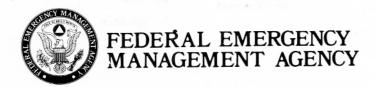
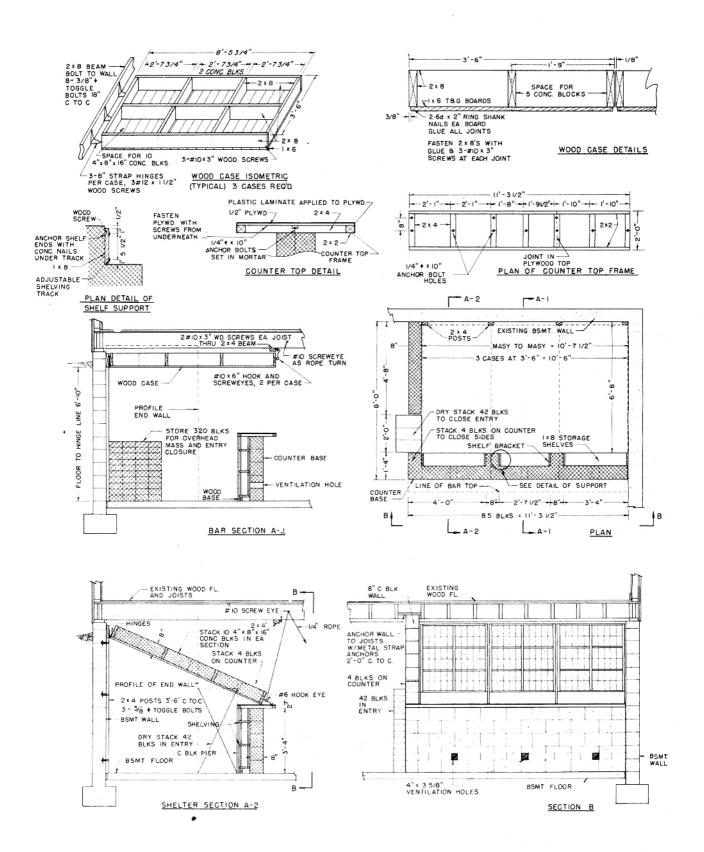


A snack bar
built of brick
or concrete block
can be converted
into shelter.
The hinged canopy
can be tilted-down
for filling with brick
or concrete block.

HOME FALLOUT SHELTER snack barbasement location plan d





GENERAL INFORMATION

The principal feature of this shelter is a sturdy wood overhead canopy which serves as a part of a pre—built snack bar in a basement recreation room. Consisting of three units hinged to the back wall, the canopy can be lowered to rest on the snack bar in an emergency.

In basements where the level of the outside ground is above the top of the canopy, adequate shelter from fallout radiation is provided for 5 people when the canopy is filled with 8" solid concrete block or brick.

The snack bar should not take more than 5 man-days to construct.

