



# Institute of Urban Transport

## Newsletter

(India)

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### Workshop on “Urban Transport Modeling Trends & Analytical Advancements”

The Institute of Urban Transport (India) organized a Workshop on “*Urban Transport Modeling Trends & Analytical Advancements*” on Friday the 1<sup>st</sup> December 2006 as part of its endeavor to promote, encourage and coordinate the state of urban transport in the country. The Workshop was attended by invited delegates from the Ministry of Urban Development, Transport Department of Delhi Government, Traffic Police, Institutional and Governing Council Members of the Institute, besides experts from U.K. and Germany. About 35 invited delegates participated in the Workshop.

The Workshop was inaugurated by Shri M. Ramachandran, Secretary, Ministry of Urban Development. Two foreign Experts, Prof. Martin Fellendorf, University of Technology, Graz, Austria, and Mr. Sonal Ahuja, Principal Project Manager Mott. Mcdonald (U.K.) made presentations at the Workshop.

The Technical Session was chaired by Dr. P. Rana, former Chairman & Managing Director, Housing and Urban Development Corporation, New Delhi. The panelists for the Technical Session included Dr. P.K. Sikdar, Senior Transport Specialist, ICT (India) Pvt. Ltd., Prof. N. Ranganathan, Senior Transport Consultant, CES (India) Pvt. Ltd., Delhi, and Dr. Sanjay Gupta, Assistant Professor (SPA) & Hony Secretary(IUT).

Sh A.S Lakra, Vice President (IUT) while welcoming the Chief Guest emphasized the importance of the workshop theme particularly in a developing country like India.



*Prof. Martin Fellendorf, & Sonal Ahuja  
making presentation*

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In the inaugural address of Shri M. Ramachandran, it was mentioned that while urban areas may be viewed as engines of growth, urban transport is, figuratively and literally, the wheels of that engine. As cities grow in population and size, the network of roads coupled with an efficient urban mass transportation system makes a substantial contribution to the working efficiency of the cities and enables them to

become catalysts for economic, social and political development. He highlighted the efforts of his Ministry in formulating the National Urban Transport Policy which offers guidelines and incentives to the States and cities for designing their urban transport strategy. He also mentioned that recently the country has embarked upon upgradation of urban infrastructure in selected cities through the major Jawaharlal Nehru National Urban Renewal Mission (JNURM) which is a reforms-driven, fast-track, planned development of identified cities with focus on efficiency in urban infrastructure and services delivery, community participation, and accountability of local governments towards citizens.

In fact about 30% of the projects sanctioned under National Urban Renewal Mission in terms of the total cost relate to urban transport. For taking up projects on urban transport under JNURM, priority is being given to the public transport proposals including non-motorised traffic, in line with the principle of equitable allocation of road space as brought out in the National Urban Transport Policy.

He emphasized that it is essential to carry out a rationale assessment of transport demand through the application of urban transport modelling and analytical tools. Workshops like these definitely help in creating awareness about the need for such exercises for developing appropriate planning strategies for sustainable development of urban transport system. He hoped that the deliberations of the workshop would focus on sharing of experiences amongst various experts in the field of urban transport modeling and analytical techniques and identify areas of research and mutual cooperation for the benefit of community at large.

Dr Gupta proposed a vote of thanks for the Chief Guest.

In the technical session which followed Dr Rana invited the experts to make their presentations. The presentations by the two experts covered application of various transportation software such as PRISM (regional model), VISUM ( multi modal transportation planning package), VISSIM( micro simulation), SATURN etc on different case studies in U.K, China and other parts of Europe. The presentations were widely appreciated by the delegates present.

In the panel discussions which followed after the presentations the panelist expressed their viewpoints on the subject. In his opening remarks Dr. Rana mentioned that a lot of times it is the non implementation of the Mater Plans which often lead to mismatch between the forecasted travel demand and the demand which actually materialises.

