# Setting up a Procurement Observatory (at Indian Institute of Management, Lucknow) in the state of Uttar Pradesh (U.P.), India

Report on observations, lessons learnt and recommendations

Submitted to:

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# **Public Procurement Observatory for the State of Uttar Pradesh**

(A World Bank Funded Observatory based at the Indian Institute of Management, Lucknow)



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## Introduction

India is emerging as the third largest economy in the world. Government procurement represents a significant portion of its spending and is a key determinant of budget execution outturns. It also makes significant impacts on the quality of public service delivery. Adequate funding for procurement by various state government departments is necessary but may not be sufficient to guarantee desired outcomes. Additional funds (from Central Government or external sources) to relieve the effects of economic downturns, or other events such as the global financial crisis or natural disasters, are therefore also at high risk of remaining unspent during the period when they are most needed.

So, there exists reasonable scope to improve procurement practices by process improvements and leveraging Information & Communications Technologies (ICT). For example, the Govt of Uttar Pradesh has planned to spend INR 1,678,922 Million on revenue expenditure and INR 533,090 Million on capital expenditures in 2013-14 (Source: Govt of Uttar Pradesh Budget 2013-14). A saving of 10% in total procurement can more or less wipe off the revenue deficit of INR 240,000 Million.

Though World Bank's engagement in India is amounting to US\$24 Billion, only very few of these funds reach some states in India and DEA has been urging the Bank to engage more in these lagging states to provide the necessary support for efficient service delivery. Further, significant portions of GOI's own funds made available under centrally sponsored schemes are underutilized or used inefficiently due to limited implementation capacity of some of the weaker states. Among Indian states, Uttar Pradesh (UP) is critical for India's plans as it is the most populous state as well as a very dominant state in national politics. UP is also one of the World Bank's focus states in India, and has received wide-ranging support comprising analytical work, technical assistance, investment lending and adjustment lending. In context of public procurement practices and outcomes, it is among the lagging states with limited implementation capacity.

To monitor procurement and supply chain practices in the state of Uttar Pradesh, the World Bank established a procurement observatory at the Indian Institute of Management, Lucknow in July 2013. This observatory seeks to advocate better procurement practices in the state by working on following three objectives:

- Collection and analysis of procurement related data in the state includeing development of procurement performance indicators.
- Monitoring the procurement policies, rules etc. and actual implementation of the same in the state.
- Sharing the findings with the U.P. Government and other stakeholders through website, workshops, seminars, webinars and other means.

To achieve the above objectives, the observatory pursued monitoring and capacity building activities in the state of Uttar Pradesh. The analysis was primarily based on secondary sources of data available in public domain, though data/information collection through meetings. The observatory also carried out formal and informal discussions and information-sharing with decision-making/ policy-making officials of the state. The

Observatory also shared the best global practices (from other states in India and countries abroad) in procurement cycle management with the UP Government through workshop, seminars and other means. All these helped it in advocating possible process improvements and leveraging ICT (Electronic Fund Transfer, e-tendering, m-procurement, e-procurement, etc.) for state-of-the-art effective procurement management.

The observatory identified 12 Key Performance Indicators (KPIs) to monitor tendering process performance in the state of Uttar Pradesh. Main reference documents to arrive at these KPIs on process efficiency, economy and transparency; fair and equitable treatment of bidders and promotion of competition are based on August 2013 Report of the Observatory and the following sources:

General Financial Regulations (GFR) 2005 of Govt of India U.P. Financial Handbook (Vol. 5 and 6: Public Work Account Rules) Central Vigilance Commission (CVC) Guidelines on public procurement

# **Objectives of Public Procurement**

Article 299 of the Constitution of India lays a basic foundation for public procurement. Rule 137 of GFR 2005 states fundamental principles of public buying wherein every authority delegated with the financial powers of procuring goods in public interest shall have the responsibility and accountability to bring:

- 1. Efficiency, economy, transparency
- 2. Fair and equitable treatment of bidders and promotion of competition

Public procurement is carried out though various methods such as rate contract, limited tender or open tender, etc. to procure goods, services and works. As per GFR, procurement value above INR 2.5 Million should be carried out via open tendering process. Any improvement in this process will lead to significant benefits for all the stakeholders.

