Latest Developments in Automobile Sector

Tesla Model X

Specifications:

Length 198.3"
Wheelbase 116.7"
Width 89.4"
With mirrors folded 81.5"
Track Front 65.4", Rear 66.9"
Clearance 5.4" - 8.3"
Head room
Front 41.7"
Second Row 40.9"
Third Row 37.1"
Leg room
Front 41.2"
Second Row 38.4"
Third Row 32.7"





- Shoulder room Front 60.7" Second Row 56.8" Third Row 40.0"
- **Hip room**Front 55.6"
 Second Row 59.0"
 Third Row 38.5"
- **Seating capacity** 7 adults **Total interior storage** 88.1 cu ft in the five seat configuration
 - Curb weight 100D - 5,421 lbs P100D - 5,531 lbs
 - Weight distribution

100D - Front 50%, Rear 50% P100D - Front 49%, Rear 51%

Body

Lightweight aluminum body reinforced with high strength, boron steel elements. UV and infrared blocking safety glass windshield. Frameless, tempered safety glass front windows. Solar absorbing, laminated safety glass rear window with defroster. Flush mounted door handles. Power folding, heated side mirrors with memory. 20" aluminum alloy wheels with all-season tires. Three-position dynamic LED turning lights. LED fog lights. Backlit side turn signals, front side marker lights and rear reflex lights

LED rear taillights and high-mounted LED stop lamp.

Powertrain

Model X is an electric all-wheel drive vehicle. The liquid-cooled powertrain includes the battery and one or more motors, drive inverters and gear boxes. 75 kWh or 100 kWh microprocessor controlled, lithium-ion battery. Three phase, four pole AC induction motor with copper rotor. Drive inverter with variable frequency drive and regenerative braking system

Suspension, Steering, and Brakes

Smart air suspension with GPS memory for automatically raising and lowering ride height. Double wishbone, virtual steer axis front suspension and independent multi-link rear suspension. Variable ratio, speed sensitive electronic power steering. Electronic traction and stability with integrated vehicle dynamics control. Anti-Lock disc brakes (ABS) with ventilated rotors and electronically actuated parking brake

Interior

14-way power adjustable, heated front seats with memory

Center console with armrest, concealed storage, 4 USB outlets (5 USB outlets in 6 and 7 seat configurations), and 6 cup holders. Front door trim with map pocket, bottle holder, and metal door release handle. Hand wrapped microfiber and synthetic leather interior surfaces. Dark ash wood décor accents. Soft LED ambient interior lighting. Auto dimming mirrors. 240 watt, nine speaker stereo system with FM/HD radio. Supports MP3, AAC, and MP4 music formats.

Charging

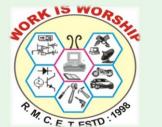
Supercharger enabled. Compatible with Tesla wall connector. 20 foot mobile connector with storage bag Automatic charge port door, concealed in rear driver side tail lamp. 240 volt NEMA 14-50 adapter. 120 volt NEMA 5-15 adapter. J1772 public charging adapter

Note: Autotrendz does not assume any responsibility for the information furnished, views expressed by the individuals.

Published & printed by Prof. Nimesh S. Dhole, Head, Automobile Engineering Department, on behalf of RMCET, Ambav-415804.

Designed by: Suraj P. Yadav Edited by: Prof. Swapneel D. Rawool. (For Private Circulation Only)

Rajendra Mane College of Engineering & Technology, Ambav Department Of Automobile Engineering





Vol. XI Half Yearly Jun - Oct 2016

NEWS LETTER

Department Vision

To mold the students into professional and competent automobile engineers, who can meet the global demands.

Department Mission

- 1. To prepare students for utilizing more creative thinking and inattentiveness.
- 2. To develop 'educational pathways' so that students can maximize on their optional career choices.
- 3. To inculcate integrity, honesty and team building through curricular, co-curricular activities.

Louis Chevrolet

He was born on Christmas Day, December 25, 1878, in La Chaux-de-Fonds, Switzerland, to Joseph Felician Chevrolet, a watch and clockmaker, and his wife, Angelina Marie Chevrolet. He was the second child of the six children - four sons and two daughters - of his parents. When he was around six years old, the family moved to Beaune, a small town in the Burgundy region of France. When he was a child, his father taught him basic mechanical skills and stressed the importance of precision in the manufacture of machine parts. As a teenager, he developed an interest in bicycle racing and became an apprentice in a bicycle shop. He started repairing broken bicycles with the help of repair manuals in his spare time.

