Downloaded from http://www.everyspec.com

MIL-S-2021E
25 May 1967

SUPERSEDING
MIL-S-002021D(DM)
18 September 1964 and
MIL-S-2021C
22 August 1958

MILITARY SPECIFICATION

SUIT, CONVALESCENT (JACKET AND TROUSERS)

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

1. SCOPE

1.1 Scope.- This specification covers the requirements for men's convalescent suits (jackets and trousers). (See 6.1).

1.2 Classification.- The convalescent suit, jackets and trousers, shall be in the following types and sizes, as specified (see 6.2). Jackets and trousers may be procured separately.

Type I - Summer suit - jacket, short sleeve; and trousers
Type II - Winter suit - jacket, long sleeve; and trousers

Schedule of sizes
Medium
Large

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

L-P-378 - Plastic Film (Polyethylene Thin Gage).
V-B-871 - Button, Sewing Hole, and Button, Staple, (Plastic).
V-T-276 - Thread, Cotton.
V-T-280 - Thread, Cotton Gimp, Buttonhole.
CCC-C-461 - Cloth, Uniform Twill, Cotton.
DDD-L-20 - Label; For Clothing, Equipage, and Tentage, (General Use).

FSC 6532

Downloaded from http://www.everyspec.com

MILITARY

MIL-C-10859 - Cloth, Oxford, Cotton (Permeable).
MIL-F-10884 - Fasteners, Snap.
MIL-B-17757 - Boxes, Fiber, Corrugated (Modular Sizes).

STANDARDS

FEDERAL

Fed. Std. No. 751 - Stitches, Seams, and Stitchings.

MILITARY

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

(Copies of specifications, standards, drawings 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.)

3. REQUIREMENTS

3.1 Sample.- Guide sample is furnished solely for guidance and information to the supplier (see 6.3). Variation from this specification may appear in the sample, in which case this specification shall govern.

3.2 Preproduction sample.- When specified (see 6.2), before production is commenced, a sample garment shall be submitted to or made ready for the contracting officer or his authorized representative for inspection as specified in 4.2. The approval of the preproduction sample authorizes the commencement of production but does not relieve the supplier of responsibility for compliance with all applicable provisions of this specification. The preproduction sample shall be manufactured by the supplier in the same facilities to be used for the manufacture of the production items.

3.3 Materials.-

3.3.1 Basic materials.-

3.3.1.1 Type I.- The basic material for type I short sleeved jacket and trousers shall be permeable cotton cloth, 5.2 ounces, conforming to type I, class 1 of MIL-C-10859. The color shall be Blue Shade No. 16.

Downloaded from http://www.everyspec.com

3.3.1.2 Type II.- The basic material for type II long sleeved jacket and trousers shall be uniform twill cotton cloth, 8.2 ounces, conforming to type I of CCC-C-461. The color shall be Blue Shade No. 16.

3.3.2 Thread.- The cotton thread shall conform to V-T-276 and shall be type IA3, tickets No. 50, 3 ply and No. 70, 2 ply for seaming and stitching, and ticket No. 20, 4 ply for button sewing. The thread shall be dyed Blue, Shade J, Cable No. 66038.

3.3.2.1 Colorfastness.- The dyed thread shall show colorfastness to light, laundering and chlorine bleaching equal to or better than the standard sample (see 6.3). When no standard sample is available, the thread shall show "good" fastness to light, laundering and chlorine bleaching.

3.3.3 Gimp.- The gimp for reinforcing buttonholes shall be cotton, and shall conform to type I or II, size No. 8 of V-T-280. The gimp shall be dyed Blue, Shade J, Cable No. 66038.

3.3.3.1 Colorfastness.- The dyed gimp shall show colorfastness to laundering and chlorine bleaching equal to or better than the standard sample. When no standard sample is available, the gimp shall show "good" fastness to laundering and chlorine bleaching.

3.3.4 Buttons.- The buttons shall conform to type II, class D, style 20 or 21, 30-line and 24-line, of V-B-871. The buttons shall be DOD shade Blue BL, Cable No. 62005.

3.3.5 Snap fasteners.- The snap fasteners for closing the front end of the jacket waistband (both types) shall conform to style 2A, finish 2 of MIL-F-10884.

3.3.6 Labels.- Each jacket and pair of trousers shall have a combination size and identification label conforming to type I, classes 1 and 2 of DDD-L-20. The label shall include the information required by the applicable products labeling act and the supplier's registration number. The labels shall meet the fastness to laundering requirements of DDD-L-20. The item identification for type I shall be Jacket, Convalescent, Summer or Trousers, Convalescent, Summer; and for type II shall be Jacket, Convalescent, Winter or Trousers, Convalescent, Winter.

3.4 Design.- The convalescent jackets have a fly-front closure and two breast patch pockets with button down flaps. The type I jacket has short sleeves and the type II jacket has long sleeves (see figures 1 and 3). The type I trousers have waist adjustment tabs and the type II trousers have belt straps and loops (see figures 2 and 4).

Downloaded from http://www.everyspec.com

3.5 Figures.- The figures are furnished for information only. To the extent of any inconsistencies between the written specification and the figures, the written specification shall govern.

3.6 Patterns.- Standard patterns to be used to cut supplier's working patterns will be furnished by the Government. The working patterns shall be identical to the standard patterns which shall not be altered in any way. The standard patterns provide a 1/2 inch seam allowance for double-lapped, double-stitched seams and 3/8 inch for all other seams, unless otherwise indicated in table II.

3.6.1 List of pattern parts.- The component parts of the jackets and trousers shall be cut from the specified materials in accordance with the number of parts required, as specified in table I.

TABLE I.- List of pattern parts

Material	Pattern Item Identification	Cut parts
	Type I	
	Jacket	
Cotton cloth, permeable (3.3.1.1)	Front	2
	Back	1
	Sleeve (one piece)	2
	Collar stand	2
	Yoke	1
	Breast patch pocket	2
	Breast pocket flaps (block)	2
	Fly lining	2
	Front facings	2
	Collar	2
	Waistband	1
	Stay piece	1
Template:	Finished breast patch pocket	
	Finished patch pocket flap	
	Trousers	
	Back	2
	Front	2
	Fly	4
	Tabs	4
	Fly lining	1
	Waistband lining	1
	Hip patch pocket	1
	Hip pocket flap (block)	1

Downloaded from http://www.everyspec.com

TABLE I. - List of pattern parts (cont'd)

Material	Pattern Item Identification	Cut parts
	Trousers (cont'd)	
Template:	Finished hip patch pocket Finished hip pocket flap Buttonhole marker (sidetabs)	
	Type II	
	Jacket	
Cotton cloth, uniform twill (see 3.3.1.2)	Front	2
	Back	1
	Undersleeve	2
	Top sleeve	2
	Collar	2
	Collar stand	2
	Breast patch pockets	2
	Breast pocket flaps (block)	2
	Front facings	2
	Fly lining	2
	Waistband	1
	Stay piece	1
	Yoke	1
Template:	Finished breast patch pocket Finished patch pocket flap	
	Trousers	
	Back	2
	Front	2
	Fly	4
	Fly lining	1
	Waistband lining	1
	Belts straps (cut single)	4
	or	
	Belt straps (cut double)	2
	Hip patch pocket	1
	Hip pocket flap (block)	1
Template:	Finished hip patch pocket Finished hip pocket flap	

Downloaded from http://www.everyspec.com

3.7 Construction.-

3.7.1 Stitches, seams, and stitchings.- The stitch, seam, and stitching types specified in table II shall conform to Fed. Std. No. 751. Whenever two or more methods of seams or stitchings are given for the same part of the operation, any one of them may be used. Where stitch type 401 is used, the looper (underthread) shall be on the inside of the garment. Unless otherwise specified, double needle stitching shall be 3/16 to 5/16 inch gage with the outer row of stitching 1/16 inch from turned edge on outside of garments. Seam allowance shall be maintained with seams properly sewn so that no raw edges, run-offs, twists, pleats or puckers shall result.

3.7.2 Stitches per inch.- The minimum and maximum number of stitches per inch shall be as specified in table II.

3.7.3 Thread breaks and ends of seams.- The ends of all seams and stitchings, when not caught in other seams or stitching, shall be backtacked not less than 1/4 inch. The ends of a continuous line of stitching shall be overlapped not less than 1/2 inch. Thread breaks, all stitch types, shall be secured by stitching back of the break not less than 1/2 inch. Skipped stitches or thread breaks on 401 stitching may be repaired using a 301 stitch type.

3.8 Buttonholes.- Buttonholes shall be eyelet-end-taper bar type worked over No. 8 gimp, with ends tacked.

3.9 Manufacturing operations requirement.- The jackets and trousers shall be manufactured in accordance with operations requirements specified in table II. The supplier is not required to follow the exact sequence of operations listed. Any basting or holding stitching used to facilitate manufacture is permissible providing that the thread is removed or does not show on the finished jackets or trousers.

3.9.1 Marking.- The parts of the jackets and trousers shall be marked to insure a uniform shade and size throughout the garment. Any method of marking may be used except:

(a) Metal fastening devices.
(b) Sew-on shade ticket.
(c) Adhesive type tickets which leave an impression or traces of paper or adhesive on material upon removal of tickets.

NO.	MANUFACTURING OPERATIONS REQUIREMENTS TABLE II	STITCH TYPE	SEAM AND STITCHING TYPE	STITCHES PER INCH	THREAD	
					NEEDLE	BOBBIN or LOOPER
1.	Cutting.-					
	a. Cut garments in strict accordance with patterns furnished which show directional lines and notches for proper assembly. Directional lines shall be placed in the warp direction.					
	b. Cut all parts out of one piece of material except for the following, which may be cut from ends. Parts cut from ends shall approximately match the shade of the garment:					
	Jacket: front facings, stay piece, undercollar and undercollar stand, fly linings and yokes.					
	Trousers: fly linings, waistband adjustment tabs (type I) and belt straps and belt loops (type II).					
	c. Cut stripping for belt loops (type II trousers) of sufficient width to comply with operation 26.					
2.	Replacement of damaged parts.-					
	a. Replace at time of cutting, any part containing a hole, smash, multiple float or large loose slub.					
	b. Replace any part damaged during manufacturing process by needle chew, tear, cut, hole, burn or large exposed drill hole (unit containing a visible mend will not be acceptable).					

