settlement of clearing / Recalculation of payment obligation in the event of a default by a member bank in meeting clearing liabilities (un-winding) and to process Speed Clearing.
- Migration of data & images from the existing system to new system, to meet the old data query requirements.

The entire workflow including backup, archival, restoration, old data query etc must be possible through the menus of the application software controlled as per the User permission.

FUNCTIONAL SPECIFICATIONS OF THE SOLUTION

3.1 Hardware

In general the following features will form the basis for evaluation of the system:

- Capacity to complete the data processing cycle within the specified time frame for the transaction volume mentioned under **"SYSTEM DESCRIPTION AND REQUIREMENTS OF THE SOLUTION'**.
- Expandability of the major components of the system such as processor, main memory, auxiliary storage, reader sorter machines, terminals, work stations, printers etc to take care of future needs.
- Reliability, fault tolerance, redundancy and high availability. There should be no single point of failure.
- LAN/WAN connectivity and support for standard communication protocols like X.25, TCP/IP over X.25, SLIP and PPP and ATM etc.
- Must have capability to interface & cluster with heterogeneous platforms.
- Ability to communicate through RBI network for the Banking & Financial Sector or any other communication channel provided by RBI.
- Backup devices like DAT,CD or any other backup system, etc
- Heavy-duty line printers.
- Format for specifying the hardware components are given in Annexure II. Full Technical specifications must be submitted.
- Full technical details of Document Processing machines alongwith attachments must be submitted. The number of devices offered must be capable of throughputs required to process documents as per data processing cycle indicated in Annexure 1.

3.2 Software

The system will be used for both on-line and batch processing. The system should have capability to run other applications. While broad guidelines are given in Annexure III, the main features are given below:

a) The operating system should support open systems standards and heterogeneous hardware connectivity. It should have features like multi-tasking, multi–user support, time-sharing, dynamic memory management, I/O spooling, multi-level security, system logging, error analysis and recovery. Other features like hardware diagnostic tools, system performance management and tuning, accounting routines and system monitoring software must be available. It should support RDBMS packages like ORACLE, SQL Server, INFORMIX, INGRESS, SYBASE, DB2 etc.

   The solution should be designed on **Windows/unix** platform.

b) Software requirements also include file management systems supporting various file structures along with utilities for their maintenance, language compilers, general utilities and program development tools, network and communication software, data entry software, accounting and access control (system security) software.

c) Cheque processing software solution must be a complete image based solution customised as per requirements of the Bank and conform to the SRS document & Memorandum of Procedure framed by Reserve Bank of India for MICR Cheque Processing. Solution should be using a RDBMS like ORACLE, SQL Server, INFORMIX, INGRESS, SYBASE, DB2 etc .The software should have a comprehensive accounting and analytical package for statistical requirements/MIS. Detailed specifications are given in Annexure III.

d) The Cheque Processing software must provide adequate security to the entire system. It should be possible to disable all users (except System Administrator) at close of day and enable/disable user through any time during the day. All changes in transactions/masters/users must be logged and Audit trail available for all such changes clearly giving the position prior to change and after change.

e) The future software updates and upgrades in terms of RBI directives are to be provided and implemented without any additional cost, if bank so desires.

3.3 Data Records

The data records used as input for MICR clearing application will be standard MICR record in E13B font.

Record/Field Layout

Field Description	**Length**	**Type**	**Remarks**
Scroll Number	10 digits	Numeric	Encoded
Serial Number	6 digits	Numeric	Preprinted
Sort Code	9 digits	Numeric	Preprinted
Account Number	6 or 7 digits	Numeric	Preprinted(optional)
Transaction Code	2 or 3 digits	Numeric	Preprinted
Amount	13 digits	Numeric	Encode

3.4 Documentation

All software products including system software must be comprehensively documented and all system and user manual must be supplied at the time of installation. A list of the manuals along with the number of copies to be supplied along with the equipment must be submitted.

3.5 Training

The vendor must undertake to provide comprehensive training to the personnel of the Bank to enable them to independently operate the system and the application software. Detailed training schedule should be submitted. Restrictions, if any, on number of people that will be trained and the duration should be mentioned.

3.6 Source Code

The source code of the software solution should be provided to the Bank. Conditions for supply of source code and restrictions, if any, on its use should be specified. All necessary documentation in this behalf should also be supplied. In case it is proposed to keep the source code under ESCROW, then complete details and the location and the terms and conditions applicable for ESCROW must be specified. Any update or upgrade be informed and brought under ESCROW.

3.7 Imaging of instruments

The images captured by the system should be clear and free of any distortions. The images & data captured by the system should be available on line for a period of at least 21 working days. Thereafter there should be provision to transfer the same to a backup media (DAT/LTO/DVD etc. The software/hardware should have the capability to locate and make available any images with associated data in print/display form either from the on-line data or from backup media by specifying any one or more combination of input parameters.

It should be possible to do On Line Reject Repair (OLRR), balancing etc with the help of images without the need to physically look at the corresponding instruments i.e the images should be available on the same screen while doing reject repair. It should have the usual features of Zoom; reverse video, rotation etc during reject repair as well in the archival. .

INSTRUCTIONS TO VENDORS

4.0 Acceptance/Rejection of offer:

4.1 The Bank reserves the right to reject any offer, in whole or in part without assigning any reason whatsoever. Offers containing ambiguous statements, incomplete or incorrect information is liable to be rejected. Information must be supplied as per formats specified in this document and should be specific.

