

## Mu-Meter Mk 6 – Specification

**Trailer Part No:** ANS8085-9000

### Dimensions

Length 1553 mm (65 in)  
Width 960mm (37.8 in)  
Height to top frame 570 mm (22.4 in)

### Towing Hitch Height

From fender mark to ground 305 ± 12 mm (12 ± 0.5 in)

### Operational Weight

Including ballast 256 kg (560lb)

### Tyres

Friction Measuring Tyres (Special slicks)  
Distance Measuring Wheel (Std 16 x 4 x 6 ply)

### Towing Speed

Normal Friction Testing 64 kph (40 mph) paved surface

48 kph (30 mph) grass surface

Runway Calibration 64 to 96 kph (40 to 60 mph)  
may be operated at 128 kph (80 mph)

### Operating Voltage

Vehicle supply 12V dc

### Electronic Modules Processor Unit (Laptop PC)

Dimensions (Screen Closed) 229 x 43 x 188 mm (9x1.7x7.4 in)

### Towing Vehicle Interface

Plug in cables with IP68 connections or optional wireless system.

### Water delivery system:

A range of water delivery systems are available as options and can be supplied to supplement the Mu-Meter when it is required to classify runways as defined in the appropriate authority classification specification.

### Corrosion protection:

The components of the Mu-Meter are heavy duty powder coated for corrosion protection against all conditions and de icing materials encountered at modern airports.

### Hard Disk Drive

The fixed hard disk drive has the capacity to store over 60,000 runway friction measurement runs. Specialist shock-damping materials are used to isolate the hard disk drive to help protect the data should the Processor Unit be accidentally dropped.

### Electronic control and processing system:

Information sensing, conditioning, processing, recording, storing and visual display are all actioned by the electronic system. It is contained in discrete items, these being: the load cell, distance sensor encoder and the central control unit mounted on the trailer.

The marshalling enclosure and laptop processor are mounted in the towing vehicle.

Electrical connections between the units are made through conventional electrical interface connectors giving protection from the ingress of moisture to IP68 standards. A stowage socket is fitted to the back face of the trailer towing plate adaptor to accommodate the trailer-to-towing vehicle connector when the wired version is selected.

### Laptop processor:

The processor comprises a 400 MHz computer with 64 Mb of SDRAM, and an 8.4" (TFT) colour Touch screen facility. Digital information is passed from the central control unit to the laptop processor screen for constant 'real time' evaluation during the measuring run.

The laptop processor can store 999 programmed friction runs, including 999 full classification surveys in accordance with:

1. ICAO Annex 14, Volume 1; Attachment A, Section 7, Para 7.1 of the International Civil Aviation Organisation Airport Services Manual Part 2 (Third Edition-July 1999).

2. UK CAA CAP683 Procedures for Runway Friction Classification and Monitoring.

The user also has the ability to create 999 custom runs. On power-up the laptop carries out a functional check on itself, and then loads the operating system. The user is then presented with a Password screen before entering the Main Software Menu.

3. FAA Advisory Circular: Measurement, Construction and Maintenance of Skid Resistant Airport Pavement Surfaces.

### Memory Key

A USB Memory Key is supplied as standard for exporting data for archiving or data transfer.

The Memory Key is capable of storing approximately 100 x 4,500 meters (15,000 feet) of runway friction measurement runs.

The Memory Key can be inserted into any desktop PC for archiving.

### Display Laptop

The touch screen lets you operate the poly silicon LCD even with gloves on.

Anti-reflection coating technology reduces reflectivity. The display is the main user interface. From here the user can display Menus, Programs, Run information and friction/distance graphs. The user can also perform basic analysis of the test runs. A zoom and pan function allows for close inspection of the graph down to a resolution of 200mm of the runway. This can be conducted immediately after the run has been conducted or later back in the office.

**For full details or to arrange a demonstration, contact Douglas SPD today.**

**DOUGLAS**  
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# Mu-Meter



...reliable, repeatable  
runway friction measurement

Uses cutting edge technology  
and offers superb value for money!

**DOUGLAS**  
**SPD**

The Douglas SPD Mu-Meter is one of the enduring success stories for the compilation of runway friction reports and contaminant drag measurement data without the need for specialist towing vehicles.

The world's best selling CFME system with over 950 units now sold around the world, Mu-Meter has consistently maintained its market and technical leadership since its launch some 25 years ago.

Douglas actually encourages technical upgrades of earlier model Mu-Meters. Our designers specifically ensure that current design developments are applicable to earlier machines so that they can be easily upgraded. It is not uncommon for a 20 year old Mu-Meter to be returned for upgrade to the latest standard.

- Ideal for testing airport runways, taxiways and highways.
- The Mu-Meter consists of a small three-wheeled trailer incorporating sophisticated electronic measuring and sensing systems operating in conjunction with a touch screen laptop computer (supplied) which is carried in the towing vehicle.
- The trailer produces data which is presented on the laptop screen and which can subsequently be down loaded to an office PC.
- Fully integrated design with a powerful onboard microprocessor based system for years of trouble-free operation.
- Software uses an MS Windows© environment which is simple to use, fully PC compatible and stores a wealth of vital measurement data.
- Mu-Meter can be supplied with optional software to provide both runway contaminant drag measurement and audible GPS position and report history.
- Mu-Meter produces automatic computerised results in a range of prescribed formats (CAA/FAA/ICAO etc) and in the chosen language of the operator.
- The Mu-Meter can be operated in both dry and self-wetting modes and will provide accurate day-to-day measurements as part of a runway maintenance plan.
- Another added advantage is it does not require a specialist tow vehicle or a dedicated van conversion.
- Results combine the effects of contaminant drag\* and immediate – weather related – friction reports for operations management. \*optional
- Douglas SPD will also be happy to arrange a demonstration of the Mu-Meter Mk6's capabilities on site.

