

KINETIX

AGENCY EDITION

**Suited for maritime agencies
tasked with monitoring impact and
vibration on the vessel and crew**



AGENCY EDITION COMPONENTS

Processing Unit Seat-mounted or standalone

On-board data storage 1000+ hours

Accelerometer Triaxial

Data acquisition rates Up to 1kHz



**SYSTEM
PROCESSING
UNIT
(SPU)**

+



**DIGITAL
LOG BOOK
(DLB)**

+



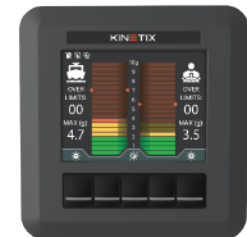
**DECK
ACCELERATION
UNIT
(DAU)**

+



**DISPLACEMENT
SENSING UNIT
(DSU)**

+

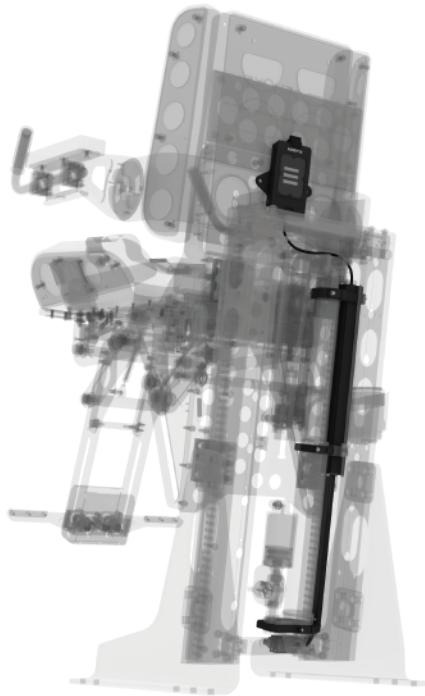


**VISUAL
ON-BOARD
DISPLAY**

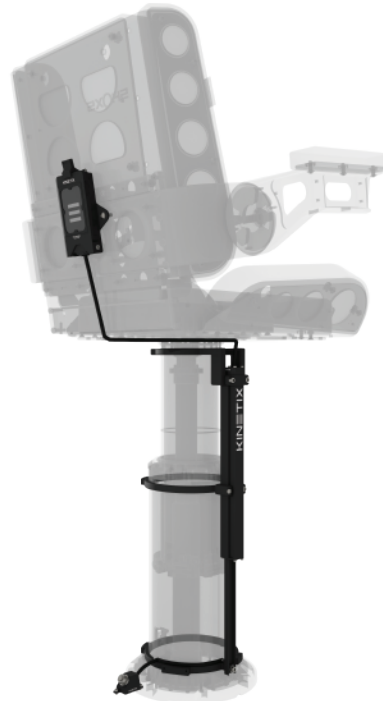


SEAT TYPES AND CONFIGURATIONS

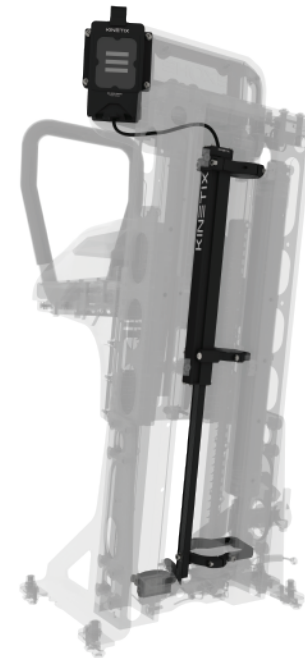
The Kinetix system can be fitted to nearly any shock mitigation seat available today.



