

Government of Pakistan

National Vocational and Technical Training Commission

Prime Minister's Hunarmand Pakistan Program

"Skills for All"



Course Contents / Lesson Plan

Course Title: Textile Designing with CAD CAM

Duration: 3 Months

Course Title	Textile Designing with CAD CAM
<p>Objective of Course</p>	<p>Employable skills and hands on practice for Textile Design withCAD/CAM</p> <p>The aim for the team of staff responsible for delivery of the advanced Textile Design and CAD/CAM curriculum is to provide knowledge and develop skills related to the Textile Design and CAD/CAM as per industrial requirements with job oriented approach. The course willallow participants to gain a comprehensive understanding of all the aspects. It will also develop the participant’s ability to act in a professional and responsible manner.</p> <p>Teaching staff will provide the technical knowledge and abilities required to solve tasks and problems that are goal-oriented. They will use participant-centered, practically oriented methods. They will also develop a program of practical assessment that reflects the learning outcomes stated in the curriculum. Trainees of the Textile Design and CAD/CAM curriculum will also develop their willingness and ability as individuals to clarify issues, as well as think through and assess development opportunities.</p> <p>Teaching staff will also support trainees in developing characteristics such as self-reliance, reliability, responsibility, a sense of duty and a willingness and ability to criticize and accept criticism well and to adapt their future behavior accordingly.</p> <p>Teaching staff also use the Textile Design and CAD/CAM curriculum to address the development of professional competence. Trainees willacquire the ability to work in a professional environment.</p> <p>By the end of this course, the trainees should gain the following competencies:</p> <ul style="list-style-type: none"> • Professionalism and Field Job Orientation • Occupational health and safety (OHS) precaution • Print Design Development • Repeats and Pattern Grids • Understanding of software • Color Theory • Develop Basic Blocks • Surface Embellishments and ornamentation • Knowledge of Basic Computer Operations and Manage Systemfor CAD/CAM • Digitization of Basic Blocks • Grading of Basic Blocks <p style="text-align: center;">Problem solving skills</p>
	<p>(i) Motivational Lectures</p> <p>The proposed methodology for the training under reference employs motivation as a tool. Hence besides the purely technical content, a trainer is required to include elements of motivation in his/her lecture. To inspire the trainees to utilize the training opportunity to the full and strive towards professional excellence.</p>

Motivational lectures may also include general topics such as the importance of moral values and civic role & responsibilities as a Pakistani. A motivational lecture should be delivered with enough zeal to produce a deep impact on the trainees. It may comprise of the following:

- ❑ Clear Purpose to convey message to trainees effectively.
- ❑ Personal Story to quote as an example to follow.
- ❑ Trainees Fit so that the situation is actionable by trainees and not represent a just idealism.
- ❑ Ending Points to persuade the trainees on changing themselves.

A good motivational lecture should help drive creativity, curiosity and spark the desire needed for trainees to want to learn more.

Impact of a successful motivational strategy is amongst others commonly visible in increased class participation ratios. It increases the trainees' willingness to be engaged on the practical tasks for longer time without boredom and loss of interest because they can clearly see in their mind's eye where their hard work would take them in short (1-3 years); medium (3 -10 years) and long term (more than 10 years).

As this tool is expected that the training providers would make arrangements for regular well planned motivational lectures as part of a coordinated strategy interspersed throughout the training period as suggested in the weekly lesson plans in this document.

Motivational sessions can be organized on following topics or can be presented virtually; the links are mentioned in Annex-II.

Work Ethics

Problem Solving

Communication

(ii) Success Stories

Another effective way of motivating the trainees is by means of Success Stories. Its inclusion in the weekly lesson plan at regular intervals has been recommended till the end of the training.

A success story may be disseminated orally, through a presentation or by means of a video/documentary of someone that has risen to fortune, acclaim, or brilliant achievement. A success story shows how a person achieved his goal through hard work, dedication and devotion. An inspiring success story contains compelling and significant facts articulated clearly and easily comprehensible words. Moreover, it is helpful if it is assumed that the reader/listener knows nothing of what is being revealed. Optimum impact is created when the story is revealed in the form of:-

- Directly in person (At least 2-3 cases must be arranged by the training institute)
- Through an audio/ videotaped message (2-3 high quality videos must be arranged by the training institute)

It is expected that the training provider would collect relevant high quality success stories for inclusion in the training as suggested in the weekly lesson plan given in this document.

Suggestive structure and sequence of a sample success story and its various shapes can be seen at annexure III.

(iii) Case Studies

Where a situation allows, case studies can also be presented to the trainees to widen their understanding of the real life specific problem/situation and to explore the solutions.

In simple terms, the case study method of teaching uses a real life case example/a typical case to demonstrate a phenomenon in action and explain theoretical as well as practical aspects of the knowledge related to the same. It is an effective way to help the trainees comprehend in depth both the theoretical and practical aspects of the complex phenomenon in depth with ease. Case teaching can also stimulate the trainees to participate in discussions and thereby boost their confidence. It also makes class room atmosphere interesting thus

	<p>maintaining the trainee interest in training till the end of the course.</p> <p>Depending on suitability to the trade, the weekly lesson plan in this document may suggest case studies to be presented to the trainees. The trainer may adopt a power point presentation or video format for such case studies whichever is deemed suitable but it's important that only those cases are selected that are relevant and of a learning value.</p> <p>The Trainees should be required and supervised to carefully analyze the cases.</p> <p>For the purpose they must be encouraged to inquire and collect specific information / data, actively participate in the discussions and intended solutions of the problem / situation.</p> <p>Case studies can be implemented in the following ways: -</p> <ol style="list-style-type: none"> i. A good quality trade specific documentary (At least 2-3 documentaries must be arranged by the training institute) ii. Health & Safety case studies (2 cases regarding safety and industrial accidents must be arranged by the training institute) <p>Field visits (At least one visit to a trade specific major industry/ site must be arranged by the training institute)</p>
<p>Learning Outcome of the Course</p>	<p>By the end of this course, the trainees should gain the following competencies:</p> <ul style="list-style-type: none"> • Professionalism and Field Job Orientation • Occupational health and safety (OHS) precaution • Print Design Development • Repeats and Pattern Grids • Understanding of software • Color Theory • Develop Basic Blocks • Surface Embellishments and ornamentation • Knowledge of Basic Computer Operations and Manage System for CAD/CAM • Digitization of Basic Blocks • Grading of Basic Blocks <p style="text-align: right;">Problem solving skills</p>
<p>Course Execution Plan</p>	<p style="text-align: center;">Total Duration of Course: 3 Months (14 Weeks)</p>