MATERIALS LIST

Actual Number Required Masonry: 4" x 8" x 16" solid concrete masonry units or $2^{-1}/4$ " x 4" x 8" solid bricks 720 blocks or 4320 bricks Mortar: prepared dry-mix bags 3 bags Lumber: ("Construction" or "No. 1" grades or better) posts $2 \times 4 \times 6^{1}-10$ " 4 pieces beam $2 \times 8 \times 10^{1}-6$ " 1 piece cases $2 \times 8 \times 8^{1}-5-3/4$ " 6 pieces $2 \times 8 \times 8^{1}-2-1/2$ " 3 pieces $2 \times 8 \times 1^{1}-6-9/16$ " 12 pieces $1 \times 6 \times 3^{1}-6$ " 12 pieces Counter top: edge frame $2 \times 2 \times 11^{1}-3-1/2$ " 2 pieces center frame $2 \times 4 \times 1-8-3/4$ " 7 pieces $2 \times 11^{1}-3-1/2$ " 2 pieces center frame $2 \times 4 \times 1-8-3/4$ " 7 pieces $2 \times 11^{1}-3-1/2$ " 2 pieces center frame $2 \times 4 \times 1-8-3/4$ " 7 pieces 2 \tau \tau \tau \tau \tau \tau \tau \tau	MITTIGE CITY	A =4== a1
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prepared dry-mix bags 3 bags Lumber: ("Construction" or "No. 1" grades or better) posts $2 \times 4 \times 6$ '-10" 4 pieces beam $2 \times 8 \times 10$ '-6" 1 piece cases $2 \times 8 \times 8$ '-5-3/4" 6 pieces $2 \times 8 \times 8$ '-2-1/2" 3 pieces $2 \times 8 \times 3$ '-2-3/4" 6 pieces $2 \times 8 \times 1$ '-6-9/16" 12 pieces $1 \times 6 \times 3$ '-6" T & G boards* 60 pieces Counter top: edge frame $2 \times 2 \times 11$ '-3-1/2" 2 pieces center frame $2 \times 4 \times 1$ -8-3/4" 7 pieces $2' \times 11'$ -3-1/2" $\times 1$ /2" plywood (good one side) 1 piece Plastic laminate if desired Shelving: uprights $1 \times 8 \times 3$ '-4" boards 6 pieces wood base $2 \times 4 \times 3$ '-2-3/4" stress-grade lumber 1 piece $2 \times 4 \times 2$ '-6-1/2" 1 piece $2 \times 4 \times 3$ '-3-1/4" 1 piece shelves $1 \times 8 \times 3$ '-2-1/4" 3 pieces	2-1/4" x 4" x 8" solid bricks	4320 bricks
Lumber: ("Construction" or "No. 1" grades or better) posts $2 \times 4 \times 6$ '-10" beam $2 \times 8 \times 10$ '-6" cases $2 \times 8 \times 8$ '-5-3/4" $2 \times 8 \times 8$ '-2-1/2" $2 \times 8 \times 8$ '-2-3/4" $2 \times 8 \times 1$ '-6-9/16" $1 \times 6 \times 3$ '-6" T & G boards* Counter top: edge frame $2 \times 2 \times 11$ '-3-1/2" edge frame $2 \times 2 \times 11$ '-3-1/2" places 2×11 '-3-1/2" x 1/2" plywood (good one side) Plastic laminate if desired Shelving: uprights $1 \times 8 \times 3$ '-4" boards wood base $2 \times 4 \times 1$ '-2-3/4" stress-grade lumber $2 \times 4 \times 2$ '-6-1/2" $2 \times 4 \times 3$ '-3-1/4" 1 piece shelves $1 \times 8 \times 3$ '-2-1/4" 3 pieces	Mortar:	
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cases $2 \times 8 \times 8! - 5 - 3/4!$ 6 pieces $2 \times 8 \times 8! - 2 - 1/2!!$ 3 pieces $2 \times 8 \times 8! - 2 - 3/4!!$ 6 pieces $2 \times 8 \times 1! - 6 - 9/16!!$ 12 pieces $1 \times 6 \times 3! - 6!!$ T & G boards* 60 pieces Counter top: edge frame $2 \times 2 \times 11! - 3 - 1/2!!$ 2 pieces center frame $2 \times 4 \times 1 - 8 - 3/4!!$ 7 pieces $2! \times 11! - 3 - 1/2!! \times 1/2!!$ plywood (good one side) 1 piece Plastic laminate if desired Shelving: uprights $1 \times 8 \times 3! - 4!!$ boards 6 pieces wood base $2 \times 4 \times 3! - 2 - 3/4!!$ stress-grade lumber 1 piece $2 \times 4 \times 2! - 6 - 1/2!!$ 1 piece $2 \times 4 \times 3! - 3 - 1/4!!$ 1 piece shelves $1 \times 8 \times 3! - 2 - 1/4!!$ 3 pieces	posts 2 x 4 x 6'-10"	4 pieces
$\begin{array}{cccccccccccccccccccccccccccccccccccc$	beam 2 x 8 x 10'-6"	1 piece
$\begin{array}{cccccccccccccccccccccccccccccccccccc$	cases 2 x 8 x 8'-5-3/4"	6 pieces
$\begin{array}{cccccccccccccccccccccccccccccccccccc$	2 x 8 x 8'-2-1/2"	3 pieces
