

<u>Expression of Interest (EoIs) for</u> <u>"In-Depth Real Time Accident Data Collection Project"</u> <u>by ADAC, NATRIP</u>

1. Background

National Automotive Testing and R&D Infrastructure Project (NATRIP) a project under the Department of Heavy Industry, Government of India aims at creating state of the art Testing, Validation and R&D infrastructure in the country at seven locations viz. ICAT-Manesar, ARAI-Pune, NCVRS-Rae Bareli, NATRAX-Pithampur (near Indore) and GARC-Chennai, VRDE-Ahmednagar and NIAIMT- Silchar, with an investment of Rs. 2288 crore, during the Project duration of 2005-2017. The Government of India has constituted NATRIP Implementation Society (NATIS) for implementation of the Project.

The Accident Data Analysis Center (ADAC) facility of NATRIP is a unique initiative by Government of India in the field scientific research and analysis of accident data. ADAC is envisaged to be state-of-the-art National Center with capabilities on accident data collection, analysis and research for policy formulation by the Government of India as well as ensuring safe vehicle and highways design to reduce number of accidents, fatalities and losses.

For capacity building and strengthening the accident data collection methodology, ADAC in association with IIT-Delhi and MoRTH participated in the "Pilot Project for cashless treatment of accident victims on Gurgaon-Jaipur Highway"; which was launched by joint effort of MoRTH, Haryana State Government, Rajasthan State Government, NATRiP and many concerned private stakeholders on Gurgaon-Jaipur national highway stretch of NH-8. In this study of "In-Depth Scientific Accident Data Collection and Analysis", ADAC have successfully recorded data from more than 240 number of crash incidents. Of these, more than one third were recorded within 30 minutes and approximately 80% within 2 hrs. At the crash location, digital photography, witness statement recording, measurement of various aspects of crash site, topography and crash deformation was conducted. Subsequently, the crash environment was constructed in Auto-CAD.

In the study a set of forms were developed to capture basic details of crash site, environmental factors, road architecture/infrastructure, involved vehicle details & crash deformation measurements, traffic data and relevant witness information in a uniform manner. The data recorded through the project was a significant improvement over the data available from FIRs/AIRs and Traffic Inspector reports. As the work of ADAC is growing, ADAC is stepping towards formulating & implementing PAN India level Practices in Accident Data Collection and Analysis.

2. Objective of the Project

ADAC, NATRIP is soon to initiate an "In-depth Real Time Accident Data Collection Project" in association with Automotive Manufacturers. The objective of this project is to collect real time data of Road Traffic Accidents (RTA) and necessary secondary data (Casualty/Injury Data, Police Data, etc.) from the National Highway near Chennai, Tamil Nadu in consortium with Automotive Manufacturers to study and research the technical characteristics of motor vehicle accident in India and to create and update the accident database of ADAC. The participating members will be entitled to access the collected data for their R & D activities.



3. Scope of work

Memorandum of Understanding (MoU) will be signed between ADAC participating members to initiate the collaboration. The details of the Accident Data Collection scheme of the project shall be as follows:

- 3.1. Based on historical data on RTAs of previous year from police records (if available), multiple black spots in the locality/stretch will be identified for deployment of an Accident Data Collection team.
- 3.2. A Temporary Site Office will be set up at a suitable central location on the stretch as a central office for the data collection team so as to be able to cover crashes through a traverse distance of less than 70kms.
- 3.3. Based on the identified black spot, the accident data collection team equipped with data collection tools and MCL vehicle will be stationed.
- 3.4. A 24hrs operational phone no. of the team will be circulated in the police control room and medical help line centers for accident notification. On receiving any road accident notification from the predefined region the team shall reach the spot
- 3.5. In this initial study, one team will be set up to operate during the day time (8 hours). Deputation of multiple teams may also be worked out depending on the numbers of participating members as defined in section 8.4.
- 3.6. A data collection team shall have 4-5 persons (at different levels, including persons to collect data from site, from hospitals and from the police and an experienced driver), and a vehicle for reaching the site within 30 minutes. In addition the vehicle shall have equipments for data measurement and recording.
- 3.7. On being intimated of a crash, the team (if not already on a visit) shall be dispatched immediately to the site. The team shall collect the data from site including dimensions, photographs, vehicle damage information, statements from witnesses/drivers etc. Subsequently, members of the team shall collect medical records and police data for the case.
- 3.8. The concerned medical officials in the hospitals/trauma centers shall be requested for injury reports of the victims.
- 3.9. Data of each collected RTA will be recorded and documented separately as an individual case.
- 3.10. Every month a statistic report based on the crash notification, collected data and the activities of the team will be prepared for monthly project review.
- 3.11. All the governing and management part of this project would be handled through ADAC, NATRIP, New Delhi.

