IDS 430 SPECIFICATION

STANDARD FEATURES

SCALE SPECIFICATIONS

Display	Bright red LED; 1-inch x 6-digit numeric
Status Indicators	Gross, Net, Motion, Zero, LB, kg (LED)
Keyboard	19-key sealed tactile feel membrane
Internal Resolution	24-bit A/D Sigma-Delta; 8,000,000 d
Display Resolution	200,000 dd industrial; 10,000 dd HB44
Display Increments	Selectable 1, 2, 5, 10, 20, 50 100
Decimal Point	Selectable 0, 1, 2, 3, 4 decimal places
Conversation Rate	60 samples/second typical
Signal Sensitivity	0.1 uV/graduation (min)
Signal Range	0.5 mV/V to 6mV/V
Load Cell Excitation	10 ± 0.5VDC (-5 to +5)
Load Cell Power	12 x 350 Ω or 24 x 700 Ω load cells
Auto Zero Tracking	0-60 dd in 1/4 dd increments
Auto Zero Delay	0-25 seconds In 0.1 second increments
Motion Detect	0-60 dd in 1/4 dd increments
Motion Delay	0-25 seconds In 0.1 second increments
Digital Filter	0-18 selectable filter (DSP) levels
Calibration	Selectable multi-point (up to 5) digital calibration to linearize input signal
Watchdog Timer	Enable/disable fault tolerant operation
RFI Protection	Signal, excitation and sense lines
RAM	32K provides 500 ID storage (parts, etc)

COMMUNICATIONS

Serial Port 1	Simplex RS232 or 20mA current loop
Serial Port 2	Full duplex RS232, 20ma or RS485
Digital Port	3 inputs and 3 outputs; Low active (TTL)
Print Formats	4 user configurable print formats

GENERAL SPECIFICATIONS

Power	110/220VAC ±10% @ 50/60Hz or 12-28 VDC
Power Consumption	10W @ 115VAC; 6W @ 12VDC
Operating Temperature	-10 to +40 °C.
Enclosure	NEMA 4X/IP66 stainless steel washdown
Weight	6 lbs (2.72 kg)
Warranty	One-year limited

OPTIONS

Parts counting	Parts counting and weighing program
Analog Output Module	Fully isolated 0-10VDC or 4-20mA; 16-bit resolution; 650Ω load resistance
Relay Box	4-channel external relay box
Relay Modules	Input/output solid-state (AC/DC) relays
Clock Module	Time and Date Clock Y2K and Leap Year compliant
High speed (HS)	100 samples/second conversion rate; high-speed process control applications
EZ-LINK™	PC software; facilitates configuration and Scale Basic™ programming
IS Barriers	Hazard location intrinsic safety barriers
Panel Mount Kit	Mounts enclosure to user panel (for future release)
DeviceNet	PLC/COM interface (for future release)
Profibus	PLC/COM interface (for future release)

APPROVALS

NTEP COC# 96-133-A3

MODES OF OPERATION

The IDS 430 is an industrial digital weight indicator that outlasts and outperforms any indicator in its class. The unique design of this indicator combines exceptional features with an affordable price. It features a large bright 6-digit LED display and full numeric keyboard with large keys to enhance and simplify operator interface. With its super fine sensitivity and 60 updates/second the IDS 430 delivers consistency and outstanding accuracy. With a NEMA4X/IP66 wash down enclosure, standard and optional features, and built-in modes of operation, the IDS 430 is a very versatile indicator for use in various industries and applications that range from basic weighing, material testing to more complex process control weighing.

The IDS 430 is fully programmable in an easy and flexible macro language called Scale Basic™. In addition to the built-in modes of operation, Scale Basic allows you to customize the operation of the IDS 430 to meet your application requirements. The Scale Basic language provides various commands and functions that include: math operations, I/O control, setpoints, timers, data entry, ID storage, message display, and program sequence control among others. Programming the IDS 430 can be performed through the keyboard or a PC using the optional EZ-LINK™ software that greatly facilitates setup and programming.