4.2 Bidder must base their offers conforming in all respects to the specifications, terms & conditions of this RFP. In order to be considered responsive, Vendor's offer must specifically include the following signed statements by a senior official having the Power of Attorney.

We certify that our offer complies with all requirements and specifications except the following ***(list exceptions: if none state NONE)*** ***We certify that all information furnished in our offer along with enclosures is correct and verified. We agree that any false information or exaggerated information will disqualify us from further consideration.*** ***The terms and conditions are acceptable to us and we hereby give our unqualified acceptance to the same.***

4.3 Submission of the offer document

4.3.1 All the interested bidders should register themselves in the e procurement system http://www.pnb.org.in for submitting the bids online

4.3.2 The bidders shall duly complete the formats of Bid and the same should be submitted online through our e-Procurement System using their Digital Signature at website http://www.pnb.org.in

4.4 All the supporting documents should be submitted manually before the final date & time of bid submission at the following address.

The Asstt. General Manager
Punjab National Bank,
Hardware Procurement Section,
I.T. Division, HO: 5 Sansad Marg,
New Delhi 110 001

4.5 Contents of Offer

All Offers must contain the following:

4.5.1 Bidder's price for each item of Hardware/software as per annexure IV.

4.5.2 All documentation and literature relating to the system including catalog and data describing all major components of the system. Detailed literature on the software along with process flow charts as per SRS document and memorandum of procedure for MICR processing, framed by Reserve Bank of India, wherever applicable.

4.5.3 The offer must include all taxes upto the time of Acceptance (except Octroi/Entry-Tax, which shall be paid on actual). Any other amounts, by whatever name it may be called shall not be paid extra.

4.5.4 Compliance statement accepting all requirements and specifications as per clause 4.2

4.5.5 Supporting documents in respect of minimum qualification criteria.

4.5.6 Earnest money deposit amounting to ` 5,00,000/- [Rupees five lakh only] in form of demand draft favouring Punjab National Bank, I.T. Division, Head Office New Delhi, payable at New Delhi.

4.5.7 Bidder information as per Annexure V.

4.5.8 Letter of undertaking as per Annexure VI.

4.6 Documentation to prove that the vendor has supplied similar solution with Front and Rear Imaging, to atleast in two MICR Centers operating in India and is satisfactorily running within the last two years. Names and addresses of the reference sites where solution same as that offered now, is functional along with contact person's name should be supplied. The bank may have the references checked.

4.7 Description of Vendor's manufacturers facilities, testing capabilities , quality control and support capabilities

4.8 Environmental specifications: Physical/Environmental/Electrical. Details should include the floor space required for the equipment and smooth operations. Requirements like air conditioning, temperature, humidity, power supply etc have to be specified.

4.9 Future upgrade possibilities and the next upgradeable model's feature including software versions under development.

4.10 Published benchmark results of the equipment and cheque processing software.

4.11 General

4.11.1 All correspondence instruction booklet, bills drawings etc, hardware and software operational manuals shall be in English or Hindi languages only

4.11.2 Hardware/Software products must be of proven international standard and the latest at the time of offer. However, the latest version of the software will have to be supplied at the time of delivery. The necessary details about Standard/Release Number/Version Number also must be mentioned along with supporting documents, wherever necessary.

4.11.3 The vendor will provide details of sub-contracted and third party hardware and software, included in the solution offered. The vendor will fully guarantee satisfactory performance of hardware and software and will be totally responsible for the same.

4.12 Price Information

The price offered by the vendor should be firm and not subject to escalation, within the validity period specified for any reason whatsoever. **All prices would be in Indian Rupees only.** However benefits arising from the fall in international market prices, taxes, duties etc or otherwise should be passed on to the Bank on mutually agreed terms.

4.13 Validity Period

All prices, technical specifications and other terms and conditions proposed by the vendors should be valid for twelve months from the date of bid document.

4.14 Training

The vendor shall be responsible for providing the onsite training to the staff working at the MICR Centre to the satisfaction of the incumbent incharge.

4.15 Inspection

Equipment and material covered by this enquiry are subject to inspection by the Bank's or by its authorised representatives.

4.16 Bench marking

Benchmarking may be done as per direction and supervision by the Bank Official or its representatives on the configuration covered by this offer. The throughputs indicated in the document will form the basis for the benchmarking.

4.17 Bidding document

The bidder is expected to examine all instructions, forms, terms and conditions and technical specifications in the bidding document. Submission of a bid not responsive to the bidding document in every respect will be at the bidder's risk and may result in the rejection of its bid without any further reference to the bidder.

4.18 Amendment to bidding document

At any time prior to the last date and time for submission of bids, the bank may, for any reason, modify the bidding document by amendments at the sole discretion of the bank. All amendments will be either uploaded in the website or shall be delivered by hand/post/courier or through e-mail or faxed to all prospective bidders, who have received the bidding document and will be binding on them. For this purpose bidders must provide name of the contact person, mailing address, telephone number and FAX numbers on the covering letter sent along with the bids.

In order to provide, prospective bidders, reasonable time to take the amendment if any, into account in preparing their bid, the purchaser may, at its discretion, extend the deadline for submission of bids.

4.19 **Bidding Process [two stages]**

For the purpose of the present job, a two stage bidding process will be followed. The response to the present will be submitted in two parts:

- Technical bid Part I
- Commercial bid Part II

The bidder will have to submit the technical bid and commercial portion of the bid separately in two separate sealed envelopes superscribing 'technical bid' or 'commercial bid' as the case may be.

TECHNICAL BID will not contain any pricing or commercial information.