Shoxs 4800 Full-Body Suspension seat

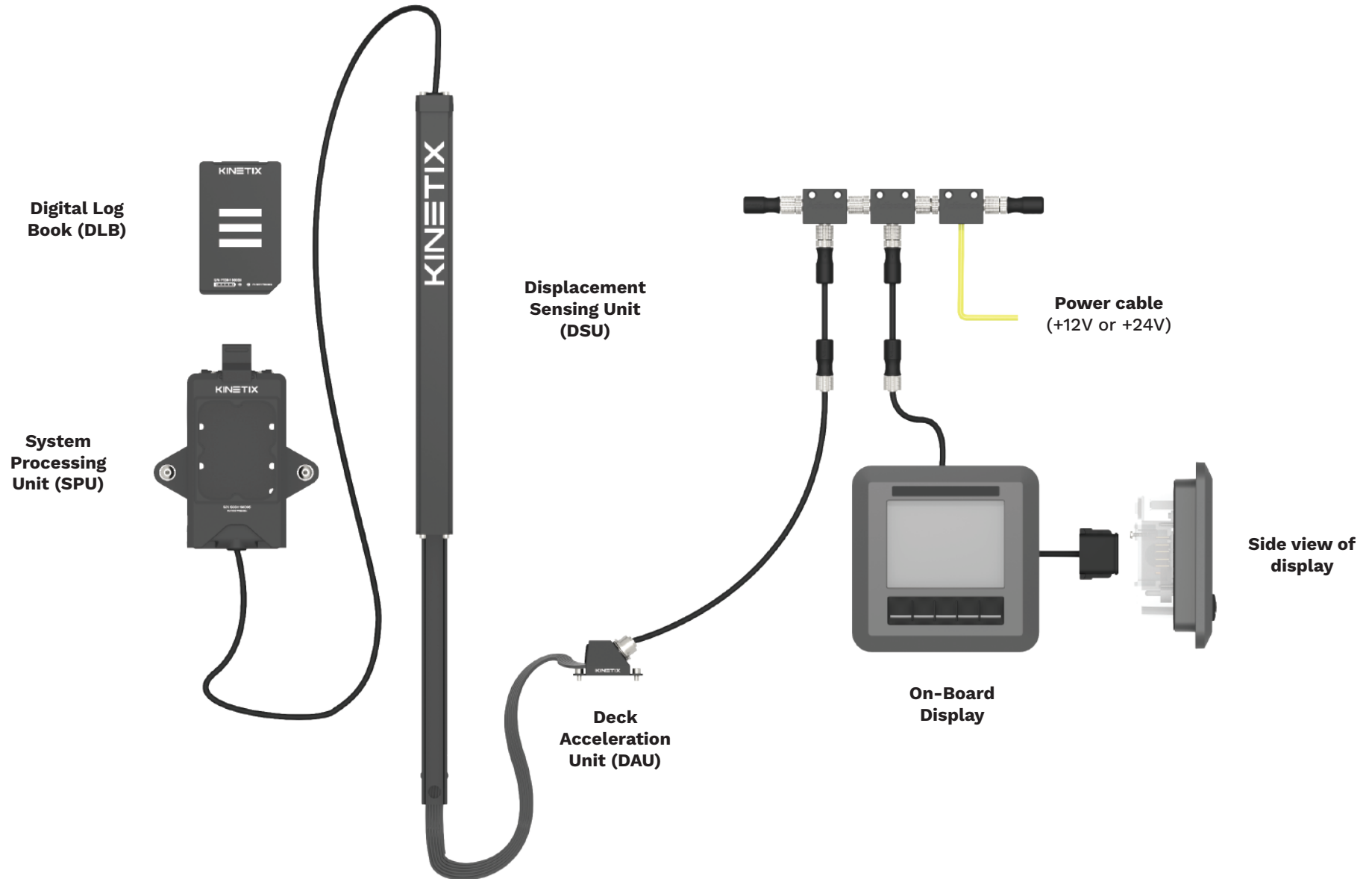


Shoxs 3200 X8 Pedestal-mounted suspension seat



Shoxs 5005 Jockey-Style Seat

Example seat placement (for illustration only, seat types may vary). Kinetix can integrate with other suspension seat manufacturers





SYSTEM PROCESSING UNIT (SPU)

The System Processing Unit (SPU) is an IP68 housing to protect the data logbook. It also functions as a system computer and contains a seat accelerometer.

