

Wireless 3-AXIS Tilt Sensor WS433-AG

SKU: WS433-AG

Doc No: WS433-AG-DS-EN-10

WIRELESS 3-AXIS TILT SENSOR WS433-AG



WS433-AG-H1.PNG

TILT SENSOR FOR CRANE MONITORING



WS433-AG-H4.PNG

Introduction

WS433-AG is a wireless Tilt Sensor, can be used to measure 3 tilt angles X, Y, Z of any object as Tower, Building, Tree, Electricity Tower, Telecom Tower, Bridges... The Tilt sensor utilises the combination of advanced Accelerometer and Gyro meter to deliver high accuracy and stable measurement of Tilt angle of 03 axis X,Y,Z. It will connect 2-way wirelessly to the wireless co-ordinator WS433-CL to send data and receiving the configuration. It can be configured the operation parameters like data sending interval, health check cycle...remotely from Globiots platform or via ModbusRTU software (thru the WS433-CL). Its default data rate is 50 kbps, can be switched to 625 bps to increase the communication range. The sensor can last up to 10 years with 1 x AA battery.

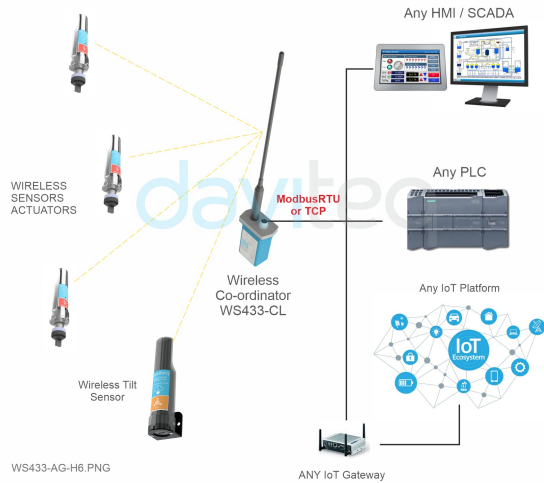
- 1 Advanced Accelerometer with Gyro meter to deliver high accuracy and stable measurement of Tilt angle of 03 axis X,Y,Z;
- 1 High performance Sub-GHz Wireless communication;
- 1 Ultra-low power with 10 years battery;
- 1 Plug & Play.

Typical Applications

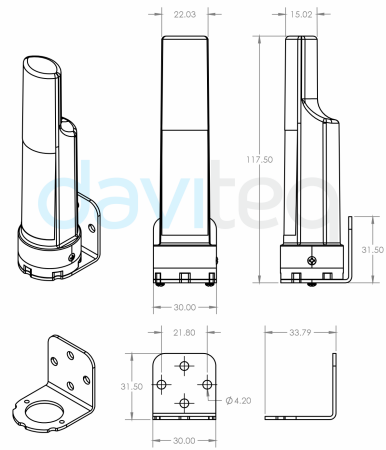
Monitoring Tilt of:

- 1 Telecommunication Tower;
- 1 Electricity Tower;
- 1 Building;
- 1 Bridges;
- 1 Trees;
- 1 Monuments;
- 1 Any infrastructures.

CONNECT WIRELESS SENSORS TO any PLC, HMI, SCADA or IoT Platform



DIMENSION DRAWING OF WIRELESS SENSOR (Unit: mm)



WS433-AG-H7.PNG

Specification

| SENSORS SPECIFICATION: | |
|-------------------------------------|---|
| Tilt Sensor | Built-in advanced accelerometer and gyro meter to deliver tilt angle measurement of X, Y, Z |
| Measurement range | $\pm 90^\circ$ of XYZ |
| Resolution | 0.5° |
| Sensor sampling rate | 1Hz max |
| WIRELESS SPECIFICATION | |
| Data speed | Up to 50kbps |
| Transmission distance, LOS | LOS 500m |
| Antenna | Internal Antenna, 3 dbi |
| Battery | 01 x AA 1.5-3.6VDC, up to 10 years operation, depends on the configuration |
| Frequency Band | ISM 433MHz, Sub-GHz technology from Texas Instrument, USA |
| International Compliance | ETSI EN 300 220, EN 303 204 (Europe) FCC CFR47 Part15 (US), ARIB STD-T108 (Japan) |
| Vietnam Type Approval Certification | QCVN 73:2013/BTTTT, QCVN 96:2015/BTTTT (DAVITEQ B00122019) |
| Security Standard | AES-128 |
| Operating temperature of PCB | -40oC..+60oC (with AA L91 Energizer) |
| Housing/Protection | Poly-carbonate, IP68 |
| Mounting method | Mounting bracket for wall mount |
| Dimension | 125x30x30mm |
| Net weight | 60g |

Ordering Code

| Item code | Descriptions |
|-------------|---|
| WS433-AG-01 | WIRELESS 3-AXIS TILT SENSOR 433MHZ, AA 1.5-3.6VDC BATTERY, IP67 |

🔗 Link for full datasheet: <https://filerun.daviteq.com/wl/?id=uvLXDHdZykf0Wap4RCFEQENu66cvr4Im>

🔗 Link for manual:



Daviteq Technologies Inc



www.daviteq.com



info@daviteq.com

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