

## **MODEL KEI-850 DUAL PORT DIGITAL READOUT BOX MODEL KEI-793A PNEUMATIC STEERING WHEEL GAUGE**



### **DESCRIPTION**

The KEI-793A is an Inclinometer / Pneumatic Steering Wheel Gauge (SWG) used to monitor the angle of a steering wheel during a vehicle alignment. The KEI-793A SWG connects to the KEI-850 Dual (or 3 port) Digital Readout Box. The KEI-850 Readout Box displays the SWG angle on a backlit Liquid Crystal Digital Display. The 850 Box interfaces to, and transmits the steering wheel angle to, the alignment machine via an RS-232 (or RS-422) line. The 850 Box also interfaces to the Alignment Machines' PLC to control the SWGs' vertical pneumatic cylinder. The KEI-793A SWG is locked onto a steering wheel with a horizontal air cylinder. The steering wheel is held, at zero degrees, during most of the alignment cycle with a vertical air cylinder that extends to the seat. When the vehicle alignment is close to being finished, the vertical air cylinder is retracted to allow the steering wheel to "float". Allowing the steering wheel to "float" prevents the hysteresis in the vehicles steering system to not bind on one side or the other. Ford Motor Co. presented Kemkraft a quality award, for this process, because it proved to be a warranty claim cost savings.

### **KEI-850 / KEI-793A SPECIFICATIONS**

POWER REQUIREMENTS:	120 VAC @ 0.5 amps
ANGLE RANGE:	+/- 60 Degrees
RESOLUTION:	+/- 0.01 Degrees
ACCURACY:	+/- 1.0% of Full Scale
OPERATING TEMP RANGE:	50 Deg F. - 120 Deg F.
SERIAL INTERFACE:	RS-232 or RS-422
PLC I/O INTERFACE:	24 VDC I/O, Optically isolated outputs