

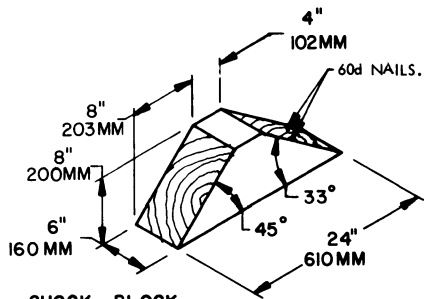
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 MOVEMENTS CONTROL AGENCY,
 U. S. ARMY TRANSPORTATION
 COMMAND, EUROPE
 SIGNED *E. O. Br...*
 TC CMDG.
 DATE 2 Jul 70

LANCE

LOADING AND BRACING ON GERMAN RAILCAR OF MOBILITY KIT, GUIDED MISSILE LAUNCHER, XM234

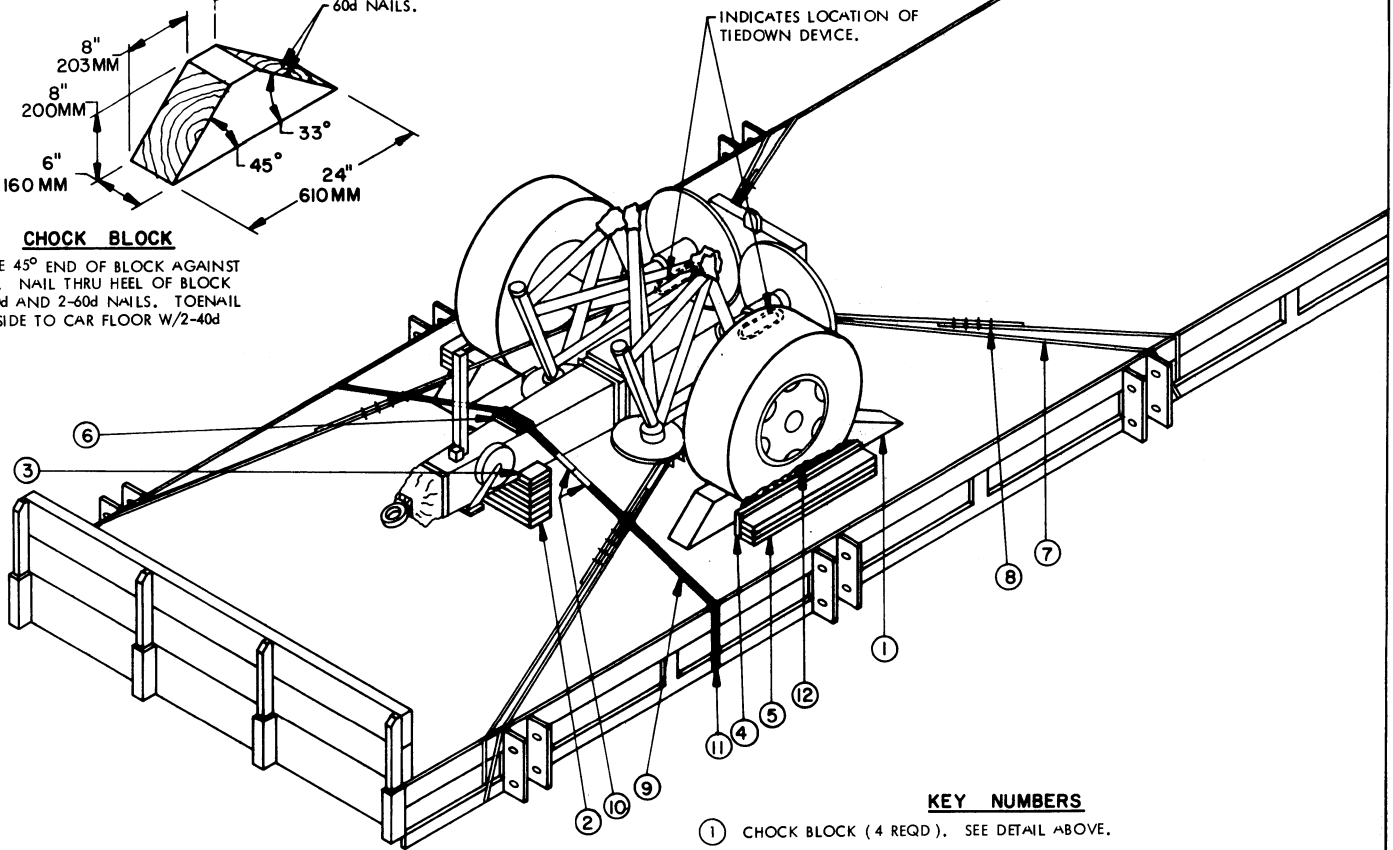
DRAFTSMAN <i>JPH</i>	PROJ ENG <i>AGE</i>	AMC PN-1 <i>...</i>	SUBMITTED <i>...</i>
CHECKER <i>...</i>	AMC AMMO CTR <i>John Boyd</i>	AMC PN-1 <i>...</i>	APPROVED <i>Andrew W. Heid</i> ARMY MISSILE COMMAND U. S. ARMY MATERIEL COMMAND
REVISIONS			APPROVED BY ORDER OF COMMANDING GENERAL U. S. ARMY MATERIEL COMMAND <i>S. H. Heil</i> U. S. ARMY MATERIEL COMMAND
			FEBRUARY 1971
			CLASS DIVISION DRAWING FILE
			19 48 7184 GSE 5LC6

