



Datasheet

Scout frontend

SCT V2.0

Microflown Technologies Phone : +31 880 010 811
Tivolilaan 205 Fax : +31 880 010 810
6824 BV Arnhem Mail : info@microflown.com
The Netherlands Web : www.microflown.com

SCOUT

Improved Electronics for Microflow Probes

Particle velocity sensor signal conditioning

The “Scout 422” is a highly accurate 24 bit resolution USB data acquisition system. It is specially designed for Microflow™ probe based solutions for noise and vibration measurements. The “Scout 422” has four inputs, one output, one amplified output, one tachometer input and an external trigger channel. It also supports other sensors like microphones, accelerometers, IEPE sensors and tachometers.

In most common measurement applications the “Scout 422” makes use of the USB powering, so no additional power cables are required. Only when the amplified output is used, which relies on an internal integrated amplifier, the external powering is required. The amplified output can be used to excite a sound source or small shaker.

I. CHARACTERISTICS

Parameter	Value	Unit/ note
Physical		
Dimensions (W x D x H)	126 x 49 x 180	mm
Weight	900	g
Interface	USB 2.0	
Environmental parameters		
Maximum humidity range	95%	non condensing
Altitude	10.000	feet
Operative Temperature range	0 to +55	°C
Storage temperature range	-25 to +85	°C
Regulatory		
EMI emissions	Class A	
4 analog inputs		
Connector	Connector	BNC
Resolution	24	bit
Máx. Sample rate	52	kHz
Input Range	1-10	V peak
1 Tachometer Input		
Connector	BNC	
Input Range	+/- 30	V
Max. input frequency	1	MHz
Minimum pulse with	1.3	micsec
Counters	83 21	nanosec resolution
Compatible sensor types	IEPE & not	
1 Analog Output		
Connector	BNC	-
Resolution	24	bit

Máx. Sample rate	52	KHz
Input Range	10	V peak

1 Power Amplified Output

Connector	BNC	-
Output range	5 to 27	watt
Fixed gain switch		

1 External Trigger

Connector	BNC	
TTL rising		

II. INSTALLING SCOUT

DRIVER INSTALLATION

Scout drivers are always included in the VELO platform software installer. Select the drivers from the list when installing:

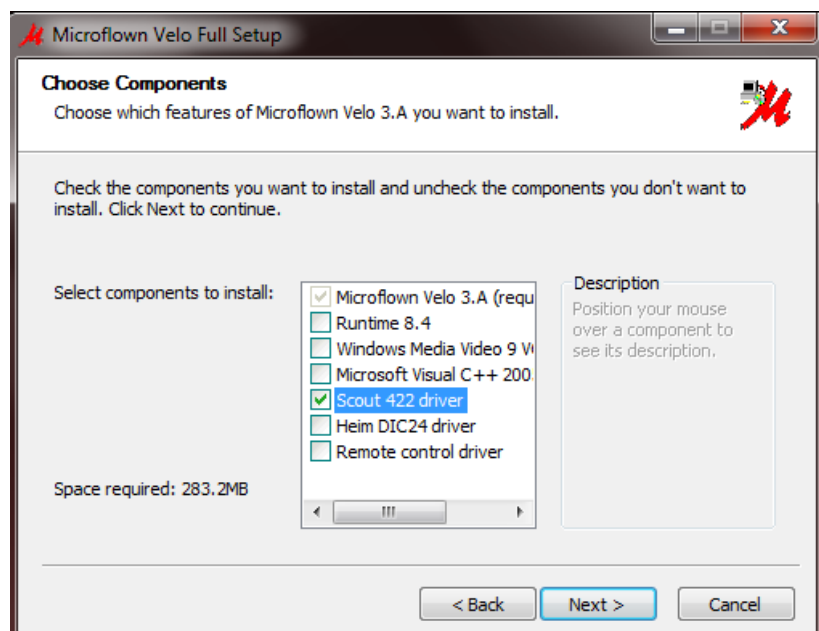


Figure 1. Scout drivers selection

Press on "install" to proceed with the driver installation:

