



# OS-5p+

The Advanced, Portable,  
PAM Chlorophyll Fluorometer



Widest range of automated testing protocols  
More than any other portable fluorometer

Weighs just 1.6kg

Up to 12 hours continuous use



## More testing protocols than any other portable chlorophyll fluorometer

Chlorophyll fluorescence can measure most types of plant stress and also analyse the photosynthetic process.

### Plant Stress Parameters

**Fast Tests:** Fv/FM, Y(II)  
OJIP (Strasser parameters)

**Analysis Tests:**  
Kinetic test (ETR, qP, qN and NPQ)  
Quenching relaxation (Puddle and Kramer  
Lake model parameters qP, qN, NPQ, qE, qT & qL,  
qL, Y(NPQ), Y(NO))

**Stepped actinic test:**  
Photosynthetic response to different light intensities

### Optional PAR Clip

Designed for one hand operation.

The opening mechanism prevents the weight of the fibre optic opening the PAR clip unexpectedly.

Features a mini PAR sensor and a leaf temperature thermistor.

An internal stable actinic light source is provided, as standard, to supply constant light levels (0-3000  $\mu\text{mol m}^{-2} \text{sec}^{-1}$ ).

As Yield measurements can vary significantly with light level and temperature, it is recommended to use the PAR Clip when making Yield measurements in the field and in the determination of electron transport rate (ETR).



## **OS5p+ Technical Specification**

### **Excitation sources:**

#### **Saturation pulse:**

White LED with 690nm filter.

0-15,000 $\mu\text{mols m}^{-2} \text{sec}^{-1}$ ,

7,500 $\mu\text{mols m}^{-2} \text{sec}^{-1}$  with PAR Clip

#### **Modulating light:**

2 channel 660nm (red) and 450nm (blue) LED

#### **Actinic light:**

White LED 0-5, 800 $\mu\text{mols m}^{-2} \text{sec}^{-1}$

0-1, 850 $\mu\text{mols m}^{-2} \text{sec}^{-1}$  with PAR Clip

#### **Far red:**

Intensity adjustable 740nm LED

### **Detection method:**

Pulse Modulation

### **Detector:**

PIN photodiode with 700-750nm filter

### **Sampling Rate:**

Auto-switching from 1 to 10,000 points per second, depending on test and phase of test

### **Test duration:**

Adjustable 0.1 seconds - 12 hours

### **Data storage:**

1Gb internal memory. Removable SD Card

### **Digital output:**

USB and 1GB SD Cards

### **Display:**

Graphic, backlit, colour, TOUCH SCREEN  
(114mm X 89mm)

### **Battery:**

Rechargeable nickel metal hydride. Up to 12 hours of continuous operation

### **Operating temperature range:** 0°C-50°C

### **Dimensions:** 18cm x 14cm x 8cm

### **Weight:** 1.6kg

[www.adc.co.uk](http://www.adc.co.uk)