AMXRE Form 423
10 February 1965

Downloaded from http://www.everyspec.com

NO.	MANUFACTURING OPERATIONS REQUIREMENTS TABLE II	STITCH TYPE	SEAM AND STITCHING TYPE	STITCHES PER INCH	THREAD NEEDLE	THREAD BOBBIN or LOOPER
3.	Marking (see 3.9.1).-					
	a. Mark, ticket or bundle all component parts to insure correct size and a uniform shade throughout the garment.					
	Make jacket					
4.	Attach label.-					
	a. Position combination label on center of yoke and stitch on all four sides. Label shall be so positioned that on finished garment the label shall face the wearer and the top row of stitching shall not be more than 1/4 inch below botton of collar stand.	301	LSbj-1	10-14	50-3	50-3
5.	Hem breast patch pockets.-					
	a. Fold top of pocket, as indicated by marks on pattern, turn in raw edge and stitch 1/16 to 1/8 inch from edge. Hem shall finish 1-1/8 ± 1/8 inches wide at sides and 1-3/8 ± 1/8 inches wide at center.	301	EFb-1	10-14	50-3	50-3
6.	Make breast pocket flaps.-					
	a. Crease flap with raw edges turned in and stitch 1/16 to 1/8 inch from edge and continue stitching along folded edge.	301 301	SSc-1 and OSf-1	10-14 10-14	50-3 50-3	50-3 50-3
	- or -					
	b. Seam sides and mitered corners of flap. Trim, turn, work out corners, and stitch sides, corners and bottom 1/16 to 1/8 inch from edge.	301 or 401 and 301 301	SSe-2(a) SSe-2(a) SSe-2(b) and OSf-1	10-14 10-14 10-14 10-14	50-3 50-3 50-3 50-3	50-3 70-2 50-3 50-3

AMXRE Form 423
10 February 1965

Downloaded from http://www.everyspec.com

NO.	MANUFACTURING OPERATIONS REQUIREMENTS TABLE II	STITCH TYPE	SEAM AND STITCHING TYPE	STITCHES PER INCH	THREAD	
					NEEDLE	BOBBIN or LOOPER
7.	Make flap buttonhole.-					
	a. Make a vertical 5/8 ± 1/16 inch finished cut-length buttonhole in the center (1/4 inch off center tolerance) of the flap with the inside edge of the eyelet 1/2 to 5/8 inch from bottom edge of flap. Purling shall be on outside of flap when buttoned.	Buttonhole		44-46 per buttonhole including tack	50-3	50-3
8.	Make and attach yoke.-					
	a. Turn the bottom edge of yoke with raw edges folded in and stitch 1/16 to 1/8 inch from folded edge. Hem shall finish 1/4 to 3/8 inch wide.	301	EFb-1	10-14	50-3	50-3
	b. Stitch yoke to inside of back at neck, shoulders and sides 1/16 to 1/8 inch from edge.	301 or 401	SSa-1 SSa-1	10-14 10-14	50-3 50-3	50-3 70-2
9.	Make collar.-					
	Finished appearance.- Collar ends shall be uniformly shaped and shall not be uneven in length by more than 1/4 inch. The collar shall be centered (1/4 inch off center tolerance) on the collar stand.					
	a. Join the two plies of the collar around bottom and side edges.	301 or 401	SSe-2(a) SSe-2(a)	10-14 10-14	50-3 50-3	50-3 70-2
	b. Turn collar, work out points, and stitch 3/16 to 1/4 inch from edge.	301	SSe-2(b)	10-14	50-3	50-3

AMXRE Form 423
10 February 1965

Downloaded from http://www.everyspec.com

NO.	MANUFACTURING OPERATIONS REQUIREMENTS TABLE II	STITCH TYPE	SEAM AND STITCHING TYPE	STITCHES PER INCH	THREAD	
					NEEDLE	BOBBIN or LOOPER
9.	Make collar.- (cont'd)					
	c. Insert collar between both plies of collar stand, matching notches, and seam, with stitching continued around ends of stand.	301 or 401	SSq-2(a) SSq-2(a)	10-14 10-14	50-3 50-3	50-3 70-2
			and			
		301 or 401	SSe-2(a) SSe-2(a)	10-14 10-14	50-3 50-3	50-3 70-2
	d. Turn down stand, work out edges, and edge stitch collar stand 1/16 to 3/32 inch from edge continuing around ends of stand.	301	SSq-2(b)	10-14	50-3	50-3
			and			
		301	SSe-2(b)	10-14	50-3	50-3
10.	Make waistband.-					
	a. Center (1/8 inch off center tolerance) and attach the socket portion of snap fastener, through stay piece, to underside of left (rounded end) waistband, in a position that will be 3/4 ± 1/8 inch from end on finished waistband.					
	b. Fold waistband and stitch rounded end to notch; stitch square end, turn and force out edges.	301 or 401	SSe-2(a) SSe-2(a)	10-14 10-14	50-3 50-3	50-3 70-2
11.	Make left fly front.-					
	a. Seam one ply of the fly lining to the facing from notch to notch. Turn and stitch 3/16 to 1/8 inch from edge.	301 or 401 and 301	SSe-2(a) SSe-2(a) SSe-2(b)	10-14 10-14 10-14	50-3 50-3 50-3	50-3 70-2 50-3
	b. Seam the other ply of fly lining to left front edge of jacket from notch to notch. Turn and stitch 3/16 to 1/4 inch from edge.	301 or 401 and 301	SSe-2(a) SSe-2(a) SSe-2(b)	10-14 10-14 10-14	50-3 50-3 50-3	50-3 70-2 50-3

AMXRE Form 423
10 February 1965

Downloaded from http://www.everyspec.com

NO.	MANUFACTURING OPERATIONS REQUIREMENTS TABLE II	STITCH TYPE	SEAM AND STITCHING TYPE	STITCHES PER INCH	THREAD NEEDLE	THREAD BOBBIN or LOOPER
11.	Make left fly front.- (cont'd)					
	c. Make four 7/8 ± 1/16 inch finished cut-length buttonholes in left facing, as indicated by marks on pattern, through both plies, with the inside edge of eyelet 1/2 to 5/8 inch from edge (see 3.8). Purling shall be on the facing side.	Buttonhole		52-56 per buttonhole including tack	50-3	50-3
	d. Seam facing to front, above and below fly opening, as indicated by notches on pattern. Turn and edge stitch above and below fly opening 3/16 to 1/4 inch from edge.	301 or 401 and 301	SSe-2(a) SSe-2(a) SSe-2(b)	10-14 10-14 10-14	50-3 50-3 50-3	50-3 70-2 50-3
	e. Make three horizontal tacks or bartacks between buttonholes, through fly facing and fly lining (not through fronts). The tacks or bartacks shall measure 3/8 to 1/2 inch long. A 1/2 inch automatic straight tack may be used.	301 or Bartack or 301		10-14 28 per bartack 28 per tack	50-3 50-3 50-3	50-3 50-3 50-3
	f. Stitch back edges of fly lining together (this operation is optional).	301	SSa-1	10-14	50-3	50-3
	g. Turn in back edge of facing (all plies) and stitch to front 1/16 to 1/8 inch from edge.	301	LSd-1	10-14	50-3	50-3
12.	Make right front.-					
	a. Seam right facing to jacket front, turn and edge stitch 3/16 to 1/4 inch from edge.	301 or 401 and 301	SSe-2(a) SSe-2(a) SSe-2(b)	10-14 10-14 10-14	50-3 50-3 50-3	50-3 70-2 50-3
	b. Turn in back edge of facing and stitch 1/16 to 1/8 inch from edge.	301	LSd-1	10-14	50-3	50-3

AMXRE Form 423
10 February 1965

Downloaded from http://www.everyspec.com

NO.	MANUFACTURING OPERATIONS REQUIREMENTS TABLE II	STITCH TYPE	SEAM AND STITCHING TYPE	STITCHES PER INCH	THREAD	
					NEEDLE	BOBBIN or LOOPER
13.	Make sleeves (type II only).-					
	a. Join top sleeve and undersleeve together along back arm seam with a double-lapped and double-stitched seam with the top sleeve over the undersleeve.	301 or 401	LSc-2 LSc-2	10-14 10-14	50-3 50-3	50-3 70-2
14.	Join shoulder seam.-					
	a. Join shoulder seams with a double-lapped, double-stitched seam with the back and yoke over the fronts.	301 or 401	LSc-2 LSc-2	10-14 10-14	50-3 50-3	50-3 70-2
15.	Join collar to jacket.-					
	a. Seam bottom edge of undercollar stand to outside of jacket at neckline, catching top of yoke in stitching and turn collar up.	301 or 401	SSa-1 SSa-1	10-14 10-14	50-3 50-3	50-3 70-2
	b. Turn under bottom edge of top collar stand and stitch to inside of jacket at neck 1/16 to 1/8 inch from turned edge. Ends of collar stand shall finish even with fronts of coat (+ 1/8 - 0 inch).	301	LSb-1	10-14	50-3	50-3
16.	Sew on breast patch pockets.-					
	a. Position pocket on jacket as indicated by marks on pattern with front edge of pocket parallel to front opening. Turn under raw edge of pocket, (may be precreased), and stitch to jacket fronts, 1/16 to 1/8 inch from turned edge.	301	LSd-1	10-14	50-3	50-3

AMXRE Form 423
10 February 1965

Downloaded from http://www.everyspec.com

NO.	MANUFACTURING OPERATIONS REQUIREMENTS TABLE II	STITCH TYPE	SEAM AND STITCHING TYPE	STITCHES PER INCH	THREAD NEEDLE	THREAD BOBBIN or LOOPER
16.	Sew on breast patch pockets.- (cont'd)					
	b. Bartack or tack each end of pocket opening with 3/8 to 1/2 inch vertical bartacks or automatic 1/2 inch straight tacks.	Bartack or 301		28 per bartack 28 per tack	50-3 50-3	50-3 50-3
17.	Sew on pocket flap.-					
	a. Seam pocket flaps to jacket, as indicated by marks on pattern. Turn down flap and raise stitch 3/16 to 1/4 inch from edge. Flap shall completely cover pocket opening.	301 or 401 and 301	LSbl-2(a) LSbl-2(a) LSbl-2(b)	10-14 10-14 10-14	50-3 50-3 50-3	50-3 70-2 50-3
18.	Set sleeves.-					
	a. Sew in sleeves with a double-lapped, double-stitched seam with fronts and backs of jacket on top of the sleeve, catching the yoke in the armhole seam.	301 or 401	LSc-2 LSc-2	10-14 10-14	50-3 50-3	50-3 70-2
19.	Join side seams and underarm sleeve seams.-					
	a. Join side seams of jacket and underarm seams of sleeves in a continuous operation with a double-lapped, double-stitched seam, with fronts over the backs. Armhole seam shall not be staggered more than 3/8 inch at underarm (measured from center of seam to center of seam).	301 or 401	LSc-2 LSc-2	10-14 10-14	50-3 50-3	50-3 70-2