# **Open Tender Procurement Process for Two Part Bidding**

The open tendering process for two part bidding starts with publication of notice inviting tenders. Potential Bidders prepare their bids and submit a techno-commercial bid which may be in one or more covers as specified in the Notice Inviting Tender (NIT). After bid submission deadline, technical bids are opened and evaluated. Successful bidders (those who qualify on technical specification parameters) are evaluated on their commercial offer and lowest bid is discovered and contract is awarded through award of contract (AOC). Figure 1 depicts an open tender procurement process. At present, this process can be carried out in either offline or online mode. Online e-tendering portals are designed centrally by the National Informatics Centre (NIC) and rolled out for different state government and other Public Sector Undertakings (PSUs). This tool collects and makes available rich information about various stages of public procurement tenders. In Uttar Pradesh, since inception in 2008, e-tendering system has supported about 3759 tenders

managing the process for INR 1,51,027 Million which represents about 15 - 20% of total public procurement spend in UP in the given period. While offline tendering process still makes the bulk of process execution, authentic and precise data about the same may not be generally available or even captured. Hence, this observatory uses historical data available on NIC's e-tendering sites to develop base line statistics and shall use it to measure and compare procurement performance in coming years.

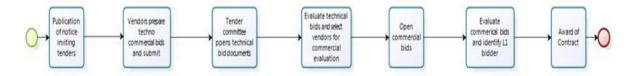


Figure 1: Open Tender Procurement Process

# Data source for tendering process analysis

e-Procurement is being adopted in India on a mission mode. Its usage is mandatory in several states and central government organizations. Although e-Procurement covers entire end- to-end procurement process, presently it is confined to only the tendering process in India. In the state of Uttar Pradesh e-Procurement was introduced in 2008. The system had its own teething troubles and moved in fits and starts. Further, there is no Government Order (GO) notification so far making it mandatory for various state departments and organizations to share procurement related information either through NIC e-procurement system or on their own websites. Therefore, as of now, the data sharing is voluntary. All these led to little/ incomplete information in initial years till 2010. However, the process is gradually picking up and seems to be more or less 'in place' at least for a few state government departments since 2011. Therefore, the observatory has taken the year 2011 as the base year to develop base line statistics and use it to measure and compare procurement performance in the coming years.

NIC has implemented e-Procurement systems in the state of Uttar Pradesh, West Bengal and Delhi among others. These systems provide tender wise detailed e-tendering process information. This data is not easily amenable to analysis and comparison. We have designed a web crawler tool that converts the available data in these web pages to a format that allows easy analysis and comparison within and across states. We have also designed a tool that allows our website visitors to easily visualize various KPIs (Key Performance Indicators) using simple drop down menus. This tool is available at the observatory's web site on www.procurementobservatoryup.com.

# **Evaluation of Key Performance Indicators**

The public procurement observatory for the state of U.P. conducted its second workshop on public procurement practices at IIM Lucknow campus on 23<sup>rd</sup> August 2014. Participants were drawn from various Uttar Pradesh Govt. departments, IIM Lucknow and the World Bank (Participants list is appended at the end of the document). World Bank's procurement

and FM specialists and IIM Lucknow faculty members shared their findings and observations on public procurement in India and particularly in the state of Uttar Pradesh. The observatory team presented a detailed analysis of procurement process on selected KPIs. The analysis is based on last three year's tendering process in the state of Uttar Pradesh, West Bengal and Delhi. Table 1 shows the number of tenders observed in each of these states in last three years. To bring a logical consistency in our analysis, we have limited our analysis to only those tenders that have reached the award of contract stage.

Legend	State		Tenders Observed	
		2011	2012	2013
	Uttar Pradesh	117	6	137
	Delhi	629	1062	1197
	West Bengal	9	1466	3273

Table 1: Observed tender details along with colour legend used in the subsequent charts

Further, each indicator was explained and discussed in detail in the workshop. Key findings and participants' observations are summarised below.

#### KPI#1 Average Time Taken to Open Technical Bids

After bids are received, the same should be opened at the earliest. Any delay in this activity indicates lack of planning and resource unavailability. This KPI is calculated by taking difference between bid submission end date and actual bid opening date. Figure 2 shows that all states observed had a decline in average time taken to open the bids. However, Delhi seems to be most efficient among the three states. Participants also observed that this efficiency may be one among many reasons behind excellent supplier participation in Delhi state tenders.

