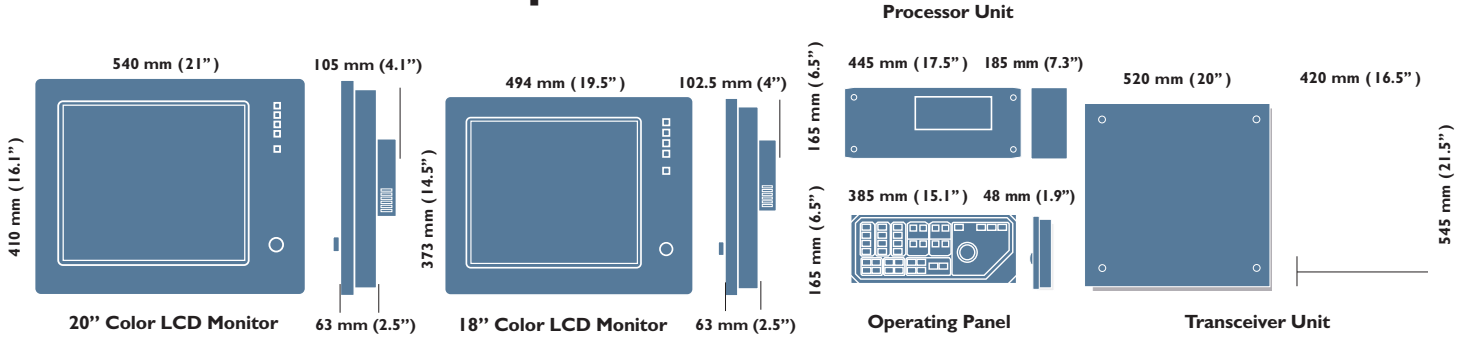


# Simrad Sonars **Technical Specifications**



Sonar:	SH80	SP70	SP90
<b>Frequency:</b>	116kHz (see options)	26kHz (see options)	26kHz (see options)
<b>Range (min/max):</b>	50m/2000m (10 step)	150m/8000m (12 step)	150m/8000m (12 step)
<b>Tilt:</b>	+10° to -60°	+10° to -60° (-90° as option)	+10° to -60°
<b>Source Level (SL):</b>			
Omni mode:	210 dB/1μPa	216 dB/1μPa	217 dB/1μPa
Single Beam:		222 dB/1μPa	223 dB/1μPa
<b>Detection Range:</b>	750 m against 0 dB target	2800 m against 0 dB target	3000 m against 0 dB target
<b>Transceiver:</b>	240 transmitter channels 480 receiver channels	241 transmitter channels 241 receiver channels	256 transmitter channels 256 receiver channels
<b>Transducer:</b>			
Horizontal beam:	Cylindrical with 480 elements 8° or 360°	Spherical with 241 elements 12° or 360°	Cylindrical with 256 elements 11.5° or 360°
Vertical beam:	9° or 60°	12° or 60° (90°/180° as option)	11.5° or 60°
<b>Data I/O (RS232):</b>	Speed log, Gyro, GPS, Echo-sounder, ITI/FS Trawl system, PI32 Net system	Speed log, Gyro, GPS, Echo-sounder, ITI/FS Trawl system, PI32 Net system	Speed log, Gyro, GPS, Echo-sounder, ITI/FS Trawl system, PI32 Net system
<b>Mains supply:</b>			
Display Unit:	115/230VAC, 50/60Hz, 100W	115/230VAC, 50/60Hz, 100W	115/230VAC, 50/60Hz, 100W
Processor Unit:	115/230VAC, 50/60Hz, 200W	115/230VAC, 50/60Hz, 200W	115/230VAC, 50/60Hz, 200W
Transceiver Unit:	230VAC, 50/60Hz, 600W	115/230VAC, 50/60Hz, 600W	115/230VAC, 50/60Hz, 600W
Hull Unit (3-phase):	230/380/440VAC, 1100W	230/380/440VAC, 750W	230/380/440VAC, 3000W
<b>Hull Unit:</b>			
Lowering travel:	1000mm	1200mm (see options)	1200mm (see options)
Raising time:	23 sec.	25 sec.	30 sec.
Max Speed:	20 knots	15 knots	24 knots
<b>Options:</b>			
Display:	18" or 20" LCD (1280x1024 pixels)	18" or 20" LCD (1280x1024 pixels)	18" or 20" LCD (1280x1024 pixels)
Tilt:		+10° to -90°	
Triple frequency:		24kHz, 26kHz and 28kHz	24kHz, 26kHz and 28kHz
Multiple frequency:	110kHz to 122kHz (1kHz step)	20kHz to 30kHz (1kHz step)	20kHz to 30kHz (1kHz step)
Beam stabilization:	±20 roll and pitch	±20 roll and pitch	±20 roll and pitch
Gyro Interface:	Analog to serial line converter	Analog to serial line converter	Analog to serial line converter
Hull Unit:	DnV approved Trunk	1200mm / 25 knots 1600 mm / 20 knots DnV approved Trunk	1600mm / 20 knots DnV approved Trunk
	DnV approved Trunk		

Note: Specifications are subject to change without notice.