

MIL-A-615E

13 June 1974

SUPERSEDING

MIL-A-615D

25 March 1971

MILITARY SPECIFICATION

ALTAR, LECTERN, AND PULPIT HANGINGS (ECCLESIASTICAL)

This specification is approved for use by all Departments and Agencies of the Department of Defense.

1. SCOPE

1.1 Scope. This specification covers ecclesiastical altar, lectern, and pulpit hangings.

* 1.2 Classification. The ecclesiastical altar covers and hangings shall be of the following classes, as specified (see 6.2).

- | | |
|---------|--|
| Class 1 | - Deleted - (see 6.5). |
| Class 2 | - "Four Seasons" Colors - Jacquard brocade. |
| Class 3 | - "Four Seasons" Colors and Ultramarine Blue - Jacquard brocade. |

2. APPLICABLE DOCUMENTS

2.1 The following documents, of the issue in effect on date of invitation for bids or request for proposal, form a part of this specification to the extent specified herein:

SPECIFICATIONS

FEDERAL

- | | |
|-----------|---|
| V-T-276 | - Thread, Cotton. |
| UU-P-553 | - Paper, Wrapping, Tissue. |
| PPP-B-636 | - Boxes, Shipping, Fiberboard. |
| PPP-B-676 | - Boxes, Setup. |
| PPP-T-45 | - Tape, Gummed Paper, Reinforced and Plain, For Sealing and Securing. |

STANDARDS

FEDERAL

- | | |
|-------------|-----------------------------------|
| FED-STD-191 | - Textile Test Methods. |
| FED-STD-751 | - Stitches, Seams and Stitchings. |

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- MIL-STD-105 - Sampling Procedures and Tables for Inspection by Attributes.
- MIL-STD-129 - Marking for Shipment and Storage.

PUBLICATION

US Postal Service Manual

(Copies of the manual may be obtained from the Superintendent of Documents, US Government Printing Office, Washington, DC 20402.)

(Copies of specifications, standards, and publications required by suppliers in connection with specific procurement functions should be obtained from the procuring activity or as directed by the contracting officer).

- * 2.2 Other publications. The following documents form a part of this specification to the extent specified herein. Unless a specific issue is identified, the issue in effect on date of invitation for bids or request for proposal, shall apply:

Color Association of the United States, Inc.

US Army Standard Color Card for Official Colors for Arms and Services, Standard Color Card of America, 9th Edition.

(Copies may be obtained from the Color Association of the United States, Inc., 200 Madison Avenue, New York, NY 10016.)

National Motor Freight Traffic Association, Inc., Agent

National Motor Freight Classification

(Application for copies should be addressed to the American Trucking Associations, Inc., Tariff Order Section, 1616 P Street, N.W., Washington, DC 20036.)

Uniform Classification Committee, Agent

Uniform Freight Classification

(Application for copies should be addressed to the Uniform Classification Committee, Room 1106, 222 South Riverside Plaza, Chicago, IL 60606.)

American Association of Textile Chemists and Colorists

Technical Manual of AATCC Method 23-1962 - Colorfastness to Oxides of Nitrogen in the Atmosphere.

(Copies of Technical Manual may be obtained from AATCC P.O. Box 12215, Research Triangle Park, North Carolina, 27709.)

3. REQUIREMENTS

3.1 Standard sample. The finished hangings shall match the standard sample for shade and pattern and shall be equal to, or better than, the standard sample with respect to all characteristics for which the sample is applicable (see 6.4).

3.1.1 First article. When specified, the supplier shall furnish a sample for first article test and approval (see 4.2.1, 6.2, and 6.3).

3.2 Material.

- * 3.2.1 Brocade. The jacquard brocade shall be made of acetate warp and cotton filling (see 6.6). The cloth shall conform to the minimum physical requirements specified in table I, when tested as specified in 4.2.2.1.