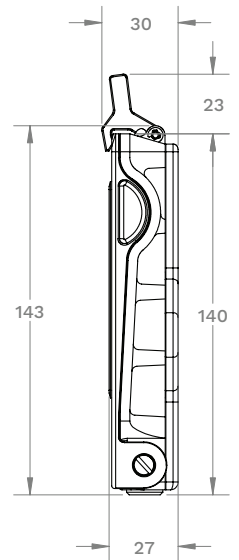
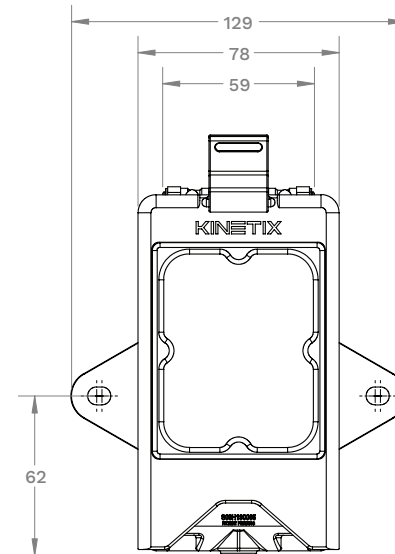
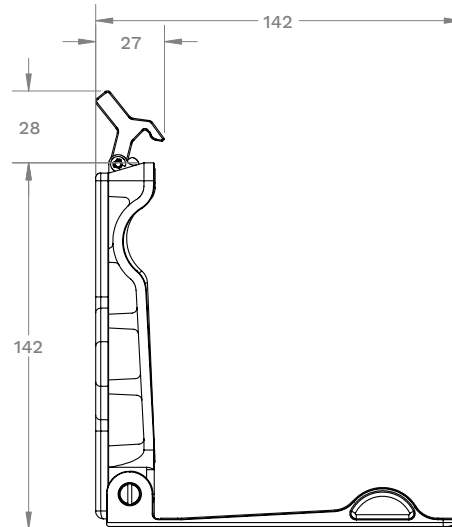
It is typically permanently mounted to a shock mitigating suspension seat.



KINETIX System Processing Unit (SPU)



Seat placement (for illustration only, seat types may vary)





DIGITAL LOG BOOK (DLB)

The DLB records occupant and vessel data. The DLB fits into the SPU, and is easily removed for data download or charging.

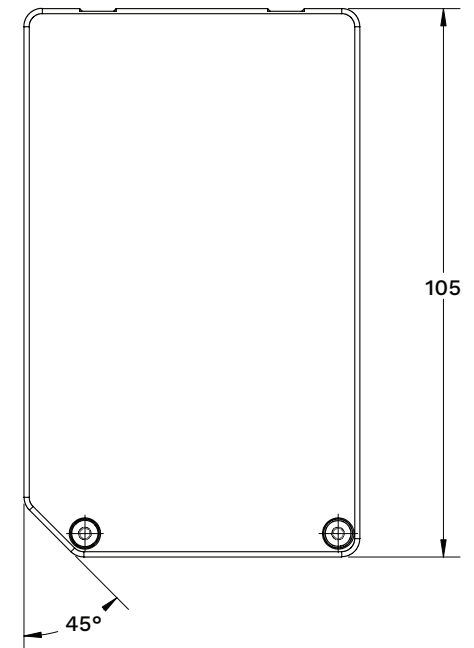
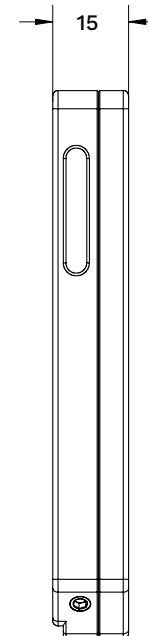
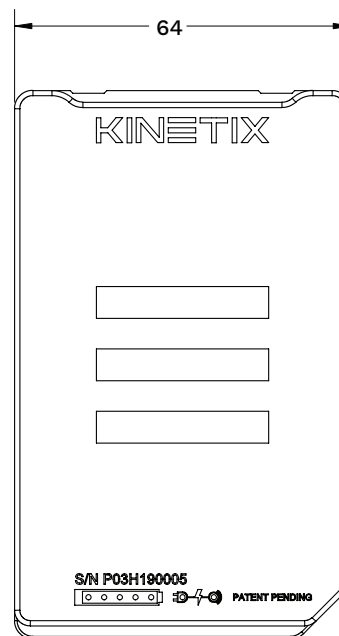
The DLB also powers the Kinetix system. It is rechargeable and IP68 rated.