Dr Sikdar in his remarks mentioned that often due to lack of good quality data sophisticated models often are not developed though there is enough skills available in our country to develop these models for application. Prof. Ranganathan highlighted that there are enough of good models which have been developed for policy planning the models for tactical planning and operational planning often are lacking in our country. Dr Gupta highlighted the need for more efforts in the area of freight demand modeling, vehicle ownership forecasting and development of simplified travel demand models of sketch planning types for our cities. He also highlighted the need to upgrade the training skills of transport professionals in software application.

### **Need for alternate Office Space for the Institute**

The Registered Office of the Institute initially was located in the Ministry of Urban Affairs & Employment, Nirman Bhawan, New Delhi, and subsequently the present accommodation in Nirman Bhawan was allotted to the Institute by the Directorate of Estates in March 2001. However, the Ministry of Urban Development wanted the institute to shift our Registered Office and we have been making efforts to locate a suitable space from where activities of the Institute have to be carried. This matter was also discussed in detail in the Annual General Body Meeting held on 15.12.2006 and a decision was taken to take urgent action in the matter. We had also made a request to Secretary (UD), who is also the President of the Institute, for not disturbing the existing arrangement as we were assisting the Ministry as its technical arm. However the Ministry decided that the Institute should vacate the Hall for use by the Ministry, perhaps for JNNURM activities. Accordingly arrangements were made to shift the furniture to two locations in South Delhi for safe storage. The staff of the Institute has been temporarily located in the two rooms provided for the Project Management Unit of the Ministry of Urban Development, for which the Institute has been rendering administrative and secretarial assistance for the various projects of the Ministry.

The Executive Committee of the Institute is making efforts to locate a suitable space for continuing with the activities of the Institute, but for a long-term measure it has been decided to seek allotment of land from the Land & Development Office, New Delhi, for which donations will also be sought from the Individual and Institutional Members of the Institute. Any suggestions about the alternate office space are most welcome from the members.

## Metro Update

With the completion of Phase-I of Delhi Metro, consisting of 65.1 km, a major milestone has been achieved by the DMRC management. As per the plan, 60 train sets have been received and deployed, which make a total of 1100 train trips everyday commencing from 6.00AM on all the 3 operational lines. The average ridership is in the range of 5 lakh commuters with the average fare box collection being about Rs.65 lakhs. In spite of fare being placed very low from Rs.6 to Rs.22 (for a maximum of about 40 kms.) the system is making an operational profit from day one.

While the whole work of Phase- I was scheduled to be completed in a period of 10 years, this job was accomplished in a period of 7 years and 3 months. Initially when the DPR was made, the total length for implementation under Phase-I was 55 kms. During the final survey and implementation, DMRC had to make drastic changes in the corridors for construction based on the expected ridership. Also the total length under Phase-I of the project increased to 65.1 kms.

While Phase I was being constructed and was going into operations, DMRC was planning Phase-II of the project being a part of the Master Plan of about 250kms. This was the time when it was also decided that Delhi will host the Commonwealth games in 2010. Necessarily from the infrastructural point of view, the work on Phase II would require to be completed by June 2010, so that Metro Services are available in time for the commonwealth

Games. This leaves just a period of 3½Years for completion of Phase-II, quite a gigantic task indeed. Simultaneously a decision was also taken that there should be a fast track metro line connecting the central business district to the airport in view of heavy spurt in air traffic and also the expected increased traffic on account of the Commonwealth Games. This 19 kms. Link which can be traversed in a period of 16 minutes is also to be accomplished by June 2010. Air travelers can book their luggage and check-in at New Delhi and Rajiv Chowk stations. This makes a total of 115 kms. of metro lines to be added with 4 new depots at a cost of Rs.17, 700 crores approximately.

The Project Management team has finalized the blue print and the whole work of 115 kms. which includes construction of a second Yamuna bridge to link the new routes in transyamuna area. A tunnel length of about 28 kms. is also being provided in the project, which is being managed by six chief project managers.

Most of the civil contracts have already been given and the work is in full swing in all corridors. Preliminary survey work on the airport link has been completed but the civil works are yet to be awarded.

Except for some minor irritants like non-availability of land, DMRC is quite confident of achieving this very tight target. As can be expected of Delhi Metro, this world record will also be achieved and the Delhites will have a total of about 180kms. Metro line crisscrossing the city by June, 2010.