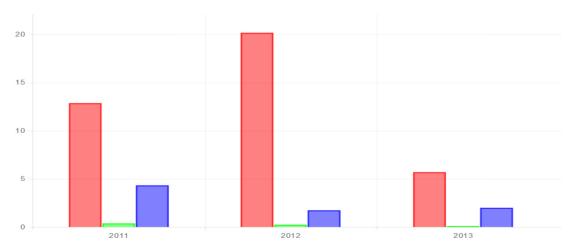


Figure 2: Average Time Taken to Open Technical Bids

### KPI#2 Average Delay in Technical Bids Opening

If bids are not opened on scheduled date and time, it causes inconvenience to the vendors and has an impact on their trust on the entire process. Figure 3 shows that by using etendering system better, West Bengal and Delhi have shown almost negligible delay in technical bid opening, while it is still a cause of concern for Uttar Pradesh.

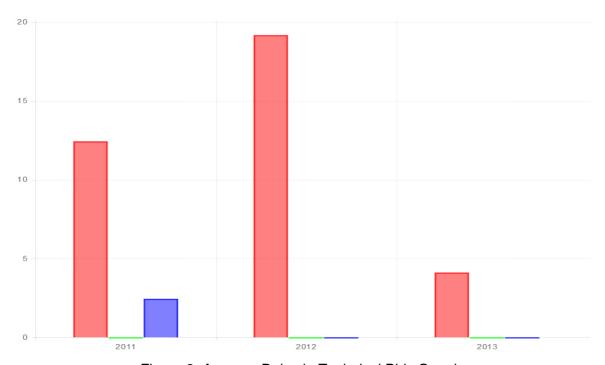


Figure 3: Average Delay in Technical Bids Opening

#### KPI#3 Average Time Taken to Evaluate Technical Bids

Technical bid evaluation can be made simple using predefined technical qualification criteria. So, an efficient process should not take unduly long time. Any delay in this activity indicates poorly designed technical specifications, lack of well-defined evaluation criteria and lack of capable human resources evaluating the technical bids. Figure 4 shows that while Delhi and West Bengal have improved their performance on this indicator (we have observed only 9 tenders of West Bengal in 2011), U.P. has shown an almost increasing trend with almost 16 days on an average taken to evaluate technical bids in 2013. Participants observed that this may so because of increase in scrutiny of tendering process by government and private agencies. While other states are also subject to such scrutiny, they have modified their procurement process to make it fairer, more equitable and more transparent. U.P. has till now failed to bring any major change in its procurement process.

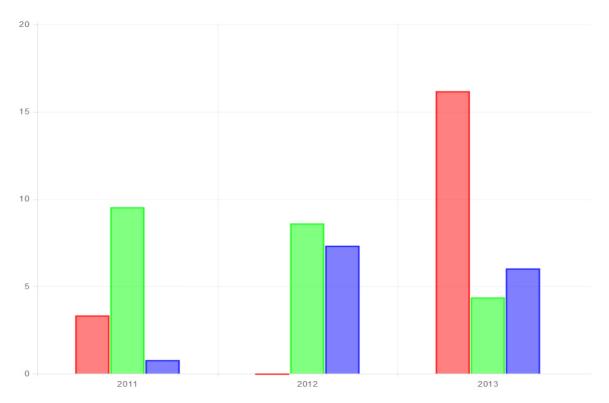


Figure 4: Average Time Taken to Evaluate Technical Bids

## KPI#4 Average Delay in Financial Bids Opening

If financial bids are not opened on scheduled date and time, it causes inconvenience to the vendors and has an impact on their trust on the entire process. All the three states observed have performed well on this indicator with almost no delay in the process as shown in the Figure 5.