TABLE I. Physical requirements, brocade

Weight per sq. yd. oz. (min.)	Texture (min.)		Breaking strength (lb.) min.		Weave
	Warp	Filling	Warp	Filling	
5.7	132 x	48	70	<u>1</u> / 100	Jacquard

1/ For bleached fabric shall be 84 lbs.

- * 3.2.2 Fringe. The fringe shall be a chainette fringe, including a three-row firm heading, approximately 3/8-inch deep. The rayon yarn for the heading shall be 3 end 300 (+ 5%) denier. The picks shall be Ultramarine Blue and Silver Gray for Ultramarine Blue hangings, two picks of each color alternating. The picks in the fringe for "Four Seasons" colors shall be Old Gold. There shall be not less than 10 picks per inch. The rayon yarn for the fringe shall be 600 (+ 5%) denier. The overall length of the fringe shall be 2 (+ 1/4) inches, and shall weigh approximately 1-1/4 ounces per linear yard. The rayon shall be multifilament, bright, viscose. Testing shall be as specified in 4.2.2.1.

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- * 3.2.3 Color. All colors shall be uniform in shade, and except as specified in 3.2.5.1, shall be dyed to match the Cable numbers and Shade numbers listed below:

Ultramarine Blue	-	Shade No. 367	
Old Gold	-	Cable No. 65021	
Silver Gray	-	Cable No. 65008	
Purple	-	Shade No. 363	} "Four Seasons" colors
Scarlet	-	Shade No. 364	
Green	-	Shade No. 365	
White	-	Shade No. 366	

3.2.3.1 Sulfur content. The use of sulfur dyes and dyes containing elementary sulfur or compounds capable of oxidation to sulfuric acid is prohibited. The dyed cloth shall show no more labile sulfur than shown by the standard sample, when tested as specified in 4.2.2.1.

3.2.3.2 Matching. The color shall match the specified shades under natural (north sky) daylight or artificial daylight having a color temperature of 7500° Kelvin and shall be a good approximation to the specified shades under incandescent lamplight to 2800° Kelvin.

- * 3.2.3.3 The dyed materials shall show fastness to wet dry cleaning and light equal to or better than, the standard sample. In addition, the fabrics shall show fastness to oxides of nitrogen in the atmosphere equal to, or better than, the standard sample. When no standard sample is available, the dyed materials shall show good fastness to wet dry cleaning and light when tested as specified in 4.2.2.1. In addition, the fabrics in the hangings shall show color change no greater than gray scale, step 4, when tested as specified in 4.2.2.1.

3.2.4 Each hanging shall be marked with the manufacturer's name or readily identifiable trademark.

3.2.5 Thread.

- * 3.2.5.1 Sewing thread. The thread for sewing shall be mercerized cotton, 3 ply ticket No. A, type IC2, dyed to match the shade of fabric. The chainette fringe shall be sewn with the applicable matching color, 3 ply ticket No. A IC2, mercerized cotton dyed thread. The thread shall conform to the requirements of V-T-276. The dyed thread shall show good fastness to wet dry-cleaning and light when tested as specified in V-T-276.

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- * 3.3 Stitches, seams, and stitchings. Unless otherwise specified herein, the stitches, seams, and stitching shall conform to the applicable types of FED-STD-751 as shown in table II. Ends of all seams and stitching produced with 301 stitch type, when not caught in other seams and stitching, shall be backtacked not less than 1/4 inch. Skipped stitches or thread breaks (401 stitch type) may be repaired by using 301 stitch type. When 401 stitch type is used, the chain shall be on the back of the hangings.

