



## DEPARTMENT OF THE AIR FORCE

HEADQUARTERS AERONAUTICAL SYSTEMS CENTER (AFMC)  
WRIGHT-PATTERSON AIR FORCE BASE, OHIO

3 April 2008

MEMORANDUM FOR HING CERFP (CPT AARON BLANCHARD)  
3949 DIAMOND HEAD RD.  
HONOLULU HI 96816

FROM: ASC/ENFC (ATTLA)  
2530 Loop Road West  
Wright-Patterson AFB OH 45433-7101

SUBJECT: Airlift Certification Memo for the CBRNE Enhanced Response Force Package (CERFP) Trailer

1. The subject trailer is identified to be a Wells Cargo, Model TW142, two axle enclosed cargo trailer. Dimensions are approximately 225.5" L X 94.5" W X 92.5" H. Gross trailer weight rating, and axle ratings are 7,700 lbs, 3,500 lbs (each axle) respectively. This memo includes all (CERFP) trailers that fall within the dimensions and capacities included in this memo.

2. Based on dimensions and structural information (axle ratings, tiedown ratings, etc), provided by the Hawaii Army National Guard the above item is herein certified for airlift in USAF C-5A/B/C, C-17A, C-130 E/H/J, and C-130J-30 cargo aircraft with the following provisions:

a. Maximum air transport weight, allowable axle weights and landing gear/tongue weights are equal to the respective rating listed in paragraph 1. When gross trailer weight, and axle weights exceed 6,160 lbs, 2,800 lbs (each axle) respectively, sleeper shoring is required. Actual gross weight, axle weights and tongue weights shall be marked on the trailer after aerial port weighs the item.

b. Preparation:

- 1) Shipper provided approach shoring IAW paragraph 2.d.4 through 2.d.8 maybe required and must transport with trailer to destination.
- 2) Shipper shall provide sleeper shoring IAW paragraph 2.a and 2.d.10.

c. Tire inflation shall not exceed 100 PSI.

d. Method of loading:

- 1) Item can be loaded so lunette/tongue faces either forward or aft in aircraft.
- 2) Winch load/off-load operations may be employed if necessary or at loadmaster discretion IAW published procedures.
- 3) Prime mover shall have adequate braking and handling capability; otherwise, the trailer and prime mover shall be loaded/off-loaded using aircraft winch.
- 4) C-5: Trailer may be loaded over either ramp when respective end is kneeled.

- 5) Approach shoring is not required if driven into aircraft.
  - 6) Approach shoring is required when loading item from the ground and backed into aircraft. See attachment 1.
  - 7) C-17 only: When backed into aircraft the use of the shipper supplied Hulett Aluminum loading ramps (Forward section having a length of 110" and a height of approximately 11", See attachment 2) are approved. These ramps have a rated capacity of 7,000 lbs per set. If aluminum loading ramps are unavailable use approach shoring dimensions listed in attachment 1.
  - 8) Approach shoring is not required if item is loaded via Tunner or Halvorsen loader and remains connected to a suitable prime mover.
  - 9) The landing gear shall not bear any trailer weight during air transport and should be retracted.
  - 10) Five stacks of sleeper shoring are required. When trailer is disconnected from the prime mover, the lunette shall be lowered onto a single stack of shoring located between the front end of the trailer cargo box and the lunette cross member. Minimum base dimensions for the shoring stack located under the lunette are 8" L X 8" W. Four stacks shall be positioned under the trailers' frame chassis, one under each corner, front and rear of the trailer. The trailer deck should be approximately level when shored. Minimum base dimensions of the four corner sleeper shoring stacks shall be 8" L X 6" W. The four stacks of sleeper shoring shall be stacked to within ½" of frame chassis, contact is preferred. Sleeper shoring stacks shall be secured with cargo straps.
3. The trailer and all accompanying cargo must be restrained to meet MIL-HDBK-1791 requirements of 3G forward, 1.5G aft and lateral, and 2G up. In addition, stored or installed equipment must meet these requirements and be capable of withstanding a 4.5G down load. The trailer is equipped with a total of eight tiedown rings rated at 10,000 lbs each. Two tiedown rings are located at the front and rear of the trailer (total of four). One tiedown provision is mounted on the underside of the frame forward and aft of the trailer axles on each side of the trailer (total of four).
4. The shipper has certified the trailer is capable of withstanding rapid in-flight decompression of up to 8.3 PSI within ½ second without endangering the aircraft or personnel.
5. All equipment shall be prepared, packaged, or mounted such that there is no adverse effect on the functioning of the equipment after being subjected to the aircraft environmental extremes. MIL-STD-810 provides guidance on approved test methods and data gathering techniques.
6. All hazardous materials (to include fuel level, batteries, etc.) must be prepared and certified for airlift in accordance with TM 38-250/AFMAN 24-204(I). Do not consider this air transport certification as approval for hazardous materials. Authorization for airlifting hazardous material is the responsibility of HQ AFMC LSO/LOT (DSN 787-4503 or 937-257-4503). The servicing Air Terminal Operations Center (ATOC) can assist you in this regard.
7. Shipper shall give a copy of this memo to the ATOC representative when the item is presented for airlift. This memo shall be part of the official cargo manifest documentation package and will be briefed to the aircraft loadmaster prior to loading this item.