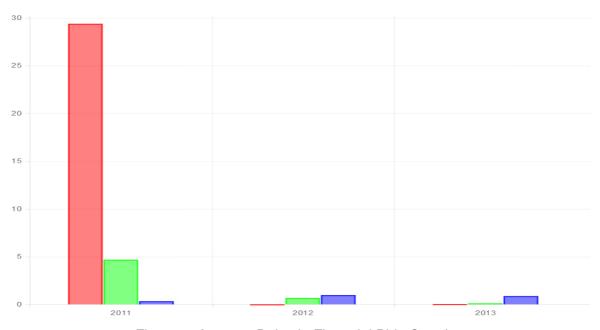


Figure 5: Average Delay in Financial Bids Opening

## KPI#5 Average Time Taken to Evaluate Financial Bids

A faster financial bid evaluation and award of contract indicates that there is no post tender negotiation with the L1 bidder. It also indicates that the administrative approval processes are not taking unduly long time to complete. While Delhi and Wes Bengal show a decreasing trend on this parameter in Figure 6, U.P. is showing an increasing trend. Further, in 2013, U.P. took almost on an average 100 days to complete this activity per tender, while Delhi took almost 10 days. Participants observed that multiple layers of approval may be the reason for such performance in U.P. There is a need to cut down layers of approval and make the process more efficient.

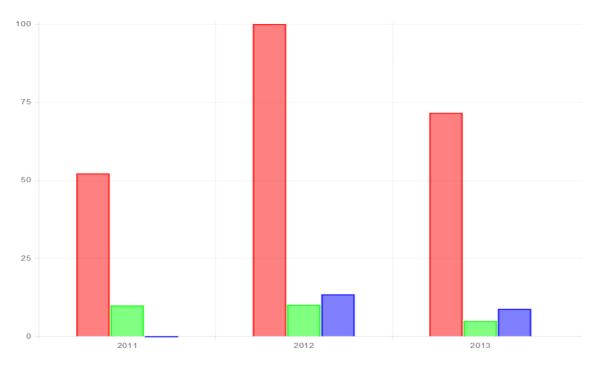


Figure 6: Average Time Taken to Evaluate Financial Bids

## KPI#6 Average Bid Validity Period

It refers to the precise period of time the bidders certify for which their bids can be considered valid. After this period, the bidders are at a liberty to change their bid price if the contract is not signed by the last date of the bid validity period. CVC vide Circular No.31/11/08 observed that while a short validity period calls for prompt finalization by observing specific time-line for processing, a longer validity period has the disadvantage of vendors loading their offers in anticipation of likely increase in costs during the period. Hence, average bid validity period is a measure of process economy and it is important to fix the period of validity with utmost care. Figure 7 shows the average bid validity days for the three states for three years.

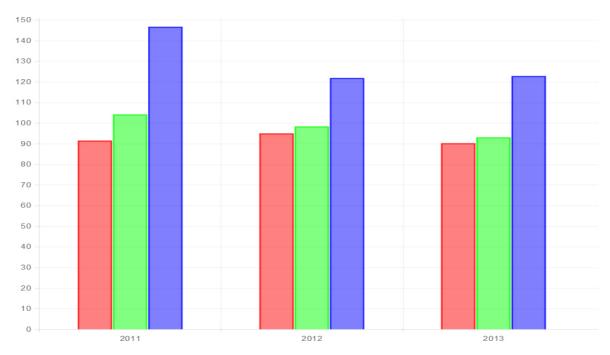


Figure 7: Average Bid Validity Period

## KPI#7 Percentage Processes with Cycle Time higher than Bid Validity Period

Process cycle time as measured by time between bid submission end date and date of award of contract has generally been unduly long and has often exceeded the bid validity period. Figure 8 shows the percentage of awarded tenders where process cycle time is higher than bid validity days as generated by the observatory's visualization tool. Participants observed that such delays could be mainly because of multiple layers (between tender evaluation committee and accepting authority) of scrutiny, particularly in high value procurements. Further, procurements are based on budgetary provisions and procurement planning & monitoring do not cover timelines. This needs immediate attention and possible process redesign.

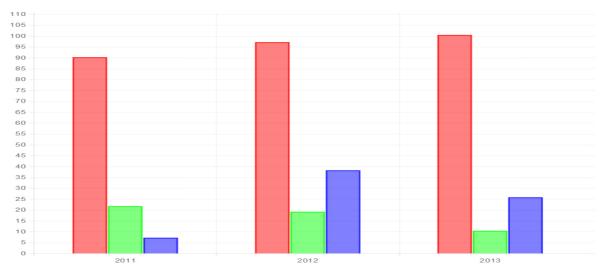


Figure 8: Percentage Processes with Cycle Time higher than Bid Validity Period

### KPI#8 Estimated Annual Savings in Procurement

Savings are a simple measure of process economy. They have been calculated as the difference between estimated procurement value mentioned in the notice inviting tender (NIT) document and the actual award value mentioned in the award of contract. We are assuming here that the initial estimate is arrived at after following due diligence process. Figure 9 shows estimated savings for the three states.