DO NOT SCALE



CHOCK BLOCK

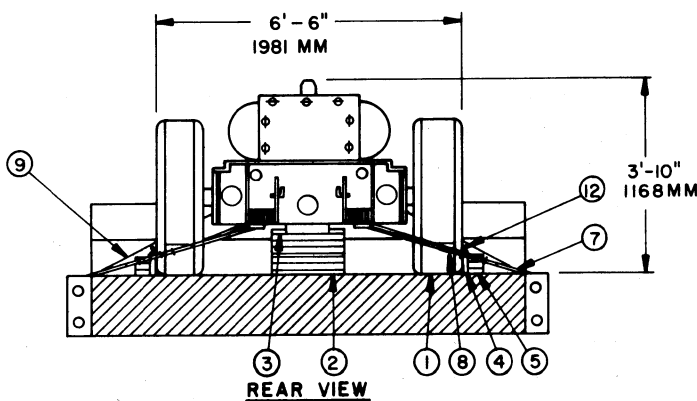
LOCATE 45° END OF BLOCK AGAINST WHEEL. NAIL THRU HEEL OF BLOCK W/3-40d AND 2-60d NAILS. TOENAIL EACH SIDE TO CAR FLOOR W/2-40d NAILS.



ISOMETRIC VIEW

KEY NUMBERS

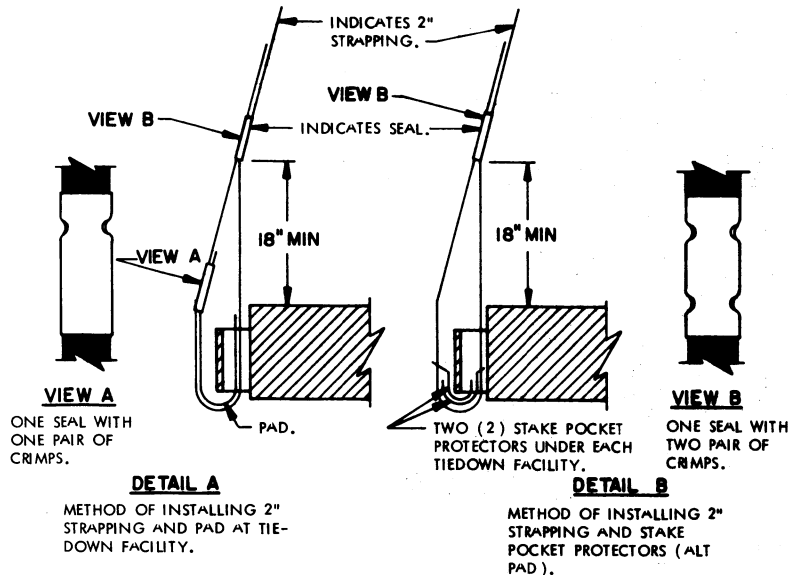
- ① CHOCK BLOCK (4 REQD). SEE DETAIL ABOVE.
- ② FORWARD BLOCKING (1 REQD). SEE THE "FORWARD BLOCKING" DETAIL ON PAGE 4.
- ③ ANTI-SWAY BLOCK, 2" X 4" X 6" (60MM X 100MM X 152MM) (2 REQD). POSITION AS SHOWN AND NAIL TO PIECE MARKED ② W/2-12d NAILS.
- ④ RUBBING STRIP, 2" X 6" X 36" (60MM X 120MM X 914MM) (2 REQD). NAIL TO LOWER PIECE ⑤ W/5-12d NAILS.
- ⑤ SIDE BLOCKING, 2" X 4" X 36" (60MM X 100MM X 914MM) (TRIPLED) (2 REQD). NAIL FIRST PIECE TO CAR FLOOR W/5-16d NAILS. NAIL EACH ADDITIONAL PIECE W/5-40d NAILS. SEE GENERAL NOTE "K" ON PAGE 3.
- ⑥ STRAPPING BOARD, 2" X 4" (60MM X 100MM) BY LENGTH TO SUIT (1 REQD).
- ⑦ STEEL WIRE ROPE, 3/8" DIA., 6.56 TONS (4 REQD). INSTALL CABLE AS SHOWN TO FORM A COMPLETE LOOP FROM TIEDOWN FACILITY ON RAIL CAR, THRU LADING TIEDOWN DEVICE, AND BACK TO RAIL CAR TIEDOWN FACILITY. SEE GENERAL NOTES "G" AND "H" ON PAGE 3.
- ⑧ CLIP, SIZE 3/8" (16 REQD). USE FOUR (4) PER CABLE.
- ⑨ STEEL STRAPPING, 2" X .050" X 20'-0" (1 REQD). STAPLE TO PIECE MARKED ⑥ W/2-2" STAPLES. SEE GENERAL NOTE "F" ON PAGE 3.
- ⑩ SEAL FOR 2" STRAPPING (6 REQD).
- ⑪ PAD, 2" X .050" X 24" LONG STEEL STRAPPING (2 REQD). POSITION UNDER AND SEAL TO PIECE MARKED ⑨. SEE "DETAIL A" ON PAGE 3. ALT: STAKE POCKET PROTECTOR (4 REQD). USE TWO (2) UNDER EACH TIEDOWN FACILITY WITH PIECE MARKED ⑨. SEE "DETAIL B" ON PAGE 3.
- ⑫ WATERPROOF PAPER OR BURLAP, 36" (914MM) LONG BY 15" (381MM) WIDE (2 REQD). POSITION UNDER AND EXTEND 2" (51MM) ABOVE PIECE MARKED ④.