8. This memo was prepared by MSgt Joseph Simon. For certification issues or questions regarding this project, contact joseph.simon@wpafb.af.mil, (937) 255-1758/ DSN 785-1758, or melvin.santiago@wpafb.af.mil, (937) 255-2330/DSN 785-2330. Refer to file number 2008.03.08 to reference this memo.



Approved by: MELVIN C.J. SANTIAGO  
Acting Technical Advisor  
Crew Systems Branch



Approved by: TIMOTHY P. JENNEWINE  
Acting Technical Advisor  
Crew Systems Branch

2 Attachments:

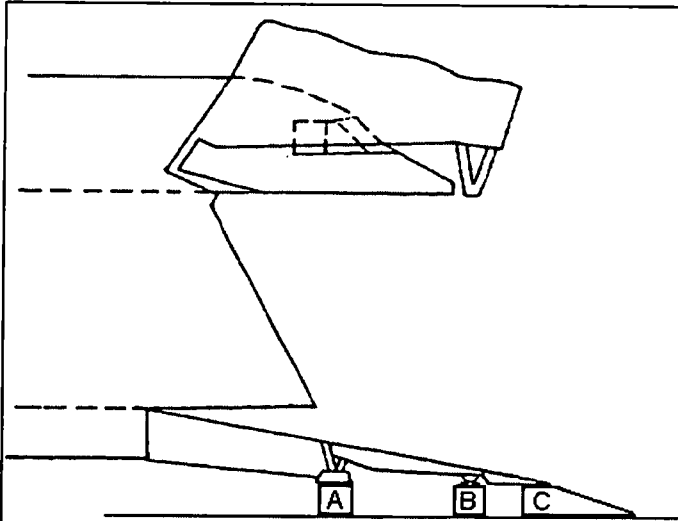
1. Approach Shoring Dimensions & Diagrams
2. Aluminum Loading Ramps

cc:

HQ AMC/A3V  
SDDCTEA

**Attachment 1: Approach Shoring Dimensions & Diagrams (when backed into aircraft)**

Minimum Recommended Shoring Dimensions for 11° Approach Angle  
Shoring requirements for other configurations are in the applicable aircraft loading manual.

**C-5 Forward Shoring (Forward Kneel)**Pedestal Shoring

"A" None (inboard)

"A" None (outboard)

"B" 15" L X 15" W X 2" H (4 each)

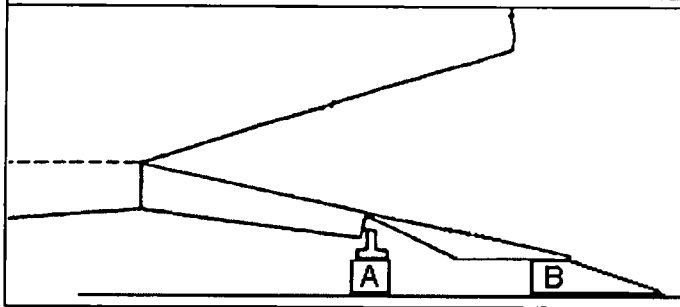
Approach Shoring

"C" 28" L X 30" W X 3" H

(2 ½ feet long) 2 required

(Shortest board should be 11")

*Caution: Width of approach shoring "C" in the area under the toe must be as wide as the ramp toe it is placed under. The remaining approach shoring extending away from the ramp toe extension contact point must be a minimum of 24 inches wide.*

**C-5 Aft Shoring (Aft Kneel)**Pedestal Shoring

"A" None

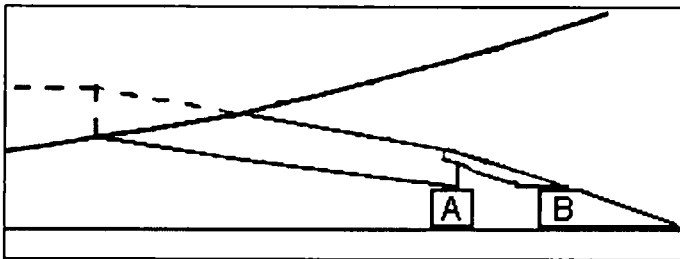
Approach Shoring

"B" 33" L X 24" W X 4" H

(2 ½ feet long) 2 required

(Shortest board should be 11")

*Caution: Width of approach shoring "B" in the area under the toe must be as wide as the ramp toe it is placed under. The remaining approach shoring extending away from the ramp toe extension contact point must be a minimum of 24 inches wide.*

**C-17 Shoring**Pedestal Shoring

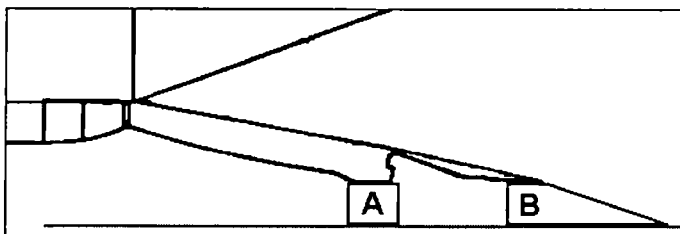
"A" None

Approach Shoring

"B" 59" L X 18" W X 9" H

(5 feet long) 2 required

(Shortest board should be 11")

**C-130 Shoring**Pedestal Shoring

"A" None

Approach Shoring

"B" 27" L X 24" W X 3" H

(2 ½ feet long) 2 required

(Shortest board should be 11")

Attachment 2: Aluminum Loading Ramps