3.3.1 Repairs of type 301 stitching. Repairs of type 301 stitching shall be as follows:

a. When thread breaks or bobbin run-outs occur during sewing, the stitching shall be repaired by restarting the stitching a minimum of 1/2 inch back of the end of the stitching. 1/

b. Thread breaks or two or more consecutive skipped stitches or run-offs noted during inspection of the item shall be repaired by over stitching. The stitching shall start a minimum of 1/2 inch in back of the defective area, continue over the defective area and continue a minimum of 1/2 inch beyond the defective area onto the existing stitching. Loose or excessively tight stitching shall be repaired by removing the defective stitching without damaging the materials and restitching in the required manner. 1/

1/ When making the above repairs, the ends of the stitching are not required to be backstitched.

3.3.2 Repairs of type 401 stitching. Thread tension shall be maintained so that there will be no loose stitching. All repairs shall be in accordance with 3.3.1 a. and 3.3.1 b., except substitute 3/4 inch for 1/2 inch wherever 1/2 inch appears.

TABLE II. Stitches, seams, and stitching

	Types of seams or stitching	Stitch type	Stitches per inch
Top and sides	EFb-1	301 or 401	10-12
Fringe	LSa-2	301 or 401	10-12
Hem tunnel	EFb-1	301 or 401	10-12

3.4 Design.

3.4.1 Hangings, set.

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- * 3.4.1.1 Hangings, class 2. Class 2 hangings set shall consist of hangings for altar, pulpit, and lectern, as shown on figure 1, and shall be in the following color combinations:

Green
Scarlet "Four Seasons" colors
Purple
White

The hangings set shall be trimmed on the bottom with chainette fringe of Old Gold. The class 2 hangings set shall consist of four altar covers, one of each color; four pulpit hangings (one of each color) and four lectern hangings, one of each color.

- * 3.4.1.2 Hangings, class 3. Class 3 hangings set shall consist of hangings for altar, pulpit, and lectern as shown on figure 1, and in the "Four Seasons" colors as indicated in 3.4.1.1 and in Ultramarine Blue. The hangings set shall be trimmed on the bottom with chainette fringe of Old Gold for the "Four Seasons" colors and alternate Ultramarine Blue and Silver Gray chainette fringe for the Ultramarine Blue hangings. The class 3 hangings set shall consist of five altar covers, one of each color; five pulpit hangings (one of each color) and five lectern hangings, one of each color.

3.5 Construction. The detail measurements of the hanging sets shall be as shown on figure 1 and as specified herein.

3.5.1 Hangings.

- * 3.5.1.1 Class 2 - Hangings set. Altar, pulpit, and lectern hangings shall be made of one piece of unlined brocade specified in 3.2.1. The altar hangings shall have a top and bottom unhemmed selvage edge. As an alternate, the hangings may have, for the bottom, an unhemmed selvage edge and, for the top edge, a $2 \pm 1/4$ inches hem using the same seam type, stitch type, and stitches per inch as the sides. The sides shall be hemmed $2 \pm 1/4$ inches with machine stitched diagonal underseams at the bottom. The chainette fringe, specified in 3.2.2 shall be sewn $2 \pm 1/4$ inches from the bottom edge and full width of the hanging. A hem tunnel shall be formed at the top of the pulpit and lectern hangings (see figure 1).

3.6 Workmanship. The finished covers and hangings shall conform to the quality and grade of product established by this specification. The occurrence of defects shall be no more than the applicable acceptable quality level.

4. QUALITY ASSURANCE PROVISIONS

4.1 Responsibility for inspection. Unless otherwise specified in the contract or purchase order, the supplier is responsible for the performance of all inspection requirements as specified herein. Except as otherwise specified in the contract or order, the supplier may use his own or any other facilities suitable for the performance of the inspection requirements specified herein, unless disapproved by the Government. The Government reserves the right to perform any of the inspections set forth in the specification where such inspections are deemed necessary to assure supplies and services conform to prescribed requirements.

4.1.1 Certificate of compliance. Where certificates of compliance are submitted, the Government reserves the right to check test such items to determine the validity of the certification.

4.2 Inspection. Sampling for inspection shall be performed in accordance with MIL-STD-105, except where otherwise indicated hereinafter.