	Class Hours: 4 Hours per day
	Theory: 20% Practical: 80%
	Weekly Hours: 20 Hours Per week
	Total Contact Hours: 2 8 0 Hours
Companies Offering Jobs in the respective trade	<ol style="list-style-type: none"> 1. Freelancing 2. Textile Industries 3. Design Houses 4. Production units 5. Government and private Institutes conducting short courses
Job Opportunities	<p>As we know Textile sector is the back bone of Pakistan, there is a high demand in the Textile industry for designers and CAD/CAM operators. Technology has come a long way since the early days of hand-drawn or Manual designing, Nowadays you will find Digital solutions for everything. This increase in learning and usage of Designing software and Gadgets has also created new opportunities for all to earn big and make a career out of this field. With the help of this course, we will be able to give technical trainings of Textile Design with CAD/CAM to our youth. There are also opportunities for start-up entrepreneurship due to the high demand in the market in following designated jobs;</p> <ul style="list-style-type: none"> • Textile Designer • CAD/CAM Operator • Fashion Designer • Product developer

No of Students	(Anticipated Class size: 25 trainees)
Learning Place	Classroom / Lab
Instructional Resources	<p>Learning Material:</p> <ul style="list-style-type: none"> ❓ https://sewguide.com/fabric-design-pattern-repeat/ ❓ https://bagntell.wordpress.com/2016/12/19/working-with-fabric-pattern-repeats/ ❓ http://blog.spoonflower.com/2019/03/the-secret-to-designing-stronger-surface-patterns/ ❓ https://slideplayer.com/slide/3178456/ ❓ https://www.google.com/search?biw=1366&bih=657&tbm=isch&sa=1&ei=fALGXJOjMJKDjLsP2aGC-AY&q=straight+print+repeat+grid&oq=straight+print+repeat+grid&gs_l=img.3...24423.31810..32737...2.0..3.4260.18319.1j1j1j0j1j1j0j1j0j4.....1.....1..gws-wiz-img.Y-ZX651xIGQ#imgrc=v9cJaXp_cPe9NM: ❓ https://bagntell.wordpress.com/2016/12/19/working-with-fabric-pattern-repeats/ ❓ www.youtube.com

Scheduled Weeks	Module Title	Days	Learning Units	Home Assignment
Week 1	Introduction to CAD/CAM Exploring Adobe Photoshop	Day 1 Day 2 Day 3 Day 4 Day 5	<ul style="list-style-type: none"> • Motivational Lecture • Course Introduction • Success stories • Job market • Course Applications • Institute/work ethics • Introduction to Textile Design • Importance of software and digital designing • Types of printing technologies • Scope of Textile design and CAD/CAM • Types of Design • Understanding of Block • Understanding of Grading • Field Terminologies • To develop professionalism • Occupational health and safety (OHS) Precautions • Communication • Time management • Up-gradation • Team work • Security procedures • Safety measures at work area • To deal with emergency situation • Team work • Using Photoshop packages • interface of Photoshop • Canvas setting • knowledge of the use of basic computer applications using fundamental components of a computer system • knowledge of basic computer operations including file saving, and data back up • knowledge of computer hardware types 	<p>Task 1</p> <p>Task 2</p> <p>Task 3</p> <p><i>Details may be seen at Annexure-I</i></p>
Week 2	Create Shapes & Motif	Day 1 Day 2	<ul style="list-style-type: none"> • All types of shapes accurately flow of line. • Geometrical shapes • Circular's shapes • Abstract's shapes 	

		Day 3	<ul style="list-style-type: none"> Animals' shapes Flowers' shapes 	Task 4
		Day 4	<ul style="list-style-type: none"> Develop motif out of shapes Types of motifs 	Task 5
		Day 5	<ul style="list-style-type: none"> Adjustment of motifs in different directions Develop design on Canvass 	Task 6
				Task 7
				<i>Details may be seen at Annexure-2</i>
Week 3	Develop Surface Designs according to elements and principles of Design & Research to select a theme	Day 1	<ul style="list-style-type: none"> Brainstorming through mind mapping Elements and principles of design Process of design development 	Task 9
		Day 2	<ul style="list-style-type: none"> tints, tone and shade Research using different research sources Art on Textiles 	Task 10
		Day 3	<ul style="list-style-type: none"> Importance of Color Theory Textile Design and Applied Art Create research board on the selected theme 	Task 11
		Day 4	<ul style="list-style-type: none"> Create mood board with reference to research board Create color board on the basis of selected theme 	Task 12
		Day 5	<ul style="list-style-type: none"> Create color board on the basis of selected theme Process of design development 	Task 13
				Task 14
				<i>Details may be seen at Annexure-3</i>
Week 4	Perform Surface Pattern Repeats	Day 1	<ul style="list-style-type: none"> Different types of surface pattern repeats 	Task 14
		Day 2	<ul style="list-style-type: none"> Grids Types of Prints Variation product to product Apparel and upholstery print classification 	Task 15
		Day 3	<ul style="list-style-type: none"> Motif extraction and design 	Task 16

