

MODEL QUESTION PAPER WITH ANSWER KEY

MID TERM I

1. Explain different classes of seams with neat diagram and their applications.

Seam Classes

- Class 1 – Superimposed seam.
- Class 2 – Lapped seam.
- Class 3 – Bound seams.
- Class 4 – Flat seams.
- Class 5 – Decorative/Ornamental stitching.
- Class 6 – Edge finishing/neatening.
- Class 7 – Attaching of separate items.
- Class 8 – Single ply construction.

Class 1 – Superimposed seam(s)

These generally start with two or more pieces of material superimposed over each other and joined near an edge, with one or more rows of stitches. There are various types of seams within this class.

Stitches Used A superimposed seam can be sewn with Stitch Types 301 or 401 to create a simple seam. The same seam type can also be sewn with Stitch class 500 (Over edge stitch) or Combination stitches (e.g., Stitch class 516)

Application

used to create neat load bearing seams for lingerie, shirts, etc.

Class 2 – Lapped seam(s)

In this class of seam, two or more piles of material are lapped (i.e., with edges overlaid, plain or folded) and joined with one or more rows of stitches.

One of the most popular of this class is the Lap felled type, involving only one stitching operation – a strong seam with fabric edges commonly used to protect jeans or similar garments from fraying. The superficially similar French seam type involves two stitching operations with an intervening folding operation – a flat, folded seam with only one row of stitching visible on the top surface.

This seam class consists of a minimum of two components and can have different varieties consisting of a number of rows of stitching.

Stitches Used

The lap felled seam is generally sewn with a 401 chainstitch.

Application

The looped seam is the most commonly used seam. It is used in jeans manufacture because of

its strong construction. The French seam is commonly used for rain wear, and edge stitching front facings on jackets and dresses.

Class 3 – Bound seam(s)

These are formed by folding a binding strip over the edge of the piles of material and joining both edges of the binding to the material with one or more rows of stitching. This produces a neat edge on a seam exposed to view or to wear. There are a variety of bound seams.

Stitches Used

401 chainstitch or 301 lockstitch

Application

Necklines of t-shirts

Class 4 – Flat seam(s)

In these seams (sometimes called Butt seams), two fabric edges, flat or folded, are brought together and over sewn with stitches.

The purpose of these seams is to produce a joint where no extra thickness of fabric can be tolerated at the seam, as in underwear or foundation garments. The looper thread(s) must be soft, yet strong and the cover thread may be decorative as well as strong. This seam is referred to as a flat seam because the edges do not overlap one another, they will be butted together.

Stitches Used

Zigzag lock stitch, chain stitch or covering stitch (class 600).

Application

This type of seam will consist of two components and can be seen on very fine knitted garments where seams are required to be free from bulk.

Class 5 – Decorative/Ornamental stitching

The ornamental stitch is a series of stitches along a straight or curved line or following an ornamental design, on a single ply of material. More complex types include various forms of piping, producing a raised line along the fabric surface.

Application

The stitching results in decorative surface effects on the fabric e.g., pin tucks, application of braids, etc. This seam type consists of a minimum of one component.

Class 6 – Edge finishing/neatening

Edge finishing stitch is where the edge of a single ply of material is folded or covered with a stitch. The simplest of these operations is Serging, Type 6.01.01, in which a cut edge of a single ply is reinforced by over edge stitching to neat and prevent fraying. The seam class must include seams whereby the edges are neatened by means of stitches and can be used in cases where the raw edge requires finishing. There is only ever one component to this type of seam. This includes other popular methods of producing a neat edge like hemming and blind stitch hemming.