AMXRE Form 423

Downloaded from http://www.everyspec.com

NO.	MANUFACTURING OPERATIONS REQUIREMENTS TABLE II	STITCH TYPE	SEAM AND STITCHING TYPE	STITCHES PER INCH	THREAD	
					NEEDLE	BOBBIN or LOOPER
20.	Hem bottoms of sleeves.-					
	a. Turn up bottom of sleeves as indicated by marks on pattern and, with raw edges turned in, stitch 1/16 to 1/8 inch from edge. Hem shall finish 1 ± 1/8 inches wide. (Sleeves shall not be prehemmed.)	301	EFb-1	10-14	50-3	50-3
21.	Sew on waistband.-					
	Finished appearance.- Finished waistband shall be of uniform width, from 2-3/4 inches to 3-1/8 inches wide. The left (rounded) end of the band shall extend 1-1/2 ± 1/8 inches beyond front edge of jacket.					
	a. Seam inside portion of waistband to bottom of jacket.	301 or 401	LScf-2(a) LScf-2(a)	10-14 10-14	50-3 50-3	50-3 70-2
	b. Turn in raw edge of band on outside of jacket and stitch 1/16 to 1/8 inch from edge through all plies.	301	LScf-2(b)	10-14	50-3	50-3
	- or -					
	c. Fold waistband in half, turn in raw edges, insert bottom of jacket between turned-in raw edges and stitch.	301	LSbh-1 (without tape insert)	10-14	50-3	50-3
	d. Stitch bottom edge of waistband and continue along rounded and square ends 3/16 to 1/4 inch from edges.	301 301	OSf-1 and SSe-2(b)	10-14 10-14	50-3 50-3	50-3 50-3

Downloaded from http://www.everyspec.com

NO.	MANUFACTURING OPERATIONS REQUIREMENTS TABLE II	STITCH TYPE	SEAM AND STITCHING TYPE	STITCHES PER INCH	THREAD NEEDLE	THREAD BOBBIN or LOOPER
22.	Make buttonholes (see 3.8).-					
	a. Make a 5/8 ± 1/16 inch finished cut-length buttonhole in the center (1/8 inch off center tolerance) of the collar stand, as indicated by marks on pattern, with the inside edge of eyelet 5/8 ± 1/8 inch from left end of stand. Purling shall be away from wearer, when worn.	Buttonhole		44-46 per buttonhole including tack	50-3	50-3
	b. Make a 7/8 ± 1/16 inch finished cut-length buttonhole in the center (1/4 inch off center tolerance) of the waistband with the inside edge of eyelet 3/4 ± 1/8 inch from right end of waistband. Purling shall be away from wearer, when worn.	Buttonhole		52-56 per buttonhole including tack	50-3	50-3
23.	Sew on buttons.-					
	a. Mark, position and sew buttons of sizes indicated in positions listed, to correspond with their respective buttonholes:	101 or		20-22 per button	20-4	
		301 or		14-16 per button double thread	20-4	20-4
		Hand		8 double thread	20-4	
	(1) One 24-line button in center (1/8 inch off center tolerance) of right end of collar stand, with center of button 1 ± 1/8 inches from edge. When buttoned, the ends of the collar shall not overlap, nor be open more than 1/2 inch.					
	(2) Four 30-line buttons on right front as indicated by marks on pattern with center of buttons 1 ± 1/8 inches from edge.					

AMXRE Form 423
10 February 1965

Downloaded from http://www.everyspec.com

NO.	MANUFACTURING OPERATIONS REQUIREMENTS TABLE II	STITCH TYPE	SEAM AND STITCHING TYPE	STITCHES PER INCH	THREAD	
					NEEDLE	BOBBIN or LOOPER
23.	Sew on buttons.- (cont'd)					
	(3) One 30-line button on the center of the underside of left waistband through stay piece (not through outer band) to correspond with buttonhole at right end.					
	(4) Two 20- or 21-line buttons on pockets (one on each pocket). Buttons shall be sewn through pocket hem.					
24.	Attach waistband snap fastener (stud portion).-					
	a. Attach the stud portion of the snap fastener through all plies on right outside of waistband to correspond with socket on left end of band positioned so that it will form a smooth closure when jacket is buttoned and fastener is closed.					
25.	Clean jacket.-					
	a. Trim all threads ends, remove all loose threads, spots, stains and shade markings.					
	Make trousers					
26.	Make belt loops (type II trousers).-					
	Finished appearance.- The belt loops on finished trousers shall measure from 1/4 to 5/16 inch wide.					
	a. Fold stripping to center with raw edges abutted and stitch, 3/16 to 1/4 inch gage, with the cover stitch on the underside.	406	EFh-1	10-14	50-3	50-3

AMXRE Form 423
10 February 1965

Downloaded from http://www.everyspec.com

NO.	MANUFACTURING OPERATIONS REQUIREMENTS TABLE II	STITCH TYPE	SEAM AND STITCHING TYPE	STITCHES PER INCH	THREAD	
					NEEDLE	BOBBIN or LOOPER
27.	Make belt straps (type II trousers).-					
	Finished appearance.- The belt straps on finished trousers shall measure 1-5/8 ± 1/8 inches wide and 12 ± 3/8 inches long (see oper. 44).					
	a. Fold belt strap in half lengthwise, with raw edges turned in, and stitch 1/16 inch from both edges and one end.	301	EFp-2	10-14	50-3	50-3
	- or -					
	b. The belt straps may be made of two pieces of material with raw edges of sides and one end turned to the inside and stitched 1/16 inch from each edge.	301	EFn-2	10-14	50-3	50-3
28.	Make waistband adjustment tabs (type I trousers).-					
	a. Seam two plies of the tab along sides and pointed end; turn, work out points and stitch 1/16 to 1/8 inch from edge. Tab on finished trousers shall measure 1-5/8 ± 1/8 inches wide and 2-1/2 ± 1/4 inches long.	301 or 401 301	SSe-2(a) SSe-2(a) SSe-2(b)	10-14 10-14 10-14	50-3 50-3 50-3	50-3 70-2 50-3
29.	Make tab buttonholes (type I trousers) (see 3.8).-					
	a. Make a 5/8 ± 1/16 inch finished cut-length horizontal buttonhole in the center (1/8 inch off center tolerance) of each tab, in accordance with buttonhole marker, with the inside edge of eyelet 1/2 to 5/8 inch from pointed finished end. Purling shall be on the outside of tab.	Buttonhole		44-46 per buttonhole including tack	50-3	50-3

AMXRE Form 423
10 February 1965

Downloaded from http://www.everyspec.com

NO.	MANUFACTURING OPERATIONS REQUIREMENTS TABLE II	STITCH TYPE	SEAM AND STITCHING TYPE	STITCHES PER INCH	THREAD	
					NEEDLE	BOBBIN or LOOPER
30.	Hem hip patch pocket.-					
	a. Fold top of pocket as indicated by marks on pattern, turn in raw edge and stitch 1/16 to 1/8 inch from edge. Hem shall finish 1-1/8 ± 1/8 inches wide at sides and 1-3/8 ± 1/8 inches wide at center.	301	EFb-1	10-14	50-3	50-3
31.	Make hip pocket flap.-					
	a. Crease flap with raw edges turned in and stitch 1/16 to 1/8 inch from edge and continue stitching along folded edge.	301 301	SSa-1 and OSf-1	10-14 10-14	50-3 50-3	50-3 50-3
	- or -					
	b. Seam sides and mitered corners of flap, trim, turn, work out corners and stitch sides, corners and bottom, 1/16 to 1/8 inch from edge.	301 or 401 and 301 301	SSe-2(a) SSe-2(a) SSe-2(b) and OSf-1	10-14 10-14 10-14 10-14	50-3 50-3 50-3 50-3	50-3 70-2 50-3 50-3
32.	Make flap buttonhole (see 3.8).-					
	a. Make a vertical 5/8 ± 1/16 inch finished cut-length buttonhole in the center (1/4 inch off center tolerance) of the flap with the inside edge of eyelet 1/2 to 5/8 inch from bottom edge of flap. Purling shall be on the outside of flap when buttoned.	Buttonhole		44-46 per buttonhole including tack	50-3	50-3

AMXRE Form 423
10 February 1965

Downloaded from http://www.everyspec.com

NO.	MANUFACTURING OPERATIONS REQUIREMENTS TABLE II	STITCH TYPE	SEAM AND STITCHING TYPE	STITCHES PER INCH	THREAD	
					NEEDLE	BOBBIN or LOOPER
33.	Make left fly.-					
	a. Join two plies of the left fly, turn and stitch 1/16 to 1/8 inch from edge.	301 or 401 and 301	SSe-2(a) SSe-2(a) SSe-2(b)	10-14 10-14 10-14	50-3 50-3 50-3	50-3 70-2 50-3
	b. Mark and make four 5/8 ± 1/16 inch finished cut-length buttonholes, in positions indicated, and with inside edge of eyelets 1/4 to 3/8 inch from edge (see 3.8). Position top buttonhole 3 ± 1/4 inches from top of finished waistband; the lower buttonhole 2 ± 1/4 inches from bottom of fly; and the other two equally spaced between the top and lower buttonholes. Purling shall be away from wearer when worn.	Buttonhole		44-46 per buttonhole including tack	50-3	50-3
	c. Position buttonhole fly on left fly lining, and overedge back edges of three plies together.	502 or 503	SSa-1 SSa-1	8-10 8-10	50-3 50-3	50-3 50-3
34.	Make right fly.-					
	a. Superimpose lining on right fly and seam front edge. Turn and stitch 1/16 to 1/8 inch from edge. Continue stitching along folded edge to bottom end of fly lining. End of lining will be caught in inseam stitching of operation 39b.	301 or 401 and 301 301	SSe-2(a) SSe-2(a) SSe-2(b) and EFb-1	10-14 10-14 10-14 10-14	50-3 50-3 50-3 50-3	50-3 70-2 50-3 50-3
35.	Sew on hip patch pocket.-					
	a. Turn in raw edges of pocket (may be precreased), and stitch 1/16 to 1/8 inch from edge, to left back of trousers, as indicated by marks on pattern.	301	LSd-1	10-14	50-3	50-3