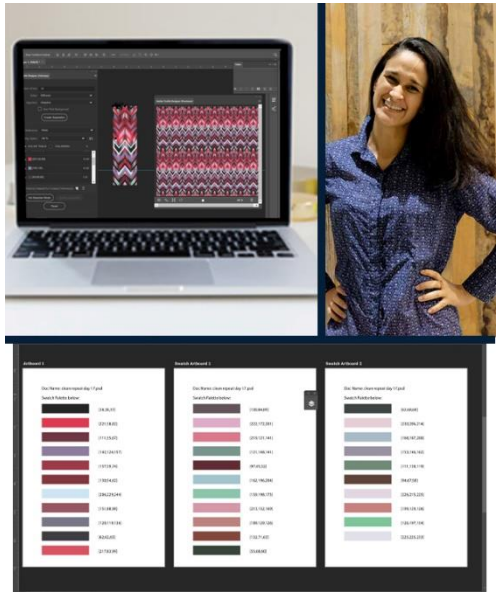
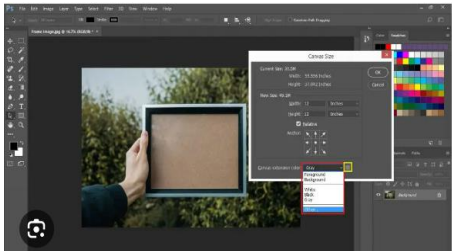
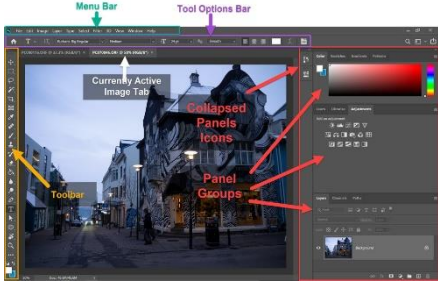
		Day 4	development	<i>Details may beseen at Annexure-4</i>
		Day 5	<ul style="list-style-type: none"> Setting repeats CAD print Color variations Rendering of surface repeat using different media <p>Success story</p>	
Week 5	Perform full body measurement & construct basic blocks	Day 1	<ul style="list-style-type: none"> Take full body measurement horizontally and vertically 	Task 17
		Day 2	<ul style="list-style-type: none"> Make measurement chart according to the measurementstaken. 	Task 18
		Day 3	<ul style="list-style-type: none"> Motivational Lecture 	Task 19
		Day 4	<ul style="list-style-type: none"> Usage of tools and equipment for measurement and drafting Create basic blocks according to standard measurement 	Task 20
		Day 5	<ul style="list-style-type: none"> Drafting and labelling of basic bodice blocks according to international standards: Pattern making terminologies 	<i>Details may beseen at Annexure-5</i>
Week 6	Construct basic blocks Part-2	Day 1	<ul style="list-style-type: none"> Basic bodice block 	Task 21
		Day 2	<ul style="list-style-type: none"> Basic sleeve 	Task 22
		Day 3	<ul style="list-style-type: none"> Waist Bust 	<i>Details may beseen at Annexure-6</i>
		Day 4	<ul style="list-style-type: none"> Shoulder line Center front 	
		Day 5	<ul style="list-style-type: none"> Center back Size Workplace ethics 	
Week 7	Construct basic blocks Part-3	Day 1	<ul style="list-style-type: none"> Basic trouser 	Task 23
		Day 2		Task 24
		Day 3	<ul style="list-style-type: none"> Basic skirt 	Task 25
		Day 4		Task 26
		Day 5	<ul style="list-style-type: none"> Sampling and strike Success story 	<i>Details may beseen at Annexure-7</i>

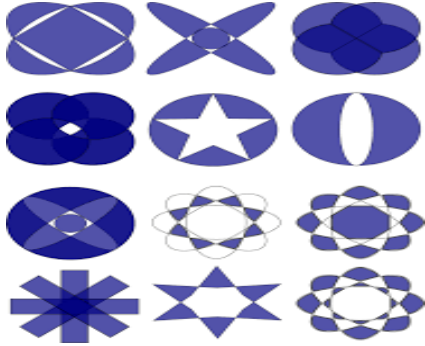

<p>Week 8</p>	<p>Types of printing</p>	<p>Day 1</p> <p>Day 2</p> <p>Day 3</p> <p>Day 4</p> <p>Day 5</p>	<ul style="list-style-type: none"> • Different types of surface pattern repeats • Types of Prints • Motif extraction and design development • Setting repeats • CAD print • Color variations • Color pallets • Rendering of surface repeat using different media <p>Types of printers</p> <ul style="list-style-type: none"> • Direct printing • Heat transfer printing <ul style="list-style-type: none"> • Block printing process • Stenciling • Tie & dye <p>Success story (For further detail please see Annexure-II)</p>	<p>Task 27</p> <p>Task 28</p> <p>Task 29</p> <p>Task 30</p> <p><i>Details may be seen at Annexure-8</i></p>
<p>Week 9</p>	<p>Create Motif Apply Motif Repeat (CAD)</p> <p>Creating Textile Pattern</p>	<p>Day 1</p> <p>Day 2</p> <p>Day 3</p> <p>Day 4</p> <p>Day 5</p>	<ul style="list-style-type: none"> • Create design with different repeat methods • Direct repeat • Cross Repeat • Half Drop & Mirror • Moving ordering and transforming design element • Adding layer effects and blending modes • Regional Suitability of motifs in size and placement <p>Day 4</p> <ul style="list-style-type: none"> • Extracting and Masking • Adding suitable image • Adjustment and effects • Designing placement <p>Day 5</p> <ul style="list-style-type: none"> • Creating all-over pattern • half-drop repeat pattern • Developing clearways and design variations • Motivational Lecture 	<p>Task 31</p> <p>Task 32</p> <p>Task 33</p> <p>Task 34</p> <p><i>Details may be seen at Annexure-9</i></p>


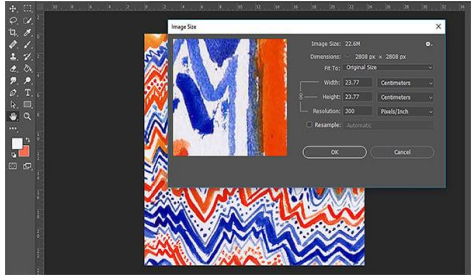

<p>Week 10</p>	<p>Create notches in patterns and apply lay limits & Pattern Grading</p>	<p>Day 1</p> <p>Day 2</p> <p>Day 3</p> <p>Day 4</p> <p>Day 5</p>	<ul style="list-style-type: none"> • Set parameters of notches according to tech pack • Make different type and size of notches on pattern according to client requirements • Apply notch type and size to pattern according to tech pack • Set lay limits according to single, double or tubular ply requirements • Identify the limits of piece placement on fabric • Set user environment • Read and interpret the relevant size charts • Input dimensions into rule table for sizes required according to tech pack • Complete rule table by inputting all required sizes • Complete the rule table by inserting values of x and y axes according to tech pack • Select required digitized pattern piece for grading. • Apply appropriate rule table to show grading using function key • Create an account profile on Fiverr (at least two gigs) and Upwork • Success story 	<p>Task 35</p> <p>Task 36</p> <p><i>Details may be seen at Annexure-10</i></p>
<p>Week 11</p>	<p>Design Development</p> <p>Create an account profile on Fiverr (at least two gigs) and Upwork</p> <p>Build your CV</p>	<p>Day 1</p> <p>Day 2</p>	<ul style="list-style-type: none"> • Zig zag pattern • Seamless pattern • Make a floral pattern • Spiral Graphical Design • Flower design • Create the vector flower • Halftone creation • Rotate the design 	<p>Task 37</p> <p>Task 38</p> <p>Task 39</p> <p>Task 40</p> <p>Task 41</p>


