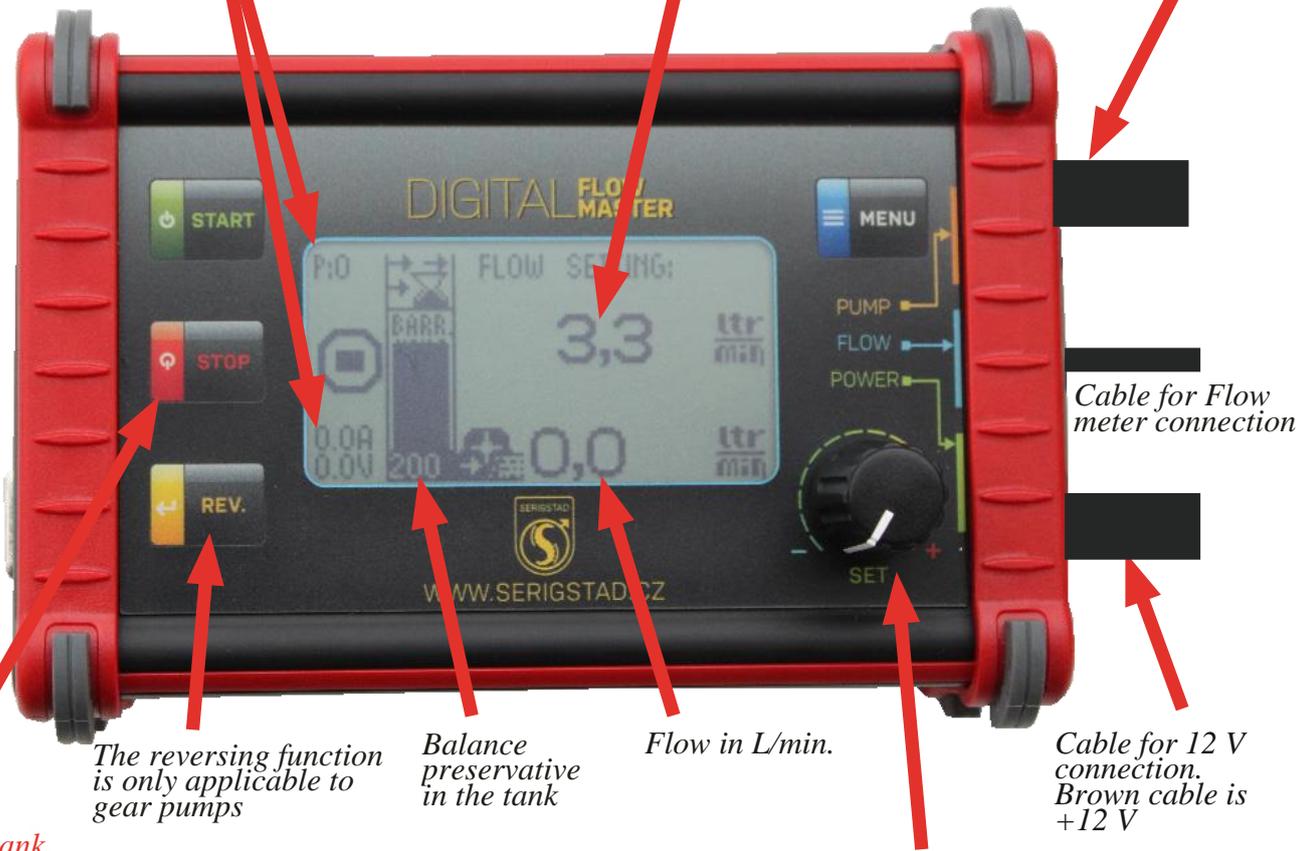


Real load on the pump motor on the top Percent and amps.- in the bottom

Flow rate set by the control unit. After switching on, the control unit maintains the flow rate.

Cable for pump connection



Refilling the tank.

Control and adjustment of pump operation / Hold 5 sec. STOP button. Every time tank is empty, refill the tank. Display show again preset barrel volume.

DIGITAL FLOWMASTER

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The control unit is designed for ease use. Once you understand the basic principle, all functions are logical. The Digital Flowmaster 4 generation is built on the basis of years of experience. We believe you will be happy with our product.

For quick introduction, press MENU.

Rotate the wheel to select individual functions.

If another language appears, select the line and press the wheel to select the appropriate language. When the wheel is pressed again, you return to the menu, where you can select the settings again by turning the wheel.

