



# Shri Vaishnav Vidyapeeth Vishwavidyalaya, Indore

## Shri Vaishnav institute of Architecture

### Choice Based Credit System (CBCS) Scheme in the light of NEP-2020

#### B.Des. Product Design

#### BDNP – 201 N DESIGN STUDIO - I

COURSE CODE	Course Typology	COURSE NAME	TEACHING & EVALUATION SCHEME								
			THEORY			STUDIO		L	T	S	CREDITS
			END SEM University Exam	Two Term Exam	Teachers Assessment*	END SEM University Exam	Teachers Assessment*				
BDNP – 201 N	STUDIO	DESIGN STUDIO - I	0	0	0	240	160	0	0	8	8

**Legends:** L - Lecture; T - Tutorial/Teacher Guided Student Activity; S – Studio ; C - Credit;

\***Teacher Assessment** shall be based following components: Quiz/Assignment/ Project/Participation in Class, given that no component shall exceed more than 10 marks.

#### Course Educational Objectives (CEOs):

CEO 1	Analyze existing products and identify areas for improvement. Apply design principles and methodologies to develop innovative design solutions.
CEO 2	Communicate design concepts and solutions effectively through visual and verbal presentations.

#### Course Outcomes (COs):

After completion of this course the students are expected to be able to demonstrate following knowledge, skills and attitudes.

CO -1	Critical thinking and problem-solving skills.
CO -2	Creativity and innovation in design.
CO -3	Effective communication and presentation skills.

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BDNP – 201 N	STUDIO	DESIGN STUDIO - I	0	0	0	240	160	0	0	8	8

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\***Teacher Assessment** shall be based following components: Quiz/Assignment/ Project/Participation in Class, given that no component shall exceed more than 10 marks.

#### Syllabus

<b>UNIT 1</b>	<b>INTRODUCTION TO DESIGN STUDIO &amp; DESIGN THINKING</b>	<b>24 HRS</b>
	<ul style="list-style-type: none"> <li>- Overview of design thinking and its applications</li> <li>- Principles of human-centered design</li> <li>- Overview of design studio and its importance in product design</li> <li>- Introduction to the design process and methodologies</li> <li>- Case studies of successful product redesigns</li> </ul>	
<b>UNIT 2</b>	<b>PRODUCT ANALYSIS &amp; DESIGN RESEARCH METHODS</b>	<b>24 HRS</b>
	<ul style="list-style-type: none"> <li>- Methods for analyzing existing products</li> <li>- Research techniques for gathering user feedback and data</li> <li>- Tools for identifying areas for improvement</li> </ul>	
<b>UNIT 3</b>	<b>DESIGN PRINCIPLES &amp; METHODOLOGIES</b>	<b>24 HRS</b>
	<ul style="list-style-type: none"> <li>- Overview of design principles and methodologies</li> <li>- Application of design principles to product redesign</li> <li>- Introduction to design thinking and human-centered design</li> </ul>	

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BDNP – 201 N	STUDIO	DESIGN STUDIO - I	0	0	0	240	160	0	0	8	8

**Legends:** L - Lecture; T - Tutorial/Teacher Guided Student Activity; S – Studio ; C - Credit;

\***Teacher Assessment** shall be based following components: Quiz/Assignment/ Project/Participation in Class, given that no component shall exceed more than 10 marks.