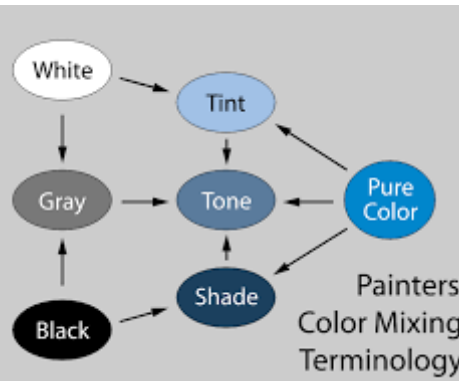
		<p>Day 3</p> <p>Day 4</p> <p>Day 5</p>	<p>Create an account by following these steps:</p> <p>Step 1: Personal Info</p> <p>Step 2: Professional Info</p> <p>Step 3: Linked Accounts</p> <p>Sep 4: Account Security</p> <p>Download professional CV template from any good site (https://www.coolfreecv.com or relevant)</p> <ul style="list-style-type: none"> • Add Personal Information • Add Educational details • Add Experience/Portfolio <p>Add contact details/profile link</p>	<p><i>Details may be seen at Annexure-11</i></p>
Week 12	Final Project and Exhibition	<p>Day 1</p> <p>Day 2</p> <p>Day 3</p> <p>Day 4</p> <p>Day 5</p>	<p>Final Project submitted</p>	<p>Task 39</p> <p>Task 40</p> <p>Task 41</p>
Week 13	Entrepreneurship and Final Assessment		<ul style="list-style-type: none"> • Job Market Searching Self-employment • Freelancing sites • Introduction • Fundamentals of Business Development • Entrepreneurship • Startup Funding • Business Incubation and Acceleration • Business Value Statement • Business Model Canvas • Sales and Marketing Strategies • Stakeholders Power Grid • RACI Model, SWOT Analysis, PESTAnalysis • SMART Objectives • OKRs • Cost Management (OPEX, CAPEX,ROCE etc.) <p>Final Assessment</p>	

Tasks For Certificate in Textile Designing With CAD/CAM

Task No.	Task	Description	Week	
1-	<p><u>What is concept the (Photoshop)</u></p> 	<p>Student will learn:</p> <ul style="list-style-type: none"> • Installing the software (Photoshop) Understanding interface of Photoshop • Photoshop is an image creation, graphic design and photo editing software developed by Adobe. • The software provides many image editing features for pixel-based images, raster graphics and vector graphics 	<p style="text-align: center;">Week 1</p> <p style="text-align: center;"><u>Annexure-1</u></p>	
2-	<p><u>Canvas setting</u></p> 	<p>Student will learn:</p> <ul style="list-style-type: none"> • What resolution is best for canvas? • What is the default canvas size • How do you change the canvas size in photoshop 		
3-	<p><u>Interface of Photoshop</u></p> 	<p>Student will learn: various functions in Menu Bar:</p> <p>File</p> <ul style="list-style-type: none"> • Object • Type • Select • Effect • View 		

		<ul style="list-style-type: none"> • Window <p>File</p> <ul style="list-style-type: none"> • Object • Type • Select • Effect • View • Window <p>File</p> <ul style="list-style-type: none"> • Object • Type • Select • Effect • View • Window 	
4-	<p><u>Geometrical shapes & Circular's shapes</u></p> 	<p>Student will learn gate Geometrical shapes & Circular's shapes are made on photoshop</p>	<p>Week 2- <u>Annexure-2</u></p>
5-	<p><u>Animals' shapes Flowers' shapes</u></p> 	<p>Student will learn gate Animals' shapes Flowers' shape are made on photoshop</p>	

<p>6-</p>	<p><u>Develop motif out of shapes Types of motifs</u></p> 	<p>Student will learn how motifs are made from shapes and their types.</p>	
<p>7-</p>	<p><u>Develop design on Canvass</u></p> 	<p>Student will learn how a design is created with a motif and how is developed on a canvas</p>	
<p>8-</p>	<p><u>Brainstorming through mind mapping</u></p> 	<p>Student will learn How to Make Mind Maps & Visualize Your Ideas for Better Brainstorming</p> <p>What Are Mind Maps?</p> <p>Why Use Mind Maps Instead of Lists or Outlines?</p> <p>How to make a mind map</p> <p>How do you generate the ideas</p>	<p>Week 3</p>

