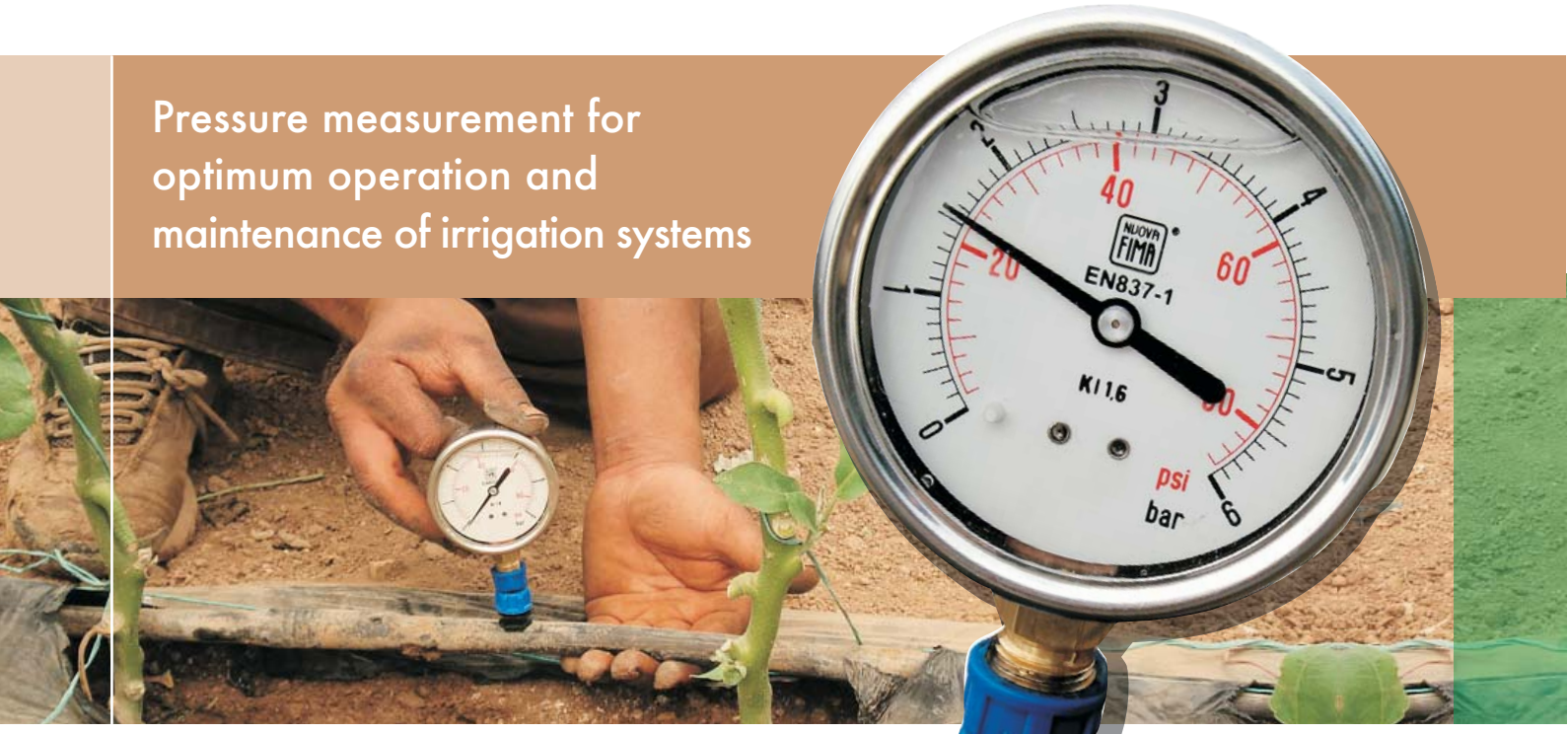
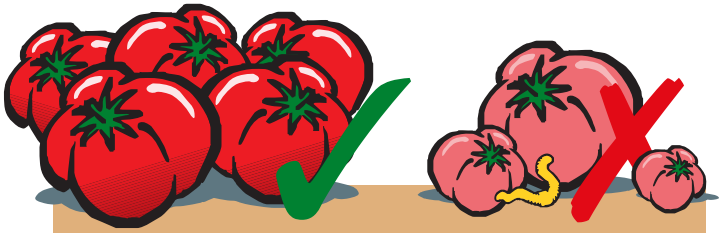
Removal Pressure Gauge

Pressure measurement for optimum operation and maintenance of irrigation systems



Why measuring pressure?