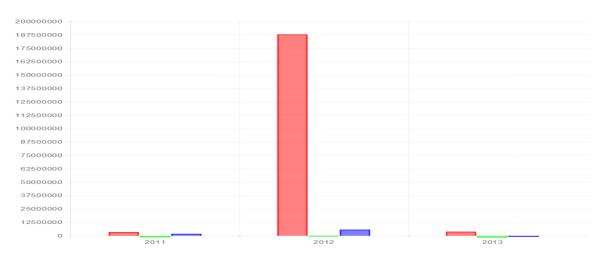


Figure 9: Estimated Annual Savings in Procurement

#### KPI#9&10 Number of EMD Payment Instruments

Vendors are expected to deposit 2-5% of estimated tender value as earnest money deposit (EMD) to participate in the tendering process. Rule 157 of GFR states that this money can be deposited in form of fixed deposit receipt, banker's cheque, banker's guarantee, demand draft and small saving certificates. Providing more options to the vendors ensures larger participation and promotes competition. Figures 10 and 11 show number of tender process allowing at least three and two payment instruments respectively. UP fares much worse than West Bengal and Delhi tops the charts.

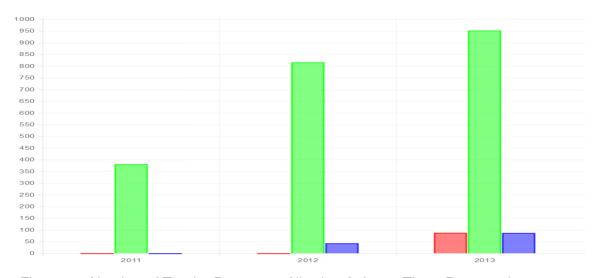


Figure 10: Number of Tender Processes Allowing At Least Three Payment Instruments

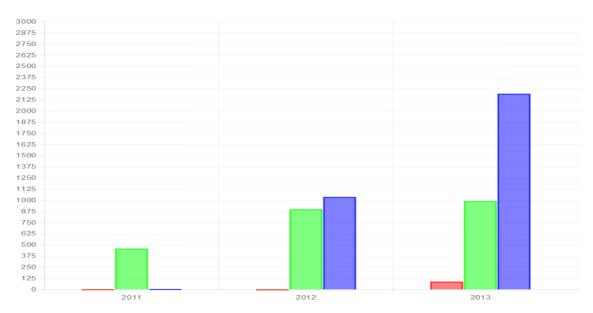


Figure 11: Number of Tender Processes Allowing At Least Two Payment Instruments

#### KPI#11 Tender Process Fairness Ratio

Promotion of competition requires larger number of vendor participating in the process. The process design should enable and encourage competition among vendors. This ratio is defined as the number of technically qualified bidders to number of bidders finally awarded the contract. To ensure fair competition, most of the technically qualified bidders should not be awarded the contract.

In some cases almost all technically qualified vendors are awarded the contract since no single vendor may have the capacity or capability. However, it is observed in other cases that the work is divided into small pieces and all vendors are given a piece of the contract even if capacity is not a constraint. This defeats the very purpose of conducting the procurement process. Figure 12 shows the tender process fairness ratios for the three states of UP, Delhi and West Bengal.

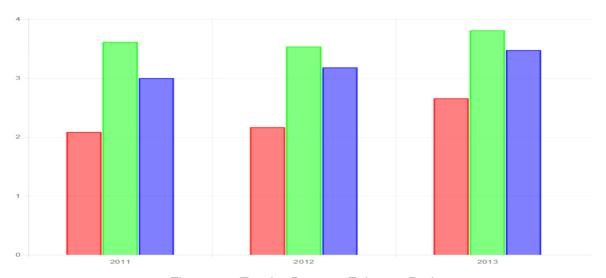


Figure 12: Tender Process Fairness Ratio

### KPI#12 Supplier Adequacy Ratio

It is defined as the number of initial bidders to the number of bidders awarded the contract and is a measure of adequate competition in the process. Higher score in this ratio indicates greater competition among suppliers. Though GFR states some minimum number of initial bidders to initiate any tendering process, however desired number of vendors should be much higher than the minimum numbers. On an average initial number of bidders should be at least three times the number of bidders awarded contract to ensure competition among vendors.