<p>9-</p>	<p><u>Elements and principles of design</u></p> <p>Principles of Design</p> <p>These are the standards or rules to be observed by Artists in creating works of Art; they are how to create and organize Artwork. When elements are utilized with the principles in mind, outstanding Artwork is created.</p>  <p>Balance A distribution of visual weight on either side of the vertical axis. Symmetrical balance uses the same characteristics. Asymmetrical uses different but equally weighted features.</p> <p>Contrast The arrangement of opposite elements (light vs. dark, rough vs. smooth, small vs large, etc...) in a composition so as to create visual interest.</p> <p>Emphasis Used to make certain parts of an Artwork stand out. It creates the center of interest or focal point. It is the place in which an Artist draws your eye to first.</p> <p>Movement How the eye moves through the composition; leading the attention of the viewer from one aspect of the work to another. Can create the illusion of action.</p> <p>Pattern The repetition of specific visual elements such as a unit of shape or form. A method used to organize surfaces in a consistent regular manner.</p> <p>Rhythm Regular repetition of, or alternation in elements to create cohesiveness and interest.</p> <p>Unity Visually pleasing agreement among the elements in a design; it is the feeling that everything in the work of Art works together and looks like it fits.</p>	<p>Student will learn: The elements, or principles, of visual design include Contrast, Balance, Emphasis, Movement, White Space, Proportion, Hierarchy, Repetition, Rhythm, Pattern, Unity, and Variety. These principles of design work together to create something that is aesthetically pleasing and optimizes the user experience.</p>	<p><u>Annexure-3</u></p>
<p>10-</p>	<p><u>Tints, tone and shade</u></p>  <p>White Gray Black</p> <p>Tint Tone Shade</p> <p>Pure Color</p> <p>Painters' Color Mixing Terminology</p>	<p>Student will learn: In color theory, a tint is a mixture of a color with white, which increases lightness, while a shade is a mixture with black, which increases darkness. Both processes affect the resulting color mixture's relative saturation. A tone is produced either by mixing a color with gray, or by both tinting and shading.</p>	
<p>11-</p>	<p><u>Importance of Color Theory</u></p>	<p>Student will learn: Colors can allow anyone to create different types of feelings depending on the particular colours they utilize.</p> <p>Colour theory allows us to understand how to make use of these colours in</p>	

COLOUR THEORY

COOL COLOURS

WARM COLOURS

PRIMARY
Mixing different amounts of the primary colours can make all the colours of the colour wheel.

SECONDARY
Mixing two primary colours make a secondary colour.

TERTIARY
Primary colours and secondary colours mixed together.

COMPLEMENTARY
Colours opposite from each other on the colour wheel.

ANALOGOUS
Colours that are neighbours on the wheel.

MONOCHROMATIC
A colour with its tints and shades. Tints are colours mixed with white. Shades are colours mixed with black.

order to create different effects and create the desired emotions.

12- **Color Wheel**

the basic colors

RED (PRIMARY)
RED-ORANGE (TERTIARY)
ORANGE (SECONDARY)
YELLOW-ORANGE (TERTIARY)
YELLOW (PRIMARY)
YELLOW-GREEN (TERTIARY)
GREEN (SECONDARY)
BLUE-GREEN (TERTIARY)
BLUE (PRIMARY)
BLUE-PURPLE (TERTIARY)
PURPLE (SECONDARY)
RED-PURPLE (TERTIARY)

Student will learn: The color wheel is a visual representation of the primary colors and how they combine to create all other visible colors. The color wheel is helpful for understanding the relationships between colors for art, design planning and color schemes.




13- **Create research board & mood board on the selected theme**

THEME
Abstract Art

Brand
Dries Van Naton

Student will learn:

- What Is a research & Moodboard?
- Who Uses Mood boards
- How to Set the direction of your project
- Collect existing material
- Add inspiring imagery
- Transform your board from messy to organized
- Remain open to inspiration, wherever you are
- Explain your thinking
- Collaborate and build on your idea

<p>14-</p>	<p><u>Different types of surface pattern repeats</u></p> 	<p>Student will learn: How to create the 7 most common surface pattern repeats</p> <ul style="list-style-type: none"> • Full drop/block pattern repeat • Half drop pattern repeat • Brick pattern repeat • Diamond pattern repeat • Ogee pattern repeat • Tossed/ random pattern repeat • Stripe pattern repeat 	<p>Week 4</p> <p><u>Annexure-4</u></p>
<p>15-</p>	<p><u>CAD print</u></p> 	<p>Student will learn the Following methods can be used for printing of a fabric:</p> <ul style="list-style-type: none"> • Block Printing • Roller Printing • Screen Printing • Flat Screen Printing • Rotary Screen Printing • Transfer Printing • Ink-Jet Printing • Carpet Printing • Jet spray printing 	
<p>16-</p>	<p><u>Take full body measurement</u></p>  <p>How to Measure for accurate body measurements</p> <p>A - Bust B - Waist C - Hip D - High Hip E - Front Waist Length F - Back Waist Length G - Arm Length</p>	<p>Student will learn how many steps taken in the full body measurement.</p>	<p>Week 5</p>

17-

Measurement chart

		SMALL				MEDIUM				LARGE				X-LARGE						
SIZE BUNDLES - WOMEN		6	8	10	12	14	16	18	20	22	24	26	28	30	32	34	36	38	40	
Womens (NZ/AU/UK)		6	8	10	12	14	16	18	20	22	24	26	28	30	32	34	36	38	40	
Womens (Europe)		35	37	39	41	43	45	47	49	51	53	55	57	59	61	63	65	67	69	
Womens (USA)		2	4	6	8	10	12	14	16	18	20	22	24	26	28	30	32	34	36	
Metric	Bust	cms	80	85	90	95	100	105	110	115	120	125	130	135	140	145	150	155	160	165
	Waist	cms	66	71	76	81	86	91	96	101	106	111	116	121	126	131	136	141	146	151
	Hip	cms	89	94	99	104	109	114	119	124	129	134	139	144	149	154	159	164	169	174
Imperial	Height	cms	169	170	171	172	173	174	175	176	177	178	179	180	181	182	183	184	185	186
	Bust	inches	31 1/2	33 1/2	35 3/8	37 3/8	39 3/8	41 3/8	43 1/4	45 1/4	47 1/4	49 1/4	51 1/4	53 1/4	55 1/4	57 1/4	59 1/4	61 1/4	63 1/4	65 1/4
	Waist	inches	26	28	29 7/8	31 7/8	33 7/8	35 7/8	37 3/4	39 3/4	41 3/4	43 3/4	45 3/4	47 3/4	49 3/4	51 3/4	53 3/4	55 3/4	57 3/4	59 3/4
	Hip	inches	35	37	39	41	42 7/8	44 7/8	46 7/8	48 7/8	50 3/4	52 3/4	54 3/4	56 3/4	58 3/4	60 3/4	62 3/4	64 3/4	66 3/4	68 3/4
Height	Ft	5'5"	5'6"	5'6"	5'6"	5'7"	5'7"	5'7"	5'7"	5'7"	5'7"	5'7"	5'7"	5'7"	5'7"	5'7"	5'7"	5'7"	5'7"	