His driving skills attracted the attention of the auto executive, William Durant, and the two men combined their talents to form the Chevrolet Motors Company. With little formal education and a vast knowledge about automobiles, he designed a stylish six-stroke touring car, which provided that his design abilities matched his racing skills.



After professional differences with Durant, he left the company and became a successful independent designer of racecars. He was a motor racing legend whose accomplishments left a huge impression on the American automotive industry.

Louis Joseph Chevrolet was a Swiss-American car racer who designed the first Chevrolet automobile and also founded the 'Frontenac Motor Corporation'. In 1905, in his first automobile race, he defeated the great American driver Barney Oldfield, and thereafter he set records on every important track in the United States. During his career on the famous brick track he won 10 races and an additional 27 major races elsewhere. In 1911, he co-founded the Chevrolet Motor Company with Durant, and even with little formal education, he designed and built the first Chevrolet automobile. He also established the 'Frontenac Motor Corporation' to build high-performance engine heads.

"We are all travellers in the wilderness of the world, and the best that we can find is one of the honest friend."

Achievements

Faculty Achievements

- Prof. S.S. Surve successfully attended the workshop on "Fracture and fatigue of Engineering Material" held by GIAN Institute held at SPPU, Pune.
- Prof. P.L. Mane successfully attended the workshop on "Principles of Steel Making" organized by IIT Bombay.
- Prof. R.U. Powar successfully attended the workshop on "Robo Expedition" organized by IIT Bombay.
- Prof. N.S. Dhole & Prof. R.D. Rajopadhye published paper on "Optimization of Bio- Diesel Engine Parameters using Taguchi Approach" at International Conference at H.I.T., Nidasoshi.
- Prof. N.N. Manchekar & Prof. A.P. Yadav published paper on "Design and analysis of composite leaf spring" at International Conference at India International Centre New Delhi.

• Prof. A.P. Yadav published paper on "Experimental study of plate heat exchanger with CuO₂ Nano Partical" at International Conference at H.I.T., Nidasoshi.

Students Achievements

- Mr. Vaibhav Bhavdhankar secured first prize in Paper Presentation competition at Tech Fest organized by MPCOE, Velneshwar.
- Mr. Harshad Naik & Tushar salvi participated RobOlympics at FAMT Ratnagiri.

Events & Activities

Industrial Design Standard using CAD Tools was organised by Prof. S.D. Rawool which proved very essential for BE and TE Auto students.

Road safety programme was arranged by Autotrendz Committee which was beneficial for all the Automobile students.

Programme of Carriers in Automation Engineering was held by Prof. N.S. Dhole guided by SEED Infotech Pune for all the BE Auto students.

28th Road safety week was celebrated by Autorendz Committee for all the students guided by R.T.Office, Ratnagiri.





A workshop on Industrial fluid mechanics was organised by Prof. S.D. Rawool for all the BE Auto students. Teacher's Day Celebration & Freshers Party was arranged by Autotrendz committee.

Engineers Day Celebration was successfully held by Autotrendz Committee for all the RMCET students.

Career opportunities in automobile industry programme was organised by Autotrendz CGC.

Sports Bike Show (Auto Day) was held by Autotrendz in which the ROAR group informed the students on bikes.

"Donation Of Educational Stationary to Students of Primary Ashram Shala Nive" programme arranged by automobile students proved beneficial for Students of Primary Ashram Shala Nive.

Creative Section



Rugved Patil (TE Auto)



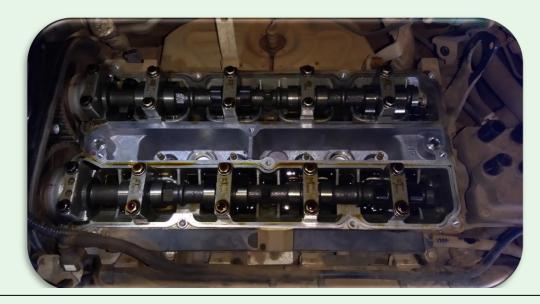
Vinay Salvi (TE Auto)



Suraj Yadav (TE Auto)



Suraj Shinde (TE Auto)



There are two days in a person's life —the day we are born and the day we discover why.

-William Barclay