Counter top: edge frame 2 x 2 x 11'-3-1/2'' edge frame 2 x 4 x 1-8-3/4'' 2 pieces 2' x 11'-3-1/2'' x 1/2'' plywood (good one side) Plastic laminate if desired Shelving: uprights 1 x 8 x 3'-4'' boards wood base 2 x 4 x 3'-2-3/4'' stress-grade lumber $2 x 4 x 2'-6-1/2''$ $2 x 4 x 3'-3-1/4''$ 1 piece $3 x 4 x 3'-3-1/4''$ shelves 1 x 8 x 3'-2-1/4'' 3 pieces	2 x 8 x 3'-2-3/4"	6 pieces
Counter top: $ \begin{array}{c} \text{edge frame 2 x 2 x 11'-3-1/2''} & 2 \text{ pieces} \\ \text{center frame 2 x 4 x 1-8-3/4''} & 7 \text{ pieces} \\ 2' \text{ x 11'-3-1/2'' x 1/2'' plywood (good one side)} & 1 \text{ piece} \\ \text{Plastic laminate if desired} \\ \\ \text{Shelving:} \\ \text{uprights 1 x 8 x 3'-4'' boards} & 6 \text{ pieces} \\ \text{wood base 2 x 4 x 3'-2-3/4'' stress-grade lumber} & 1 \text{ piece} \\ 2 \text{ x 4 x 2'-6-1/2''} & 1 \text{ piece} \\ 2 \text{ x 4 x 3'-3-1/4''} & 1 \text{ piece} \\ \text{shelves 1 x 8 x 3'-2-1/4''} & 3 \text{ pieces} \\ \end{array} $	2 x 8 x 1'-6-9/16"	12 pieces
edge frame 2 x 2 x 11'-3-1/2" center frame 2 x 4 x 1-8-3/4" 2 pieces $2'$ x 11'-3-1/2" x 1/2" plywood (good one side) Plastic laminate if desired Shelving: uprights 1 x 8 x 3'-4" boards wood base 2 x 4 x 3'-2-3/4" stress-grade lumber 2 x 4 x 2'-6-1/2" 2 x 4 x 3'-3-1/4" shelves 1 x 8 x 3'-2-1/4" 2 pieces	1 x 6 x 3'-6" T & G boards*	60 pieces
edge frame 2 x 2 x 11'-3-1/2" center frame 2 x 4 x 1-8-3/4" 2 pieces $2'$ x 11'-3-1/2" x 1/2" plywood (good one side) Plastic laminate if desired Shelving: uprights 1 x 8 x 3'-4" boards wood base 2 x 4 x 3'-2-3/4" stress-grade lumber 2 x 4 x 2'-6-1/2" 2 x 4 x 3'-3-1/4" shelves 1 x 8 x 3'-2-1/4" 2 pieces	Counter top:	
2' x 11'-3-1/2" x 1/2" plywood (good one side) Plastic laminate if desired Shelving: uprights 1 x 8 x 3'-4" boards wood base 2 x 4 x 3'-2-3/4" stress-grade lumber $2 x 4 x 2'-6-1/2"$ $2 x 4 x 3'-3-1/4"$ shelves 1 x 8 x 3'-2-1/4" 1 piece 3 pieces	edge frame 2 x 2 x 11'-3-1/2"	2 pieces
Plastic laminate if desired Shelving: uprights $1 \times 8 \times 3'$ - $4''$ boards 6 pieces wood base $2 \times 4 \times 3'$ - 2 - $3/4''$ stress-grade lumber 1 piece $2 \times 4 \times 2'$ - 6 - $1/2''$ 1 piece $2 \times 4 \times 3'$ - 3 - $1/4''$ 1 piece shelves $1 \times 8 \times 3'$ - 2 - $1/4''$ 3 pieces	center frame 2 x 4 x 1-8-3/4"	7 pieces
Shelving: uprights $1 \times 8 \times 3$ '-4" boards 6 pieces wood base $2 \times 4 \times 3$ '-2-3/4" stress-grade lumber 1 piece $2 \times 4 \times 2$ '-6-1/2" 1 piece $2 \times 4 \times 3$ '-3-1/4" 1 piece shelves $1 \times 8 \times 3$ '-2-1/4" 3 pieces	2' x 11'-3-1/2" x 1/2" plywood (good one side)	1 piece
uprights $1 \times 8 \times 3'$ -4" boards 6 pieces wood base $2 \times 4 \times 3'$ -2-3/4" stress-grade lumber 1 piece $2 \times 4 \times 2'$ -6-1/2" 1 piece $2 \times 4 \times 3'$ -3-1/4" 1 piece shelves $1 \times 8 \times 3'$ -2-1/4" 3 pieces	Plastic laminate if desired	
uprights $1 \times 8 \times 3'$ -4" boards 6 pieces wood base $2 \times 4 \times 3'$ -2-3/4" stress-grade lumber 1 piece $2 \times 4 \times 2'$ -6-1/2" 1 piece $2 \times 4 \times 3'$ -3-1/4" 1 piece shelves $1 \times 8 \times 3'$ -2-1/4" 3 pieces	Shelving:	
wood base $2 \times 4 \times 3! - 2 - 3/4!$ stress-grade lumber 1 piece $2 \times 4 \times 2! - 6 - 1/2!$ 1 piece $2 \times 4 \times 3! - 3 - 1/4!$ 1 piece shelves $1 \times 8 \times 3! - 2 - 1/4!$ 3 pieces		6 pieces
$2 \times 4 \times 2' - 6 - 1/2''$ 1 piece $2 \times 4 \times 3' - 3 - 1/4''$ 1 piece shelves $1 \times 8 \times 3' - 2 - 1/4''$ 3 pieces		
$2 \times 4 \times 3' - 3 - 1/4''$ 1 piece shelves $1 \times 8 \times 3' - 2 - 1/4''$ 3 pieces		V
shelves 1 x 8 x 3'-2-1/4" 3 pieces		-
		_
		<u> </u>
$1 \times 8 \times 3' - 2 - 3/4''$ 3 pieces		-

