



Sensors



Switches



Controls

Application notes



Application Note : October 2018

Market involved : Agriculture

Product : RGTS

Customer : System integrators

Subject : Ensuring continuous water supply in mobile irrigation systems

CUSTOMER ISSUE :

In rural locations, irrigation of fields might not be an easy task to accomplish due to the limitation or inaccessibility of the electrical grid.

In such cases generators are normally used to supply the required power for the pumps.

Single phase centrifugal pumps require a significant starting current. This high starting current needs to be sustained by the generator.

Hence customers tend to oversize the generator to ensure they have enough power (also known as the starting kVA).

This results in higher installation costs and inefficiency, since the high kVA is only required for the start.

A solution is necessary whereby it is possible to reduce the size of the generator whilst making sure that the pumps start when needed.

OUR SOLUTION :

The RGTS is a soft starter designed for single phase 2-wire motors.

It can reduce pump starting currents by up to 40%.

The RGTS is designed for ease of use as it only requires 2 simple settings to configure – initial torque and ramp-up.

No control signal is required, thereby reducing control panel complexity and wiring.

The RGTS can work on voltages ranging from 100 to 240 VAC 50/60Hz.

BENEFITS :

- Less over-sizing of generators
- Fewer issues with unstable voltage supply
- Less wiring required
- Easy to retrofit in existing installations