**Subject Code:16SCCAF2**

**DEPARTMENT OF APPAREL AND FASHION TECHNOLOGY**

**BASICS OF SEWING**

**Unit I**

**Sewing Equipment and Body measurements**

**Sewing machine-** Sewing machine is used to stitch fabric and other material together

**Parts of sewing machine-**

* **spool pin-** The main function of spool pin is to hold spool of thread.
* **Bobbin binder Spindle-** During winding, bobbin in placed here.
* **Feed dog-** During swing, feed dog pulls the fabric in forward.
* **Thread take-up lever-** Thread take-up lever moves up and down with the needle.
* **Needle clamp-** Holds the needle in its actual place.
* **Balance wheel-** The round wheel located at the upper right of the sewing machine.
* **Needle-** It is specialized needle for use in sewing machine. Clamped by the sewing machines needle holder.
* **Pressure Foot-** Pressure foot holds the fabric in its definite place.
* **Treadle-** Which is operated to produce reciprocating or rotary motion in a machine such as a weaving loom or grinder.
* **Drive wheel-** The big wheel below the machine that is connected to the treadle.
* **Stitch regulator-** Regulators the length of the stitches.
* **Belt-** Connects the balance wheel and the drive wheel.

**Care and maintenance**

* Oiling keep the parts working smoothly, only a drop of oil once a week.
* Wipe a dust from the exposed parts
* With soft cloth, clean the machine parts
* Scarp material to remove excess oil
* Do not use detergents for cleaning
* Using the lint brush clean feed dog and shuttle

**Tools for measuring**

* There are many tools to using measuring.
* E.g- Tape, Sewing gauge, Seam Gauge, Transparent ruler, Hem Gauge, Yard Stick

**Tools for marking**

* Mark the importance point marking a garment, Tracing wheel, tailor chalk

**Tools for cutting**

* Embroidery Scissors, Trimming Scissors, Pinking Shears, Seam Ripper

**Selection of thread and needle**

* Heavier fabric require thicker needle, fine fabric require fine needle
* The sewing thread are available in various size

**Body Measurement**

* It is very important in drafting of pattern
* It helps to produce a garment to fitted to the body
* It helps in reducing fabric or paper waste
* It prevents waste of time and energy,
* Would have been used in pattern alteration or adjusting garments

**Eight Head Theory**

* The normal body structure is considered 5’4” height.
* The body divided into 8 parts, each parts 8” length
* The observation of body structure becomes easy
* Work shall be easily and speedily executed

**Unit II**

**Seams, Plackets, Fullness and Sleeves**

**Seams**

* One or two layers of fabrics are joined
* Seam is used as functional purpose, E.g Strength, Security, Attaching, Joining
* Sometimes used as decorative purpose
* No missed or uneven stitches
* No damage to the material being sewn
* Comfortable while garment is in use

 **Types of seams**

 1. **Superimposed Seam**

* Mostly used seam for joining fabrics
* It have 50 variations
* Seam can be sewn a variety of m/c. e.g. Lock stitch, overlock
* Mostly used in inside seam like as shirts, pants, children wear

**2. Lapped Seam**

* Two or more pieces of fabric over lapping each other
* Two sewn ends of the fabric are in opposite direction.
* Mostly two needle chain stitch m/c is used
* This seam used in sewing jeans pants, lunges etc

**3.Bound seam**

* The bound seam is to finish an edge of garment
* The binder fabric may be different color
* There are 18 variations of bound seam. E.g Underwears, pants, sleeping suits, neckline of t-shirt

**4. Flat Seam**

* Two pieces of fabric meet precisely at their edges
* Seam thickness is comparatively less.
* Zigzag stitch may be used
* This seam is widely used in undergarments & in knitted items.

**Plackets**

* A placket is finished opening in front of blouse, polo, shirt
* Fasteners like zippers, buttons, buttonholes, hooks are used in the plackets closed
* It is very easily accessible and conveniently operated

**Bound plackets**

* These packets can be made on a seam or a slash
* It is usually used in children’s garment
* This placket are not suitable for bulky fabrics or curved seams

**Bound or faced**

* Usually seen in the back seat of the dresses and left seam of skirt and petticoats

**Zipper placket**

* Zipper placket usually comes in different sizes and is normally
* It makes it easier to wear the garment
* Appearance wise too zippers give a style to the garment

**Shirt plackets**

* Centre front of the men’s dresses shirt
* There are the many types of shirt plackets- placket front, French front, fly front

**Fullness**

**Darts**

* It is used to shape fabric to fit the body
* They provide fullness to body curved
* Sometime darts are used in decorative purpose
* It is important to the fitting, marking, stitching and pressing darts.