While all this construction activities are going on, Delhi Metro trains are a big attraction to the Delhi population and tourist from outside. Mostly the foreign dignitaries who arrive in New Delhi make it a point to have a ride on the Metro and have discussions with the DMRC management. Not only Indian students, but from foreign universities also make bee-line to Delhi Metro to find out their success strategies.

DMRC has already been appointed as the Prime Consultants for the upcoming metros in Hyderabad, Bangalore and Kochi. DMRC had as indicated in the



*Yamuna bridge under construction*



Security check on Metro Stations

is under preparation. A feasibility report for Pune is also on the anvil. In view of the terrorist activities security has been beefed up on all the Metro stations.

Recently Delhi Metro has become a member of the Nova Benchmarking Group, an exclusive consortium of medium size metro systems. The other 14 members of the group are Barcelona, Buenos Aires, Glasgow, Hong Kong, Lisbon, Milan, Montreal, Naples, Newcastle, Rio de Janeiro, Santiago de Chile, Singapore, Taipei and Toronto. The membership of Nova would enable Delhi Metro to rate itself international benchmarks and pave the way for technology transfer for DMRC.

Not resting on their laurels, DMRC is going ahead with the task in hand in making Delhi a better city to live in.

earlier news letters, prepared Detail Project Reports for Mumbai and for a second line in Kolkata. DPR for Chennai



# General Body Meeting of the Institute of Urban Transport

The 10th Meeting of the General Body of the Institute was held on 15th December, 2006 at National Urban Transport Information Centre, N.B.O. Building, Nirman Bhawan, New Delhi. Shri M. Ramachandran, Secretary, Ministry of Urban Development, & President of the Institute, could not attend due to pre-occupation. Shri A.S. Lakra and Shri A.K. Sharma, Vice Presidents of the Institute participated in the proceedings. The meeting was attended by 33 members.

An Open House session followed on the proposed recommendations on Eleventh Five Year Plan for Urban Transport including mass transport System drafted by the Working Group constituted by the Ministry of Urban development. The session was coordinated by Prof. N. Ranganathan, Past Vice President (IUT). In this session a presentation was made by Dr. Sanjay Gupta, Hony. Secretary, on the salient recommendation of the proposed Eleventh Five Year Plan for Urban Transport including Mass Rapid Transport System. He highlighted in the end of his presentation certain issues which did not receive adequate emphasis in the recommendations. The session witnessed some lively interaction by the members from the floor before Prof. Ranganathan summed up the deliberations.

Thereafter Shri A.S. Lakra, presided and the formal agenda of the meeting was taken up.

**1. Confirmation of Minutes:** The Minutes of the 9 th meeting of the General Body held on 8 th December 2005, which had been circulated to members earlier, were considered and approved.

**2. Hony. Secretary's Report:** Dr. Sanjay Gupta, Hony. Secretary of the Institute, highlighted the activities of the Institute and developments since last meeting, which was held on 8<sup>th</sup> December 2005.

Hony. Secretary welcomed the new enrolled members, particularly the Institutional Members, namely Bangalore Metro Rail Corp. Ltd., Bangalore, CEPT University, Ahmedabad & WilburSmith Associates Pvt. Ltd., Bangalore.

**3. Audited Accounts for the year ended 31 st March 2006:** The audited Accounts for the Financial Year ended 31 st March 2006, and the Auditor's Report along with the Income and Expenditure Account and Balance Sheet

were presented. It was mentioned that the Institute had been managing its affairs with the membership fee received from the new members and the interest earned on bank deposits. It was also mentioned that due to diminishing bank interest on the Fixed Deposits and few new enrolments for membership, the financial position of the Institute had been badly effected and even for monthly expenditure, we have to depend on the Ministry, which is giving 'Administrative and Service Charges' on the projects which we assist.

Hony. Treasurer proposed to appoint M/s. Bindra & Associates, who had been earlier auditing the accounts of the Institute, as auditor at an annual fee of Rs.12,500/- plus taxes for the year 2006-2007, which was approved.