Press MENU to return to pump control mode.



Auto reverse - This function start automatically reverses. The pump stops automatically when the hoses are exhausted.

WARNING - this function is only applicable to gear pumps. Activates by pressing the wheel. If this function is not used, the cross appears.

Tank size - The size of the tank is set by pressing the wheel and adjusting the size on the display. Once you have set the correct value, you can save it by pressing the wheel again.

Delayed start.

This function delays pump start. It is used when the pump starts automatically by the remote control or 12 V signal. In that case, there may start dosing before mass appears. To prevent this problem, we can set a delayed start of the pump with the help of a wheel.

Fuse selection.

This function is used to adjust the current amper limit to avoid damaging the pump.

GP 8 - 8A MP 6 - 8A MP12 - 12A GP12 - 20 A MP17 - 20A MP 20-20

Record

The log shows the amount of liters per time. Suitable for service use. When the job is finished, the value is reset.

Flow meter

Used to calibrate the flowmeter. See calibration of the flowmeter.

Working mode

Here are the different modes of use.

Language

Selection of language

Time -automatic reverse

If Auto reversal is selected, we can select the time for the pump to reverse. When the remote control is used, the sensor responds in short intervals and the pump unnecessarily switches back.

Low Dosing System

For controlling of Low Dosing System

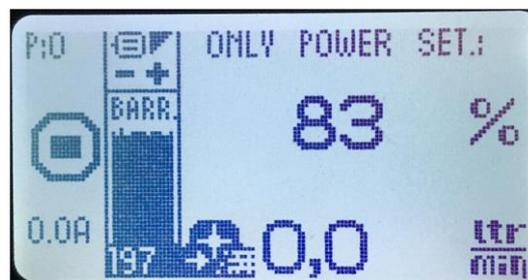
DIGITAL FLOWMASTER

2

Working mode - 01

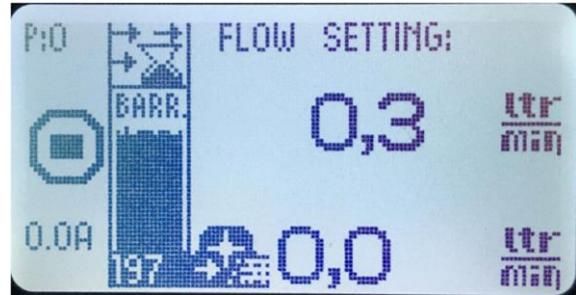
This mode is designed for direct pump control. Turning the wheel increases and decreases the pump performance.

Press MENU to return to pump control. Pressing the wheel will show SET and turn to select the pump power in percent.



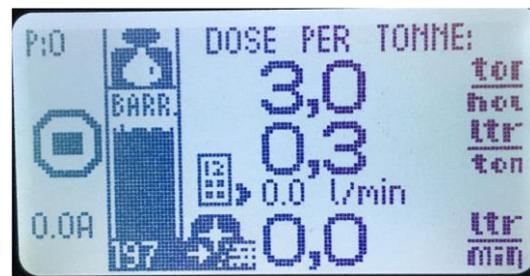
Working mode - 2

This mode is used to adjust the pump control based on the flowmeter data. Set a certain flow by wheel and the control unit keeps specified flow rate throughout the application period.



Working mode - 3

This mode is for easy dosing adjustment. Especially for cutters there is a known capacity per hour. The preservation of the preservative is given in liters / ton. If we are not sure of the hourly capacity, we will measure the time of the first wagon after weighing,



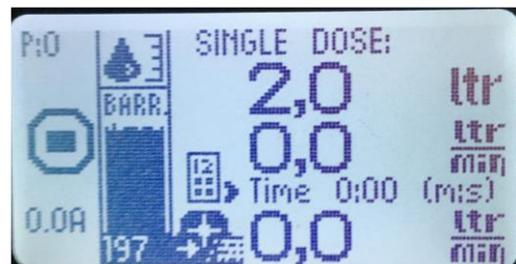
DIGITAL FLOWMASTER

3

Working mode - 4

When using this function, the pump deliver the set value after each start.

At the same time, we can adjust the flow rate. Based on these parameters, we will see the time at which the pump exhausts the dose.