4.2.1 First article inspection. When required (see 6.2), the first article shall be visually inspected for the defects listed in 4.3.1. The sample shall be tested for physical and chemical characteristics in accordance with 4.2.2.1.

4.2.2 Component and material inspection. In accordance with 4.1 above, components and materials shall be tested in accordance with all the requirements of referenced specifications, drawings, and standards unless otherwise excluded, amended, modified, or qualified in this specification or applicable purchase documents. In addition, the supplier shall furnish a certificate of compliance for the fiber requirements of 3.2.1 and 3.2.2.

* 4.2.2.1 Testing of components. The methods of testing specified in FED-STD-191, wherever applicable, and as indicated in table III herein, shall be followed on samples selected from each lot or batch of components used in the fabrication of the end item. The sample unit shall be one linear yard, full width of the cloth. Three sample units shall be tested and any one failure to meet each characteristic requirement shall be cause for rejection of the material.

TABLE III. Tests

Characteristic	Requirement paragraph	Test method
Cloth		
Weight (ounces per sq/yd)	3.2.1	5041
Texture:		
Warp	3.2.1	5050
Filling	3.2.1	5050

TABLE III. Tests (cont'd)

<u>Characteristic</u>	<u>Requirement paragraph</u>	<u>Test method</u>
Breaking strength:		
Warp	3.2.1	5100
Filling	3.2.1	5100
Weave	3.2.1	Visual <u>2/</u>
Finish	3.2.1	Visual <u>1/</u>
Fringe:		
Weight	3.2.2	5041
Length	3.2.2	Visual <u>2/</u>
Picks per inch	3.2.2	5050
Colorfastness to:		
Wet drycleaning	3.2.3.3	5622
Light	3.2.3.3	5660 <u>3/</u>
Labile sulfur	3.2.3.1	2020
Oxides of Nitrogen in the Atmosphere	3.2.3.3	Method 23-1962-AATCC Technical Manual <u>1/</u>

- 1/ Unless otherwise specified, a certificate of compliance shall be submitted and will be acceptable for the stated requirements.
- 2/ One determination shall be made and results reported as "pass" or "fail".
- 3/ The time of exposure shall be 40 Standard Fading Hours.

4.3 End item examination.

- * 4.3.1 Examination of the end item. Examination of the end item shall be made in accordance with the defects set forth below. The sample unit shall be one hanging set. The lot size shall be expressed in units of one hanging set. The inspection level shall be level II with an acceptable quality level (AQL) of 2.5 percent defective. Any sample unit containing one or more of the following defects shall be scored as defective.

Defects

Any component missing.
 Finish or color not as specified.
 Finish or color not uniform.
 Cloth for hangings not in one piece.
 Hem tunnel in top of hanging not as specified.
 Any misweave, hole, cut or tear, broken or missing yarn, smash, or unsightly slubs.

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Defects

Tight or loose yarn resulting in pucker, ridge, or loop.
Open seam not repaired or not repaired as specified.

NOTE: A seam shall be classified as open when one or more stitches joining a seam are broken or when two or more consecutive skipped stitches or run-offs occur.

Seam twisted, puckered, not straight.
End of stitching not securely backstitched, unless caught in other seam or stitching.
Any faulty stitching, such as loose or tight tension which shows evidence of puckering; loose seam or strain which would result in broken thread under slight tension.
Backstitching missing where specified.
Stitching, seams, and stitches not as specified.
Stitching irregular.
Color of thread not as specified.
Any raw edge of fabric not securely caught in stitching.
Not clean; any spots or foreign matter embedded in fabric.
Measurements not within tolerance as applicable.

- * 4.4 Examination of preparation for delivery requirements. An examination shall be made to determine that the packaging, packing, and marking complies with the requirements of section 5. Defects shall be as listed below. The sample unit shall be one shipping container fully prepared for delivery with the exception that it need not be closed. Defects of closure listed below shall be examined on shipping containers fully prepared for delivery. The lot size shall be the number of shipping containers in the end item inspection lot. The inspection level shall be S-2 with an AQL of 4.0 defects, expressed as defects per hundred units.