^{*}Square-edge boards may be used.

Hardware:

3" x 8" x 1/8" unfinished steel strap hinges	9
#12 x 1-1/2" wood screws, c.s.	72
3/8" diameter x 6" square head unfinished toggle bolts	16
6d ring shanked nails	4 pounds
#10 x 3" wood screws, c.s.	72
glue, protein emulsion (must develop 450 lbs./sq.in.)	1-1/2 pints
8d finish nails	2 pounds
1/4" diameter x 10" square head unfinished anchor bolts	s 10
#10 x 6" steel hook and screw eye sets	6
#10 x 6" steel screw eyes	6
1/4" hemm rone 80 lbs test	12 feet

CONSTRUCTION SEQUENCE

- 1. Prepare wood canopy units.
 - a. Assemble units in accordance with drawings on sheet 2.
 - b. Fasten hinges to hinge board with 1-1/2" #12* wood screws.
 - c. Locate and drill holes in basement wall to receive toggle bolts.
 - d. Bolt hinge board and posts to wall with toggle bolts.
 - e. Fasten the three wood canopy units to hinges with 1-1/2" #12* wood screws.
- 2. Prepare snack bar and walls.
 - a. Lay up end wall and counter base using concrete blocks or brick, building in anchor bolts for counter tops. Note drawings show material for base as concrete block. Brick, however, can also be used.
 - b. Assemble counter top frame.
 - c. Bolt counter top frame to counter base with anchor bolts.
 - d. Fasten plywood with plastic laminate to counter top.
 - e. Assemble wood shelves and supports.
 - f. Paint or varnish wood as desired. Use grain sealer for first coat. Shelter is now ready for use when and if needed.
- 3. Assembly of shelter (emergency actions)
 - a. Unhook and lower canopy to counter top using rope.
 - b. Fill canopy unit with blocks or bricks.
 - c. Occupy shelter and fill entry with blocks or bricks.

^{*} Drill lead holes 5/32" in diameter, 1-3/8" deep and shank lead holes 3/16" in diameter, 3/8" deep.