**Tucks**

* A tuck is a stitched fold of garment
* Tucks are primarily used for decoration
* However, released tucks may be used for shaping fabric to the body

**Types of tucks**

**1. Pin tuck**- The small ones (right on the fold of the fabrics)

**2. Spaced tucks**- Have spaces between the stitching

**3. Shell tucks**- Stitches by hand or using the sewing machine to blind stitch creating even design

**4.Corded tucks**- cords are placed in wrong side and tucks are produced

**Pleats**

* Also used to control fullness in a garment design
* They may be pressed or unpressed, soft or crisp
* Selecting fabric for a pleated design, be sure it has good drape and is resilient

**Types of pleats**

**1.Knife pleat-** are flat and are turned to one side, usually right to left on the outside of garment. They are used in kilts, skirts, and on shoulders of bodices.

**2. Box-** are two straight pleats with folds turned away from each other. Use in skirts, dresses, shirts and jackets

**3. Inverted-** are two straight pleats with folds turned towards each other. They meet in the centre and are used primarily in skirts

**Gathers**

* Are visible fullness that is a part of the garment design
* They may be functional or decorative
* It is used in sleeve caps, sleeve cuffs, waistline, yokes, and ruffles
* There are three types- gathers by hand, machine and gathering by using elastic

**Frills & Ruffles**

* A ruffle is a strip of fabric cut or handled in such a ways as to produce fullness.
* These are used for decoration to a garment
* Also used in hems of skirts and dresses to add length

**Sleeve**

* The part of an items of clothing that covers the arm
* Sleeve is one of the characteristics of fashion in dress, varying in every country and period

**Bell**

* **A** long sleeve fitted from the shoulder to the elbow part and quietly flared from elbow on ward

**Raglan**

* A sleeve in which the seam extends from the neck to the underarm

**Kimono**

* shoulder of garment extended over upper arm

**Bishop**full sleeve set into normal armhole and gathered into band at wrist

**Leg-o-mutton-** sleeve with full top gathered or pleated into armhole and tapered to wrist where it looks like a regular sleeve

**Puff-** short sleeve gathered, either at the armhole or at the cuff bend or both

**Unit III**

**Neck finishes and yokes**

**Neck finishes:**

* It increases the durability of the garment
* Necklines are finished by three ways namely facing, binding and collar

**Bias:**

* True bias is a diagonal line at 45\* to the lengthwise or crosswise grain
* It has the maximum elasticity

**Joining bias:**

* Place the bias stripes with their right sides facing each other
* The edges of the cut ends should coincide
* Stitch a 0.5 cm seam joining the points where the sides of the two stripes intersect.
* Press the seam open and trim the seam projection



**Uses:**

* It can be applied as facings and bindings.
* Also used for finishing curved edges such as neckline, sleeveless, armholes and scallops.

**Bias facing:**

* Facing are used to provide a neat finish to the raw edges in a garment
* Facing may appear on the right side of the garment



**Bias binding:**

* It is used to finish and strengthen raw edges
* Add decorative trim to a garment
* It shows both on the right and wrong side of the garment



**Collars:**

* Collar is the part of a dress that closes around your neck securely
* It can be attached to a shirt, coat, blouse, etc.

**Parts of collar:**



**Factors to be considered in designing collar:**

* It should be suitable to the garment
* The fabric should be same as the fabric used in the garment

**Classification of collar:**

* Flat
* Standing
* rolled

**Drafting peter pan:**







**Yokes:**

* yoke is a fashioned pattern piece used in garments
* usually fitting around the neck and shoulders or around the hips to provide support for looser parts of the garment

**Selection of yoke design:**

* Design of the fabric
* Design of the garment
* Purpose and use of the garment
* Sex and age of the wearer
* Figure and personality of the wearer

**Creating variety in yoke:**

* Variety in shape and size
* Variety in material and grain
* Designing seam line of yoke
* Decoration within the yoke
* Introducing the yoke at different positions
* Designing yokes which release fullness in various forms

**Yoke without fullness:**



**Yoke with fullness:**



**Attachment of yokes:**



**Unit-IV**

**Pockets**

 A pocket is a bag or envelope which an opening or slot with a closed end that is usually sewn in or over the garment.

**Classification:**

* Applied pockets
* In-seam pockets
* Set-in pockets – welt, flap and bound or corded pocket

**Selection of pocket:**

* Pocket design should blend with the fabric design, garment design and its components like collar, sleeve, cuff etc.

**Patch:**

* It can be lined or unlined and can be made in any shape desired.
* It can be cut in the desired shape and fastened to the outside of the garment.
* It has three layers. First layer is pocket itself, a middle with garment lining and the third layer is a lining matching with garment lining.



**Bound:**

* Hidden or secretive pockets
* The edges of the slash have narrow stitched folds or welts along the seams
* Difficult to distinguish from the garment



**Unit V**

**Trimmings & Decoration**

These are classified based on the raw materials used and the type of work done

**Fabric decoration**

* Ruffles and frills
* Ric Rac
* Patch work
* Applique
* Belts
* Bows
* Smocking
* Laces
* Scallops

**Applied trimming**

* Felting
* Satin ribbon work
* Ari & Zardosi

**Decorative trimmings**

* Sequins
* Mirrors
* Stickers

**Decorative fastness**

* Bias bindings
* Fabric looks
* Decorative buttons
* Macramé