<u>Examine</u>	<u>Defect</u>
Packaging and packing material	Any packaging material or component not as specified. Any component missing, damaged or not as specified. Items not neatly folded and individually wrapped, nor completely and neatly packaged in set-up paperboard box.

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<u>Examine</u>	<u>Defect</u>
Packaging and packing material (cont'd)	Inadequate application of components, such as: incomplete closure of container flaps, improper taping, loose strapping or inadequate stapling. Bulged or distorted container.
Marking (exterior or interior)	Omitted, incomplete, incorrect, illegible, of improper size, location, sequence, or method of application.
Weight	Weight of contents of each shipping container exceeds requirements.

5. PREPARATION FOR DELIVERY

5.1 Packaging. Packaging shall be level A or C, as specified (see 6.2).

- * 5.1.1 Level A. Hangings furnished separately or in sets, as applicable, shall be neatly folded and individually wrapped in tissue paper conforming to type I, class 1 of UU-P-553. The wrapped item(s) of one description only shall then be packaged in a snug-fitting, setup paperboard box conforming to type I, variety 1, class A, style 4 of PPP-B-676. The box closure shall be secured with 2-inch minimum width gummed paper tape conforming to type III, grade A of PPP-T-45 applied at the center of the length opening and extending along the bottom and up each side a minimum of 2 inches.

5.1.2 Level C (commercial packaging). The hangings shall be packaged to afford adequate protection against physical damage during shipment from the supply source to the first receiving activity. The package and the quantity per package shall be the same as that normally used by the supplier for retail distribution.

5.2 Packing. Packing shall be level A, B, or C, as specified (see 6.2).

- * 5.2.1 Level A. Hangings of one description only, packaged as specified in 5.1, shall be packed in a snug-fitting, fiberboard shipping container conforming to style RSC, grade V2s of PPP-B-636. Each shipping container shall be closed in accordance with method III, waterproofed in accordance with method V and reinforced as specified in the appendix of PPP-B-636. The weight of contents of each shipping container shall not exceed 65 pounds.

5.2.2 Level B. Hangings of one description only, packaged as specified in 5.1, shall be packed in a snug-fitting fiberboard shipping container

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conforming to style RSC, type CF (variety SW) or SF, class domestic, grade 275 of PPP-B-636. Each shipping container shall be closed in accordance with method II as specified in the appendix of PPP-B-636. The weight of contents of each shipping container shall not exceed 65 pounds.

- * 5.2.2.1 When specified (see 6.2), the shipping container shall be a grade V3c, V3s, or V4s fiberboard box fabricated in accordance with PPP-B-636 and closed in accordance with method III as specified in the appendix of the container specification.

5.2.3 Level C (commercial packing). Hangings of one description only, packaged as specified in 5.1, shall be packed in a manner to insure carrier acceptance and safe delivery at destination at the lowest transportation rate for such supplies. The quantity per shipping container shall be the same as that normally used by the supplier for retail distribution. Containers shall comply with the US Postal Service Manual, Uniform Freight Classification Rules or National Motor Freight Classification Rules, as applicable.

5.3 Marking. In addition to any special marking required by the contract or order, interior packages and shipping containers shall be marked in accordance with MIL-STD-129.

6. NOTES

- * 6.1 Intended use. The hangings covered by this specification are intended for use in Chapels of the Armed Forces. Class 2 hangings are for use by the Army and Navy. Class 3 hangings are for use by the Air Force.

6.2 Ordering data. Procurement documents should specify the following:

- (a) Title, number, and date of this specification.
- (b) Class of hanging set required (see 1.2).
- (c) When a first article sample is required (see 3.1.1, 4.2.1, and 6.3).
- (d) Selection of applicable levels of packaging and packing (see 5.1 and 5.2).
- (e) When weather-resistant grade fiberboard shipping containers are required for level 3 packing (see 5.2.2.1).