4. Data ownership:

- 4.1. All the data collected will be owned by ADAC, NATRIP.
- 4.2. Access rights will be given to all participating members, who can use it in their organization but will not be allowed to pass the data to other organizations, excluding their principals / parent organizations / subsidiaries and cannot publish any results without the written approval from ADAC.



- 4.3. Based on the analysis of the data, contributors may publish / present / disseminate any results to a non-member or in a public forum only after the written approval of ADAC.
- 4.4. The data or its output if used by any member in any public forum after approval from ADAC, the member shall give due credit to ADAC, NATRIP.
- 4.5. As the data generated during the project is property of ADAC; ADAC, NATRIP reserve the right of data sharing and may share the data with any organization/institution or may use the same for its revenue generation.
- 4.6. Data ownership, sharing and management shall be as per the "Project Terms and condition" as mentioned in Annexure I.

5. Receivables from Participating Members

- 5.1. Timely Budget Support as mentioned in section 11.
- 5.2. Cooperation and support in technical analysis of collected data.
- 5.3. Continuous support and involvement in quarterly meetings and analysis activities.

6. <u>Deliverables to Participating Members</u>

In the project, the collected data will be delivered to the Participating Members on quarterly basis. The collected data will have the following technical details;

- 6.1. Crash information e.g. Location of Accident, Environment details, Vehicles & Causalities, Road Features, Character & Condition of Road, Traffic/Junction Control System, Vehicle & Driver details, Collision sketch and Location sketch, Property damage etc.
- 6.2. Vehicle deformation e.g. Exterior & Interior deformation and crush depth measurement
- 6.3. Impact contact points for passengers or pedestrians
- 6.4. Technical vehicle data
- 6.5. Photography and Videography of the crash scene
- 6.6. Annual report on the project

7. Financial Management

- 8.1. The project shall run under aegis of ADAC. Accounts for the program shall be managed by ADAC and audited financial statements shall be made available by them.
- 8.2. It is estimated that for the running of one data collection team apprx. Rs 116 lacs would be needed for a one year period (As specified in Annexure II).
- 8.3. As a joint contributing member in the project, Participating Members may contribute the part funding of amount Rs.30 lacs (about 26% of the total projected expenses) towards revenue of ADAC.



8. Administrative Aspects

- 9.1. Responsibility for the purchase, reasonability etc shall lie with ADAC.
- 9.2. Qualified Manpower needed for the project for data collection and management shall be deputed by ADAC.
- 9.3. For monitoring the progress and future course of actions, meeting will be held on periodically with participating members and other stakeholders.
- 9.4. Meetings will be chaired by ADAC, NATRIP.

9. Time Schedule

Duration

: Duration of the project is for 1 year (12 months). The time period may be further extended on mutually agreed conditions and contribution by the members.

Starting Date: 3 months after receipt of 1st payment as per payment schedule. 3 months are considered as the preparatory stage for procurement and set-up.

> Tentatively, the start date is expected to be around 1st November, 2016 if the contribution is received from the first participating member before dated 31st July, 2016.

10. Payment Schedule

A payment total of Rs. 30,00,000.00/- (Rupees Thirty Lacs) is to be made to NATRIP Implementation **Society** at the start of the project as contribution to ADAC towards the project cost.