KINETIX Digital Log Book (DLB)



Seat placement (for illustration only, seat types may vary)





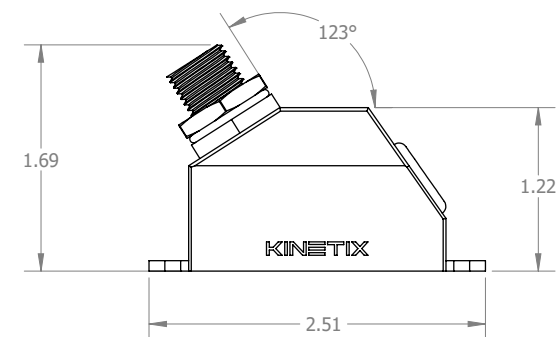
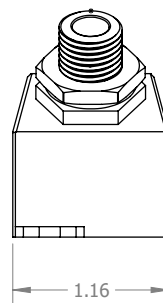
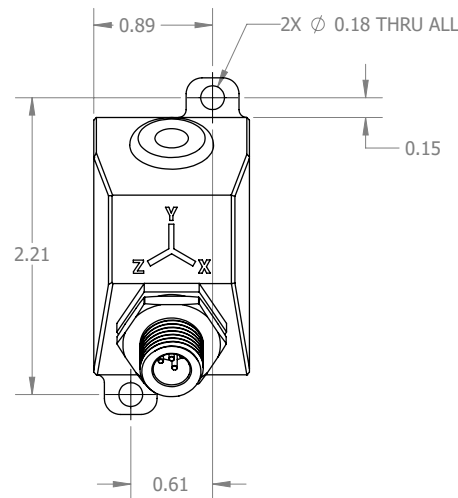
DECK ACCELERATION UNIT (DAU)

The Deck Acceleration Unit (DAU) measures accelerations acting on the vessel.

It is typically permanently or semi-permanently mounted to a fixed point on the vessel.



Deck Acceleration Unit (DAU)



Seat placement (for illustration only, seat types may vary)



DISPLACEMENT SENSING UNIT (DSU)

The Displacement Sensing Unit (DSU) is an infrared laser ranging sensor that connects to a deck accelerometer to record seat displacement at the isolator.

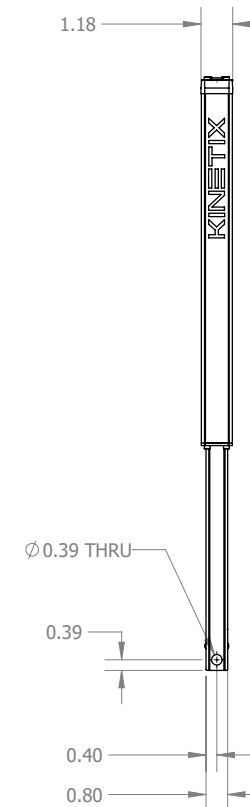
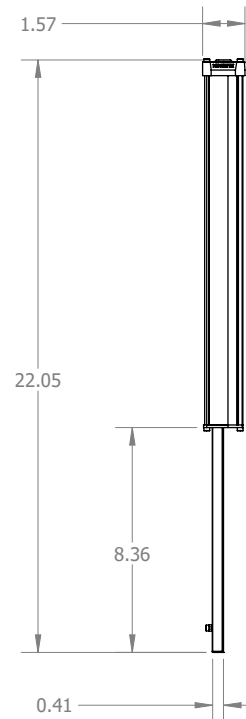
The DSU measures seat travel and evaluates the risk of bottoming out the suspension. The cable is managed between the seat and deck.



