

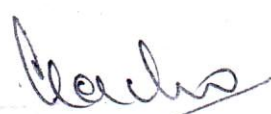
SPECIFICATIONS FOR ULTRASONIC FLAW DETECTOR

WEX/HI/UFD/2014-15

<u>GENERAL SPECIFICATIONS OF ULTRASONIC FLAW DETECTOR</u>		
SI NO.	SPECIFICATION	DESCRIPTION
1.	Trigonometric functions i) probe angle ii) job thickness	Beam path, flaw depth & projection distance, echo height 0 deg – 90 deg 0.1 to 999.9mm echo height + 1.0% tolerance thickness(echo to echo)+ 0.1mm or set range/ 300whichever more with peak & flank option.
2.	Measurement units	Millimeter
3.	Memory	-255 'A' scans memory with calibration parameters, trigonometric values and label (ID tag) -150 calibration parameter sets -150 DAC sets Standard printer interface (dot matrix LX-300+) and PC connectivity via RS-232
4.	Interface PC software	PC interface software to upload current "frame" or from saved set to PC through the RS-232 serial port.
5.	keyboard	User friendly with direct access to frequently used functions
6.	Power source	Built in battery pack,3nos 'D' size Ni-mH rechargeable cells model BAT322 -operating time up to 8hrs with battery -battery charger cum mains adapter 110-220V 50Hz-60Hz model-AD5V5, full charge in 4hrs.
7.	Battery indicator	Battery status indicator with auto shut down
8.	Charge indicator	Green LED for charging
9.	Operating temperature	0 deg C – 55 deg C

LCD DISPLAY

1. Viewing area – 117.2mm (W) X 84mm (H)
2. Pixel density – 320 X 240
3. Display type – TFT LCD


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PULSE / RECEIVER

1. Receiver – 0.5 to 10 MHz by wide band amplifier
2. Bandwidth gain – variable 0-80 dB selectable in steps of 0.1, 0.5, 1, 2, 6 12dB
3. Rejection – linear type (0.99%), 1% step
4. Operating mode – single probe, double probe, T-R mode
5. Test mode – pulse reflection or pulse transmission
6. Pulse power – at energy high, 260V rise time 9ns
7. Energy – 4 energy levels 1, 2, 3, 4
8. Damping – High / Low
9. Vertical linearity – 5%
10. Probe connector – BNC type

TIME BASE


1. Range -
 - 5mm min, -5mtrs max (@ 5890m / sec)
 - continuous variable
 - (0.1mm step for 10-100mm 1mm step for 100mm – 5mts)
2. Delay -
 - 0-3mts continuous variable
 - (0.01mm / step for 10-100mm 0.1mm / step for 100 – 1mtr 1mm / step for 1mtr – 5mts)
3. PRF -
 - Variable from 100 Hz – 1000 Hz in 100 Hz step manually auto limiting for set parameters
4. Velocity -
 - 2000m/sec – 9.999m/sec in 1m steps transverse mode velocity mode selection as velocity.
5. Time base linearity – 1%

MONITOR GATE

1. 2 gates
2. Width 1/10 screen to full screen
3. Height 1/10 screen to 99%
4. Gate measured from initial pulse
5. Monitor logic - +ve/-ve logic selectable
6. Alarm- audio / visual (audio mute available)

DAC

1. Up to 10 points auto plotting curve, minimum 3 points required, alarm function linked to gate 2.
2. Simultaneous 3 curves displayed for +6dB to -20dB.


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