AMXRE Form 423
10 February 1965

Downloaded from http://www.everyspec.com

NO.	MANUFACTURING OPERATIONS REQUIREMENTS TABLE II	STITCH TYPE	SEAM AND STITCHING TYPE	STITCHES PER INCH	THREAD	
					NEEDLE	BOBBIN or LOOPER
35.	Sew on hip patch pocket.- (cont'd)					
	b. Bartack each end of pocket opening with 3/8 to 1/2 inch vertical bartacks or automatic 1/2 inch straight tacks.	Bartack or 301		28 per bartack 28 per tack	50-3 50-3	50-3 50-3
36.	Sew on pocket flap.-					
	a. Seam pocket flap to trousers, as indicated by marks on pattern. Turn down flap and raise stitch 3/16 to 1/4 inch from edge. Flap shall completely cover pocket opening.	301 or 401 and 301	LSbl-2(a) LSbl-2(a) LSbl-2(b)	10-14 10-14 10-14	50-3 50-3 50-3	50-3 70-2 50-3
37.	Sew on right and left fly.-					
	a. Sew on right fly with fly extending 1/2 ± 1/8 inch below the fly notch, turn seam to one side and raise stitch through front of fly with edge of fly lining turned in.	301 or 401 and 301	LSq-2(a) LSq-2(a) LSq-2(b)	10-14 10-14 10-14	50-3 50-3 50-3	50-3 70-2 50-3
	b. Sew on left fly, with notches matching, terminating stitching at notches.	301 or 401	SSa-1 SSa-1	10-14 10-14	50-3 50-3	50-3 70-2
	c. Make three horizontal tacks or bartacks between buttonholes through left fly, fly lining and front seam allowance. The tacks or bartacks shall measure 3/8 to 1/2 inch long. An automatic 1/2 inch straight tack may be used.	301 or Bartack or 301		10-14 28 per bartack 28 per tack	50-3 50-3 50-3	50-3 50-3 50-3

AMXRE Form 423
10 February 1965

Downloaded from http://www.everyspec.com

NO.	MANUFACTURING OPERATIONS REQUIREMENTS TABLE II	STITCH TYPE	SEAM AND STITCHING TYPE	STITCHES PER INCH	THREAD	
					NEEDLE	BOBBIN or LOOPER
37.	Sew on right and left fly.- (cont'd)					
	d. Stitch front edge of left fly, through facing only, from top down to a point 1 ± 1/4 inches above top buttonhole with the stitching superimposed on edge stitching of fly. Secure end of stitching with a 1/2 to 3/8 inch vertical tack or bartack. An automatic 1/2 inch straight tack may be used.	301 and 301 or Bartack or 301	SSa-1	10-14 10-14 28 per bartack 28 per tack	50-3 50-3 50-3 50-3	50-3 50-3 50-3 50-3
	e. Seam fly across top to front of trousers.	301	SSa-1	10-14	50-3	50-3
38.	Join crotch seam.-					
	a. Turn crotch seam of right front to outside and stitch 1/16 to 1/8 inch from edge, catching the right fly lining extension piece.	301 or 401	LScd-3(a) LScd-3(a)	10-14 10-14	50-3 50-3	50-3 70-2
	b. Turn edge of left front crotch seam to inside and stitch with two rows of stitching, catching the right front crotch seam. The two rows of stitching shall be 1/4 inch gage with the outer row of stitching 1/16 to 1/8 inch from folded edge.	401	LScd-3(b)	10-14	50-3	70-2
39.	Join inseams, outseams and seat seams.-					
	a. Join seat seams with a double-lapped, double-stitched seam.	401	LSc-2	10-14	50-3	70-2

AMXRE Form 423
10 February 1965

Downloaded from http://www.everyspec.com

NO.	MANUFACTURING OPERATIONS REQUIREMENTS TABLE II	STITCH TYPE	SEAM AND STITCHING TYPE	STITCHES PER INCH	THREAD	
					NEEDLE	BOBBIN or LOOPER
39.	Join inseams, outseams and seat seams.- (cont'd)					
	b. Join outseams with a double-lapped, double-stitched seam, with fronts over backs.	301 or 401	LSc-2 LSc-2	10-14 10-14	50-3 50-3	50-3 70-2
	c. Join inseam with a double-lapped, double-stitched seam, with fronts over the backs catching the extension of the right fly lining in the joining of the inseam at crotch. Seat seam and crotch seam shall not be staggered more than 3/4 inch (measured from center of seam to center of seam).	301 or 401	LSc-2 LSc-2	10-14 10-14	50-3 50-3	50-3 70-2
40.	Sew on waistband lining.-					
	a. Turn in raw edge at top of trousers, turn in the raw edge at the top of lining and seam to trousers 1/16 to 1/4 inch from edge.	301 or 401	SSc-1 SSc-1	10-14 10-14	50-3 50-3	50-3 70-2
	b. Turn in the raw edge at bottom of lining and stitch 1/16 to 1/8 inch from edge. Finished waistband lining shall measure 1-3/4 ± 1/4 inches wide. Both rows of stitching shall end 2-1/2 to 3 inches from opening at left front.	301 or 401	LSd-1 LSd-1	10-14 10-14	50-3 50-3	50-3 70-2
	- or -					
	c. The lining may be attached as indicated in a. and b. in one operation	301 or 401	LSk-2 LSk-2	10-14 10-14	50-3 50-3	50-3 70-2
	- or -					
	d. Seam top edge of waistband to top of trousers, turn and stitch 1/16 to 1/8 inch from edge.	301 or 401	SSe-2 SSe-2	10-14 10-14	50-3 50-3	50-3 70-2

Downloaded from http://www.everyspec.com

NO.	MANUFACTURING OPERATIONS REQUIREMENTS TABLE II	STITCH TYPE	SEAM AND STITCHING TYPE	STITCHES PER INCH	THREAD NEEDLE	THREAD BOBBIN or LOOPER
40.	Sew on waistband lining.- (cont'd)					
	- and -					
	e. Turn in the raw edge at bottom of lining and single stitch to trouser 1/16 to 1/8 inch from edge.	301 or 401	LSd-1 LSd-1	10-14 10-14	50-3 50-3	50-3 70-2
41.	Attach label.-					
	a. Position combination label on inside of trousers 1/2 to 3/4 inch to the left side (right side as worn) of the seat seam not more than 1/4 inch below the bottom waistband lining stitching and stitch on all four sides.	301	LSbj-1	10-14	50-3	50-3
	Note: Top of label may be caught in bottom waistband lining stitching in operation 40 and remaining three sides stitched.					
42.	Finish end of right fly and top of left fly.-					
	Finished appearance.- The fly shall finish smooth and flat, without bulkiness, pleats or gathers. Corners shall be forced out and outside stitching shall be uniform.					
	a. Turn in right end of waistband lining and stitch to end of right fly.	301	SSb-1	10-14	50-3	50-3
	b. Insert left end of waistband lining under left fly and seam back edge of fly from bottom notch to top of waistband trousers 1-3/4 ± 1/8 inches from opening.	301	SSbd-1	10-14	50-3	50-3

AMXRE Form 423
10 February 1965

Downloaded from http://www.everyspec.com

NO.	MANUFACTURING OPERATIONS REQUIREMENTS TABLE II	STITCH TYPE	SEAM AND STITCHING TYPE	STITCHES PER INCH	THREAD	
					NEEDLE	BOBBIN or LOOPER
42.	Finish end of right fly and top of left fly.- (cont'd)					
	c. Continue the waistband lining stitching at top to the opening at left front. Continue the bottom row of the waistband lining stitching to the back edge of the left fly.	301 301	SSe-2(b) and LSd-1	10-14 10-14	50-3 50-3	50-3 50-3
43.	Sew on waistband adjustment tabs (type I).-					
	a. Position one tab on each forepart, on waistband, as indicated by marks on pattern, with finished end toward front, and seam to waistband. (Top edge of tab shall not be more than 1/8 inch below top of trousers.) Turn tab back and raise stitch 3/16 to 1/4 inch from turned edge. Loose end shall face back of trousers.	301 or 401 and 301	LSbl-2(a) LSbl-2(a) LSbl-2(b)	10-14 10-14 10-14	50-3 50-3 50-3	50-3 70-2 50-3
44.	Sew on belt straps (type II).-					
	a. Position one belt strap on each forepart, at waistband, as indicated by marks on pattern, with finished end toward back and seam to waistband. (Top edge of strap shall not be more than 1/8 inch below top of trousers.) Turn belt back and raise stitch 3/16 to 1/4 inch from turned edge. Loose ends shall face front of trousers.	301 or 401 and 301	LSbl-2(a) LSbl-2(a) LSbl-2(b)	10-14 10-14 10-14	50-3 50-3 50-3	50-3 70-2 50-3
45.	Hem bottoms.-					
	Finished appearance.- The stitching of each leg hem shall be uniform, starting and finishing at the inseams.					

