LVDT Applications

LVDT USE IN ROBOTIC MANIPULATOR

The Trans-Tek Series 240 DC-DC LVDT, available in strokes ranging from ±0.05" to ±3.0", is an accurate position sensing transducer complete with internal supporting electronics. Driven by a regulated power supply between 6 and 30 VDC, this transducer provides a linear DC voltage output over its working range, with a standard ±0.5% maximum non-linearity of full stroke.

A leading manufacturer of industrial manipulators has selected our Series 240 DC LVDTs for use in their product. These manipulators are used in severe-duty applications - where heat, dust, and vibration are the norm. These rugged, long-reach machines are often found in the forge, foundry and casting industries. Controlled by operator or by program, the machines allow precise handling of complex, repetitive motions with large payloads of up to 7000 kg and reaches to 10 meters. Hazardous materials often handled include hot billets, large molds, ingots, waste and much more.

Complete robotic control is the last step in fully automating this machine, and can provide over 4000 program steps for repetitive movements in volatile environments. The cost for one of these machines starts at around $300,000, with the majority being sold overseas.

Our customers have discovered the convenience, reliability, and cost-effectiveness of the Series 240 DC-DC LVDT. With a precision LVDT and complete signal conditioning electronics nicely packaged in one unit, it is no wonder this style transducer is Trans-Tek’s best selling product.