The bid shall be typed or written in indelible ink and shall be signed by the Bidder or a person duly authorized by him. The authorization shall be indicated by a written power of attorney accompanying the Bid. All pages of the Bid shall be initialed by the person(s) signing the Bid.

The Bid shall contain no interlineations, erasures or overwriting except as necessary to correct errors made by the Bidder, in which case corrections shall be initialed by the person(s) signing the Bid.

4.20. Last date and time for submission of bids.

Bids must be received by the Purchaser at the address specified in the Bid Document not later than the specified date and time as specified in the Bid Document or as extended by the purchaser as per clause 5. In the event of the specified date of submission of bids being declared a holiday for the Purchaser, the bids will be received up to the appointed time on next working day.

4.21 Late bids

Any bid received by the Purchaser after the deadline for submission of bids will be rejected and/or returned unopened to the Bidder, if so desired by him.

4.22 Modification and /or withdrawal of bids

- Bids once submitted will be treated, as final and no further correspondence will be entertained on this.
- No bid will be modified after the deadline for submission of bids.
- No bidder shall be allowed to withdraw the bid, if the bidder happens to be a successful bidder.

4.23 Bid opening and evaluation

The Bank will open the technical bids, in the presence of Bidders representative who choose to attend, at the time and date mentioned in Bid document at the address mentioned at clause-9 titled "Submission of Bids".

The bidders or their representatives who are present shall sign register evidencing their attendance. In the event of the specified date of bid opening being declared a holiday for purchaser, the bids shall be opened at the appointed time and place on next working day.

In the first stage, only TECHNICAL BID will be opened and evaluated. Bidders satisfying the technical requirements as determined by the purchaser and accepting the terms and conditions of this document shall be short-listed. In the second stage, the COMMERCIAL BID of short-listed bidders will be opened. Purchaser reserve right to accept or reject any technology proposed by the bidder without assigning any reason thereof. Decision of the purchaser in this regard shall be final and binding on the bidders.

Commercial bids of those bidders whose technical bids are found suitable by the purchaser shall only be opened.

4.24 Clarification of bids

To assist in the examination, evaluation and comparison of bids the purchaser may, at its discretion, ask the bidder for clarification and response shall be in writing and no change in the price or substance of the bid shall be sought, offered or permitted.

4.25 Preliminary examination

The Bank will examine the bids to determine whether they are complete, whether any computational errors have been made, whether required information has been provided as underlined in the bid document, whether the documents have been properly signed, and whether bids are generally in order.

The bid determined as not in order as per the specifications will be rejected by the purchaser.

4.26 Contacting the Bank

Any effort by bidder to influence the Bank in the purchaser's bid evaluation, bid comparison or contract award decision may result in the rejection of the Bidders' bid. Bank's decision will be final and without prejudice and will be binding on all parties.

4.27 Purchaser's right to accept or reject any bid or all bids.

The Bank reserves the right to accept or reject any bid and annul the bidding process and reject all bids at any time prior to award of contract, without thereby incurring any liability to the affected bidder or bidders or any obligation to inform the affected bidder or bidders of the ground for the purchaser's action.

4.28 Signing of contract

The successful bidder(s) to be called as vendor, shall be required to enter into a Service level Agreement (SLA) with PNB, within 15 days of the award of the tender or within such extended period as may be specified by the purchaser.

4.29 Total cost of ownership will be calculated as under.

1. Total cost of hardware.
2. Total cost of software [application/operating system/ database].

3 Cost of implementation
4 Cost of AMC for six years.

Above cost shall be added together for each vendor shortlisted after technical evaluation. The vendors having lowest figure shall be treated as L 1 and called for further negotiations.

4.30 Patent Rights

The supplier shall indemnify the Bank against all third party claims of infringement of intellectual property rights including trademark, patent, copyright or industrial design rights arising from use of the products or any part thereof in India or abroad.

The Supplier shall grant to the bank a fully paid-up, irrevocable, non-exclusive license throughout the territory of India or abroad to access, replicate and use software [and other software items] provided by the supplier, including all inventions, designs marks embodied therein perpetuity.

TERMS AND CONDITIONS OF THE OFFER

5.1 Submission of the bidder information as per annexure v

5.1.1 Vendors Offer, complete in all respect must be submitted in a sealed cover addressed to

Asstt. General Manager
Punjab National Bank
Information Technology Division,
Hardware Procurement Section,
HO: 5 Sansad Marg,
New Delhi 110 001

5.1.2 All offers have to be sealed.

5.1.3 Technical & Commercial details of the offer shall be submitted at the same time in separate covers superscribed “Technical” or “Commercial” as the case may be.

5.1.4 All Offers received after the specified opening date and time (including extensions, if any) will not be considered.

5.1.5 The foregoing terms and conditions should be accepted by the vendor without any qualifying remarks/variations. An undertaking to this effect has to be given at the time of submission of offer.

5.2 Agreement

The selected vendor will enter into a purchase agreement with the Bank. The Bank shall provide the draft of agreement.

5.3 TAXES

The prices are inclusive of all charges, Taxes, Statuary levies etc. except Sales Tax/VAT, Octroi/Entry Tax which will be paid on actual basis. The Excise/Custom duty will however have to be mentioned separately in the invoice and the bank may set off the applicable Excise/Customs duty against the Duty Free Scrip for which bank is eligible under chapter 3 of Foreign Trade Policy.