- * 6.3 First article. When a first article sample is required, it shall be inspected and approved under the appropriate provisions of ASPR 7-104.55.

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The first article should be a preproduction sample and should consist of one unit. The contracting officer should arrange for inspection and approval of the first article with the Construction, Materials and Supplies Advisory Group, Armed Forces Chaplains Board, Washington, DC 20301 and the U.S. Army Natick Laboratories (GL), Natick, MA 01760.

6.4 Standard sample. For access to standard sample, address the procuring office issuing the invitation for bids.

- * 6.5 The requirements for Class 1 as contained in MIL-A-615C have been deleted from this document since there is no longer a need for this item.

6.6 The brocade (Jacquard) has been made under Olympia Fabrics Corporation, Style - Holiday #225.

- * 6.7 Coloration. The standard samples for class 2 and class 3 hangings were dyed with the following formulations:

Purple - Shade No. 363

Dispersed Navy Blue SGL
Dispersed Violet 5R
Direct Violet 66

Scarlet - Shade No. 364

Dispersed Yellow 23
Direct Red 80
Direct Orange 61
Dispersed Red 2GL

Green - Shade No. 365

Dispersed Yellow 31
Dispersed Yellow 23
Dispersed Blue CAFD
Direct Orange 61
Direct Green 27
Direct Rubine RNLL

Ultramarine Blue - Shade No. 367

Disperse Blue 1
Disperse Yellow 42
Direct Brilliant Blue 2 BL

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6.8 Marginal code identification. The margins of this specification are marked with an asterisk to indicate where changes (additions, modifications, corrections, deletions) from the previous issue were made. This was done as a convenience only and the Government assumes no liability whatsoever for any inaccuracies in these notations. Bidders and suppliers are cautioned to evaluate the requirements of this document based on the entire content irrespective of the marginal notations and relationship to the last previous issue.

Custodians:

Army - GL
Navy - PE
Air Force - 23

Preparing activity:

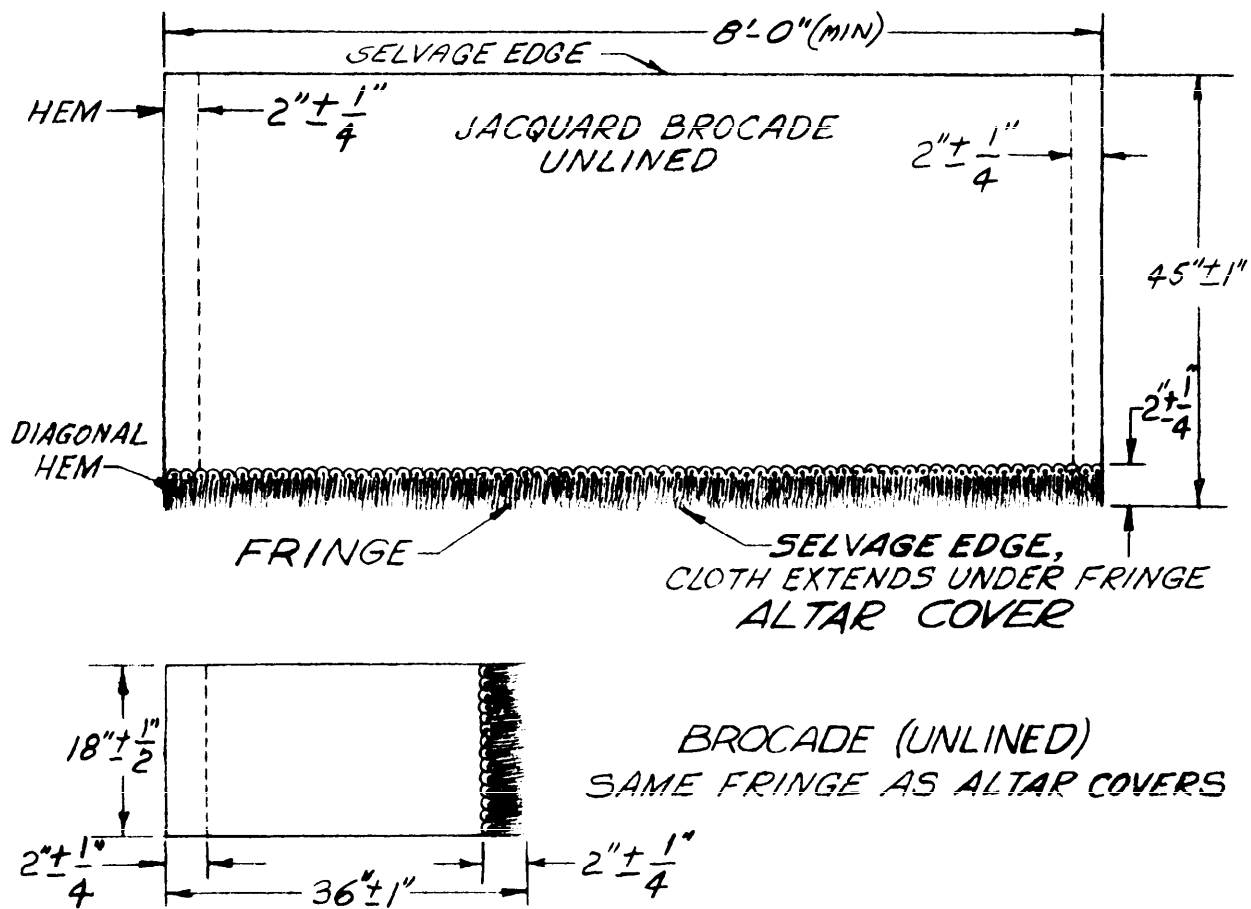
Army - GL
Project No. 9925-0212

Review activity:

Armed Forces Chaplains Board

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PULPIT OR LECTERN HANGINGS

FIGURE 1: ALTAR, LECTERN AND PULPIT
HANGINGS (ECCLESIASTICAL) CLASSES 2&3

STANDARDIZATION DOCUMENT IMPROVEMENT PROPOSAL		OMB Approval No. 22-R255
INSTRUCTIONS: The purpose of this form is to solicit beneficial comments which will help achieve procurement of suitable products at reasonable cost and minimum delay, or will otherwise enhance use of the document. DoD contractors, government activities, or manufacturers/vendors who are prospective suppliers of the product are invited to submit comments to the government. Fold on lines on reverse side, staple in corner, and send to preparing activity. Comments submitted on this form do not constitute or imply authorization to waive any portion of the referenced document(s) or to amend contractual requirements. Attach any pertinent data which may be of use in improving this document. If there are additional papers, attach to form and place both in an envelope addressed to preparing activity.		
DOCUMENT IDENTIFIER AND TITLE MIL-A-615E ALTAR, LECTERN, AND PULPIT HANGINGS (ECCLESIASTICAL)		
NAME OF ORGANIZATION AND ADDRESS	CONTRACT NUMBER MATERIAL PROCURED UNDER A <input type="checkbox"/> DIRECT GOVERNMENT CONTRACT <input type="checkbox"/> SUBCONTRACT	
1. HAS ANY PART OF THE DOCUMENT CREATED PROBLEMS OR REQUIRED INTERPRETATION IN PROCUREMENT USE? A. GIVE PARAGRAPH NUMBER AND WORDING. B. RECOMMENDATIONS FOR CORRECTING THE DEFICIENCIES		
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3. IS THE DOCUMENT RESTRICTIVE? <input type="checkbox"/> YES <input type="checkbox"/> NO (If "Yes", in what way?)		
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