



ROTECH FOR RELIABILITY!

Why Accept Anything Less?

Cost Comparison Motion sensors/encoders

The following is a comparison of the benefits between Rotech motion sensors/encoders and the use of individual proximity probes for monitoring speed, underspeed, slow down and stoppage of conveyors, elevators, dryers, etc.

Standardisation

In a plant containing a larger number of units.

| Rotech Motion Sensors | Proximity Probe |
|---|--|
| <p>All units identical</p> <p>Stock holding and specifying new equipment and spares greatly simplified.</p> | <p>Many variations of targets, brackets and guards will exist.</p> <p>Quality of manufactured items will generally be inferior.</p> <p>Standardisation is difficult if not impossible.</p> |

Reliability

Underspeed switches of this type are installed to monitor the reliability of plant and give alarm or shut down action if the problem occurs

Reliability equipment must be at least as reliable as the plant to which it is installed (otherwise it will breakdown before the plant itself) and ideally should be many times more reliable.

Rotech units meet the latter criteria.

Proximity probes are also very reliable, the problem occurs in their method of installation. The design and manufacture of targets, brackets and guards is inconsistent, with thought and care some will be good, many will be only average, whilst some will be poor and will always be troublesome. Objects can become trapped between the sensor and the target. The gap between the sensor and the target is critical, any lateral or axial movement of the shaft can result in the sensor moving out of range or worse coming into contact with the target and both being damaged.

The cost of stoppages

Almost regardless of the reason for production stoppages, the costs of carrying out repairs are minimal compared to the real cost – the loss of production throughput, revenue and profit whilst the plant is not operating. Purchase and installation costs must be balanced against potential production losses. Production stoppages that occur when a sensor detects a fault have to be accepted, stoppages that occur due to a sensor failure are unacceptable.

Low speeds

Rotech units can be supplied to monitor rotational speeds as low as 0.03 RPM and as high as 10,000 RPM.

Summary

The Rotech unit, put simply, combines the sensor, target and guarding into one very tough, heavy duty, easily installed unit.

Initial higher purchase price is more than off set by saving in installation costs.

Further cost free benefits include:-

Ultra reliability and long service life.

High specification.

Plant standardisation.