REAR VIEW

GENERAL NOTES

- A. THIS DOCUMENT HAS BEEN PREPARED AND ISSUED IN ACCORDANCE WITH AMCR 740-13.
- B. THE OUTLOADING PROCEDURES SHOWN HEREIN ARE APPLICABLE TO GERMAN RAILCARS AND OTHER FOREIGN RAILCARS OF SIMILAR DESIGN AND CONSTRUCTION.
- C. THE LOAD AS SHOWN IS BASED ON GERMAN RAILCAR (SM) 42'-7-3/8" (12,990MM) LONG X 9'-2-1/4" (2,800MM) WIDE. ADDITIONAL UNITS OR OTHER ITEMS MAY BE LOADED ON THE CAR WITH THE VIEW TOWARD FULL UTILIZATION OF CARRIER EQUIPMENT.
- D. LADING DATA:
 DIMENSIONS ----- 9'-2" (2,794MM) LONG X 6'-6" (1,981MM) WIDE X 3'-10" (1,168MM) HIGH.
 GROSS WEIGHT ---- 1,824 LBS (APPROX) (827 KG).
- E. REMOVE ALL POSTS FROM SIDE OF CAR AND PLACE IN RACKS UNDER CAR.
- F. WHEN ANY STRAP IS SEALED AT AN END-OVER-END LAP JOINT, A MINIMUM OF TWO (2) SEALS, BUTTED TOGETHER, WITH TWO (2) PAIR OF CRIMPS PER SEAL MUST BE USED TO SEAL THE JOINT.
- G. **CAUTION:** DURING WIRE ROPE INSTALLATION AVOID ALL CONTACT WITH ELECTRICAL WIRING, VEHICLE CONTROLS AND OTHER APPURTENANCES.
- H. WIRE ROPE CABLE MUST BE TENSIONED SUFFICIENTLY TO CAUSE SLIGHT VEHICLE BODY DEPRESSION. TENSIONING CAN BE ACCOMPLISHED BY EMPLOYING TWO (2) CABLE "GRIPPERS" AND AN APPLICABLY SIZED "COME-A-LONG" TYPE MECHANICAL HOIST.
- J. ALL HAND BRAKES MUST BE "SET" WITH THE HAND LEVERS WIRE TIED OR BLOCKED, AND TIRES WILL BE INFLATED TO 10 PSI ABOVE REGULAR OPERATING PRESSURE.
- K. **NOTICE:** A STAGGERED NAILING PATTERN WILL BE USED WHEN DUNNAGE IS NAILED TO THE FLOOR OF THE TRANSPORTING VEHICLE, OR WHEN LAMINATING DUNNAGE. ADDITIONALLY, THE NAILING PATTERN FOR AN UPPER PIECE OF LAMINATED DUNNAGE WILL BE ADJUSTED AS REQUIRED SO THAT A NAIL FOR THAT PIECE WILL NOT BE DRIVEN THROUGH ONTO OR RIGHT BESIDE A NAIL IN A LOWER PIECE.