AMXRE Form 423
10 February 1965

Downloaded from http://www.everyspec.com

NO.	MANUFACTURING OPERATIONS REQUIREMENTS TABLE II	STITCH TYPE	SEAM AND STITCHING TYPE	STITCHES PER INCH	THREAD	
					NEEDLE	BOBBIN or LOOPER
45.	Hem bottoms.- (cont'd)					
	a. Turn up bottom as indicated by marks on patterns, with the raw edge turned in 1/4 inch and stitch through legs of trousers 1/16 inch from edge. Hem shall measure 1-1/4 ± 1/8 inches wide.	301	EFb-1	10-14	50-3	50-3
46.	Bartack.-					
	Finished appearance.- Bartacks shall be 3/8 to 1/2 inch, positioned as specified, to reinforce points of strain.					
	a. Bartack upper and lower edges of belt straps (type II) or adjustment tabs (type I) with vertical bartacks superimposed on raise-stitching, with bartacks ending at top and bottom edges of straps or tabs.	Bartack		28 per bartack	50-3	50-3
	b. Position one belt loop (type II) on each front 4 ± 1/4 inches from front opening and with raw ends turned under, bartack not more than 1/4 inch from edge of fold at top and bottom, with horizontal bartacks covering entire width of the loop. Distance between top and bottom bartack shall be 2 ± 1/4 inches.	Bartack		28 per bartack	50-3	50-3
	c. Bartack fly at junction of crotch seam and fly, with a diagonal bartack, in line with left fly stitching.	Bartack		28 per bartack	50-3	50-3

AMXRE Form 423
10 February 1965

Downloaded from http://www.everyspec.com

NO.	MANUFACTURING OPERATIONS REQUIREMENTS TABLE II	STITCH TYPE	SEAM AND STITCHING TYPE	STITCHES PER INCH	THREAD	
					NEEDLE	BOBBIN or LOOPER
47.	Make waistband buttonhole (see 3.8).-	Buttonhole		44-46 per buttonhole including tack	50-3	50-3
	a. Make a 5/8 ± 1/16 inch finished cut-length buttonhole in center (1/4 inch tolerance) of waistband at top of left fly with the inside edge of eyelet 1/2 ± 1/16 inch from edge of left fly.					
48.	Sew on buttons.-					
	a. Mark or gage and sew on 24-line buttons in positions indicated:	101 or		22 per button	20-4	
	Four (4) on right fly, through fly lining, to correspond with buttonholes on left fly.	301 or		14-16 per button	20-4	20-4
		Hand		8 double thread	20-4	
	One (1) on waist at top of right fly to correspond with buttonhole at top of left fly.					
	One (1) on hip pocket to correspond with buttonhole in flap.					
	On type I only					
	Three (3) on each front; one positioned to engage the buttonhole on the tab and the other two placed toward back, 2 ± 1/8 inches apart, center to center (for adjustment of waist size).					

AMXRE Form 423
10 February 1965

Downloaded from http://www.everyspec.com

NO.	MANUFACTURING OPERATIONS TABLE II REQUIREMENTS	STITCH TYPE	SEAM AND STITCHING TYPE	STITCHES PER INCH	THREAD	
					NEEDLE	BOBBIN or LOOPER
49.	Clean trousers.- a. Trim all thread ends, remove all loose threads, spots, stains and shade markings. b. Button fly (at least two bottom and waist). c. Type I trousers; button waistband adjustment tabs. d. Type II trousers; lace belt straps through belt loops.					

AMXRE Form 423
10 February 1965

Downloaded from http://www.everyspec.com

Downloaded from http://www.everyspec.com

3.10 Finished measurements.- Unless otherwise specified, jackets and trousers, type I and II, shall conform to measurements specified in table III. All measurements and tolerances are expressed in inches.

TABLE III.- Finished measurements

	Medium	Large	Tolerance +	Tolerance -
Jacket				
1/2 chest 1/	24	26	1/2	1/2
1/2 waist 2/	22	24	1/2	1/2
Collar 3/	17	18	1/2	1/2
Back length 4/	26	26-1/2	1/2	1/2
Sleeve length: 5/				
type I	5-1/2	5-3/4	1/2	1/2
type II	19	19	1/2	1/2
Trousers				
1/2 waist 6/	19	21	3/4	1/2
Inseam 7/	32	33	3/4	3/4

1/ Button jacket, lay in a flat and smooth position and measure across at base of armhole from folded edge to folded edge.

2/ Button jacket, lay in a flat and smooth position and measure through center of waistband, from folded edge to folded edge.

3/ Measure through center of collar stand, from center of button to eyelet of buttonhole.

4/ Measure from base of collar stand to bottom of waistband, at center of back.

5/ Measure from base of armhole to bottom of sleeve.

6/ Button trousers, lay in a flat and smooth position and measure through center of waistband, from folded edge to folded edge.

7/ Measure along inseam, from crotch to bottom of leg.

3.11 Workmanship.- The finished jacket and trousers shall conform to the quality of product established by this specification. The occurence of defects shall not exceed the applicable acceptable quality levels.

Downloaded from http://www.everyspec.com

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, the supplier may utilize his own facilities or any commercial laboratory acceptable to the Government. The Government reserves the right to perform any of the inspections set forth in the specification where such inspection is deemed necessary to assure supplies and services conform to prescribed requirements.

4.2 Preproduction sample inspection.- The preproduction sample, when submitted in accordance with 3.2, shall be inspected as specified in 4.3.2.1 through 4.3.2.5 for compliance with design, workmanship and dimensional requirements.

4.3 Inspection.- Inspection shall be conducted in accordance with MIL-STD-105 unless otherwise indicated herein.

4.3.1 Component and material inspection.- In accordance with 4.1 above, components and materials shall be inspected and tested in accordance with all the requirements of referenced specifications, drawings and standards unless otherwise excluded, amended, modified or qualified in the specification or applicable purchase document.

4.3.2 Examination of the end item.- The end item shall be examined for defects listed in 4.3.2.1 through 4.3.2.5. The applicable inspection levels and acceptable quality levels (AQL's) shall be as indicated in 4.3.3. The sample unit shall be one jacket, one pair of trousers or one suit, as applicable. Defects shall be classified as listed.

4.3.2.1 General defects.-

Defect	Classification Major	Minor A	Minor B
Material defects and workmanship damages			
a. Any weakening defect such as a smash, multiple float or large loose slub.	X		
b. Unsightly slub.		X	
c. Hole, cut, tear, visible mend, burn or needle chew.	X		
d. Large exposed drill hole.		X	

Downloaded from http://www.everyspec.com

Defect	Classification Major	Minor A	Minor B
Shaded parts			
a. Parts cut from ends badly shaded.		X	
Cleanness			
a. Spot or stain on outside.		X	
b. Thread ends not trimmed, or loose threads or one or more shade tickets not removed.			X
c. Shade stamp marking exposed on the outside.	X		
d. Visible basting stitches.			X
Components and assembly			
Any component part or assembly omitted (unless otherwise classified herein).	X		
Cutting			
Any component part not cut in conformance with specification requirements.	X		
Seam and stitching			
a. Accuracy of seaming:			
1. Seam twisted, puckered or pleated.	X		
2. Part of garment caught in any unrelated operation or stitching.	X		
3. Ends of seams produced with 301 stitching type, when not caught in other seams or stitching, backtacked less than 1/4 inch.			X
4. Ends of a continuous line of stitching overlapped less than 1/2 inch.			X
5. Thread breaks stitched less than 1/2 inch beyond each end of break.			X
b. Gage of stitching:			
1. Irregular, i.e., unevenly gaged or not uniform.		X	
2. Not within range of gage specified or varies more than 1/16 inch when no range is specified.			X

Downloaded from http://www.everyspec.com

Defect	Classification Major	Minor A	Minor B
Seams and stitching (cont'd)			
c. Skipped or broken stitches:			
- up to 1/4 inch, inclusive			X
- more than 1/4 inch.		X	
d. Raw edges (applicable when edges are required to be turned under and stitched):			
1. On outside seams:			
- 1/4 inch to 3/4 inch, inclusive			X
- more than 3/4 inch.		X	
2. On inside:			
- more than 1 inch.		X	
e. Run-offs:			
1. On joining seams, when resulting in an open seam, use the open seam classification.			
2. On edge or raised stitching:			
- 1/4 inch to 1/2 inch inclusive			X
- more than 1/2 inch.		X	
f. Stitch tension (except on bartacks):			
1. Loose tension resulting in a loose seam.	X		
2. Loose tension on raised or edge stitching resulting in a loosely exposed lower or top thread.		X	
3. Tight tension (stitches break when normal strain is applied to seam or stitching).	X		
g. Loose tension on one or more bartacks.			X
h. Seam and stitch type:			
1. Wrong seam or stitch type.		X	
2. Looper thread exposed on outside of garment when 401 stitch type is used.	X		

Downloaded from http://www.everyspec.com

Defect	Classification Major	Minor A	Minor B
Seams and stitching (cont'd)			
i. Stitches per inch (to be scored when condition exists on major portion of seam or stitching):			
1. Less than minimum specified by:			
- one or two stitches			X
- three or more stitches.		X	
2. More than maximum specified.	X		
Buttonholes (construction)			
a. One or more omitted or added.	X		
b. Not caught in fabric, causing stitching to pull away from fabric.	X		
c. Buttonholes not specified size.		X	
d. Wrong type or uncut buttonholes.			X
e. Ragged edges.			X
f. Gimp omitted on one or more buttonholes.			X
g. End not securely tacked.			X
h. One or more broken or more than two skipped stitches in one or more buttonholes.		X	
Buttons			
a. One or more missing, insecurely sewn, broken, or otherwise defective.		X	
b. Not specified type, size or color.			X
Bartacks or tacks			
a. Bartacks or tacks less than 3/8 inch or more than 1/2 inch long.			X
Combination label			
a. Missing, incorrect or illegible.		X	
b. Not stitched on all four sides.			X
c. Not in proper location on jacket or trousers.		X	

Downloaded from http://www.everyspec.com

4.3.2.2 Defects applicable to specific parts of jacket.-

Defect	Classification Major	Minor A	Minor B
Collar			
a. Top collar twisted.	X		
b. Top collar tight, causing edge to curl.		X	
c. When buttoned, top of collar at neck front overlapping or gapping more than 1/2 inch.		X	
d. Edge uneven.			X
e. Fullness on top collar.			X
f. Edge not forced out.			X
g. Points uneven in length by more than 1/4 inch.			X
h. Points not uniformly shaped.			X
i. Stand twisted.		X	
j. Fullness on stand, at joining seams causing puckers on collar or body neckline.			X
k. End of stand finishing more than 1/8 inch beyond front edge of jacket.		X	
l. Collar off center by more than 1/4 inch.			X
m. Inside edge of buttonhole eyelet on collar stand less than 1/2 inch or more than 3/4 inch from left end of collar stand.			X
n. Buttonhole off center (width) of collar stand by more than 1/8 inch.			X
o. Center of button on collar stand less than 7/8 inch or more than 1-1/8 inches from right end of collar stand.			X
p. Button off-center (width) of collar stand by more than 1/8 inch.			X
q. Button and buttonhole out of alignment causing twist.			X
r. Buttonhole purling facing wearer, when worn.			X
Fronts			
a. Facings tight, short or twisted, causing fullness or twist on fronts.	X		
b. Fullness or pleats on facings.		X	
c. Fronts puckered or pleated at back edge stitching of facing.		X	
d. Front edges uneven or not properly forced out.			X