<b>UNIT 4</b>	<b>DESIGN PROCESS &amp; FORM DEVELOPMENT</b>	<b>24 HRS</b>
	<ul style="list-style-type: none"> <li>- Apply design thinking to a product design project</li> <li>- Conduct user research and analysis</li> <li>- Develop and present design concepts</li> </ul>	
<b>UNIT 5</b>	<b>DESIGN PRESENTATION</b>	<b>24 HRS</b>
	<ul style="list-style-type: none"> <li>- Principles of effective design presentation and communication</li> <li>- Techniques for creating visual and verbal presentations</li> <li>- Strategies for pitching design concepts to stakeholders</li> </ul>	

#### REFERENCES:

- Christopher Jones- Design Methods
- Jennifer Hudson – 1000 new designs 2 and where to find them
- Manfred Maier – Basic principles of Design
- "Design Thinking" by Nigel Cross
- "The Design of Everyday Things" by Don Norman

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### Choice Based Credit System (CBCS) Scheme in the light of NEP-2020

#### B.Des. Product Design

#### BDNP – 202 N MATERIAL & PROCESSES - I

COURSE CODE	Course Typology	COURSE NAME	TEACHING & EVALUATION SCHEME								
			THEORY			STUDIO		L	T	S	CREDITS
			END SEM University Exam	Two Term Exam	Teachers Assessment*	END SEM University Exam	Teachers Assessment*				
BDNP – 202 N	STUDIO + THEORY	MATERIAL & PROCESSES - I	60	20	20	0	50	3	0	1	4

**Legends:** L - Lecture; T - Tutorial/Teacher Guided Student Activity; S – Studio ; C - Credit;

**\*Teacher Assessment** shall be based following components: Quiz/Assignment/ Project/Participation in Class, given that no component shall exceed more than 10 marks.

#### Course Educational Objectives (CEOs):

<b>CEO 1</b>	Analyze the properties and applications of wood and metal materials in product design.
<b>CEO 2</b>	Evaluate the sustainability and environmental impact of wood and metal materials.

#### Course Outcomes (COs):

After completion of this course the students are expected to be able to demonstrate following knowledge, skills and attitudes.

<b>CO -1</b>	Material selection and specification.
<b>CO -2</b>	Understanding of material processing techniques.
<b>CO - 3</b>	Sustainable design and environmental consideration.

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COURSE CODE	Course Typology	COURSE NAME	TEACHING & EVALUATION SCHEME								
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BDNP – 202 N	STUDIO + THEORY	MATERIAL & PROCESSES - I	60	20	20	0	50	3	0	1	4

**Legends:** L - Lecture; T - Tutorial/Teacher Guided Student Activity; S – Studio ; C - Credit;

**\*Teacher Assessment** shall be based following components: Quiz/Assignment/ Project/Participation in Class, given that no component shall exceed more than 10 marks.

#### Syllabus

<b>UNIT 1</b>	<b>INTRODUCTION TO MATERIALS AND PROCESSES</b>	<b>12 HRS</b>
	<ul style="list-style-type: none"> <li>- Overview of material properties and selection criteria.</li> <li>- Introduction to wood and metal materials.</li> <li>- Sustainable design principles.</li> </ul>	
<b>UNIT 2</b>	<b>WOOD WORKING TECHNIQUES</b>	<b>12 HRS</b>
	<ul style="list-style-type: none"> <li>- Types and characteristics of wood materials.</li> <li>- Wood processing techniques (sawing, planning, joining).</li> <li>- Wood finishing and treatment.</li> </ul>	
<b>UNIT 3</b>	<b>METAL WORKING TECHNIQUES</b>	<b>12HRS</b>
	<ul style="list-style-type: none"> <li>- Types and characteristics of metal materials.</li> <li>- Metal processing techniques (casting, forging, machining).</li> <li>- Metal finishing and treatment.</li> </ul>	

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BDNP – 202 N	STUDIO + THEORY	MATERIAL & PROCESSES - I	60	20	20	0	50	3	0	1	4

**Legends:** L - Lecture; T - Tutorial/Teacher Guided Student Activity; S – Studio ; C - Credit;

**\*Teacher Assessment** shall be based following components: Quiz/Assignment/ Project/Participation in Class, given that no component shall exceed more than 10 marks.

