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|  | **PRESSURE AGING VESSEL****PRESSURE AGING VESSEL****Name of the equipment:** Pressure Aging Vessel**Make & Model:**PRENTEX- PAV9500**I-Stem Registration ID-** **Category of Instrument**Characterization and Testing**Types of Analysis / Testing**Used for aging paving asphalt binders**Application:** It is used in the asphalt industry for the aging of paving asphalt binders, specifically for testing and evaluating their performance and durability under various environmental conditions.**Description of Instrument**It is a laboratory instrument used for the accelerated aging of paving asphalt binders. It consists of a pressure vessel, air supply system, and temperature control system, designed to simulate the effects of time and temperature on asphalt binders. |

**Booking Details**

**Contact Details**

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| **Book through I-STEM:**<https://www.istem.gov.in/>**Slot Booking Link**I-STEM Slot Booking link for External User | **Booking available for**Internal and External Both**Requisition form for**[Internals](https://randc.nitc.ac.in/pdf/instruments/civil/CED-REQUISITION_FORM_Internal.pdf)[Externals](https://randc.nitc.ac.in/pdf/instruments/civil/CED-REQUISITION_FORM_Internal.pdf) |

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| **Features, Working Principle and Specifications** **Features of the equipment*** Pressure vessel
* Air supply system
* Temperature control system
 | **Unique features/Measurement capabilities, if any*** Simulates real-world aging conditions
* High-pressure vessel (up to 350 psig)
* Precise temperature control (50°C to 180°C)
* Real-time data logging
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| **Instrument Technical Description and Major Specifications (This Specifications Limited to Major 5)*** Pressure: 350 psig (2.41 MPa)
* Temperature: 50°C to 180°C (122°F to 356°F)
* Power: 10-amp, single-phase, 100-125 volt AC
* Air Supply: Regulated compressed air (2.10 MPa)
* Dimensions: 60" x 36" x 24" (152 cm x 91 cm x 61 cm)
 | **Measurement/Sample specifications:** * Sample size: 10 TFOT sample pans
* Sample type: Asphalt binders
* Temperature control: 50°C to 180°C (122°F to 356°F)
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**Type of Sample Required for Analysis / Testing (Quantity, Pre-Preparation, State etc.) Guidelines for Sample Submission – User Instructions**

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| The Prentex PAV Model 9500 requires:* Sample type: Asphalt binders
* Sample quantity: 10 TFOT sample pans
* Pre-preparation: None required
* Sample state: Liquid or semi-solid

Guidelines for Sample Submission:1. Collect a representative sample from the production batch.
2. Store and label the sample properly.
3. Submit the sample to the testing laboratory in the original container.
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**User Charges Rs. (GST Extra)**

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| **Internal** | **External Academic Institutes** | **National R&D Lab** | **Industry** |
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