#### **4. Any Other Item:**

##### **Alternate Space for Institute**

The members were also informed by the Hony. Secretary about the Ministry's decision to take over the control of the space under NUTIC ( conference hall) for the purpose of JNNURM and thereby forcing the Institute to look for alternate space outside the Nirman Bhavan. The members suggested that Institute should contact various other professional institutes such as Institute' of Town Planners, Indian Roads Congress, HUDCO , AMDA etc requesting them to lease out some space for the Institute. Failing which Institute could explore taking some space on rent in planned commercial areas. The members present also suggested that Institute should approach the Ministry to allot some institutional land for it own building.

Hony. Secretary thanked the Members of the Institute for extending their full support to the executive committee and the support staff to carry out the various activities of the Institute and appealed to all the members to provide their unstinted support in future also and play a more proactive role in the institute's development activities. He also conveyed thanks and appreciation to the Ministry of Urban Development for encouraging and supporting the activities of the Institute.

Hony. Secretary appealed to the members to make sincere efforts in enrolling new individual members and Institutional Members to improve the financial position of the Institute. Efforts are also required to seek sponsorship for issue of Urban Transport Journals & Newsletters.

## Workshop on Bus Rapid Transit Systems

The Institute of Urban Transport organized a Workshop on Bus Rapid Transit Systems on 21<sup>st</sup> December 2006 at New Delhi. The workshop was attended by nearly 50 delegates from the States of Haryana, Maharashtra, Madhya Pradesh, Andhra Pradesh, Rajasthan and Uttaranchal besides representatives of Delhi Integrated Multi-modal Transit Systems (DIMTS), RITES, Ministry of Urban Development and Urban Mass Transit Company (UMTC).

Dr. Sanjay Gupta, Hon. Secretary welcomed the Chief Guest and all the delegates present and gave a brief overview of the Workshop. He requested the Chief Guest, Shri M. Ramachandran, Secretary, Ministry of Urban Development and President of the Institute, to inaugurate the Workshop.

In his inaugural address Shri M. Ramachandran mentioned that Urban Transport is one of the most important and crucial sectors of urban infrastructure and services. Realizing the importance of urban transport, Government of India has recently approved the National Urban Transport Policy (NUTP), which emphasizes upon movement of people rather than vehicles and development of sustainable public transport systems. He mentioned that for implementation of various objectives, outlined in NUTP, Central funding assistance is now available through recently launched Jawaharlal Nehru National Urban Renewal Mission (JNNURM) besides the Viability Gap Funding Scheme of Government of India. Urban transport is an important component and NUTP compliant proposals are eligible for funding under JNNURM.



*Shri M. Ramachandran, Secretary, Ministry of Urban Development addressing the Participants*

Shri Ramachandran mentioned that Bus Rapid Transit (BRT) is being increasingly recognised as amongst the most effective solutions for providing a cost effective, high quality public transport services in urban areas of both the developed and developing world. The growing popularity of the system, as a viable solution to urban mobility, underscores the success of the initial efforts in cities such as Bogota that have one of the best BRT system in the world. These cities have shown that by providing a functional BRT network even low-income cities can develop a high quality mass transit system that serves the daily traffic needs of the citizens. Shri Ramachandran hoped that this workshop will help to create awareness about BRT systems and provides the necessary guidelines for the cities to detail out their plans.

The Technical Session was chaired by Shri S.K. Lohia. Dr. Geetam Tiwari, of TRIPP, IIT Delhi, and Prof. Shivanand Swamy, CEPT, Ahmedabad, were invited as resource persons for the event. Dr Sanjay Gupta, Hon. Secretary assisted in conduct of the technical session including the question and answer sessions.

Shri Lohia gave an overview of the various efforts made in other countries and lessons learnt from them. He mentioned that NUTP envisages preparation of comprehensive city transport plans and detailed project reports (DPRs) and preparation of integrated land use and transport plans. Detailed guidelines have also been formulated for the guidance of the states and cities for preparation of DPRs for both rail based and road based public transport. All these guidelines are available on the website of the Ministry of Urban Development.