Working mode - 5

When the pump is controlled by machine speed, the number of pulses supplied by the speed sensor is set. In this case, the value is 10 l / min. divided into 100 pulses. If the machine is moving faster, dosing will be

increased if the dosage is reduced more slowly. The pump starts and stops on the basis of the signal. If the machine move, it starts pumping if it stops, stopping the pump. The pulse value is set so that the speed of the machine matches the desired flow rate.



Micodosing

Used for applicator SLD.

Dosing rate - 0,1-0,18 l/min.



DIGITAL FLOWMASTER

4

Language



Barrel size



Revers delay.



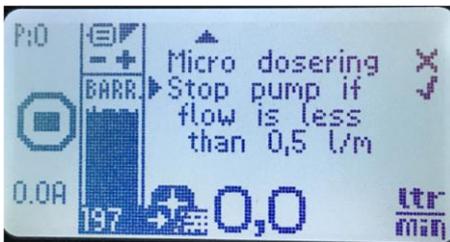
Start delay



Pump stop if flow is lower than 0,5 U/min.

This function should be always on.

If the flowmaster lose signal from the flow meter for some reason (broken flow meter, the cable loses contact) you can complete the work in emergency mode without feedback only by estimating in Mode 1



DIGITAL FLOWMASTER

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Flow meter calibration

If the barrel is not empty, when the display shows it is exhausted, reduce number of pulses.

If this is the opposite, add the number of pulses. The reason is the density of different preservatives and acids.

*In many Flow meter set 145 pulses.
Microdosing is value 4100 pulses.*

GPS control

Set Flowmaster to mode 5. Connect cable from GPS and mechanical switch to connector on side of Flowmaster. Display switch automatically to this option.



Remote control

If we want the pump to switch on automatically based on the switch located on the moving parts of the machine, connect both ends to the mechanical switch. If both ends are connected, the pump will start running. If disconnected, the pump stops.



If the machine gives a 12 V signal (most cutters), the blue cable is connected to +12 V. Cuttecs gives signal 12 V after putting down pick up, start drums and machine is moving

The same connector connects speed control. The inductive sensor is placed on the machine. Sensor picks up the speed at which the pump performance is controlled. The sensor is inductive. That is, it records a pulse every time it approaches the metal part. In practice, this means that the sensor is placed on a gear or on a wheel with holes to alternate between the full material and the holes. The number of pulses is set to 100 pulses = 10 l/min. Accordingly, the number of pulses is set to match the value we want as the basic at a given speed.



GPS modul for Roundbailers.

Connect in GPS sensor to Digital Flowmaster.

Sett Mode - 5

When cable is connected to the Digital Flowmaster display shows automatic

Place switch to pic up. Whne pick up is down the signal is on.

When pick uo is up the signal is on.

GPS start the pump then roundbailer is moving, When sopp, the pump will stop. When pick up goes up and rounabailer is driving the pump is off.

DIGITAL FLOWMASTER

If you use a gear pump, you can use the reverse function to exhaust the preservative back into the tank. A reverse gear message will appear on the display and the pump will run at 80% of the power in the reverse direction. Once the hose preservative has been exhausted, the pump stops automatically on the basis of a small flow.

This message will also appear when the preservative is exhausted from the tank, stopping the pump at a lower flow rate than 0.5 l/min.

All messages are not shown in this manual. This is an auxiliary or purely indicative report.

We believe that once you understand this system, setup and control will be easy to understand.

In development, we have used our years of experience with applicators to create devices with a range of functions, but not difficult to understand.

Problem solving.

1 Small flow.

See if you can see bubbles in outlet hose. If so, check all suction side connections. As long as bubbles appears, the pump will not work at full power.

Older pumps can have hardened diaphragms. The life of the membranes is about 2-3,000 hours depending on the type of preservative. Never use petrochemical products. They destroy the membranes even in small concentration.

Another cause may be impurities in the membranes. Always use the filter.

If you are using biological preservatives, take care to thorough rinse after use. Rinsing is also recommended for chemical preservatives.

Sometimes it is caused by a flattened suction hose. At higher temperatures, the hose may under certain circumstances flatten.

2 Flow does not show any value.

Check the cable and connectors between the flowmeter and the control unit. Another option is a damaged flow meter. If you can not remove the problem, continue working in manual adjustment only according to pump motor power. Estimate the dosage as last engine power values. It is always displayed on the left side of the screen.

3 The pump stopped.

Checks the status of the tank. If it is zero, refill the tank and reset the tank by holding down the STOP button for 5 seconds.

4 The flow rate of the pump is less than 0.5 l / min.