Application

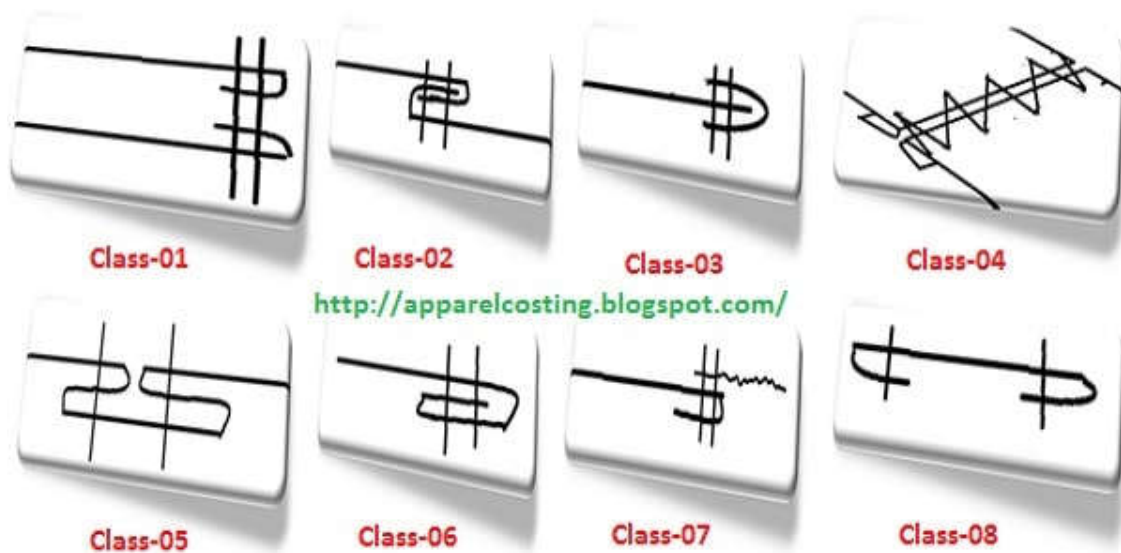
Serging trouser panels, flys, facings, etc.

Class 7 – Attaching of separate items

This seam class involves seams that require the addition of another component onto the edge of a piece of fabric e.g., elastic braid onto the edge of ladies briefs. This type of seam requires two components.

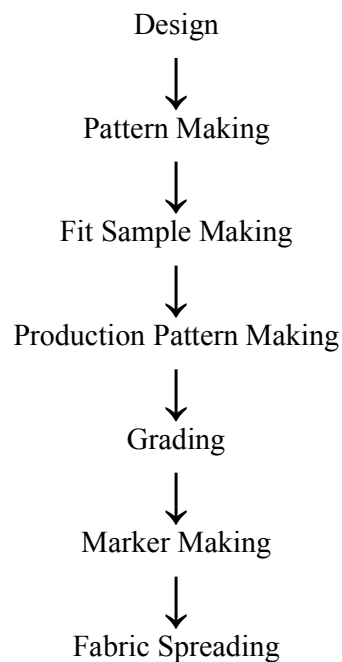
Class 8 – Single ply construction

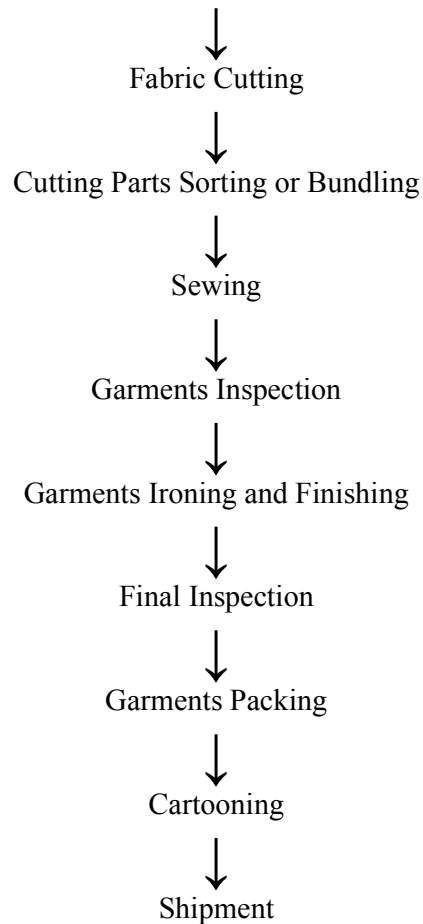
This seam class consists of one piece of fabric that is turned in on both edges. It is most commonly seen in belt loops or berts for which a folder can be attached to the machine. This type of seam requires only one component.