Downloaded from http://www.everyspec.com

Defect	Classification Major	Minor A	Minor B
Fronts (cont'd)			
e. Fly lining not caught in back edge stitching of facing, to front.		X	
f. Lining tight, short or twisted, causing fullness or twist on fronts.	X		
g. Lining on buttonhole fly exposed beyond front edge.		X	
h. Fullness or pleats on fly lining.		X	
Front closure			
a. Fly front:			
1. Buttonholes unequally spaced by 1/4 inch or more.		X	
2. Bartack(s) or tack(s) omitted between buttonholes.			X
3. Bartack(s) or tack(s) stitched through front.		X	
4. Buttonhole purling on lining side.			X
5. Inside edge of buttonhole eyelet(s) less than 1/2 inch or more than 5/8 inch from front edge.		X	
6. Buttons and buttonholes out of alignment causing bulge or twist when buttoned.			X
7. Center of buttons less than 7/8 or more than 1-1/8 inches from edge.			X
b. Waistband:			
1. Stay piece for button omitted.	X		
2. Button stitches exposed on outside of waistband.			X
3. Inside edge of buttonhole eyelet less than 5/8 inch or more than 7/8 inch from right end of waistband.			X
4. Buttonhole off-center (width) by more than 1/4 inch.			X
5. Button and buttonhole not aligned, causing distortion when engaged.			X
6. Buttonhole purling facing wearer, when worn.			X

Downloaded from http://www.everyspec.com

Defect	Classification Major	Minor A	Minor B
Front closure (cont'd)			
7. Snap fastener not specified size, type or finish.			X
8. Snap fastener missing or defective.	X		
9. Stud or socket not securely clinched.	X		
10. Socket clinched through outside of waistband.		X	
11. Stay piece for socket omitted.		X	
12. Stud and socket not aligned, causing distortion when engaged.	X		
Equal length of buttoned fronts			
a. Left front shorter, or longer than right at bottom by:			
- more than 1/4 inch to 1/2 inch, inclusive		X	
- more than 1/2 inch.	X		
b. Bottom corner of right front exposed by more than 1/4 inch below left front.		X	
c. Fronts uneven at neck by:			
- more than 1/8 inch to 1/4 inch, inclusive			X
- more than 1/4 inch.		X	
Waistband			
a. Fullness, twist or pleats on outside of waistband.		X	
b. Outside or underside of waistband tight, causing fullness or pleats on jacket, at joining seam.		X	
c. Rounded end distorted.			X
d. Less than 2-3/4 inches or more than 3-1/8 inches wide.			X
e. Irregular in width by 1/4 inch or more.			X
f. Rounded end extended beyond front edge of jacket less than 1-3/8 inches or more than 1-5/8 inches.			X
Breast pockets			
a. Misplaced.		X	
b. Poorly shaped or set on crookedly.		X	

Downloaded from http://www.everyspec.com

Defect	Classification Major	Minor A	Minor B
Breast pockets (cont'd)			
c. Hem finishing less than 1 inch or more than 1-1/4 inches wide at sides; or less than 1-1/4 inches or more than 1-1/2 inches wide at center.			X
d. Full or tight at opening.		X	
e. Button(s) not corresponding with buttonholes in flaps.			X
f. Bartack(s) or tack(s) missing at ends of pocket opening.			X
Breast pocket flaps			
a. Out of horizontal alignment with top of pocket by 1/2 inch or more.		X	
b. Not covering pocket opening at side edges.		X	
c. Buttonhole off center of flap by 1/4 inch or more.			X
d. Inside edge of buttonhole eyelet less than 1/2 inch or more than 5/8 inch from bottom edge of flap.			X
e. Buttonhole purling on underside when buttoned.			X
Sleeves			
a. Tight, causing puckers or pleats on body parts.	X		
b. Wide, causing puckers or pleats on armhole joining seam.		X	
c. Sleeve hem less than 7/8 inch or more than 1-1/8 inches wide.			X
d. Sleeve bottoms hemmed before joining of sleeve seams.		X	
e. Hem or bottom of sleeve twisted, puckered or pleated.		X	
f. Armhole seam staggered at side seam, more than 3/8 inch (measured from center of seam to center of seam).			X
Direction of seams			
a. Sleeve finishing on top of body at armhole seams.	X		

Downloaded from http://www.everyspec.com

Defect	Classification Major	Minor A	Minor B
Direction of seams (cont'd)			
b. Undersleeve finishing on top of top sleeve at backarm seam.			X
c. Fronts lapped on backs at shoulder seams.			X
d. Backs lapped on fronts at side and underarm seams.			X
Yoke			
a. Tight across back, or twisted, causing puckers, pleats or distortion on outside of jacket.	X		
b. Ends not caught in shoulder or armhole seams.		X	
c. Hem omitted on bottom edge.		X	
d. Hem less than 1/4 inch or more than 3/8 inch wide.			X
e. Fullness or pleats on yoke.			X

4.3.2.3 Defects applicable to specific parts of trousers.-

Defect	Classification Major	Minor A	Minor B
Waistband			
a. Lining finished less than 1-1/2 or more than 2 inches wide.			X
b. Lining exposed beyond top edge by more than 1/8 inch for a distance of 1 inch or more.		X	
c. Buttonhole off-center (width) of waistband stitching by more than 1/4 inch.			X
d. Buttonhole purling facing wearer, when worn.			X
e. Inside edge of buttonhole eyelet less than 7/16 inch or more than 9/16 inch from top left front edge.			X
Hip pocket			
a. Misplaced.		X	
b. Poorly shaped or set on crookedly.		X	
c. Hem finishing less than 1 inch or more than 1-1/4 inches wide at sides; or less than 1-1/4 inch or more than 1-1/2 inches wide at center.			X
d. Full or tight at opening.		X	
e. Button not corresponding with buttonhole in flap.			X
f. Bartack(s) or tack(s) missing at end of pocket opening.			X

Downloaded from http://www.everyspec.com

Defect	Classification Major	Minor A	Minor B
Hip pocket flap			
a. Out of horizontal alignment with top of pocket by 1/2 inch or more.		X	
b. Not covering pocket opening at side edges.		X	
c. Buttonhole off-center of flap by more than 1/4 inch.			X
d. Inside edge of buttonhole eyelet less than 1/2 inch or more than 5/8 inch in from bottom edge.		X	
e. Buttonhole purling facing wearer, when worn.			X
Fly construction and closure			
a. Fly opening uneven in length when buttoned by:			
- more than 1/4 inch to 1/2 inch, inclusive		X	
- more than 1/2 inch.	X		
b. Fly or base of fly twisted, puckered or bulging.	X		
c. Right fly joining seam exposed beyond left front edge, when buttoned.		X	
d. Fullness, twist or pleat on right fly lining.		X	
e. Left fly overlapping right fly joining seam by more than 1/2 inch.		X	
f. Buttonhole fly exposed beyond left front edge.		X	
g. Inside edge of buttonhole eyelet(s) from edge of fly:			
- less than 1/4 inch		X	
- more than 3/8 inch.			X
h. Lower buttonhole placed less than 1-3/4 inches or more than 2-1/4 inches up from bottom of fly.			X
i. Top buttonhole placed less than 2-3/4 inches or more than 3-1/4 inches from top edge of waistband.			X
j. Buttonholes unequally spaced by 1/4 inch or more.			X
k. Buttonhole purling facing wearer, when worn.			X
l. Bartack(s) or tack(s) between fly buttonholes exposed through left front.		X	
m. Bartack(s) or tack(s) off-center between buttons, by more than 1/4 inch.			X

Downloaded from http://www.everyspec.com

Defect	Classification Major	Minor A	Minor B
Fly construction and closure (cont'd)			
n. Buttonholes and buttons out of alignment causing bulge when buttoned.			X
o. Bartack missing at base of fly.			X
p. Base of fly pleated in bartacking.		X	
q. Stitching along back edge of left fly irregular, or less than 1-5/8 inches or more than 1-7/8 inches from front opening.		X	
Crotch seam			
a. Crotch seam on right front not turned to outside and stitched on edge, before joining of crotch seam.			X
b. Extension piece of right fly lining not securely caught in crotch seaming.		X	
c. Crotch seam stitching extending beyond bartack at base of fly by more than 1/4 inch.		X	
d. Crotch seam staggered from seat seam by more than 3/4 inch (from center of seam to center of seam).			X
Direction of seams			
a. Back parts finishing on top of front parts at outseams or inseams.			X
Leg hem			
a. Less than 1-1/8 inches or more than 1-3/8 inches wide.			X
b. Irregular in width by 1/4 inch or more.			X
c. Twisted, puckered or pleated at hem stitching.			X
Adjustment tabs (type I)			
a. Poorly shaped or set on crookedly.		X	
b. Top of tab more than 1/8 inch below top of trousers.		X	
c. Not positioned properly, i.e., unequal distance from center front by more than 1/2 inch.		X	

Downloaded from http://www.everyspec.com

Defect	Classification Major	Minor A	Minor B
Adjustment tabs (type I) (cont'd)			
d. Not securely stitched.		X	
e. Bartack(s) at top and bottom edge of raise stitching omitted.			X
f. Bartack(s) extending beyond edge of tab at top or bottom.			X
g. Tab(s) less than 1-1/2 inches or more than 1-3/4 inches wide.			X
h. Less than 2-1/4 inches or more than 2-3/4 inches long.			X
i. Buttonhole off-center (width) of tab by more than 1/8 inch.			X
j. Inside edge of buttonhole eyelet less than 1/2 inch or more than 5/8 inch from loose end.			X
k. Purling against wearer, when worn.			X
l. First button not positioned properly, causing bulge or tightness when tab is engaged.		X	
m. Second and third buttons spaced toward back of first button less than 1-7/8 inches or more than 2-1/8 inches apart from first button and each other.			X
Belt straps (type II)			
a. Top of strap more than 1/8 inch below top of trousers.		X	
b. Not securely stitched.		X	
c. Bartack(s) at top and bottom edge of raise stitching omitted.			X
d. Bartack(s) extending beyond edge of strap at top or bottom.			X
e. Strap(s) less than 1-1/2 inches or more than 1-3/4 inches wide.			X
f. Less than 11-5/8 inches or more than 12-3/8 inches long.			X
Belt loops (type II)			
a. Distance between bartacks less than 1-3/4 inches or more than 2-1/4 inches.		X	
b. Bartack(s) not covering entire width of loops.		X	

Downloaded from http://www.everyspec.com

Defect	Classification Major	Minor A	Minor B
Belt loops (type II) (cont'd)			
c. Positioned from edge of front opening by less than 3-3/4 inches or more than 4-1/4 inches.		X	
d. Out of vertical alignment by more than 1/4 inch.		X	
e. Less than 1/4 inch or more than 5/16 inch wide.		X	

4.3.2.4 Suit (when jackets and trousers are procured as unit).-

Defect	Classification Major	Minor A	Minor B
Suit			
1. Mismatched for size.	X		
2. Mismatched for shade.			X

4.3.2.5 Size measurements.-

Jacket

1/2 chest 1/2 waist Collar Back length Sleeve length	Any measurement deviating from nominal dimension and tolerance specified in table III shall be scored as a size measurement defect.
Equal length of sleeves	Sleeves uneven in length by 1/2 inch or more shall be scored as a size measurement defect.

