

Centre of Excellence Vehicle Dynamic

NATRAX is proposed for Proving Ground in India, the centre will be one of the most unique facilities in terms of world class test tracks in India. **The proposed Center of Excellence for Vehicle Dynamic will be complement to test track planned at NATRAX-Indore.** The lab will give R&D facilities to the automotive sector by simulating real road conditions in test lab scenario. Vehicle Dynamic Lab will assist component and vehicle manufacturer in developing component and vehicle structure design that are assessed using the latest techniques. The Lab will provide test facility for evaluation of vehicle components, automotive sub-assembly and complete vehicle performance and durability. **The complete facility of Vehicle Dynamic Center of Excellence has divided in for test rigs which are as follows:**

1. K&C TEST RIG

Kinematic and compliance (1axle) static is used for accurate and quick measurement of the Kinematics and Compliance Deflection properties of the front and rear axle suspensions of automobiles.

2. ELASTOMER CHARACTERIZATION TEST RIG

The test rig shall be dedicated mainly to the characterization of passenger cars suspension bushings and engine mounts. The Elastomeric Test System is configured specifically for characterizing the dynamic properties of elastomeric materials and components.

3. DAMPER CHARACTERIZATION TEST RIG

The test rig shall be dedicated to test the characterization of dampers (passenger cars and trucks). The test system is a functional evaluation tool used in both performance and durability testing applications. The test rigs are having servo hydraulic load frame technology with advanced controllers and the most feature-rich damper testing software available.

4. STEERING TEST RIG

The purpose of this equipment is to perform durability, quality, simulation, road data and characterization tests of steering systems. This system is designed to test the durability of steering system applications and steering components.