11. Data Access Options

- Option I: Members may participate in the project by making the payment as specified above at the initiation of the project and provide valuable technical inputs/recommendations in data collection during the course of the project as a project partner.
- Option 2: Interested Members may also access the collected archive data of one year of one data collection team, by making a payment of Rs.30,00,000.00/- (Rupees Thirty Lacs).

12. Expression of Interest

ADAC, NATRIP hereby invites "Expression of Interest" (EOIs) for "In-depth Real Time Accident Data Collection Project" from Automotive Manufacturers/OEMs/Concern R&D Institutions. Interested Organisation/Institution may send their EOIs to the Project Officer (Procurement), NATRIP, NBCC Place, 3rd Floor, South Tower, Bhishm Pitamah Marg, Pragati Vihar, Lodhi Road, New Delhi – 110003. For any clarification, please contact Sh. Sitikantha Padhy, Manager – ADAC, at +91-11-42915555 or email to sitikantha.padhy@natrip.in.

National Automotive Testing and R&D Infrastructure Project (NATRIP)

Corporate Office: NBCC Place, 3rd Floor, South Tower, Bhishm Pitamah Marg, Pragati Vihar, Lodhi Road, New Delhi - 110003

Ph: +91-11-49215555 Fax: +91-11-24369333, website: www.natrip.in



Annexure - I

PROJECT TERMS AND CONDITIONS

1. Funding Aspect

- i. The data will be collected by using the resources of ADAC, NATRiP and with a part funding of proposed amount of Rs.30 lacs (about 26% of the total estimated projected cost) by participating members.
- ii. Considering the proposed part funding is only 26% of the estimated project cost, hence, the funding as proposed i.e. Rs.30 lacs for the data, is being discovered by using a transparent process through inviting Expression Interest (EOI) from concerned stakeholders.
- iii. Participating members shall agree to the condition that they shall equal the price offered by any other party in case any other party offers to pay more than Rs. 30 lacs for purchasing the collected data after the EoI is published and such interested party gives an offer for purchase of data.

2. Data Transfer:

- i. Under the provision of the project, collected data i.e. all collected documents and photos, during the project will be shared with the participating members in every three months in a password encrypted storage device. The Password to access the data will only be shared with the authorised signatory of the participating members.
- ii. The participating members shall ensure that the data not to be copied from the storage device to any other medium by any unauthorised persons and only selected authorised person to work on the analysis of the data and they shall abide by the confidentiality agreement as stated in the next section. It is the sole responsibility of the participating members to decide the numbers of person to be authorized to work on the data under the agreed terms and conditions.
- iii. The printing of any of the shared data shall be avoided and only be done if necessary. Any printed material of the shared data shall be treated with equal confidentiality.

3. Confidentiality

- i. The accident data those are to be shared in this project are sole properties of ADAC, NATRIP.
- ii. The shared accident data and the analysis results shall be treated in a highly confidential manner.
- iii. The participating members shall commit to maintain the confidentiality of shared accident data provided in the project and the outcome of their analysis, during the project duration and after expiry of this agreement.
- iv. The accident data that will be shared during the project is meant for study and R&D activities of the participating members only and they shall not share the data with any of its subsidiaries without approval of ADAC.
- v. The accident data or its analysis cannot be used by the participating members in any manner in any public forum or/and cannot be referred even during their internal/external discussion/research that involves its subsidiaries without the approval of ADAC.



- vi. The data that will be shared after anonymizing the same. However, owing to the size and nature of the data the data may contain some private details such as names, addresses, contact details, vehicle registration numbers etc., about the persons and vehicle involved.
- vii. The participating members shall
 - a. not disclose data or any part of the data received from ADAC to any other person or party and use at least the same degree of care to maintain the Information confidential as it uses in maintaining confidentiality of its own confidential information.
 - b. use the Information only for the above mentioned purposes as specified in section 4.2.iv.
 - c. restrict disclosure of the data solely to those employees of the participating members who have the need to know this Information in order to accomplish the purpose stated above.
 - d. inform and advise each such employee, before he or she receives access to the data of the obligations under this Agreement and require each such employee to maintain those obligations;
 - e. within fifteen (15) days of notice furnished by Disclosing Party, the Receiving Party on receipt of such notice shall return all documentation, copies, notes, diagrams, prototypes and other materials containing any portion of the Information or confirm to the other Party in writing the destruction of such materials.
 - f. shall acknowledge and agree that the data shall remain the sole property of ADAC, NATRIP.
- viii. The participating members shall not publish any result/outcome that is generated through the analysis of data provided in this project without prior written consent of ADAC.