A number of proposals for MRTS/BRTS have been received for grant of Central Government's assistance under JNNURM. So far BRTS proposals for cities of Ahmedabad, Indore and Pune for a total of 135.2 km at Rs 491.3 crores of central assistance have been approved for construction. Pune has already inaugurated a pilot corridor of 3.5 km. In addition to above, in principle, approval for a 42 km length of BRT in Jaipur has been accorded.

He mentioned that Urban Mass Transit Company (UMTC), which was being revived, would be acting as a project advisor and would help in project development and mobilizing

resources. He also highlighted that Central Government funding for transportation studies and preparation of DPRs by the city municipalities was available through JNNURM and Viability Gap Funding schemes of the Government of India for projects envisaged under it

Dr. Geetam Tiwari in her presentation on BRTS as a Sustainable Urban Transport Solution explained the basics of sustainable transport system. It was not only the 4 metropolitans of the country that are facing urban transport problems but also 600 odd other cities, which are primarily dependent on self-organized intermediate public transport system. She emphasized on investment in space for bicycles and pedestrians and the kind of infrastructure to be created for pedestrians. It was pointed out that in absence of public transport, the number of two- wheelers is increasing and this is making the problem even more complex. She mentioned that the bus system was the most optimal solution and it needs to be segregated from traffic as in the case of BRT. She mentioned that while working for urban mass transport it becomes important to compare various options available with reference to energy, pollution, fuel emission, fatalities, capacity - which depends on network connectivity, land use along the corridor - and subsidy needed etc. She said that BRT was a very flexible system which could be designed for roads with different ROWs within the existing available width without any land acquisition.

Prof. Shivanand Swamy made a presentation on preparation of Detailed Project Report on BRTS projects . He mentioned that BRT is just one element in the overall process of moving towards sustainable transport systems in the urban area .He said that the city structures should be re-designed with the objective of reduced travel which can be achieved by reducing trip length and achieving a favorable modal mix in favour of public transport or mass transit system or NMT or pedestrian modes. He said that the four basic principles to achieve this are PPP, exploitation of opportunities for value capture of increased land value, physical social and economic integration and direct subsidy mechanism where poor can be a part of the overall development process.

Prof. Shivanand Swamy mentioned that the basic step was to ensure that roads are drawn and built as per Master Plans. He mentioned that as part of transport initiatives one has to deal with network initiatives, external traffic, air quality management initiatives, public transit and demand management. He then gave an overview of the DPR

guidelines which included City Profile, Urban Structure to determine the mobility within the city, Socio- economic characteristics, Transport System and Travel Characteristics, Planned Area and also the Influence Area, Zoning, Land use and Employment Distribution, Road Network inventory, Topographical Survey, which should include number of roads and major roads, ROW, and their traffic surveys besides Stakeholders consultation.



*Left to Right Prof. Shivanand Swamy, Dr. Sanjay Gupta, Mr. S.K. Lohia & Smt. Geetam Tiwari*

Prof. Shivanand Swamy mentioned that another important aspect to determine the network was to target group users, which will. He mentioned that road width is not a constraint while designing a BRT system and showed some designs of BRT network of Ahemdabad with finer details of turning traffic, bus stations etc. For BRT projects FIRR is no more than 2% , therefore there would invariably be element of subsidy built in at some point of time.

The delegates from various states talked about the initiatives taken in Hyderabad, Pune, Jodhpur, Indore, and Delhi (DIMTS) and also gave their suggestions. It was mentioned that a National Level Conference needs to be conducted for promoting the concept of BRTS projects and various objectives of the National Urban Transport Policy.

The Workshop concluded with the recommendation that it is important to have a comprehensive transport plan before planning for a BRT corridor. It was also concluded that public participation was very important.

In the end Dr. Sanjay Gupta thanked all the participants for attending the Workshop and hoped that the deliberations of the workshop would be useful to all the participants.

# NEW INSTITUTIONAL MEMBER VOLVO IN INDIA

VOLVO Group, founded in 1927, has grown with the years to become one of the leading suppliers of transport solutions for commercial use worldwide. Characterized by its core values of quality, safety and concern for the environment, Volvo has established itself across the entire transport range – Buses, Trucks, Construction Equipment and Marine and Industrial Engines. Volvo today has production in 25 countries and operates in more than 185 markets.