5.4 The offer to be a complete solution

The vendor would have to undertake that the cheque processing solution offered by him would be a complete solution which will enable completion of the full cycle of cheque processing activity of a volume between 10,000 and 30,000 instruments within the specified time window of 5 hours with sort upto Banks and theirs branches**.** The vendor would have to rectify any insufficiency / inadequacies in the cheque processing solution at his own cost and within the specified time schedule. Non acceptance of the system by the Bank and any resultant cost under these circumstances for replacing the system will be borne by the vendor. The rate of rejection of reading of the data on the MICR band by the reader sorters should not be more than 3% of the total instruments processed on any day.

5.5 No third party contract by PNB

PNB shall deal with the vendor only and any third party contract made by the vendor and the terms and conditions associated therewith will not be binding on PNB.

5.6 Certificates

The vendor will furnish the certificates regarding the authorisation by the proprietor/ Manufacturer of the system enabling it to supply the same for use in India for verification and record. The vendor will also furnish the certificates of genuineness relating to various components of the system for verification and record. The vendor will indemnify the buyer against any damages arising out of any infringement of the copyright act or any other act or legal provision in force in relation to the supply/use of the system. The vendor will take care of all import/customs formalities.

5.7 Consideration Amount / Taxes and Dues

The Consideration Amount shall be firm and no escalation shall be permitted to any change in foreign exchange rates, excise/ customs duty, freight charges, taxes or levies or any other similar taxes/ duties except Octroi and / or entry tax which is payable on actual on production of bills. The Consideration Amount shall be inclusive of freight, Intransit insurance, technical service charges, installation charges, Customization charges, training charges, cost of manuals documents and all taxes and levies other than Octroi and / or entry tax.

5.8 Period of Validity of the prices quoted

The price quoted by the vendors should remain valid for twelve months from the date of bid document.

5.9 Terms of Payment

The payments towards the amount of the system will be released as under:

A - On installation	70% of the consideration amount of the system on delivery and installation of the hardware. However, in case of delay in site preparation, the payment would be made after 45 days of delivery.
B– After Acceptance Test to the complete Satisfaction of the Bank	30% of the consideration amount of the system after satisfactory completion of the Acceptance test, at its own discretion, against a 'Bank Guarantee' for the amount paid by the Bank valid for *seven* year (one + six) from the date of acceptance.

5.10 Delivery Schedule

The delivery of the system should be completed within 12 weeks from the date of purchase order. The installation of the system should be completed within 2 weeks from the date of delivery. The final acceptance of the system should be completed in all respects within a period of 1 week from the date of installation. Delay in delivery, installation or defaults in completion of Acceptance or any part of the obligation will attract liquidated damages (without prejudice to the buyer's right to resort to any other remedies) as under:

- Penalty on account of delay/default in delivery @ 1/% of the total cost of the system for each week or part thereof of the delay subject to a maximum of 10% of the cost of the system.
- Penalty on account of delay/default in installation @ 1/% of the total cost of the system for each week or part thereof of the delay subject to a maximum of 5% of the cost of the system
- Penalty on account of delay/default in acceptance @ 1% of the total cost of the system for each week or part thereof of the delay subject to a maximum of 5% of the cost of the system.

5.11 **Pre Delivery Testing**:

The Bank reserves the right to test the Equipment prior to delivery in accordance with established standard procedures to ensure that the equipment satisfies the equipment specifications. The vendor shall provide the Bank with a certification that the equipment has been so tested, along with certificates of genuineness relating to the various components of the equipment.

The Bank may get the system inspected by its authorized official(s) before shipment of the same at bank's cost. If the visit for pre-shipment inspection by the authorized representative(s) of the Bank proves infructuous and/or does not serve the purpose, due to the fault of vendor then any subsequent visit(s) to be undertaken by the representative(s) for the purpose of pre-shipment inspection of the system will have to be arranged by the vendor within reasonable period of time, keeping in view the delivery schedule for the system and any expenditure to be incurred in this connection shall be borne by the vendor.

5.12 Insurance

The vendor will enter into comprehensive insurance cover in respect of all equipments, components and software from the date of shipment till the date of release of payment upto 70% relating to delivery/installation. Certificates of the 'Comprehensive Insurance Cover' will be furnished to the Bank for verification, examination and record.

5.13 Training

The vendor shall provide the training free of charges in all functional areas and such training should be of sufficient duration. Training shall synchronize with the phased implementation plan and in any case be completed before the start of live operations. Training shall be imparted at site or at other location as per mutual agreement. In any case, on site training must be provided and the training will be an ongoing process until the satisfactory completion of the Acceptance Test. The training shall be conducted and training material provided, by expert faculty of / arranged by the vendor. Training should cover System Administration, Maintenance Training, Development Training, Operator Training etc.

5.14 Transition Support

During the acceptance tests, the vendor shall provide at least two expert personnel on full time basis at the disposal of the Bank, apart from the personnel that is required to be engaged by the vendor for attending the regular work. The said expert personnel shall provide all transition support necessary to complete acceptance test, customization and put the System into operation.

5.15 Operational Environment/Site Preparation

The vendor shall provide layout, detailed specifications, working-drawings estimates & tenders required for site preparation including interiors/electrical, air conditioning equipment, Data Cabling, fire alarm system, generator, flooring, ceiling, humidity control, voltage stabilizers and/or UPS equipment. The vendor shall inform the specifications relating to UPS, Generators, and Powerload etc. The vendor shall supervise and certify the site preparation. The vendor shall also review the site preparation and environmental equipments during procurement and ensure that the same would be sufficient to ensure smooth working of the system, at no extra cost to the bank. The vendor shall provide the disaster recovery procedure of the System under the adverse conditions of power failure, voltage variations, frequency variations and any such other adverse circumstances. As the Bank may execute this project as a turn-key project, wherein the vendor will have to carry out the software and hardware installations along with the site preparation work. Alternatively, the Bank might decide to avail the consultation for site preparation, which should be provided by the vendor.