Trousers

1/2 waist Inseam	Any measurement deviating from nominal dimension and tolerance specified in table III shall be scored as a size measurement defect.
Equal length of legs	Legs uneven in length by 1/2 inch or more shall be scored as a size measurement defect.

Downloaded from http://www.everyspec.com

4.3.3 Acceptable quality levels and inspection levels.- The inspection levels and acceptable quality levels, expressed in defects per hundred units (DHU) shall be as follows:

	AQL's	Inspection level
For defects listed in 4.3.2.1 through 4.3.2.4 (when jacket and trousers are procured as a unit):		II
Major	4.0	
Major and Minor A (combined)	10.0	
Total (Major, Minor A and Minor B combined)	25.0	
For defects listed in 4.3.2.1 and 4.3.2.2 (jacket only):		II
Major	2.5	
Major and Minor A (combined)	8.0	
Total (Major, Minor A and Minor B combined)	15.0	
For defects listed in 4.3.2.1 and 4.3.2.3 (trousers only):		II
Major	2.5	
Major and Minor A (combined)	8.0	
Total (Major, Minor A and Minor B combined)	15.0	
For defects listed in 4.3.2.5:		S-2
One class	4.0	

4.3.4 Examination of preparation for delivery requirements.- An examination shall be made to determine compliance with the packaging, packing and marking requirements of section 5. Defects shall be scored in accordance with the list below. The sample unit shall be one shipping container fully prepared for delivery with the exception that it need not be sealed. 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 and the acceptable quality level shall be 2.5 defects per hundred units.

Downloaded from http://www.everyspec.com

Examine	Defect
Marking (exterior and interior)	Omitted, incorrect, illegible, of improper size, location, sequence or method of application.
Material	Any component missing, damaged or not as specified.
Workmanship	Inadequate application of components such as incomplete closure of container flaps, loose strapping, inadequate stapling, open and noncontinuous heat sealed seams and closure of polyethylene bag. Omission of vent hole in polyethylene bag. Bulged or distorted container.
Content	Number per container is more or less than required.

5. PREPARATION FOR DELIVERY

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

5.1.1 Level A.-

5.1.1.1 Jacket.- Each buttoned jacket shall be laid front down, the sides and sleeves folded in over the back and the bottom brought up to the shoulders to approximate dimensions of 14-1/2 by 11-1/2 inches. Each folded jacket shall then be inserted into a close-fitting polyethylene bag as hereinafter specified.

5.1.1.2 Trousers.- Each buttoned pair of trousers, with inseams meeting, shall be folded from the leg bottom up toward the waistband to a length of approximately 23-inches. The trousers shall then be folded in half the length. The waist and seat area shall be adjusted to approximately 14-1/2 inches. Each folded pair of trousers, measuring approximately 14-1/2 by 11-1/2 inches, shall then be inserted into a close-fitting polyethylene bag as hereinafter specified.

5.1.1.3 Suit.- One jacket, folded as specified in 5.1.1.1, and one pair of trousers, folded as specified in 5.1.1.2, comprising a suit of one description only, shall be inserted into a close-fitting polyethylene bag as hereinafter specified.

5.1.1.4 Polyethylene bag.- The bag shall be flat style, made of clear polyethylene film of 0.00125-inch thickness (± 20 percent tolerance). The

Downloaded from http://www.everyspec.com

bag shall be formed with heat sealed seams that are straight, continuous and parallel to each other and the formed edges of the bag. The final closure of the bag shall be heat sealed with the heat seal made as close as possible to the open end. A 1/4-inch diameter hole shall be made at one corner of the polyethylene bag to allow excess air to escape. Alternatively, the final closure of the polyethylene bag may be accomplished by means of a tuck or reverse flap.

5.1.2 Level C.- Jackets (only), trousers (only), and suits (complete) shall be packaged to afford adequate protection against physical damage during shipment from the supply source to the first receiving activity. The supplier may use his standard practice when it meets this requirement.

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

5.2.1 Level A.- Jackets (only), trousers (only), and suits (complete), packaged as specified in 5.1, shall be packed in the quantity and arrangement specified in table IV within a fiberboard shipping container assembled, closed and reinforced conforming to grade V3s, size 3A of MIL-B-17757. The fiberboard used in fabricating the container liner shall be grade V3c. Toward the end of the contract or when there are less than the required amount of the same size per container, mixed sizes of one description only may be packed within the same container.

5.2.2 Level B.- Jackets (only), trousers (only), and suits (complete), packaged as specified in 5.1 shall be packed in the quantity and arrangement specified in table IV within a fiberboard shipping container assembled and closed conforming to class domestic, size 3A of MIL-B-17757. The fiberboard used in fabricating the container shall be grade 275. Toward the end of the contract or when there are less than the required amount of the same size per container, mixed sizes of one description only may be packed within the same container.

5.2.2.1 When specified, shipping containers shall be fabricated from grade V3c or V3s fiberboard (see 6.2).

Downloaded from http://www.everyspec.com

TABLE IV. - Packing quantity and arrangement of type I and II level A packages of jackets (only), trousers (only), and suits (complete) within a shipping container

Item	Quantity per container (each)	Arrangement within a container (Level A packages packed flat)		
		Length	Width	Depth
Type I				
Jackets (only)	50	2	1	25
Trousers (only)	25	2	1	12*
Suits (complete)	25	2	1	12*
Type II				
Jackets (only)	25	2	1	12*
Trousers (only)	30	2	1	15
Suits (complete)	15	2	1	7*

* Odd package placed on top in center of container.

5.2.3 Level C.- Jackets (only), trousers (only), and suits (complete) packaged as specified in 5.1, shall be packed in a manner to insure carrier acceptance and safe delivery to destination at the lowest transportation rate for such supplies. Containers shall be in accordance with rules or regulations of carriers applicable to the mode of transportation.

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.

5.3.1 Polyethylene bagged packages.- Polyethylene bagged packages shall have the required information legibly printed or stamped in black directly on the bag across the center face or on a white paper label inserted within the bag so as to permit ready identification. The bag or label shall indicate the following information:

STOCK NUMBER
NOMENCLATURE
QUANTITY

5.3.2 Labels, mixed sizes.- Each shipping container packed with mixed sizes of one description only, shall have securely attached to the end and side, directly under the printing or stencilling, a white paper label 5-by-4-inches with the words "MIXED SIZES" plainly stamped or printed thereon and under these words shall be legibly stamped or printed the correct quantity and sizes contained therein.

Downloaded from http://www.everyspec.com

6. NOTES

6.1 Intended use.- The jackets and trousers, convalescent, type I or type II, are intended for wear by male ambulatory patients in hospitals of the Department of Defense.

6.2 Ordering data.- Procurement documents should specify the following:

(a) Title, number and date of this specification.
(b) Types and sizes required (see 1.2).
(c) If preproduction sample is required (see 3.2).
(d) Selection of applicable levels of packaging and packing (see 5.1 and 5.2).
(e) When V-board containers are required for level B shipment (see 5.2.2.1).

6.3 Samples.- For access to guide and standard sample, address the procuring office issuing the invitation for bid.

6.4 Asterisks are not used in this revision to identify changes with respect to the previous issue, due to the extensiveness of the changes.

Custodians:

Army - GL
Navy - MS
Air Force - 03

Preparing activity:

Army - GL

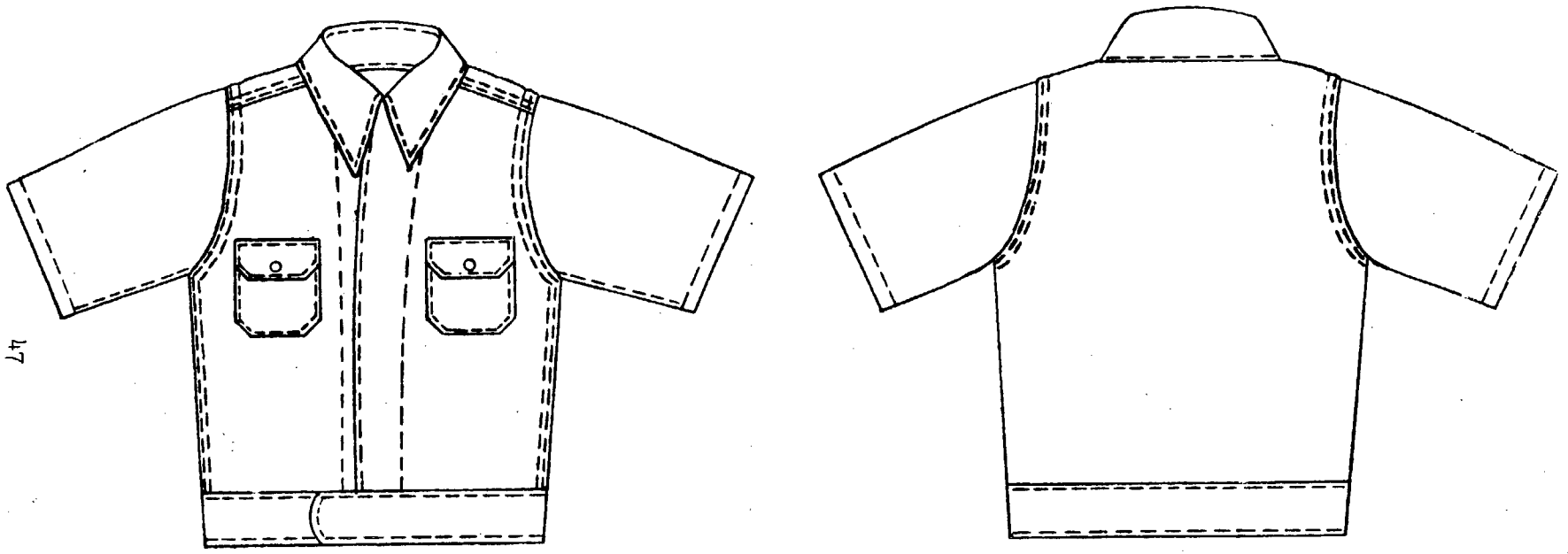
Project No. 6532-1010

Review activities:

Army - MD
Navy - MS
Air Force - 03
Defense Supply Agency - DM

Review information is current as of the date of this document. For future coordination of changes to this document, draft circulation should be based on the information in the current Federal Supply Classification Listing of DOD Documents.