Operational in India over the last 9 years, Volvo has contributed towards rising standards and expectations on all the fronts that enable better quality transport – increased productivity, safety, product reliability, global emission standards, reduced fuel consumption by bringing state-of-the-art technology products to India.

Volvo started its business in India with **Penta**, its Marine and industrial power system division. Penta engines are today one of the most preferred engines in Defence and Marine applications. Volvo was the first to incorporate EURO III **Truck** engines. These trucks offer a high power-to-weight ratio enabling efficient and reliable transport, marked by high speeds. The City and Inter-city **Buses** from Volvo has brought about a radical change in the perception about road transport. These high end buses have made bus travel an easier, safer, more comfortable and has motivated several people to opt for public transport for their day to day travel requirements. Volvo has also introduced fuel efficient, electronically managed engines in its **Construction equipments**, which has led to its remarkably high presence in Coal and Iron Ore mining sector, Marble Mines, and even in Irrigation and road building industries.

Volvo Trucks and Buses have access to maintenance and repairs by specially trained technicians from any Volvo Service and Parts Centre across the Country – for the entire product combination including the superstructure and trailers. The Construction Equipment and Volvo Penta support their products through a team of Volvo trained specialists and experienced OEM and Dealer network.

Volvo in India has always helped in bringing about a change in people's lives. Today, Volvo also exports completely built trucks to South Korea and Buses to Bangladesh and Srilanka. Volvo India is responsible for all markets in South Asia. Global sourcing from India also supports all three Truck brands within the Volvo group – Volvo, Renault and Mack, as well as to Volvo Power train and Volvo Bus.

Volvo not only sells good products, but also offers best advice and service. The well trained Sales Team act as the transport solution consultants to the customers. With Volvo, a customer has one contact for service contracts; one partner for discussing complete solutions – tailored to the operational needs of the Operator; one partner for managing everything from order to deliver and one partner to train or re-train the Drivers or Fleet Managers. At Volvo, relationship with the customer does not end with the delivery of the product, it marks the beginning of a long term partnership for complete transport solutions.

**We welcome M/s. Volvo India as  
35<sup>th</sup> Institutional Member**

## Editorial Board

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# Institute of Urban Transport for Newsletter March, 2007 Issue

## Forthcoming Events

1. 11th International conference on mobility and transport for elderly and disabled persons (TRANSED 2007/COMOTRED 2007): Benchmarking, evaluation and vision for the future Montreal, Canada Organizer: Canada Transport June 18-21, 2007
2. Urban Transport 2007 Thirteenth International Conference on Urban Transport and the Environment in the 21st Century 3 - 5 September, 2007 Coimbra, Portugal, WIT
3. Fifteenth International Conference on Modelling, Monitoring and Management of Air Pollution, 23 - 25 April 2007, Algarve, Portugal, WIT
4. Third International Conference on Sustainable Development and Planning 25 - 27 April, 2007 Algarve, Portugal, WIT
5. April 17-18, 2007 18th Biennial Symposium on Visibility and Traffic Control Devices College Station, TX, TRB
6. May 2, 2007 Traffic Monitoring Data: Successful Practices in Collection and Analysis Washington, DC, TRB
7. June 24-27, 2007 3rd Urban Street Symposium Seattle, WA, TRB
8. July 8-11, 2007 46th Annual Workshop on Transportation Law Philadelphia, PA, TRB
9. July 9-11, 2007 2007 Transportation Planning and Air Quality Conference\* Orlando, FL, TRB
10. July 10, 2007 Meeting Freight Data Challenges Chicago, IL, TRB
11. August 26-28, 2007 Meaningful Transit Input into Transportation Planning and Land Use: Best Practices Denver, CO, TRB
12. October 22-23, 2007 Research Issues in Freight Transportation — Congestion and System Performance Washington, DC
13. November 14-16, 2007 Road Safety on Four Continents - 2007\* Bangkok, Thailand

## BOOKS IN URBAN TRANSPORT

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