2. Draw the flow chart of garment manufacturing process and discuss in brief.

A basic garment manufacturing flow chart is presented in the below:





Design:

Design is provided by the buyer. After placing an order buyer send the technical sheet and art-work of an order to the merchandiser. This process is done by both manually or by using computer.

2. Pattern Making:

By following technical sheet and art-work, pattern of each garment style should be made. It's done by both manually and by using computerized method.

3. Fit Sample Making:

The main target of making a fit sample is to follow the details instruction about that garments style. After making it's sent to the buyer to rectify. It's done by manually.

4. Production Pattern Making:

For bulk production, allowance added here with net dimension. Production Pattern Making is done by both manually and by using computer.

. Grading:

During an order confirmation, the buyer suggests about the size ratio of that order. So that order should be graded according to the buyer's instruction. Grading is done by manually or by using computer.

Marker Making:

Marker is a very thin paper which contains all the parts of a particular garment. To make the cutting process easy, it's must be needed. Marker making process can be done by both manually and by using computer.

Fabric Spreading:

To cut the fabric properly fabric is spread in lay form. Fabric Spreading is done by manually or by using computerized method.

Fabric Cutting:

Fabrics have to cut here according to marker of garments. Fabric Cutting process is done by using manual method or computerized method.

Cutting Parts Sorting or Bundling:

Here, cutting parts have to sort out or make bundling to send these easily into the next process. This process is done by manually.

Sewing:

All the parts of a garment are joined here to make a complete garment. Sewing process is done by manually.

Garments Inspection:

After completing sewing, inspection should be done here to make fault free garments. Garments Inspection is done by using manual method.

Garments Ironing and Finishing:

Here garments are treated by steam; also required finishing should be completed here. This process is done by using manual method.

Final Inspection:

Finally the complete garments are inspected here according to the buyer's specification. Final Inspection is done by manual method.

Garments Packing:

Complete garments are packed here by using buyers instructed poly bag. Garments packing are done by using manual method.

Cartooning:

To minimize the damages of garments, all the garments have to cartooned by maintaining buyers instruction. This process is done by manually.

Shipment:

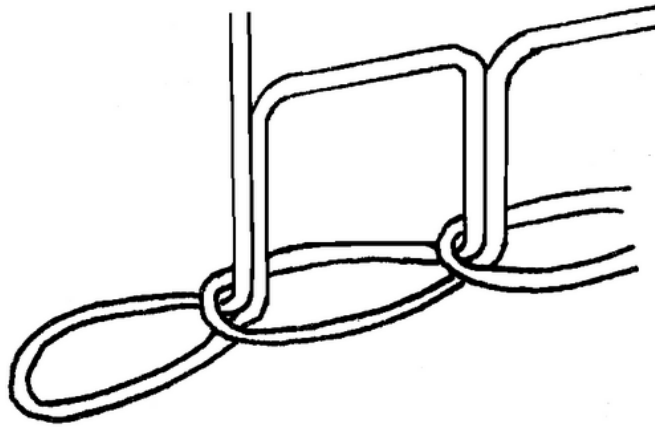
After completing all the required processes it's finally send to the buyer

MID TERM II

1. Classify different types of stitches with their diagrams.

Stitch class – 100 (Single thread chain stitch):

Stitches under this class are produced with single thread by intra-looping technique. All the stitches under this class are unsecured and used for temporary purposes. Starting and finishing end of the stitch under this class needs bar taking or back stitching to secure the stitches. Most common uses in blind stitching, hemming, button attaching, button holing, gathering, temporary positioning of garment components, etc. purposes.