5.16 Upgradation of the System

In case Bank decides to upgrade the hardware/ software at any time, the vendor shall upgrade the same at reasonable prices comparable to similar items available in the market.

5.17 Warranty

The warranty of the system will be for a period of one year from the date of Acceptance. The Bank will decide the acceptance criteria. Further the vendor shall warrant that the System, the sale, delivery, and installation of the Equipment, and the license, modification and installation of the software will not infringe any industrial or intellectual property rights of any third person. The vendor shall fully indemnify and hold harmless the Bank against any actual or direct loss, amounts, expenses, demands or liability, arising directly out of a claim by a third party of the breach of this warranty relating to infringement of any industrial or intellectual property rights of any third person.

5.18 Annual Maintenance

Immediately after expiry of the warranty period, the vendor shall continue to

(a) Maintain and support the System for a minimum period of six years in respect of System, accessories, spares and services, including Software update and support Services,

(b) Maintain services on call and on-site stock of critical spares and Consumable,

(c) Make available on-call service of fully trained/ engineers/ experts in Hardware and software support, including customisation and

(d) The support will include atleast 8 hours availability of the site engineer at the MICR Center. The deputed engineer should be a qualified engineer (B Tech) with atleast one year post qualification experience. The engineer will be approved by the Incharge of concerned MICR Centre before the same is deputed at site.

The charges towards AMC will be maximum @ 8 % of the consideration amount of the system, which will remain constant. For the purpose of calculation of the charges towards AMC, the consideration amount of the system will mean the amount of hardware components and software packages constituting the system and no other amount. Amount of installation, training, manuals/ documentation will not be included in the consideration amount for computing of AMC.

The cost of installation, training, manuals/ documentation, transit-insurance etc will not be included in the consideration amount for computing of AMC.

The vendor will, ensure easy availability of imported components/ equipment, hardware, software, accessories, consumable and all other support continuously on an ongoing basis not only during the warranty period, but also thereafter at least for a period of seven years, after expiry of warranty.

During warranty and AMC, the vendor will ensure 99% uptime of the core configuration of the system and 95% uptime for the whole system worked out on quarterly basis. The core configuration should not be down for a continuous period of two hours. The Mean Time Between Failures (MTBF) on annual basis for core configuration should not be less than three months. The core configuration would mean one server, one document processor (Reader Sorter), one line printer and three terminals connected to each other and capable of running the application.

The AMC charges will be released in the beginning of every quarter in advance. The release of AMC charges for the subsequent quarter will not only depend upon satisfactory maintenance of the system during the previous quarter but will also be reduced to the extent of the penalty to be recovered towards the down time of the system during the quarter.

The vendor shall supply the consumables under AMC free of cost except paper, printer ribbon/cartridge and backup media such as tapes and floppies.

Warranty & AMC will cover site support for one 8 hours shifts. The engineer as per (d) above capable of providing Hardware/Software support will be provided onsite in the operational shift. Further the software/Hardware engineer's support will be available on demand at any other time, in case of any problem at no extra cost.

The vendor shall guarantee availability of all spare parts of the system to ensure agreed uptime. Adequate quantities of essential spares will be stored by vendor at the site. If any spare part is not available, the vendor will have to arrange for that spare part or any spare part of higher capacity without any problem of incompatibility with the system at no additional charges to the Bank.

The vendor will furnish a preventive maintenance schedule (indicating periodicity of preventive maintenance) and the list of the jobs to be carried out under preventive maintenance acceptable to the Bank. PMS on the Hardware must be done once in every month.

In case the vendor fails for any reason whatsoever, to maintain the equipments, to give 99% uptime of the core configuration of the system and 95% uptime for the whole system worked out on quarterly basis and MTBF more than 3 months, for a period of 7 years from the date of acceptance including the period of one year of free warranty and six years of AMC, the vendor will be liable to pay the damages to the Bank as determined by the Bank subject to maximum of 30 % of the consideration amount.

5.19 **Obsolescence**

The vendor will constantly keep informing the Bank on the new technologies (hardware systems and software) that could prove cost-effective and ensure that all new releases/ updates/ applications of the systems software are advised to the Bank from time to time.

5.20 RETURN OF EMD

EMD money of unsuccessful bidders shall be returned (without any interest on it) on completion of tender process whereas EMD of the successful bidder shall be returned (without any interest on it) on submission of Bank Guarantee as per clause 5.9 (B).

Annexure I

Cheque Processing work flow

A. At the presenting Bank's Service Branch :

1. Cheques for presentation received from branches as outward lots.
2. Encoding of amount (and scroll Number – optional) and preparation of fully proved batches with encoded control documents containing presenting bank/branch and control amount details. Present the consolidated bank outward cheques to the clearing house/cheque processing center.