<b>UNIT 4</b>	<b>MATERIAL SELECTION, SPECIFICATIONS &amp; SUSTAINABILITY</b>	<b>12 HRS</b>
	<ul style="list-style-type: none"> <li>- Importance of material selection and specification in product design</li> <li>- Selecting and specifying wood and metal materials for design project</li> <li>- Environmental impact of wood and metal materials.</li> <li>- Sustainable material selection criteria.</li> </ul>	
<b>UNIT 5</b>	<b>DESIGN PROJECT – WOOD AND METAL</b>	<b>12 HRS</b>
	<ul style="list-style-type: none"> <li>- Apply wood and metal working techniques to a design project</li> <li>- Select and specify wood and metal materials for the design project</li> </ul>	

#### REFERENCES:

- Murr, Lawrence E, Handbook of Materials Structures, Properties, Processing and Performance.
- Ashby, M. F., & Johnson, K. (2013). Materials and design: the art and science of material selection in product design. Butterworth-Heinemann.
- Lefteri, C. (2007). Making it: Manufacturing techniques for product design. Laurence King.

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### Choice Based Credit System (CBCS) Scheme in the light of NEP-2020

#### B.Des. Product Design

#### BDNP – 203 N DIGITAL STUDIO - I

COURSE CODE	Course Typology	COURSE NAME	TEACHING & EVALUATION SCHEME								
			THEORY			STUDIO		L	T	S	CREDITS
			END SEM University Exam	Two Term Exam	Teachers Assessment*	END SEM University Exam	Teachers Assessment*				
BDNP – 203 N	LAB	DIGITAL STUDIO - I	0	0	0	60	40	0	2	2	4

**Legends:** L - Lecture; T - Tutorial/Teacher Guided Student Activity; S – Studio ; C - Credit;

**\*Teacher Assessment** shall be based following components: Quiz/Assignment/ Project/Participation in Class, given that no component shall exceed more than 10 marks.

#### Course Educational Objectives (CEOs):

CEO 1	Apply basic AutoCAD skills to create 2D drawings and designs for product design.
CEO 2	Understand the importance of technical drawing and design communication in product design

#### Course Outcomes (COs):

After completion of this course the students are expected to be able to demonstrate following knowledge, skills and attitudes.

CO -1	Proficiency in basic AutoCAD commands and tools.
CO -2	Understanding of 2D drawing and design techniques.
CO - 3	Ability to communicate design ideas through digital media.

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BDNP – 203 N	LAB	DIGITAL STUDIO - I	0	0	0	60	40	0	2	2	4

**Legends:** L - Lecture; T - Tutorial/Teacher Guided Student Activity; S – Studio ; C - Credit;

**\*Teacher Assessment** shall be based following components: Quiz/Assignment/ Project/Participation in Class, given that no component shall exceed more than 10 marks.

#### Syllabus

<b>UNIT 1</b>	<b>INTRODUCTION AND INTERFACE</b>	<b>6 HRS</b>
	Overview of AutoCAD and its application in product design Setting up the AutoCAD environment Basic navigation and interface	
<b>UNIT 2</b>	<b>2D – BASIC DRAWING COMMANDS</b>	<b>6 HRS</b>
	Introduction to basic drawing commands (e.g., line, circle, arc) Understanding coordinate systems and units Practicing basic drawing exercises	
<b>UNIT 3</b>	<b>OBJECT MANIPULATING AND EDITING</b>	<b>6 HRS</b>
	Introduction to object manipulation commands (e.g., move, copy, scale) Understanding object selection and grouping Practicing object manipulation and editing exercises	

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BDNP – 203 N	LAB	DIGITAL STUDIO - I						0	2	2	4

**Legends:** L - Lecture; T - Tutorial/Teacher Guided Student Activity; S – Studio ; C - Credit;

**\*Teacher Assessment** shall be based following components: Quiz/Assignment/ Project/Participation in Class, given that no component shall exceed more than 10 marks.