Student will learn how to make a slandered measurement chart

Annexure-5

18-

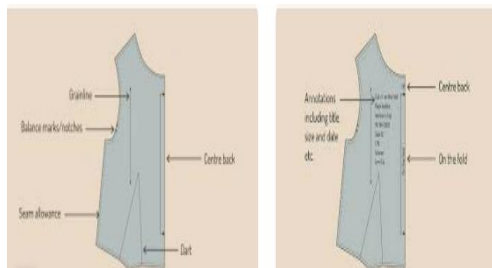
Basic bodiceblocks



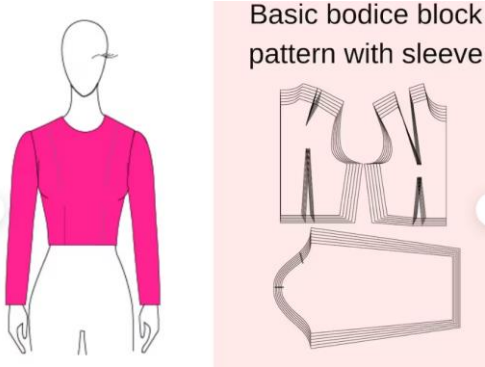
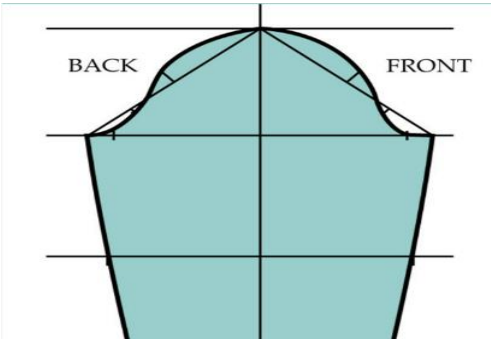
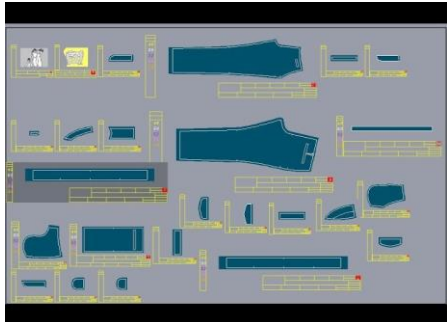
Student will learn how to create basic body block with the help of measurement chart and taking each other in measurement

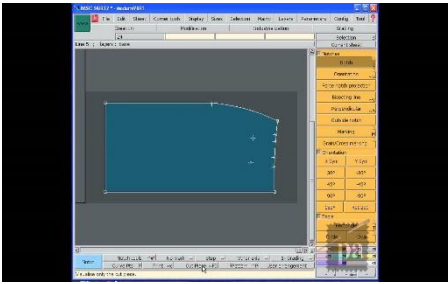
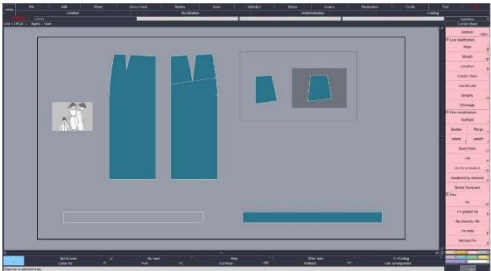


19-



Pattern making terminologies



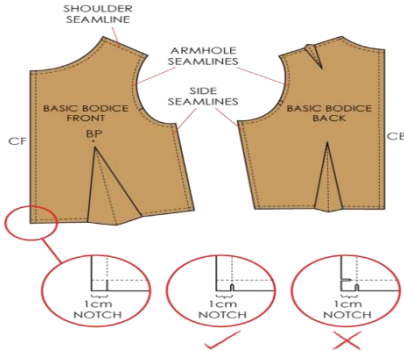


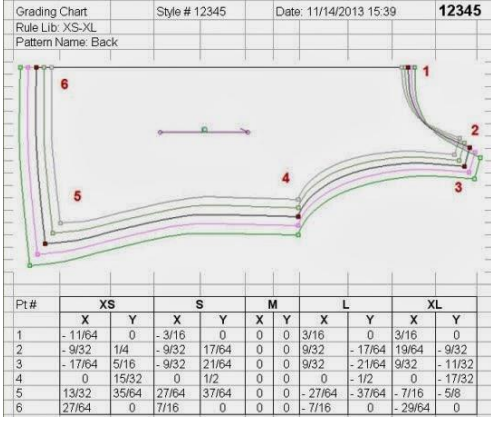


- Alter
- Apex
- Armscye
- Backing
- Backstitch
- Bias
- Blend
- Blocks
- Cad
- Dart
- Dart intake
- Dart point
- Draping
- Drafting
- Facing
- Grading (seams)
- Grain
- Inseam
- Hem
- Marker
- Notch
- Seam allowance

		<ul style="list-style-type: none"> • Tuck 	
20-	<p>Basic bodice block</p>  <p>Basic bodice block pattern with sleeve</p>	<p>Student will learn: how to open template file and how to change the basic body block in the template as per your requirement.</p>	<p>Week 6</p> <p><u>Annexure-6</u></p>
21-	<p>Basic sleeve:</p> 	<p>Student will learn: how to open template file and create basic sleeve as per your requirement.</p>	
22-	<p>Basic trouser</p> 	<p>Student will learn: create basic trouser by the taking the required measurement from a measurement chart</p>	<p>Week 7</p> <p><u>Annexure-7</u></p>

<p>23-</p>	<p><u>Basic skirt</u></p> 	<p>Student will learn: create basic skirt by the taking the required measurement from a measurement chart</p>	
<p>24-</p>	<p><u>Sampling and strike</u></p> 	<p>Student will learn: Open the Lectra software, ensure all settings after this, how it be done by bringing all strike part of the start at one place</p>	
<p>25-</p>	<p><u>CAD print</u></p> 	<p>Student will learn: what is the difference between Digital & Rotary Printing</p> <p>Type of printing</p> <p>Surface Printing. Flexographic Printing. Screen Printing. Rotary Screen. Gravure Printing. Digital Printing.</p>	<p>Week 8</p> <p><u>Annexure-8</u></p>
<p>26-</p>	<p><u>Block printing process</u></p> 	<p>Student will learn: the steps of block printing, following which block printing is done</p> <p>The Process of Block Printing in 5 Steps</p> <p>Step 1: carving Step 2: printing Step 3: drying</p>	