MODE 0 - Normal
Basic gross, tare and net weighing

MODE 1 – Fill to Setpoint
Single setpoint fill with relay output control and weight print

MODE 2 - Over/Under Checkweigh
Provides 3 TTL outputs and 2 setpoints to indicate over, under and between weight conditions. Outputs can activate lights or alarms

MODE 3 – Vehicle Weigh-In/Out with Totals
Weigh-In/Out program for up to 500 vehicles; Maintains running totals for each vehicle; Provides reporting functions

MODE 4 - Multi-Container/Axle Auto Weighing
Auto weighs and prints each weight placed on the scale; Each weight is sequentially numbered and accumulated; The total can be printed manually or automatically; Provides traffic light control

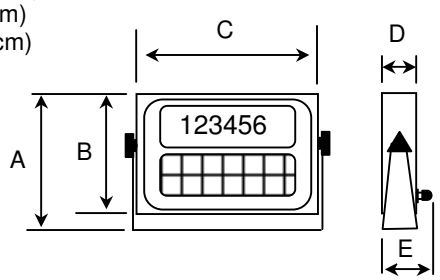
MODE 5 - Auto Axle Weigh (Long Scales)
Same as Mode 4 but previous axles are auto tared

MODE 6 – ID Tare, Print and Total
Provides tare entry and recall by ID; Prints ID, sequence # and GTN weights; Keeps running totals by ID; Provides reporting functions

MODE 7 - Peak Hold Mode
Display or print the peak gross or net weight detected

DIMENSIONS

A = 7.63" (19.38 cm)
B = 6.88" (17.48 cm)
C = 8.56" (21.74 cm)
D = 2.00" (5.08 cm)
E = 3.00" (7.62 cm)



INDUSTRIAL DATA SYSTEMS

WEIGHING TECHNOLOGY LEADERS

MODEL IDS 430

WEIGHT INDICATOR

APPLICATIONS

- Gross, tare and net weighing
- Vehicle and railroad weighing
- Multi-container or axle weighing
- Parts counting and weighing
- Weigh system interface to Distributed Control System
- Batching and process control systems
- Drum filling, tank, hopper, bench and floor scales
- Over/Under check-weighing and material-testing
- Chemical and washdown environments
- Hazardous environments with optional IS barriers

FEATURES

- NEMA 4X/IP66 stainless steel washdown enclosure
- One-inch-high bright, bold, 6-digit LED display
- 19-key audible with tactile feel membrane keyboard (sealed)
- 8 selectable modes of operation: Normal; Fill to Setpoint; Over/Under Checkweigh; Vehicle Weigh-In/Out with Totals; Multi-Container/Axle Auto Weighing with Total; Auto Weigh & Print; Auto Axle Weigh with Traffic Light Control (Short/Long Scales); ID Tare, Print & Total; Peak Hold
- Programmable in Scale Basic™ macro language for application development (event driven)
- Simulates A&D, Condec, Weigh-Tronix, Ohaus communication protocols; user configurable protocol
- Selectable 5-point calibration for improved accuracy
- 24-bit A/D with 60 or 100 samples/second conversion rate
- Signal sensitivity to 0.1 uV/graduation
- Selectable digital filter to eliminate weight vibrations
- Powers up to 12 x 350 Ω or 24 x 700 Ω load cells
- Two serial ports: RS232, 20mA current loop and RS485
- Digital port for relay control and remote operation
- Primary and secondary units with conversion factor
- 32K RAM provides 500 ID storage (part, truck, etc.)
- Selectable address for multi-drop RS485 network interface

OPTIONS

- Parts counting and weighing program
- Time and Date Clock Y2K and Leap Year compliant
- 4-20mA/0-10VDC isolated analog output with 16-bit resolution
- 4-channel relay box for setpoint control or remote operation
- Input/output solid-state relay modules (AC/DC)
- High-speed 100 samples/second conversion rate
- EZ-LINK™ PC software; facilitates configuration and Scale Basic programming; Windows® 3.1/95/98/2000 compatible
- Intrinsic safety barriers for hazardous locations Class I / II / III Div. 1and 2 Groups A-G
- Panel mount kit (for future release)

MADE IN U.S.A.