<b>UNIT 4</b>	<b>LAYERS, COLORS AND LINT TYPE</b>	<b>6 HRS</b>
	Introduction to layers and their application in organization and management Understanding colors and linetypes in AutoCAD Practicing layer, color, and linetype management	
<b>UNIT 5</b>	<b>DIMENSIONING AND ANNOTATION</b>	<b>6 HRS</b>
	Introduction to dimensioning commands (e.g., linear, angular, radial) Understanding annotation techniques (e.g., text, leaders, tolerances) Practicing dimensioning and annotation exercises	

#### REFERENCES:

- AutoCAD 2021 Tutorial First Level 2D Fundamental by Randy H. Shih, SDC Publications
- AUTODESK User Guide Architecture 2011
- "AutoCAD 2020 Tutorial" by Lee Ambrosius

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### Choice Based Credit System (CBCS) Scheme in the light of NEP-2020

#### B.Des. Product Design

#### BDNP – 204 N ERGONOMICS - I

COURSE CODE	Course Typology	COURSE NAME	TEACHING & EVALUATION SCHEME								
			THEORY			STUDIO		L	T	S	CREDITS
			END SEM University Exam	Two Term Exam	Teachers Assessment*	END SEM University Exam	Teachers Assessment*				
BDNP – 204 N	STUDIO + THEORY	ERGONOMICS - I	60	20	20	0	50	2	0	1	3

**Legends:** L - Lecture; T - Tutorial/Teacher Guided Student Activity; S – Studio ; C - Credit;

**\*Teacher Assessment** shall be based following components: Quiz/Assignment/ Project/Participation in Class, given that no component shall exceed more than 10 marks.

#### Course Educational Objectives (CEOs):

<b>CEO 1</b>	Apply anthropometric data to design products that fit human needs.
<b>CEO 2</b>	Analyze and design products that minimize physical discomfort and injury.

#### Course Outcomes (COs):

After completion of this course the students are expected to be able to demonstrate following knowledge, skills and attitudes.

<b>CO -1</b>	Understand the importance of anthropometry in product design.
<b>CO -2</b>	Apply principles of physical ergonomics to design products.
<b>CO - 3</b>	Design products that accommodate human-machine environment interaction

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BDNP – 204 N	STUDIO + THEORY	ERGONOMICS - I	60	20	20	0	50	2	0	1	3

**Legends:** L - Lecture; T - Tutorial/Teacher Guided Student Activity; S – Studio ; C - Credit;

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#### Syllabus

<b>UNIT 1</b>	<b>INTRODUCTION TO ANTHROPOMETRICS</b>	<b>9 HRS</b>
	<ul style="list-style-type: none"> <li>- Definition and importance of ergonomics</li> <li>- Anthropometric data and its application</li> <li>- Human body measurements and terminology</li> </ul>	
<b>UNIT 2</b>	<b>PHYSICAL ERGONOMICS</b>	<b>9 HRS</b>
	<ul style="list-style-type: none"> <li>- Principles of physical ergonomics</li> <li>- Musculoskeletal disorders and prevention</li> <li>- Designing for comfort and reducing fatigue</li> </ul>	
<b>UNIT 3</b>	<b>HUMAN - MACHINE ENVIRONMENT INTERACTION</b>	<b>9 HRS</b>
	<ul style="list-style-type: none"> <li>- Understanding human-machine interaction</li> <li>- Designing for usability and accessibility</li> <li>- Environmental factors affecting human performance</li> </ul>	

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#### BDNP – 204 ERGONOMICS - I

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BDNP – 204 N	STUDIO + THEORY	ERGONOMICS - I	60	20	20	0	50	2	0	1	3

**Legends:** L - Lecture; T - Tutorial/Teacher Guided Student Activity; S – Studio ; C - Credit;

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<b>UNIT 4</b>	<b>UNIVERSAL DESIGN</b>	<b>9 HRS</b>
	<ul style="list-style-type: none"> <li>- Principles of universal design</li> <li>- Designing for inclusivity and accessibility</li> <li>- Case studies of universal design applications</li> </ul>	
<b>UNIT 5</b>	<b>APPLICATION OF ERGONOMICS IN DESIGN</b>	<b>9 HRS</b>
	<ul style="list-style-type: none"> <li>- Applying ergonomic principles to product design</li> <li>- Case studies of ergonomic design successes and failures</li> <li>- Group project: Designing an ergonomic product</li> </ul>	