As illustrated in the Figure 13, while Delhi shows very high supplier participation, states such as West Bengal and Uttar Pradesh are not performing as well. However, for the state of Uttar Pradesh there has been an improvement over the years. Participants opined that ease of doing business may be a reason for higher vendor participation in Delhi. In the state of Uttar Pradesh, contractors need to get registered in multiple departments and there is no single procurement coordination agency. A single point registration of contractors may be introduced which may apply to all purchasers in the state and allow interested contractors to apply for registration any time.

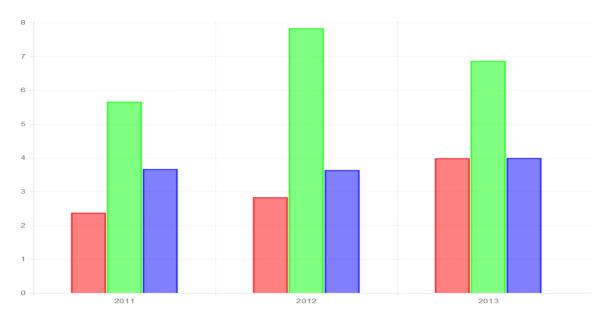


Figure 13: Supplier Adequacy Ratio

# Insights from workshops and experience sharing sessions

The Observatory shared its key findings and analyses with UP government officials on a continuous basis and particularly through three workshops and experience sharing sessions (list of participants attached in Appendix A). The workshop deliberations highlighted the potential for improvements in procurement processes in U.P., which may have significant impact on effective delivery of services to the citizens. The key insights, observations and recommendations from these activities are summarized here.

Need for training and capacity building on public procurement: All interactions and workshops pointed that training and capacity building on public procurement could lead to easier, efficient, economic and more transparent procurement process. Vendors also need to be trained extensively for e-tendering. A 3-4 days module needs to be developed for the trainers and subsequently the training programs for state department officials can be carried out. The State Planning Institute agreed to identify the final list of selected resource persons/master trainers. The course agenda and materials for this program on public procurement should follow Uttar Pradesh rules and guidelines. The World Bank offered to extend support through its experts on Indian systems of procurement and its procurement panel members located in Lucknow/Uttar Pradesh.

It was suggested that interested participants and other volunteers may enroll for the free online Certificate Program in Public Procurement (CPPP) for enhancing capability in public procurement. The State Planning Institute and other representatives from various state institutions to enroll their faculty and other resource persons for the program.

**Need for procurement process redesign:** Our analysis for the state of Uttar Pradesh revealed that overall, the e-tendering process is marred with wait and delays. In 2011 observing 124 dataset, calculated average time taken to open bids was at 14.95 days per tender while technical evaluation took less than 3 days per tender. In last three year average time taken for technical evaluation remained less than 3 days. However overall process time is more than 150 days in last 3 years. Similarly, observations of 1024 tenders in 2012 revealed that cancelled tenders spiked to 50%, while they were 9% and 4.7% in 2011 and 2013 respectively. A possible but empirical unproven association could be change in political scenario in 2012 and associated changes in administrative structure.

Presently, procurements are based on budgetary provisions and procurement planning & monitoring do not cover timelines. This needs immediate possible process redesign. The existing financial rules and guidelines need to be reviewed on urgent basis for goods, services and works. Efforts should be made to harmonize the state and central rules so as to prevent any ambiguity and confusion. Policies for specialized services (e.g. consultancy) and specialized projects (e.g. PPP) need to be framed properly. Archaic rules such as mandatory newspaper advertising for any procurement above Rs 50 thousand needs to be modified/ done away with in these changed times. Many other financial rules and policy changes are required. In fact, a thorough review, updation and standardization of procurement policy is the need of the hour. It was felt that a standardized manuals (similar to handbooks on election law - in terms of comprehensiveness) would make the procurement process quicker, easier, unambiguous, economic and more transparent. Further, periodic review of these rules and guidelines should be followed in future through Periodic Policy Review Commissions.