BILL OF MATERIAL		
LUMBER	LINEAR FEET	BOARD FEET
1" X 6"	2	1
2" X 4"	20	14
2" X 6"	15	15
6" X 8"	6	24
NAILS	NO. REQD	POUNDS
12d (3-1/4")	14	1/4
16d (3-1/2")	14	1/2
40d (5")	72	4-1/4
60d (6")	8	1
ROPE, STEEL WIRE, 3/8" DIA	64' REQD	16 LBS
CLIPS, 3/8"	16 REQD	5 LBS
STEEL STRAPPING, 2" X .050"	24' REQD	8 LBS
SEALS, FOR 2" STRAP	6 REQD	1 LB
STAPLES, FOR 2" STRAP	2 REQD	NIL
WATERPROOF PAPER OR BURLAP	6' REQD	NIL

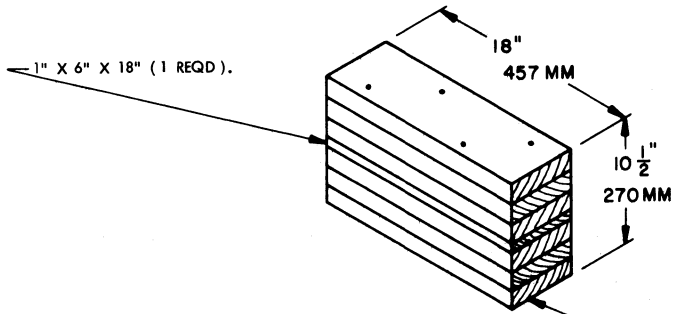
LIST OF RAILCARS THAT MAY BE USED FOR SHIPMENTS		
RAILCARS	NO. OF ITEMS	TOTAL WEIGHT OF ITEMS
SM ----- 24	4	7,296 LBS (3,309 KG)

MATERIAL SPECIFICATIONS

- LUMBER** ----- : DOUGLAS FIR OR COMPARABLE LUMBER WITH STRAIGHT GRAIN AND FREE OF MATERIAL DEFECTS. REF: FED SPEC MM-L-751.
- NAILS** ----- : COMMON, CEMENT COATED OR CHEMICALLY ETCHED. REF: FED SPEC FF-N-105. ALT: ANNULAR-RING TYPE NAIL OF SAME SIZE.
- ROPE** ----- : STEEL, WIRE, PLAIN, PREFORMED, REGULAR LAY, 6.56 TONS, 6 X 19, FLEXIBLE IWRC. MACWHYTE WIRE ROPE CO (OR EQUAL). REF: FED SPEC RR-W-410.
- CLIPS** ----- : "U" BOLT, CROSBY, HEAVY DUTY (OR EQUAL).
- STRAPPING, STEEL** ----- : TYPE I OR IV, CLASS "A" OR "C", REF: FED SPEC QQ-5-781. FOR FSN SEE SB-38-100.
- STRAP SEAL; STRAP STAPLE; STAKE POCKET PROTECTOR** ----- : COMMERCIAL GRADE.

LOAD AS SHOWN

ITEM	QUANTITY	WEIGHT (APPROX)
MOBILITY KIT (XM234)	1	1,824 LBS
DUNNAGE		171 LBS
TOTAL WEIGHT		1,995 LBS (905 KG)



2" X 6" X 18" (6 REQD). NAIL THE FIRST
PIECE TO THE CAR FLOOR W/4-16d NAILS.
NAIL EACH ADDITIONAL PIECE W/4-40d
NAILS.

FORWARD BLOCKING

NOTE: 6" (120MM) WIDE MATERIAL OF
ANY THICKNESS MAY BE USED IN LIEU
OF THAT SHOWN TO PROVIDE THE
HEIGHT SPECIFIED.