4. Indemnification:

- i. ADAC undertake to carry out the project as conscientiously as conditions allow and to provide data of all relevant road traffic accident cases, those are collected during the project and coordinate with the participating members as conscientiously as conditions allow, but accept no economic responsibility, should the work not lead to expected results.
- ii. The project will be initiated on the condition that the participating members indemnify ADAC/NATRIP against all losses/ damages and third party liabilities for losses/ damages sustained directly or indirectly as a consequence of the work done during the project.
- iii. **Arbitration procedure and place:** Save where expressly stated to the contrary in the Contract, any Dispute shall be finally settled by binding arbitration under the Arbitration and Conciliation Act 1996 Act and in accordance with the UNICTRAL rules (the "Arbitration Rules") by three arbitrators appointed in accordance with the Arbitration Rules. The place of arbitration shall be New Delhi. The request for arbitration, the answer to the request, the terms of reference, any written submissions, any orders and awards shall be in English and, if oral hearings take place, English shall be the language to be used in the hearings.



5. Non-transferability							
	The project is intended considering the specific requirement that, relates to the sharing of accident data collected during the discussed project provided by ADAC. Consequently, the rights and obligations of the parties under this Agreement may not be sold, assigned or otherwise transferred (subject to contract).						



<u>Annexure - II</u>

ESTIMATED PROJECT COST

	Estimated b	oudget in la	cs for 12	months			
	Staff	Monthly Salary	Nos.	Annual Salary	Annual Salary per employee (including 30% HRA)	Total Annual Salary	<u>Total</u>
	Driver	0.20	1	2.40	3.12	3.12	
Manpower Cost	Data Collection Engineer	0.45	3	5.40	7.02	21.06	
	Supervising Engineer/ Team Leader	0.50	1	6.0	7.80	7.80	
	Project in Charge / Manager	0.70	0.25	8.40	10.92	2.73	
	Total for the project		1				34.71
	Particulars Particulars Particulars Particulars						
	Computer, Printers, Hardware, Furniture and Other initial setup cost of site office						
	Operational Cost (Vehicle Mobility & Maintenance, Office Expenses, Utility, Miscellanious etc.) @ 60k per month					7.20	
	Site Rental @ 40k per month (500 sqm with secured parking)					4.80	
Other Expenses	Auto Cad and other required software (1 license for 12 months)					3.00	
	Travelling Expenses of Senior Officials for Liaisoning and supervision					5.00	
	Total other expenses						28.00
Contigencies and	Contingencies @10% of project of (Total manpower and other expe					6.27	
#Overheads	Overhead @2% of Software and @20% of rest				12.0		
	Toatal Contigencies and Overheads						18.27
MCL Vehicle and Equipments Rental Cost MCL Vehicle with various data collection equipments, Marking and measuring tools, Still and Video Cameras, misc. equipments; (Resources for 2 teams available with ADAC, NATRIP)							35.00
0 15 : 10	40 11						445.00
Grand Total for 12 months							<u>115.98</u>

^{*}The overheads have been calculated @ 2% for software / equipment and 20% for other expenses.

Interested Organisation/Institution may send their EOIs to: Project Officer (Procurement), NATRIP, NBCC Place, 3rd Floor, South Tower, Bhishm Pitamah Marg, Pragati Vihar, Lodhi Road, New Delhi – 110003.

^{*}Equipments as listed above is proposed to be used in the project by paying a considerable rental amount to NATRIP. All the Equipment and MCL Vehicle will remain as a property of NATRIP.