Further, using NIC's post tendering module may lead to better and auditable procurement planning & control. The state may think about establishing a nodal agency for government purchasing along with a procurement Ombudsman. Simple ideas like buy-back for e-waste may be considered in IT procurement policy

Better vendor management for higher participation: Almost 20-30 % of tenders observed in last three year received no bids indicating market making failure. In these cases not only the cost of procurement (such as NIT publication cost and resource cost etc) goes waste, but the services to citizens also get delayed causing non-enumerable losses. These clearly reflect vendor apathy and market making failure. While Delhi shows a very high supplier participation, states such as West Bengal and Uttar Pradesh are not performing as well. However, for the state of Uttar Pradesh there has been an improvement over the years. Participants opined that ease of doing business may be a reason for higher vendor participation in Delhi. In the state of Uttar Pradesh, contractors need to get registered in multiple departments and there is no single procurement coordination agency. A single point registration of contractors may be introduced which may apply to all purchasers in the state and allow interested contractors to apply for registration any time.

There are also a few issues related to vendor registration and blacklisting as well as payment which need to be resolved. Vendor registration and blacklisting processes need to be simplified. Perhaps an electronic platform could be a good solution. Presently, the payment has to be approved by the treasury; this process too needs to be streamlined and simplified. For example, government may create a "pooling bank account" for government departments and another one for PSUs. A similar practice is already been followed in the state of Kerala.

**Transparent public procurement process using e-tendering:** Observing three years data, on tabulated bid evaluation sharing and AOC information sharing with public, we observed a decreasing trend. While this is a cause of concern, it may also be so because NIC's e-tendering system does not mandate information sharing. An improvement in e-tendering system can ensure that AOC information of all financially evaluated tender should be shared before creating a new tender by a tender committee.

Further, it was observed that in some states such as West Bengal, e-Procurement usage being made mandatory, the number of tenders on e-tendering portal has gone up rapidly. However, in states such as Tamil Nadu and Uttar Pradesh, where e-Tendering use isn't mandatory, the number of tenders on e-tendering portal is still limited. Presently, in UP departments like PWD carry out e-tendering for procurement over Rs one crore only. e-Tendering not only brings efficiency in public procurement, it also makes the process more transparent and leaves an auditable trail. Such trail will make state wide procurement management information available for useful analysis or policy formulation. Thus, it is highly recommended that the e-Tendering should be made mandatory for the state of Uttar Pradesh as well. e-procurement should also be covered in training programs at state training institutes.

Overall, while technology can bring efficiency and transparency in the public procurement process, there is a need for education and capacity building on public procurement in the state of Uttar Pradesh. Along with process redesign and policy review, the state of UP needs to focus on better vendor management practices. To bring greater transparency in public procurement, contract implementation data may be shared in the public domain so that U.P.'s contract implementation process performance can be measured as well.

# **Future Roadmap**

In last one year the observatory at IIM Lucknow developed a few key performance indicators (KPIs) to measure procurement process on efficiency, economy, transparency, fair vendor treatment and promotion of competition. These KPIs can contribute to systematically to promoting best procurement practices. The observatory has also developed a website that contains relevant information on public procurement along with a data visualization tool which allows users compare various Indian states on the identified KPIs. Further, the observatory shared the findings with the U.P. Government and other stakeholders through workshop, seminars, website and other means. A few external experts were also invited in these workshops from government agencies and University of Cincinnati, USA.

There is still ample scope for sharing the best practices among various stakeholders as well as monitoring and promoting good practices. The observatory proposes to continue these activities with greater focus on providing advice on procurement policy and practices to the state government as well as on making the observatory website more attractive and richer in content. Observatory would also make efforts for active engagement with government departments and institutions involved in procurement policy making and major public procuring entities in state.

The observatory proposes to carry out a review of existing procurement practices and related documents in a few selected Indian states. This will enable it to document the existing practices and also in unpacking each select state's performance on various KPIs. Simultaneously, the observatory will review the extant global practices through literature and publicly available secondary documents. Next, it shall share the best global practices (from other states in India and countries abroad) in public procurement with the UP Government through workshop, seminars and other means. The analysis will primarily be based on secondary sources of data available in public domain, though data/information collection through meetings (if feasible, mainly for data gaps) is not ruled out.