

## **Applied Acoustic Engineering Ltd**

Marine House, Marine Park, Gapton Hall Road, Great Yarmouth, NR31 ONB United Kingdom

# AA251, AA301 Boomer Seismic Sound Source



**The AA251 and AA301** boomer plates are seismic sound sources that produce a sharp repeatable pulse from a floating position on the sea surface.

The AA251, deployed on either a robust CAT100 or CAT200 catamaran, is ideal for inshore surveys from small craft.

The AA301 is designed for higher power applications and can also be used as a variable frequency boomer when combined with a CSP energy source.

## **Key Features**

- Stable pulse shape clarity with minimum reverberation
- Rugged mechanical design with weight kept to a minimum
- Supplied as individual product, or with a catamaran
- Supplied with RMK connectors and locking collars as standard
- AA251 forms part of the Inshore Boomer System, ideal for coastal surveys
- AA301 ideal for nearshore and shallow water surveys (up to 120m) depending on geology

# **Technical Specification**

#### PHYSICAL

AA251 Boomer plate AA301 Boomer plate	Size 380 x 380mm 620 x 520mm	Weight air/water 18kg/10kg 25kg/14kg	Fixing centres 315mm <sup>2</sup> 485mm x 440mm	Connector RMK 1/0 RMK 1/0
ELECTRICAL INPUT				
Recommended energy	AA251 AA301	50 – 200J/shot 100 – 300J/shot	:	
Maximum energy	AA251 AA301	300J/shot 350J/shot		
Average energy	AA251 AA301	600J/second 1000J/second		
Operating voltage	3600 to	4000Vdc		



#### SOUND OUTPUT

Source level	AA251 AA301	Typically 212dB re 1µPa at 1 metre with 200J Typically 215dB re 1µPa at 1 metre with 300J
Pulse length	AA251 AA301	120/150/180µs at 50/100/200J 200µs depending on energy setting of CSP
Reverberation	AA251 AA301	<10% of initial pulse <10% of initial pulse

#### **COMPATIBLE ENERGY SOURCES**

AA251	CSP-NP, CSP-Nv1200, CSP-Nv2400
AA301	CSP-NP, CSP-Nv1200, CSP-Nv2400

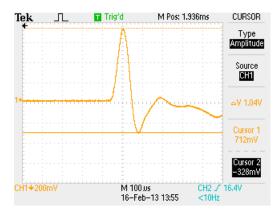
#### **COMPATIBLE CATAMARAN**

AA251	CAT 100:	940 (L) x 740 (W) x 500 (H) mm
	CAT 200:	1280 (L) x 915 (W) x 525 (H) mm
AA301	CAT 200:	1280 (L) x 915 (W) x 525 (H) mm
	CAT 300:	1700 (L) x 660 (W) 490 (H) mm

### **COMPATIBLE HV CABLE**

AA251 and AA301	HVC 2000
	Standard length 75m
	RMK 1/0 connectors complete with locking collars

### AA301 TYPICAL PULSE SIGNATURE AT 300J







An AAE Tech Due to continual product improvement, specification information may be subject to change without notice. AA251, AA301 Boomers/April 2020 ©Applied Acoustic Engineering Ltd.



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