B. At the MICR Cheque Processing Center :

1. Receive the cheque/data from the presenting banks and prepare the documents/data for processing.
2. Capture data and images and sort the documents in the Reader-Sorters.
3. Generate the following files :
   - i. Cleanly or fully captured data.
   - ii. Rejected items file
4. Reject processing procedure
   - i. Correct rejected data with the help of images through on-line data entry.
5. Balancing and adjustments.
   - i. Generate balancing reports according to batch/block tickets
   - ii. Merge all data and prepare final processing files
   - iii. Generate exception listings for rejected items.
6. Fine Sort/ reports
   - i. Sort documents into inward bank/branch lots. Optionally sort the documents as per specified sort options such as transaction codes, account codes etc within bank/branch.
   - ii. Generate and print all reports.
   - iii. Sort reject documents into drawee bank/branch lots.
   - iv. Prepare inward/outward bank-wise files and transfer to floppy/media or network.
   - v. Generate settlement registers/vouchers and files for transmission to inter-bank current account ledgers.

8. Final packing/delivery to inward banks.

C. At the drawee Service Branch

1. Receive Cheque/reports from the clearinghouse/MICR Center.
2. Distribute documents/inward listings to branches
3. Prepare inter-branch accounts i.e credit outward presentations and debit for inward receipts.

D. Settlement in the bank maintaining inter-bank Current Account

The settlement vouchers containing net settlement figures for all banks (Credit/Debit) are posted in the respective banks accounts for each clearing.

E. Return Processing

1. Drawee service branch consolidates all unpaid return cheques from its branches and prepares claims either on paper or on media on MICR format depending upon the procedures for delivery to the clearing house.
2. The instruments are physically exchanged and delivered to presenting banks or sorted into presenting banks lots.
3. Settlement figures and vouchers are generated and posted in the Current Account of each member bank.
4. Presenting Service branch receives the unpaid cheques and distributes them to its branches. The inter-branch debits/credits are raised on account of these unpaid cheques received from/returned to other member banks.

Annexure II

Hardware Specifications

The vendor must submit item wise hardware specifications of the system offered. It must be ensured that the there are no single point of failure in the entire system.

Item	Configuration	No of Units (per site)	Description **(Make, model and specs to be filled by the vendor)**
Workstations (Computers)	Intel® Core™ i5-2400 Processors (3.1GHz, 6MB Cache) or higher. 2x1GB DDR3-1333 RAM upgradeable up to 8 GB or more. 500GB or higher SATA HDD. DVD RW Drive, Windows 7 Professional. 18.5" TFT OEM color monitor asset controlled/ Energy Star 5.0 /TCO 05 or higher	6	
Servers	6-Core Processor: Xeon E7-4807 (18M cache, 6 Cores, 1.86 GHz(95W) 4.80GT/sec Intel ® QPI). 16 GB DDR3 (4x4 GB) ECC with minimum 75% memory slots spare and interleaving capability with balanced configurations. 16 MB or higher V SDRAM-dedicated3X 300GB 10k or higher SAS hot-plug HDD or better, Disk bays capacity for eight SAS hot pluggable SAS drives or greater. Integrated SAS-RAID Controller should be provided. The RAID controller with 512MB BB cache and should support RAID 0, 1, 1+0, 5. 18.5" TFT OEM color monitor asset controlled/ Energy Star 5.0 /TCO 05 or higher. The Servers should be Rack Mounted and the related Rack be provided by the Vendor.	2	
Reader Sorters	Min. 300DPM (16 Sort Pockets, Dual MICR Reader, Rear graphic endorser, Bi-Tonal Front & Back image Cameras (Black & White) CTS compliant	2	
Joggers	4 Bin cheque Jogger with stand	2	

Line Printer	Min 1000 LPM	2	
Laser Printer	Speed-Up to 33 ppm in A4 Resolution – up to 1,200x1,200 dpi Memory / storage – 64 MB	2	
Storage system	Network Attached Storage (NAS) system capable of keeping Images and data with usage storage capacity of 1 TB SAS and 5 TB SATA storage systems. The system should be rack mounted with dual controller and dual power supply.	1	

- Size/Capacity may be indicated as offered
- Description should highlight the product specification in brief
- Make & Model Number must be mentioned for all hardware units
- A block diagram showing the connectivity of different hardware components should be submitted

Annexure III

Software Specifications

1. Operating System

Should be internationally proven operating system with following desirable features:

- Multiprogramming, Multitasking and Multiprocessing
- Multi-level Security
- Error Checking and recovery
- Open System compliant
- Support for RDBMS like ORACLE. SYBASE, INFORMIX etc
- High Availability software
- Performance measurement and tuning tools
- On line diagnostic tools
- Disaster recovery features
- Data compression software.
- Support for X.25, TCP/IP over X.25, PPP and SLIP and NFS, ATM,X.400 etc
- Number of user limits for both operating system & compilers must be mentioned.

2. General Software and Utilities

- Standard file Management & maintenance utilities
- Compilers and program development tools
- Sort/Merge Utilities
- File & Media conversion
- Backup & archival software
- ASCII/EBCIDIC-ASCII converters
- Terminal Emulation Software
- Disk Maintenance utilities
- Data encryption
- Antivirus software

3. Cheque Processing Software

The Cheque processing software must confirm to the SRS document of RBI for MICR Cheque Processing. In addition the Bank may indicate further customisation requirements.

It must have the following major features:

Must be parameter driven for changing sort patterns, pocket allocation, bank code definitions etc.

It should be possible to pass parameters on line.

Inter-system connectivity with remote processing possibilities.

The record layout has been given under ‘FUNCTIONAL SPECIFICATIONS OF THE SOLUTION’.

The software should be capable of processing multiple cycles in the same day (i.e several simultaneous runs using different sort arguments) the total number of processing cycles possible must be specified.

Please attach a flow chart explaining the processing.