Displacement Sensor Unit (DSU)



Seat placement (for illustration only, seat types may vary)





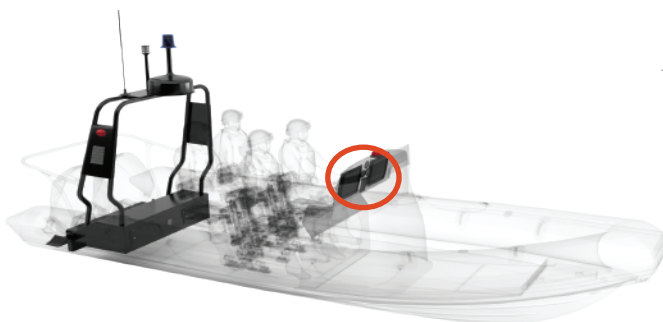
KINETIX DISPLAY

The KINETIX digital on-board dash display is an optional system component that alerts crew in real-time to hazardous impact conditions or seat bottom-out risk.

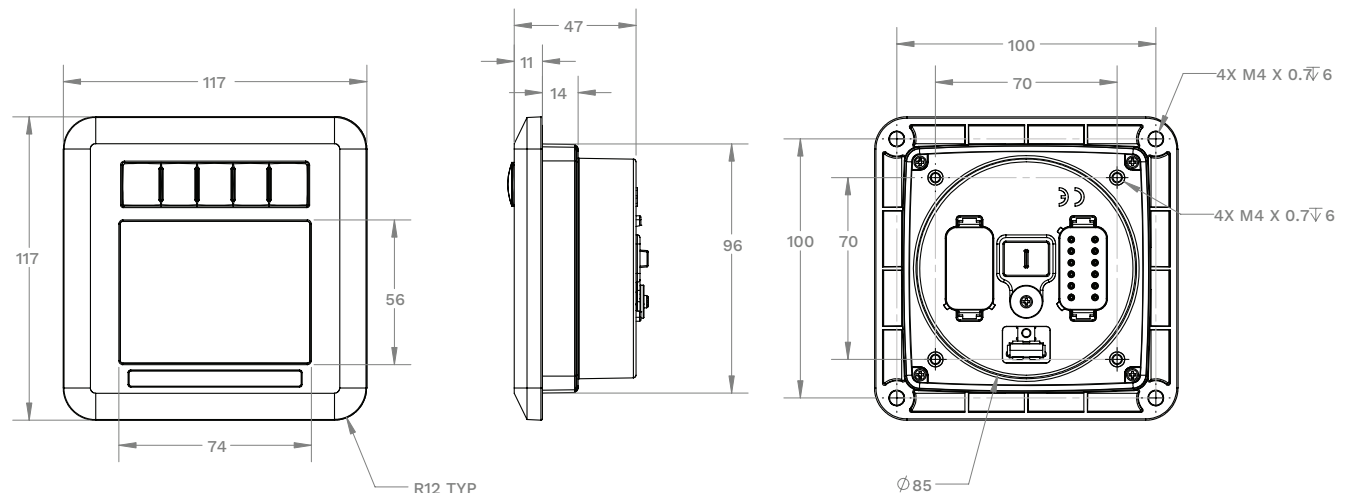
The display is IP-rated 67.



On-Board Display (optional)



Typical placement (for illustration only)





ADDITIONAL DISPLAY OPTIONS

*Both options require a Bluetooth-connected
Digital Log Book



The KINETIX application is available through the Raymarine LightHouse application store for the Axiom series. KINETIX also displays on most other Android-powered devices.



The KINETIX application can be displayed on a Smartwatch for individualized reporting and physical alerts (i.e. vibration or sound).



KINETIX SPECIFICATIONS

Processing Unit Seat-mounted or standalone

On-board data storage 1000+ hours

Accelerometer Triaxial

Data acquisition rates Up to 1kHz

Acceleration	Displacement	Data Storage	Power
Tri-axial X, Y, Z with gyro	Infrared laser ranging	64 GB flash memory	6000 mAh LiPo battery
Up to 1 kHz recording	50 Hz recording	Up to 2000 hours logging	100 hours active logging
+/- 30 g range	1 mm resolution	7+ data channels	6+ months standby mode
1 mg resolution		Real-time clock stamped	12-24 V power input