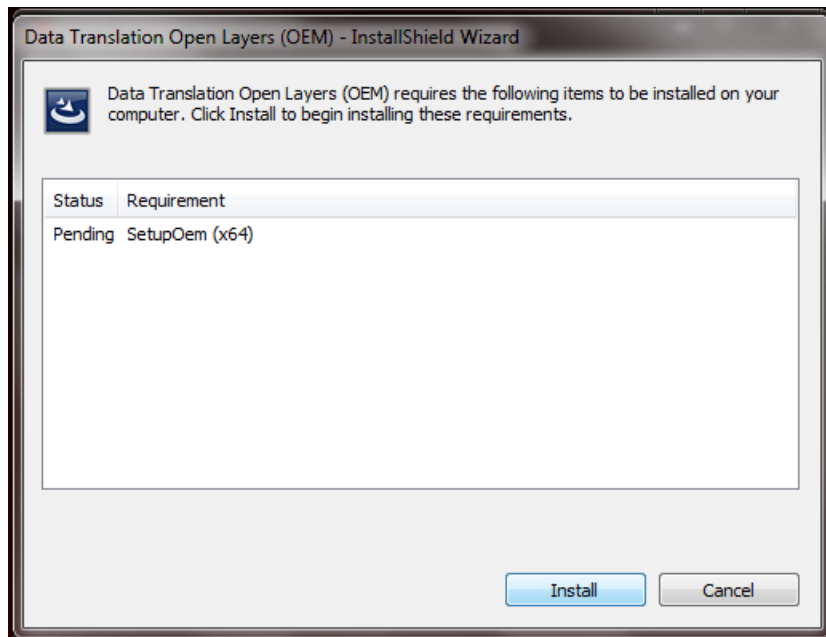


Figure 2. Proceed with installation process

When installation is completed and the Scout connected to the computer via the USB port, go to Control panel
 → Open layers control panel



Figure 3. Open layers control panel

If the drivers are correctly installed, the device should be visible here:

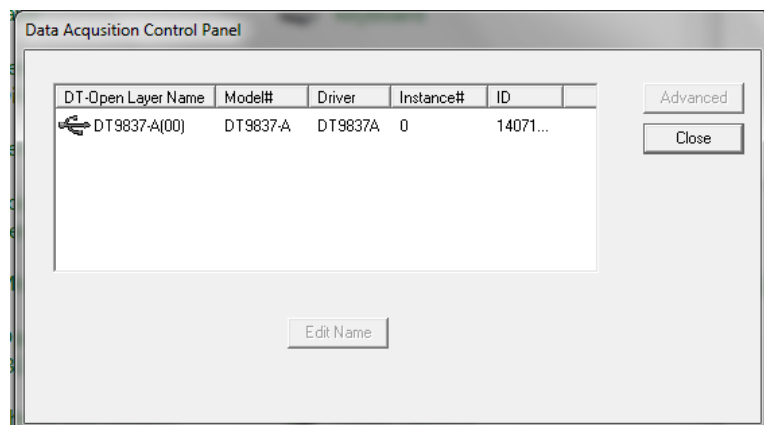


Figure 4. Scout device detected at open layers control panel. Device correctly installed

III. USAGE AND PRECAUTIONS



- Do not submerge the electronics in water as this will lead to permanent damage.
- Do not connect the system with any other power supply than provided
- Only use the provided USB cable to connect the equipment to your computer. Lower quality cables often have data throughput problems
- Ensure that the ICP power options are correctly set via software, before connecting the Microflown probe.

IV. TECHNICAL SUPPORT

If you experience any problem or doubt regarding your equipment, please contact Microflown™ Technologies Customer service:

- Mail: cs@microflown.com
- Skype: cs.microflown
- Telephone: +31(0) 88 001 08 11 Monday to Friday, from 9:00 to 17:00 (UTC+1).

V. WARRANTY POLICY, REPAIRS AND REPLACEMENTS

WARRANTY AND REPLACEMENT OR SUBSTITUTION

During the first two years (24 months) the seller offers a warranty on all its products, except for trading items and third party manufactured items. The seller warrants that all products will be free from defects in materials and workmanship for this period of two years. During this two year period, the seller will repair or replace defect products free of charge. Products damaged by accident, abuse, misuse, natural disaster or by any unauthorized disassembly, repair or modification are not covered by this warranty. The incurred transportation costs of returning the products to seller will be borne by the buyer. The logistical cost for returning the products back to the buyer will be borne by the seller. Several products come with a “VOID if seal is broken” sticker, the warranty is void at all times when this sticker is broken.

GRACE PERIOD (YEAR 3 AND 4)

During the third and fourth year the seller offers a grace period. In the grace period the products purchased at an earlier date can be replaced by completely new state of the art products of the same scope of the original purchase. This applies only for the products known as standard probes and signal conditioners. In the first year of the grace period, (year 3) customers have an option to replace their products for 25 % of the actual ex works end-user price. The full freight and packaging charges apply.

In the second year of the grace period, (year4) customers have an option to replace their products for 50 % of the actual ex works end-user price. The full freight and packaging charges apply.

The new products are accompanied by a new warranty. Both the two years warranty and grace period become applicable again from the date of invoice.

REPAIRS OUTSIDE WARRANTY POLICY

Replaced/repared parts come with a six month warranty under the same conditions as the two year warranty.