Software should be capable of allowing both production and test runs simultaneously

The details of all files used must be given.

The process flow must include:

i. Data capture should include various configurable options like pocket allocation by all fields and sub fields like city, bank, branch.
ii. Programmable endorser and item sequencing features must be available for optional use.
iii. The tasks should be menu driven preferably with windows type of environment.
iv. Supervisory tasks should be tightly controlled with suitable security features.
v. Each task must have restart and recovery capabilities.
vi. Emphasis should be on concurrent running of tasks to ensure timely completion of operations.
vii. On-line balancing features.
viii. It should be possible to do OLRR & balancing with the help of images without the need to physically handle the instruments.
ix. It should be possible to do Amount Keying in of unencoded instruments with the help of images without the need to physically handle the instruments.
x. Concurrent report generation and file distribution in magnetic media or through network.
xi. Configurable fine sort options like bank/branch/transaction codes.
xii. The entire work flow must be menu driven and there should not be any need to use the super user (root) password for any activity including backup, restore etc.
xiii. It should be possible to disable all users (except SA) at the close of day and individually enable user at start of day.
xiv. All activities including updation during OLRR, Balancing and changes in masters must be logged in audit trail clearly depicting the details of record prior to change and after change with user-id .
xv. A module to query archived images /data by specifying various fields. Facility to print/display.

Software should include a statistical and analytical packages giving reports like field specific reject analysis. Monthly/quarterly charges reports and commulative clearing statistics on weekly, monthly or annual basis.

On line query of archived database.

Further, the data in a flat file along with the data structure be provided.

File transfer on floppy magnetic media or through network should be available.

Receipt/Acknowledgment software for documents and a facility to correlate this data with balanced figures.

Separate returns/unpaid cheques processing solution under MICR.

Software should have adequate controls to ensure data validity, data integrity and consistency.

It must have processing controls across various processes of the processing cycle.

It should have facility for generating different types of audit trails as may be required such as accounting audit trails/efficiency audit trails etc. Facility for tracing/tracking single or group of entities, user etc.

Facility to query audit trail as per auditors' requirements.

Run time or development must be specified where applicable.

4. Integrated Reporting Services and Tools

The Integrated reporting platform must have the following capabilities:-

- The solution should Support connection to remote and non-relational data sources
- The solution should support key extensions such as DHTML, Excel, PDF, Word and Image rendering extensions ; MHTML, CSV, XML, and Null rendering extensions ; E-mail and file share delivery extensions ; Custom data processing, delivery, and rendering extensions; Custom authentication extensions
- It should support Report caching, Report history and report Scheduling
- It should support ad-hoc reporting
- The Reporting solution should support Report server scale-out deployment
- It should support Visualization tools such as maps, gauges, and charts
- The Reporting Solution should support drilling-down on data displayed in reports/dashboards/scorecards to automatically show the detail comprising that data
- The Reporting solution should help click-through of the data in a scorecard or report to other linked/related reports in the system
- It should support ability to perform predictive analytics against scorecard data and generate predictions for the KPIs contained in the scorecards

- It should support general data navigation capabilities which include: Multidimensional slice-and-dice, drill down/up, cross-drill, data sort and filter, expand/collapse, show/hide, root-cause analysis and Web client for ad-hoc query and analysis
- It should support publishing of reports to both: A portal/shared drive and then schedule automated delivery of these reports to a pre-defined audience and an intranet browser where the audience access reports directly
- It should support user's access to generate, create, change and read the reports, scorecards, dashboards and queries in the system. It should be defined and restricted based on each user's roles and responsibilities
- It should support Automated and secure log and audit trail of reports run, reports accessed, and reports changed etc. E.g. User and Date and Time of change
- The solution should support calculations/computations within reports
- The solution should provide provision for Report server in scale-out deployment

Note : Version number of all software must be given.

Annexure IV

PRICE INFORMATION

Format for submission of Commercial Bids in Rupees for EACH CENTER

TO BE ENCLOSED IN SEPARATE COVER MARKED "COMMERCIAL OFFER"

A. System Server

Sr No	Hardware Components	No of Units	Unit Cost	Total Cost

B. **Network Hardware including cabling**

Sr No		No of Units	Unit Cost	Total Cost

C. Imaging System (Transport controllers etc)

Sr No	Hardware components	No of Units	Unit Cost	Total Cost

D. Work Station & Printers

Serial no.	Hardware components	No of Units	Unit Cost	Total Cost

E Document Processor System (Reader Sorters, Jogger for each reader sorter etc)

Sr No	Hardware components	No of Units	Unit Cost	Total Cost

F Software

Sr No	Software Components	No of Units	Unit Cost	Total Cost

G AMC

Sr No	Rate of AMC Charges after warranty period	Cost of Hardware and Software	AMC Charges for one year	Total AMC Charges for 6 years

H. Others [both hardware and software]

Sr No	Hardware & software components	No of Units	Unit Cost	Total Cost
1	Technical service charges, if not, included elsewhere in the cost of system[please specify component-wise breakup and nature-/ type of the service]			
2	Installation charges			
3	Manuals, documentation etc.[if not included elsewhere]]			
4	Any other cost			

I. Summary of price information

Price Information	
A System server	
B Network Hardware	
C Imaging system	
D Workstation & printers	
E Document Processor system	
F Software	
G.AMC for 6 years	
H Others (both hardware & software	
GRAND TOTAL (For each Center)	

J. Buy Back-Cost of Old Hardware

Sr No	**Item**	**Total Cost (for two reader sorters)**
1	Existing Old reader Sorters (2) already installed at MICR Centres Agra, Allahabad and Varanasi.	