		Step 4: dyeing Step 5: washing & drying	
27-	Stenciling 	Student will learn <ul style="list-style-type: none"> • Your Cutting Edge Stencil • Fabric Scrap for testing • Low Tack Painters Tape • Stencil Paint (acrylic or textile paint) • Textile medium (optional) • Stencil Brush(es) • Dense Foam Roller • Paint Tray or Paper Plate • Paper Towels • Spray Adhesive 	
29-	Tie & dye 	Student will learn Which color of dye is applied to which and what are the different method of dye	
30-	Repeat pattern	Student will learn: Create design with different repeat methods <ul style="list-style-type: none"> • Direct repeat • Cross Repeat • Half Drop & Mirror 	Week 9 <u>Annexure-9</u>

<p>31-</p>	<p>Masking</p> 	<p>Student will learn :</p> <ul style="list-style-type: none"> • What is the concept of using masking effect with object? • What is an After Effects Masking Effect • how can You use masking to hide or reveal a portion of a layer or an object. 	
<p>32-</p>	<p>All-over pattern/ half-drop repeat pattern</p> 	<p>Student will learn : how can create different motif and set it on their canvas in all over pattern & half-drop repeat pattern</p>	
<p>33-</p>	<p>Notches in Pattern</p> 	<p>Student will learn</p> <ul style="list-style-type: none"> • How much value has been allowed as seam allowance • How do to two seams match to each other 	<p>Week 10</p> <p><u>Annexure-10</u></p>

34-	<p>Pattern Grading</p>  <table border="1" data-bbox="310 562 797 695"> <thead> <tr> <th>Pt#</th> <th colspan="2">XS</th> <th colspan="2">S</th> <th colspan="2">M</th> <th colspan="2">L</th> <th colspan="2">XL</th> </tr> <tr> <th></th> <th>X</th> <th>Y</th> <th>X</th> <th>Y</th> <th>X</th> <th>Y</th> <th>X</th> <th>Y</th> <th>X</th> <th>Y</th> </tr> </thead> <tbody> <tr> <td>1</td> <td>-11/64</td> <td>0</td> <td>-3/16</td> <td>0</td> <td>0</td> <td>0</td> <td>3/16</td> <td>0</td> <td>3/16</td> <td>0</td> </tr> <tr> <td>2</td> <td>-9/32</td> <td>1/4</td> <td>-9/32</td> <td>17/64</td> <td>0</td> <td>0</td> <td>9/32</td> <td>-17/64</td> <td>19/64</td> <td>-9/32</td> </tr> <tr> <td>3</td> <td>-17/64</td> <td>5/16</td> <td>-9/32</td> <td>21/64</td> <td>0</td> <td>0</td> <td>9/32</td> <td>-21/64</td> <td>9/32</td> <td>-11/32</td> </tr> <tr> <td>4</td> <td>0</td> <td>15/32</td> <td>0</td> <td>1/2</td> <td>0</td> <td>0</td> <td>0</td> <td>-1/2</td> <td>0</td> <td>-17/32</td> </tr> <tr> <td>5</td> <td>13/32</td> <td>35/64</td> <td>27/64</td> <td>37/64</td> <td>0</td> <td>0</td> <td>-27/64</td> <td>-37/64</td> <td>-7/16</td> <td>-5/8</td> </tr> <tr> <td>6</td> <td>27/64</td> <td>0</td> <td>7/16</td> <td>0</td> <td>0</td> <td>0</td> <td>-7/16</td> <td>0</td> <td>-29/64</td> <td>0</td> </tr> </tbody> </table>	Pt#	XS		S		M		L		XL			X	Y	X	Y	X	Y	X	Y	X	Y	1	-11/64	0	-3/16	0	0	0	3/16	0	3/16	0	2	-9/32	1/4	-9/32	17/64	0	0	9/32	-17/64	19/64	-9/32	3	-17/64	5/16	-9/32	21/64	0	0	9/32	-21/64	9/32	-11/32	4	0	15/32	0	1/2	0	0	0	-1/2	0	-17/32	5	13/32	35/64	27/64	37/64	0	0	-27/64	-37/64	-7/16	-5/8	6	27/64	0	7/16	0	0	0	-7/16	0	-29/64	0	<p>Student will learn:</p> <p>Pattern grading is the process of turning a sample size (sometimes referred as base size) into an additional smaller or larger size. Pattern grading is done using a size specification sheet. Grading does not create a new shape; it increases or decreases the size of the original shape of the garment</p>	
Pt#	XS		S		M		L		XL																																																																																		
	X	Y	X	Y	X	Y	X	Y	X	Y																																																																																	
1	-11/64	0	-3/16	0	0	0	3/16	0	3/16	0																																																																																	
2	-9/32	1/4	-9/32	17/64	0	0	9/32	-17/64	19/64	-9/32																																																																																	
3	-17/64	5/16	-9/32	21/64	0	0	9/32	-21/64	9/32	-11/32																																																																																	
4	0	15/32	0	1/2	0	0	0	-1/2	0	-17/32																																																																																	
5	13/32	35/64	27/64	37/64	0	0	-27/64	-37/64	-7/16	-5/8																																																																																	
6	27/64	0	7/16	0	0	0	-7/16	0	-29/64	0																																																																																	
35-	<p>Design Development</p> 	<p>Student will learn</p> <ul style="list-style-type: none"> • Zig zag pattern • Seamless pattern • Make a floral pattern • Spiral Graphical Design 	<p>Week 11</p> <p><u>Annexure-11</u></p>																																																																																								
36-	<p>Design Development</p> 	<p>Student will learn</p> <ul style="list-style-type: none"> • Flower design • Create the vector flower • Halftone creation • Rotate the design 																																																																																									
37-	<p>Create an account profile on Fiverr</p>	<p>Create an account by following these steps:</p> <p>Step 1: Personal Info</p> <p>Step 2: Professional Info</p> <p>Step 3: Linked Accounts</p> <p>Step 4: Account Security</p>																																																																																									