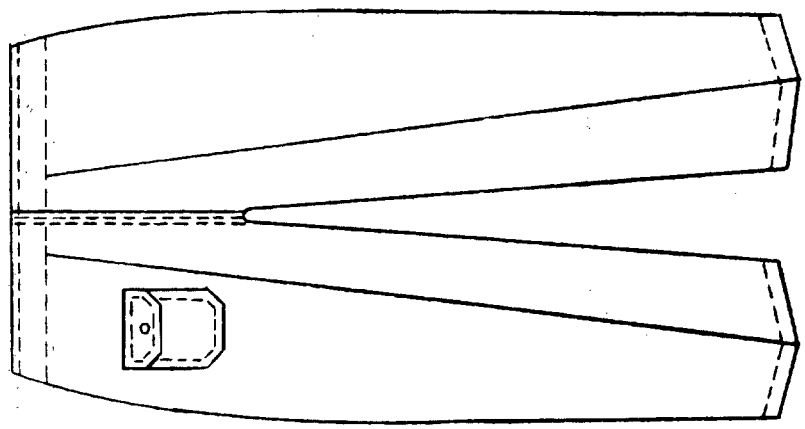
Downloaded from http://www.everyspec.com



FRONT BACK

FIG 1 JACKET, SUIT, CONVALESCENT, SUMMER (TYPE I)

Downloaded from http://www.everyspec.com



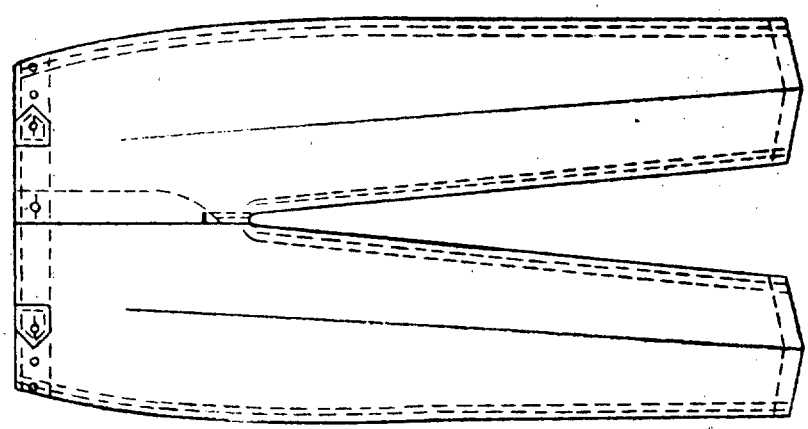


FIG 2 – TROUSERS, SUIT, CONVALESCENT, SUMMER (TYPE I)

Downloaded from http://www.everyspec.com

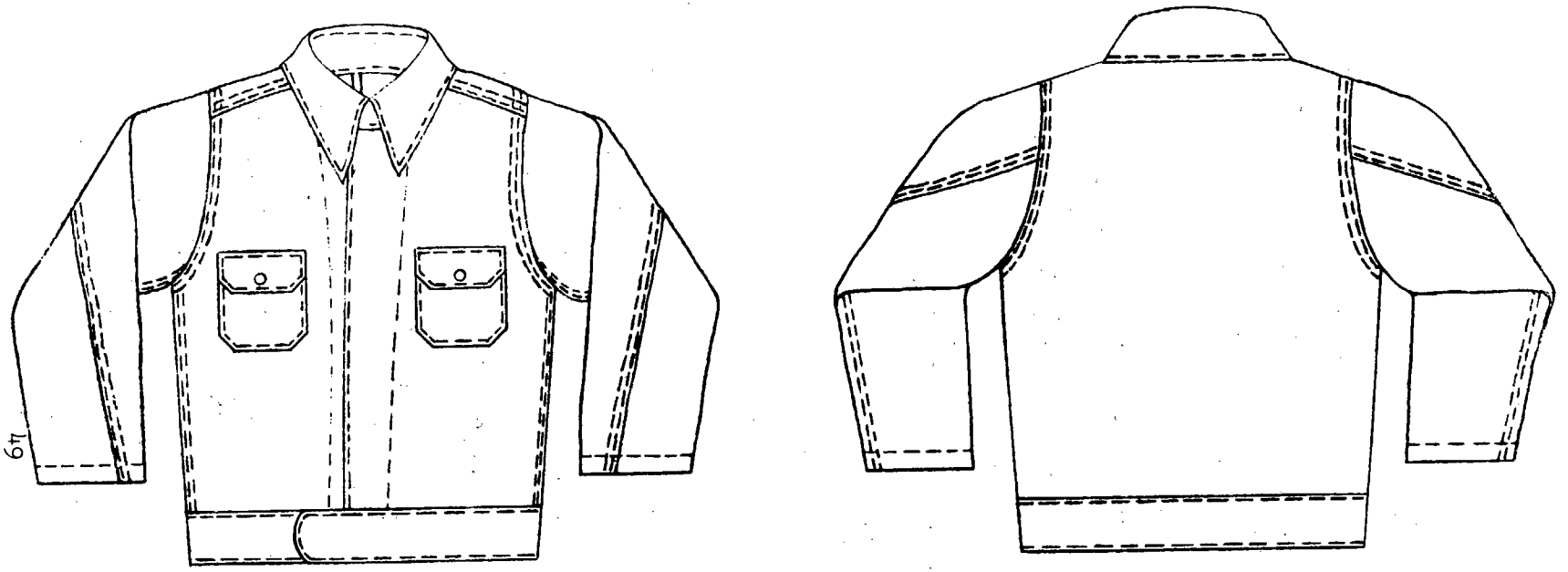
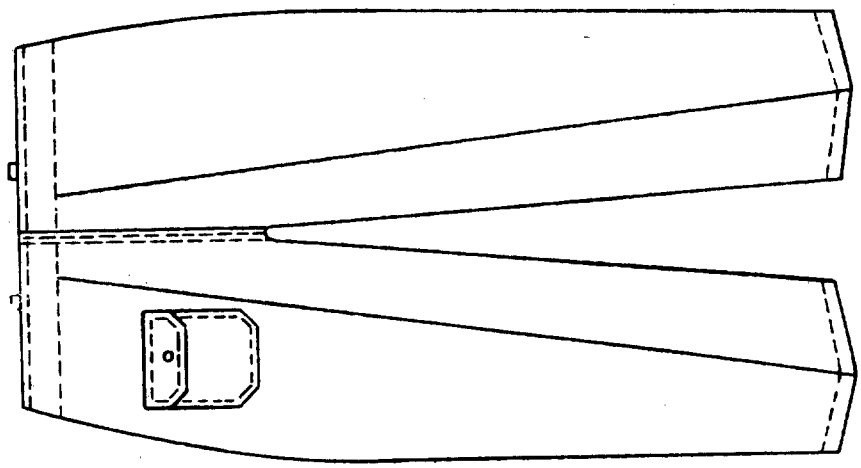
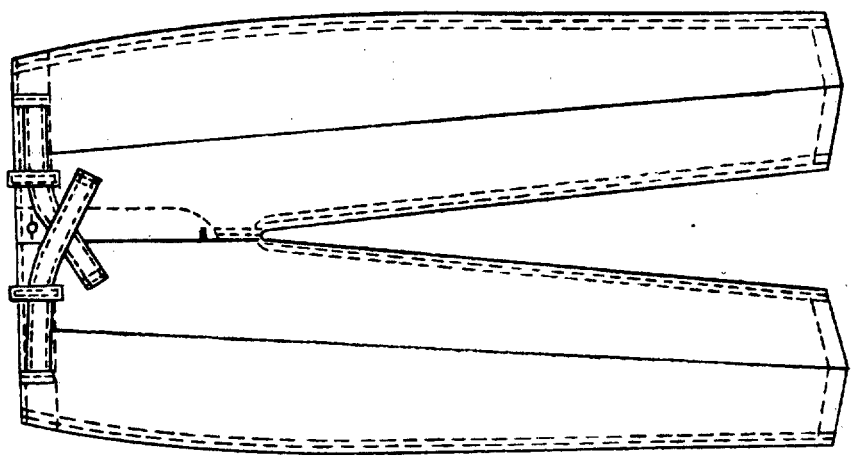


FIG 3 JACKET, SUIT, CONVALESCENT, WINTER (TYPE II)

Downloaded from http://www.everyspec.com



BACK



FRONT

FIG. 4 - TROUSERS, SUIT, CONVALESCENT, WINTER (TYPE II)

☆ U. S. GOVERNMENT PRINTING OFFICE—1967: 253-228X1428

Downloaded from http://www.everyspec.com

STANDARDIZATION DOCUMENT IMPROVEMENT PROPOSAL

(See Instructions – Reverse Side)

1. DOCUMENT NUMBER
MIL-S-2021 E Rtc-1

2. DOCUMENT TITLE

3a. NAME OF SUBMITTING ORGANIZATION

b. ADDRESS *(Street, City, State, ZIP Code)*

4. TYPE OF ORGANIZATION *(Mark one)*

- ☐ VENDOR
- ☐ USER
- ☐ MANUFACTURER
- ☐ OTHER *(Specify)*:

5. PROBLEM AREAS

a. Paragraph Number and Wording:

b. Recommended Wording:

c. Reason/Rationale for Recommendation:

6. REMARKS

7a. NAME OF SUBMITTER *(Last, First, MI)* – Optional

b. WORK TELEPHONE NUMBER *(Include Area Code)* – Optional

c. MAILING ADDRESS *(Street, City, State, ZIP Code)* – Optional

8. DATE OF SUBMISSION *(YYMMDD)*

DD FORM 1426, 82 MAR

PREVIOUS EDITION IS OBSOLETE.