Stitch type- 101

Stitch class – 200 (Hand stitch):

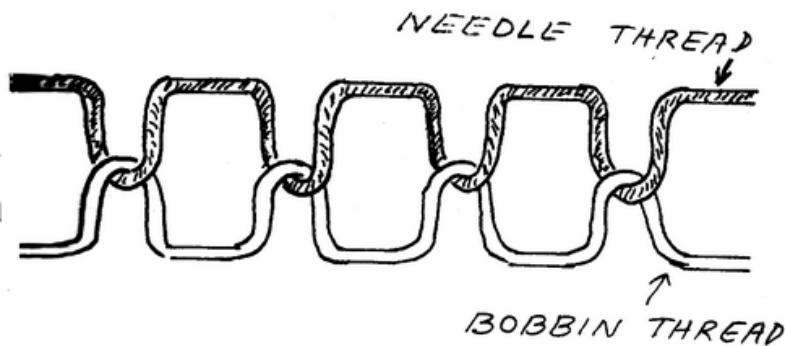
Stitches under this class are also produced with single thread but by the use of special type of sewing machine. Stitch class – 200 can not be produced for longer length sewing. This class of stitches is used very rarely in the Ready Made Garments (RMG) sector as because they are very expensive to produce. They are used mainly for coat manufacturing. Stitch type – 209 is shown in diagram which is used in the label area.



Stitch type- 209

Stitch class – 300 (Lock stitch):

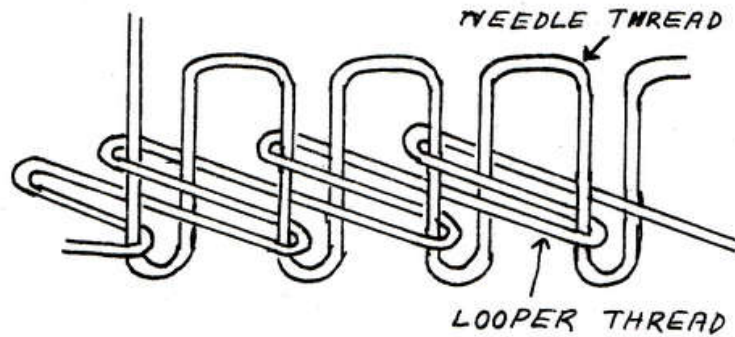
Stitches under this class are produced by interlacing technique with two threads. The upper thread is called needle thread and the lower one is called bobbin thread. Stitch type – 301 is shown in diagram which is extensively used in domestic sewing machine, tailoring sewing machine, RMG sector sewing machine, for general sewing for attaching pocket, collar, cuff, etc components. Stitches under this class are naturally secured and shows good frictional resistance property. Its extensibility is about 30%, hence used extensively in Ready Made Woven Garments products.



Stitch type- 301

Stitch class – 400 (Multi thread chain stitch):

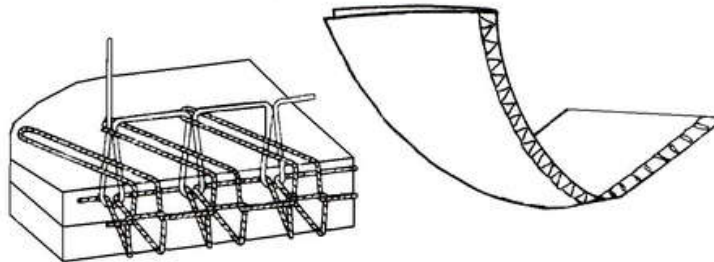
Stitch class – 400 is produced by interlacing and interloping technique. The upper thread is called the needle thread and the lower one is called looper thread. Stitch class – 400 is stronger than stitch class – 300, hence used for joining heavy fabrics, side seam of trouser, etc purposes.



