

**FD520**

# Digital Ultrasonic Flaw Detector



- ★ Automated calibration、 Automated gain
- ★ DAC、 AVG、 TCG、 B scan、 AWS
- ★ High-speed capture and very low noise
- ★ Solid metal housing
- ★ high contrast viewing of the waveform from bright
- ★ Powerful pc software and reports can be export to excel

## Features

- Automated display precise flaw location (Depth d、 level p、 distance s、 amplitude、 sz dB、  $\phi$ );
- Automated switch three staff gauge ((Depth d、 level p、 distance s);
- Automated calibration of transducer Zero-point, Angles, Front edge and material Velocity ;
- Convenient to make and use DAC\TCG and AVG to evaluate the echo, the curve can be modified and compensated
- 6dB DAC functions;
- 500 independence setup, any criterion can be input freely, we can work in the scene without test block;
- Big memory of 1000 A graph
- Automated gain and gain scan;
- Peak Hold and Peak Memory;
- B scan;
- AWS D1.1
- Automated make video of test process and play; use upan, *the length of video is unlimited.*
- Powerful pc software and reports can be export to excel;
- Li battery, continue working time up to 10 hours;
- The embeded software can be online updated;

## Other assistant function

- Display freeze;
- Automated echo degree;
- Angles and K-value;
- Lock and unlock function of system parameters;
- Electronic clock calendar ;
- Two gates setting and alarm indication;
- Gate and DAC alarm;

## Specifications

Title	Parameter	Title	Parameter
Measuring Range (mm)	0 ~ 10000	Measurement Mode	Single、 Dual、 Thru
Vertical Linearity Error	$\leq 3\%$	Reject	0~80%
Horizontal Linearity Error	$\leq 0.1\%$	Pulse Displacement ( $\mu s$ )	-20 ~ +3400
Sensitivity Leavings	$\geq 62\text{dB}$	Zero ( $\mu s$ )	0.0 ~ 99.99
Dynamic range	$\geq 32\text{dB}$	Port Type	BNC (Q9)
Resolving Power	$\geq 36\text{dB}$	Operating Temperature ( $^{\circ}\text{C}$ )	-20~50
Frequency Range (MHz)	0.5 ~ 15	HxWxD(mm)	240x156x48
Gain (dB)	0 ~ 120	Weight (kg)	1.0 (with battery)
Material Velocity (m/s)	1000 ~ 15000		

Title	FD510	FD520	FD550
Measuring Range	0-6000mm	0-10000mm	0-10000mm
Material Velocity (m/s)	1000-15000	1000-15000	1000-15000
Gain (dB)	110dB	120dB	130dB
Frequency Range (MHz)	0.5-15M	0.5-15M	0.5-20M
Memory	500	1000	1000
<b>independence setup</b>	100	500	500
<b>sz dB、φ</b>	★	★	★
<b>Peak Hold and Peak</b>	★	★	★
<b>Memory</b>			
B scan	X	★	★
DAC	★	★	★
AVG	★	★	★
TCG	X	★	★
STANDARD(13 standards in-built)	★	★	★
<b>Automated calibration( IIW )</b>	★	★	★
<b>Automated calibration(two hole )</b>	X	X	★
6dB DAC	X	★	★
<b>make video</b>	★	unlimited	unlimited
<b>pc software</b>	★	★	★
<b>updated online</b>	★	★	★
curved surface correction	★	★	★
AWS	★	★	★
Pulse energy	★	★	★
Pulse width	★	★	★
Gate alarm	★	★	★
DAC alarm	★	★	★
<b>continue working time</b>	9 hours	12 hours	12 hours
Port Type	BNC	BNC	BNC
Overall dimension (mm)	238×160×48	238×160×48	238×160×48
Weight (kg)	1.0	1.0	1.0