

Submersible Level Transmitters | MeasureX Solutions

Designed for wastewater and slurry applications, these submersible level transmitters have a clog-free silicon piezo-resistive pressure sensor encased in a rugged 316 stainless steel body. These devices are able to withstand years of harsh use without damage from debris. The resulting instantaneous level output can be used for pump control and to inform plant personnel of the actual current level within the vessel. Some models are even available with a large diameter, process-isolating sensor diaphragm that can be sealed to protect against solids and clogs. PBLT2 and PBLTX are hazardous-location rated and provide high-resolution, stable levels for the most demanding of industrial applications.

The measurement method of a submersible level transmitter is based on the hydrostatic head pressure (pressure generated by a volume of liquid due to gravity). This pressure is transmitted to the sensor via a conductive fluid such as oil or water and converted into an electrical signal using built-in electronics. This signal is then converted to a 4-20 mA output after temperature and linearity compensation. This type of level sensor can be easily installed into a tank, well or vessel with a simple threaded probe or suspended from a loop wire. It is also ideal for well, ground, surface and surface water monitoring, environmental remediation and industrial process applications.

Another option for a <u>submersible level transmitter</u> is to utilize a magnetic level measurement system. These sensors use a magnet, which is attached to a buoyant float in an auxiliary column that restricts the float's lateral movement and allows for a more precise measurement. The movement of the float is then measured by a separate magnetic device to determine the current liquid height. This information is then transmitted to the transmitter.