Stitch type- 401

Stitch class – 500 (Over edge stitch):

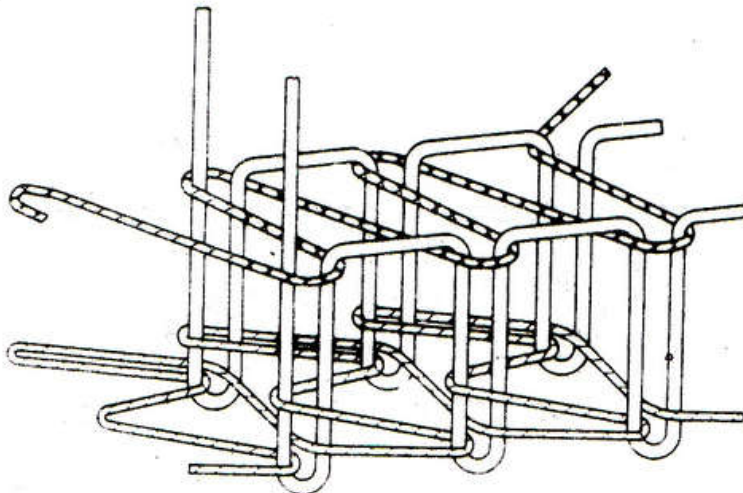
Stitches under this class are produced with one or a group of more threads (one needle thread and two or more looper thread) and at least threads of one group round the edge of the fabric stop fraying i.e. threads from the edge of the fabric can not come out. The knife of the machine cuts the edge first producing a clear edge for seaming. Stitch under this class is sometimes called over locking, but actually it is over edge stitch. Sometimes it is used for decorative purpose. Extensibility is quite well (may be 300%) and the width of the stitch is about 3 to 5 mm. Stitch class – 504 is shown in the figure below:



Stitch type- 504

Stitch class – 600 (Covering chain stitch):

Stitches under this class are formed with at least three groups of threads and threads of two groups are seen in both side of the fabric. Threads of first group are called needle thread and threads of second group are called top cover threads and threads of third group are called bottom cover thread. This type of stitch is so complex and sometimes usage of 9 threads can be seen. This type of stitch is used for sewing underwear, for attaching lace, braid, elastic, etc. It is also used for making cover stitch, decorative stitch and top stitching. Stitch class – 602 and 606 are shown in figure below:
































Stitch type- 602 & 606

2. Write a note on care labelling of garments.

The care symbols provide information on the maximum permitted type of treatment
 The care symbols must always be used in full and in the prescribed sequence
 The care labelling must be clear, readily understandable, easy to use and not dependent on any particular language
 The care symbols must not leave room for possible misinterpretation by the consumer
 Uniform positioning of labels and harmonised use of the care symbols
 The uniform care labelling system using symbols must take account of consumer habits without using complex technical data
 The appliances used for textile care purposes must ensure the best possible implementation of the recommended care treatment
 Adaptations which are necessary to keep up with ongoing technical and economic developments must as far as possible be made without the use of new symbols and additions in the framework of the existing system



 Washing	 Do not wash	<p>Machine wash cycles</p>  Normal  Permanent press  Delicate / gentle  Hand wash
 Bleaching	 Bleaching	 Any bleach when needed  Only non-chlorine bleach when needed
 Drying	 Do not tumble dry  Do not dry (used with do not wash)	<p>Tumble dry cycles</p>  Normal  Permanent press  Delicate / gentle  Line dry / hang to dry  Dry flat
 Ironing	 Do not iron	<p>Iron-dry or steam</p>  <small>Maximum temperature</small> 200°C (390°F) High  150°C (300°F) Medium  110°C (230°F) Low  No steam (added to iron)
 Dry-clean	 Do not dry-clean	<p>Dry-clean - normal cycle</p>  Any solvent  Any solvent except trichloroethylene  Petroleum solvent only