L-1 will be decided on the basis netting of buy back price of the old reader sorters for the locations at Agra, Allahabad, and Varanasi and without buy-back at new Centre Sholapur.

Signature and Seal of Bidder

ANNEXURE V

Letter to be submitted by bidder along with bid documents

To

Asstt. General Manager
Hardware Procurement Section
Information Technology Division
Punjab National Bank
Head Office, 5 Sansad Marg
New Delhi – 110 001

Sir

Reg: Our bid for supply of cheque processing systems for MICR centres

We submit our Bid Document herewith.

If our Bid for the above job is accepted, we undertake to enter into and execute at our cost, when called upon by the purchaser to do so, a contract in the form provided by the bank. Unless and until a formal contract is prepared and executed, this bid together with your written acceptance thereof shall constitute a binding contract between us.

We understand that if our Bid is accepted, we are to be jointly and severally responsible for the due performance of the contract.

We understand that you are not bound to accept the lowest or any bid received by you, and you may reject all or any bid; you may accept or entrust the entire work to one vendor or divide the work to more than one vendor without assigning any reason or giving any explanation whatsoever.

We understand that the names of short listed bidders after the completion of first stage (Technical Bid) and the name of the successful bidder to whom the contract is finally awarded after the completion of the second stage (Commercial Bid), shall be communicated to the bidders either over phone/e-mail/letter.

Dated at ______ / ______ day of _______ 20_.

Yours faithfully,

For ________________________

Signature __________________

Name ______________________

Address ____________________
____

(Authorised Signatory)

Annexure- VI

Bidder Information

Please provide following information about the Company (Attach separate sheet if required): -

<table>
<tr><th>S. No.</th><th>Information</th><th colspan="3">Particulars / Response</th></tr>
<tr><td>1.</td><td>Company Name</td><td colspan="3"></td></tr>
<tr><td>2.</td><td>Date of Incorporation</td><td colspan="3"></td></tr>
<tr><td>3.</td><td>Company Head Office / Registered Office and Addresses
Contact Person(s)
Phone
Fax
E-mail
Website</td><td colspan="3"></td></tr>
<tr><td rowspan="2">4.</td><td rowspan="2">Provide the range of services /options offered by you covering service description and different schemes available for:
▪ Customization
▪ Implementation Support
▪ Warranty
▪ Post-implementation
▪ Ongoing Support for: -
o AMC
o Helpdesk
o Training
o Documentation
o Others (specify)</td><td colspan="3">Yes / No / Comments (if option is ‘No’)</td></tr>
<tr><td colspan="3"></td></tr>
<tr><td rowspan="2">5.</td><td rowspan="2">Any pending or past litigation (within three years)? If yes please give details

Also mention the details of claims and complaints received in the last three years (About the Company / Software that are sold / licensed by the company).</td><td colspan="3">Yes/No/Comments (if option is ‘Yes’)</td></tr>
<tr><td colspan="3"></td></tr>
<tr><td rowspan="4">6.</td><td rowspan="4">Please mention turnover for last three years and Profit/Loss figures. Enclose the copies of Balance Sheet in support.(Amount in lacs)</td><td>Year</td><td>Turnover</td><td>Profit/Loss(-)</td></tr>
<tr><td>2008-09</td><td></td><td></td></tr>
<tr><td>2009-10</td><td></td><td></td></tr>
<tr><td>2010-11</td><td></td><td></td></tr>
</table>

Signature and Seal of Bidder

Annexure VII

Prequalification criteria

S No	Eligibility Criteria	Compliance (Yes/No)	Remarks, if any
1	Bidder should have supplied similar solution with front and rear imaging, to at least two MICR Centers operating in India and is satisfactorily running during last two years. Names and addresses of the reference sites where similar solution is operational, should be provided to the bank. Bank reserves the right to verify the references provided by the bidder.		
2	Bidder should be the original equipment manufacturer or their authorized representative in India. An authorization letter from original manufacturer should be provided along with the bid.		
3	Turnover of the bidding company must exceed Rs.10 crores at least in the two financial years out of the last three financial years commencing from the financial year 2008-09.		
4	The company should have earned net profits in at least two years out of the last three financial years commencing from the financial year 2008-09.		
5	The bidder should be able to provide technical support infrastructure in all four cities where PNB is proposing to set up MICR Centre/to replace the existing solution.		

Signature and Seal of Bidder

ANNEXURE VIII

Compliance statement

DECLARATION

All Terms and Conditions including scope of work except technical specifications

We hereby undertake and agree to abide by all the terms and conditions stipulated by the Bank in this RFP including all addendum, corrigendum etc. Any deviation may result in disqualification of bids.

Signature and Seal of Bidder

Technical Specification

We certify that the systems/services offered by us for tender conform to the specifications stipulated by you with the following deviations

List of deviations

1) ____

2) ____

3) ____

4) ____

(If left blank it will be construed that there is no deviation from the specifications given above)

Signature and Seal of Bidder

ANNEXURE IX

PROFORMA FOR PERFORMANCE STATEMENT FOR A PERIOD OF LAST 2 YEARS

NAME OF BID

NAME OF FIRM

Order Placed by (Full Address of Purchaser)	Order No. and Date	Description and Quantity of ordered Equipment	Value of Order	Date of Completion		Remark (reason for late delivery)	Performance of equipment (Attach certificate from customer)
				As per contract	Actual		

Signature and Seal of Bidder