

Energy-Absorbing Armoured Crew Seat for EH101

An Introduction

The energy-absorbing armoured crew seat includes an armoured seat bucket and outboard wing, an energy-absorbing seat frame, a vertical/horizontal seat adjustment system, a five-point restraint system, and a cushion system. The seats and wings are right- or left-handed (P/N 108300-5/-6). Provisions for both a personal survival pack and a parachute are integrated into the seat. The seat also includes a "dual-action" buckle and an emergency restraint release to ensure trouble-free egress during ditching.

Advantages

- Energy-absorbing
- Variable-Load Energy Attenuator (VLEA)
- Five-point restraint
- Dual-action buckle
- Emergency release
- Provision for integral parachute (Simula Durachute®)
- Provision for integral personal survival pack
- Comfort cushion options
- Easy-egress armoured wing
- Superior armour system

Vertical Energy Absorption System

The Variable-Load Energy Attenuators (VLEAs) may be set to decelerate the 5th- through 95th-percentile equipped occupant (150-283 lb) at a rate not in excess of human tolerance. The VLEAs are to be adjusted to the occupant's equipped weight, ensuring optimal energy absorbing performance and resultant occupant protection.

Seat Weight

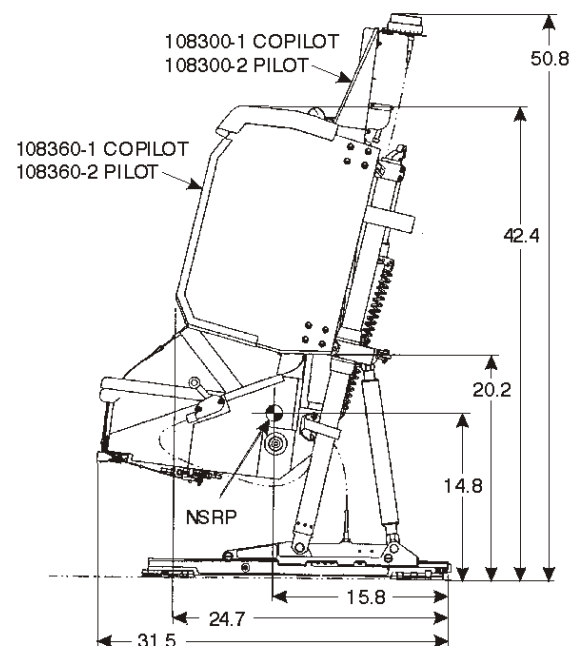
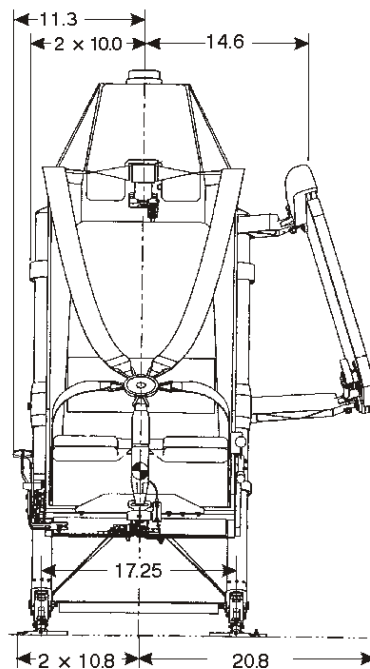
53.1 kg / 116.8 lb (seat)
11.1 kg / 25.4 lb (wing)

Available Vertical Stroke

249 mm / 9.8 in. max
(Varies according to seat vertical adjustment position)



Application



(All dimensions in inches)

CREW SEAT OUTLINE AND INSTALLATION INFORMATION

The ULTIMATE in Operability Features, with Superior Protection and Versatility

Dynamic Test Conditions

These seats have been successfully tested to the dynamic test requirements shown below.

Armour System

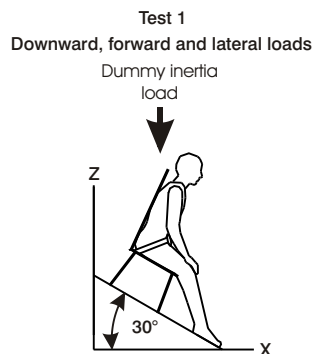
Superior ballistic protection (Threat and V_{50} are classified)

Level of Ballistic Protection

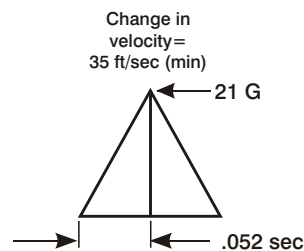
THREAT:
Classified.

VELOCITY:
Classified.

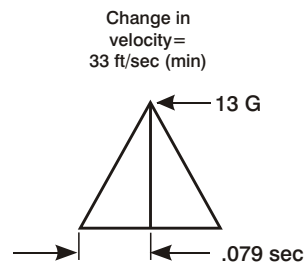
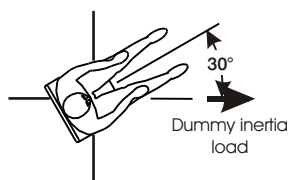
Test Conditions and Orientation



Qualification Pulse



Test 2
Forward and lateral loads



For more information contact:

Jack Cress - Product Manager, Military Seats
Simula Safety Systems, Inc. • 7822 South 46th Street • Phoenix, Arizona 85044 USA
Voice: 602.643.7268 (SAFE) • e-mail: jack.cress@simula.com • www.simula.com

Advanced Seat Systems. Air Bag Restraint Systems. Sensor Systems. Energy-Management Systems. Lightweight Armor Systems.



Concept Development. Safety System Integration. Detailed Design Analysis. Testing Services. FAA Certification. Flexible Manufacturing.

Protecting People in Motion