Adequate pressure and uniform flows delivered to the plants:

- ✓ Better yield (quantity + quality)
  - ↳ Higher revenue
- ✓ Less risk of clogging of the emitters
  - ↳ Higher life time of the pipes
- ✓ Water and fertilizers saving

Removable plastic pressure gauges

Low cost
need less number of gauges

Long life
removable means protected, plastic resists water and do not rust.

Easy to install and maintain
easy to fix on all kind of pipes

Flexible number of measuring spots

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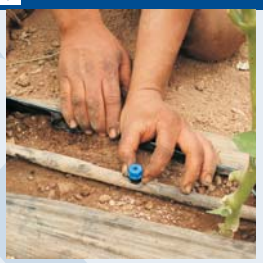
How to check if the operation is correct?

Emitters should be operated at a specific pressure, determined by the manufacturer. To be sure that this adequate pressure is respected, it is important to measure the pressure with pressure gauges on the different points of the irrigation network (from the water source to the emitter).

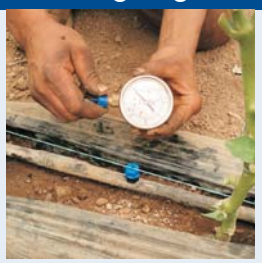
Be sure that your pressure gauge is made of glycerine.

For a easier reading choose it with a wide measurement range

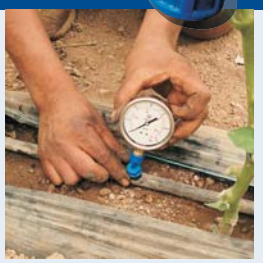
How to use the pressure gauge?



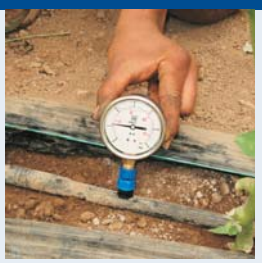
1. Fix the plastic basis on the pipe



2. Fix the plastic needle on the gauge

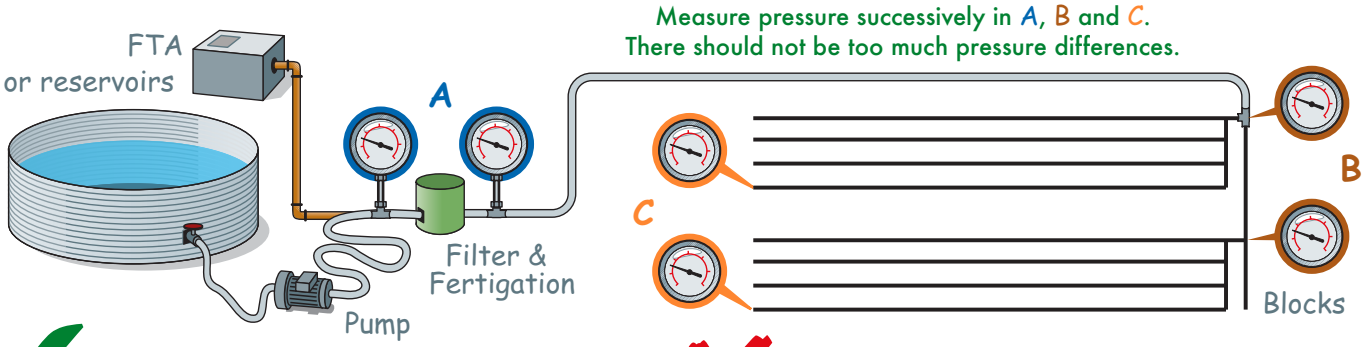


3. Interlogg the needle and the gauge on the basis that is fixed on the pipe



4. Read the pressure indicated by the gauge

If your network is correctly designed, high headlosses mean that something wrong is happening



✓ Good operation* = High pressure (=1 bar at the emitter)

A. If difference before/after filter and fertigation is < 0,3 bar.

Filter Type	Clean Filter (bar)
Sand (media) Filter	0,2 - 0,3 bar
Disc Filter	0,1 - 0,2 bar
Screen Filter	0,2 - 0,3 bar

If pressure before filter and fertigation is ≥ 2,5 bar

B. If pressure at the begining of blocks is ≥ 1 bar

C. If pressure at the end of the laterals is min 0,8 bar!!!

✗ Wrong operation* = Low pressure (<1 bar at the emitter)

A. If difference before/after filter and fertigation is > 0,5 bar.

Clean the filter and check fertigation device

If pressure before filter and fertigation is ≤ 2 bar.

Check water source

B. If pressure at the begining of blocks is low <1 bar

Leakage. Check the network and valves

Too many block maybe opened at the same time

C. If pressure at the end of the laterals is < 0,8 bar

Lines may need to be flushed

* In most cases in Jordan, depending on the emitter and systems characteristics.

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