39-	Build your CV	<p>Download professional CV template from any good site (https://www.coolfreecv.com or relevant)</p> <ul style="list-style-type: none"> • Add Personal Information • Add Educational details • Add Experience/Portfolio <p>Add contact details/profile links</p>	
	Final Project and Exhibition	Final Project submitted	Week 12
	Entrepreneurship and Final Assessment inproject	<ul style="list-style-type: none"> • Job Market Searching Self-employment • Freelancing sites • Introduction • Fundamentals of Business Development • Entrepreneurship • Startup Funding • Business Incubation and Acceleration • Business Value Statement • Business Model Canvas • Sales and Marketing Strategies • Stakeholders Power Grid • RACI Model, SWOT Analysis, PESTAnalysis • SMART Objectives • OKRs • Cost Management (OPEX, CAPEX,ROCE <p>etc.) Final Assessment</p>	

Motivational Lectures

Textile Designing with CAD/CAM

What is freelancing and how you can make money online - BBCURDU

<https://www.youtube.com/watch?v=9jCJN3Ff0kA>

What Is the Role of Good Manners in the Workplace? By Qasim Ali Shah | In Urdu

<https://www.youtube.com/watch?v=Qi6Xn7yKIIQ>

Hisham Sarwar Motivational Story | Pakistani Freelancer

https://www.youtube.com/watch?v=CHm_BH7xAXk

**Success Story of a 23 Year - Old SEO Expert | How This Business Works | Urdu
Hindi Punjabi**

<https://www.youtube.com/watch?v=tlQ0CWqszl0>

**Failure to Millionaire - How to Make Money Online | Fiverr Superhero Aaliyaan
Success Story**

<https://www.youtube.com/watch?v=d1hocXWSpus>

SUGGESTIVE FORMAT AND SEQUENCE ORDER OF MOTIVATIONAL LECTURE.

Mentor

Mentors are provided an observation checklist form to evaluate and share their observational feedback on how students within each team engage and collaborate in a learning environment. The checklist is provided at two different points: Once towards the end of the course. The checklists are an opportunity for mentors to share their unique perspective on group dynamics based on various team activities, gameplay sessions, pitch preparation, and other sessions, giving insights on the nature of communication and teamwork taking place and how both learning outcomes and the student experience can be improved in the future.

Session- 1 (Communication):

Please find below an overview of the activities taking place Session plan that will support your delivery and an overview of this session's activity.

Session- 1 OVERVIEW
Aims and Objectives:
<ul style="list-style-type: none"> • To introduce the communication skills and how it will work • Get to know mentor and team - build rapport and develop a strong sense of a team • Provide an introduction to communication skills • Team to collaborate on an activity sheet developing their communication, teamwork, and problem-solving • Gain an understanding of participants' own communication skills rating at the start of the program

Activity:	Participant Time	Teacher Time	Mentor Time
Intro Attend and contribute to the scheduled.			
Understand good communication skills and how it works.			
Understand what good			

communication skills mean			
Understand what skills are important for good communication skills			
Key learning outcomes:	Resources:		Enterprise skills developed:
<ul style="list-style-type: none"> • Understand the communication skills and how it works. • Understand what communication skills mean • Understand what skills are important for communication skills 	<ul style="list-style-type: none"> • Podium • Projector • Computer • Flip Chart • Marker 		<ul style="list-style-type: none"> • Communication • Self Confidence • Teamwork

Schedule	Mentor Should do
Welcome: 5 min	<p>Short welcome and ask the Mentor to introduce him/herself.</p> <p>Provide a brief welcome to the qualification for the class.</p> <p>Note for Instructor: Throughout this session, please monitor the session to ensure nothing inappropriate is being happened.</p>
Icebreaker: 10 min	<p>Start your session by delivering an icebreaker, this will enable you and your team to start to build rapport and create a team presentation for the tasks ahead.</p> <p>The icebreaker below should work well at introductions and encouraging communication, but feel free to use others if you think they are more appropriate. It is important to encourage young people to get to know each other and build strong team links during the first hour; this will help to increase their motivation and communication throughout the sessions.</p>
Introduction & Onboarding: 20mins	<p>Provide a brief introduction of the qualification to the class and play the “Onboarding Video or Presentation”.</p> <p>In your introduction cover the following:</p> <ol style="list-style-type: none"> 1. Explanation of the program and structure. (Kamyab jawan Program)

	<p>2. How you will use your communication skills in your professional life.</p> <p>3. Key contacts and key information – e.g. role of teacher, mentor, and SEED. Policies and procedures (user agreements and “contact us” section). Everyone to go to the Group Rules tab at the top of their screen, read out the rules, and ask everyone to verbally agree. Ensure that the consequences are clear for using the platform outside of hours. (9am-8pm)</p> <p>4. What is up next for the next 2 weeks ahead so young people know what to expect (see pages 5-7 for an overview of the challenge). Allow young people to ask any questions about the session topic.</p>
<p>Team Activity Planning: 30 minutes</p>	<p>MENTOR: Explain to the whole team that you will now be planning how to collaborate for the first and second collaborative Team Activities that will take place outside of the session. There will not be another session until the next session so this step is required because communicating and making decisions outside of a session requires a different strategy that must be agreed upon so that everyone knows what they are doing for this activity and how.</p> <ul style="list-style-type: none"> • “IDENTIFY ENTREPRENEURS” TEAM ACTIVITY • “BRAINSTORMING SOCIAL PROBLEMS” TEAM ACTIVITY” <p><i>As a team, collaborate on a creative brainstorm on social problems in your community. Vote on the areas you feel most passionate about as a team, then write down what change you would like to see happen.</i></p> <p>Make sure the teams have the opportunity to talk about how they want to work as a team through the activities e.g. when they want to complete the activities, how to communicate, the role of the project manager, etc.</p> <p>Make sure you allocate each young person a specific week that they are the project manager for the weekly activities and make a note of this.</p> <p>Type up notes for their strategy if this is helpful - it can be included underneath the Team Contract.</p>
<p>Session Close: 5 minutes</p>	<p>MENTOR: Close the session with the opportunity for anyone to ask any remaining questions.</p> <p>Instructor: Facilitate the wrap-up of the session. A quick reminder of what is coming up next and when the next session will be.</p>