#### REFERENCE:

1. "Ergonomics: How to Design for Ease and Efficiency" by Kris Lundgaard
2. "Universal Methods of Design" by Nathan Shedroff and Christopher Noessel
3. "Cognitive Ergonomics" by Gavriel Salvendy
4. "The Measure of Man and Woman: Human Factors in Design" by Alvin R. Tilley and Henry Dreyfuss
5. "Ergonomic Design of Products and Worksystems" by Waldemar Karwowski

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### Choice Based Credit System (CBCS) Scheme in the light of NEP-2020

#### B.Des. Product Design

#### BDNP – 205 N DESIGN DRAWING

COURSE CODE	Course Typology	COURSE NAME	TEACHING & EVALUATION SCHEME								
			THEORY			STUDIO		L	T	S	CREDITS
			END SEM University Exam	Two Term Exam	Teachers Assessment*	END SEM University Exam	Teachers Assessment*				
BDNP – 205 N	STUDIO	DESIGN DRAWING	0	0	0	0	100	0	0	3	3

**Legends:** L – Lecture; T – Tutorial/Teacher Guided Student Activity; S – Studio ; C – Credit;

**\*Teacher Assessment** shall be based following components: Quiz/Assignment/ Project/Participation in Class, given that no component shall exceed more than 10 marks.

#### Course Educational Objectives (CEOs):

<b>CEO 1</b>	Develop proficiency in product design drawing and representation techniques
<b>CEO 2</b>	Understand the role of drawing and visualization in product design communication

#### Course Outcomes (Cos):

After completion of this course the students are expected to be able to demonstrate following knowledge, skills and attitudes.

<b>CO -1</b>	Technical drawing skills, including orthographic projections and isometric drawings.
<b>CO -2</b>	Develop skills in creating clear and effective drawings and visualizations
<b>CO – 3</b>	Analyze and evaluate the effectiveness of product design drawings and visualizations

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## Shri Vaishnav institute of Architecture

### Choice Based Credit System (CBCS) Scheme in the light of NEP-2020

#### B.Des. Product Design

#### BDNP – 205 N DESIGN DRAWING

COURSE CODE	Course Typology	COURSE NAME	TEACHING & EVALUATION SCHEME								
			THEORY			STUDIO		L	T	S	CREDITS
			END SEM University Exam	Two Term Exam	Teachers Assessment*	END SEM University Exam	Teachers Assessment*				
BDNP – 205 N	STUDIO	DESIGN DRAWING	0	0	0	0	100	0	0	3	3

**Legends:** L – Lecture; T – Tutorial/Teacher Guided Student Activity; S – Studio ; C – Credit;

**\*Teacher Assessment** shall be based following components: Quiz/Assignment/ Project/Participation in Class, given that no component shall exceed more than 10 marks.

#### Syllabus

<b>UNIT 1</b>	<b>INTRODUCTION TO PRODUCT DESIGN DRAWING</b>	<b>6 HRS</b>
	<ul style="list-style-type: none"> <li>- Overview of technical drawing and its importance in product design.</li> <li>- Basic drawing tools and techniques.</li> <li>- Introduction to orthographic projections.</li> </ul>	
<b>UNIT 2</b>	<b>ORTHOGRAPHIC PROJECTIONS AND ISOMETRIC</b>	<b>6 HRS</b>
	<ul style="list-style-type: none"> <li>- Principles of orthographic projections.</li> <li>- Drawing orthographic views (front, top, side).</li> <li>- Principles of isometric and oblique drawings.</li> <li>- Drawing isometric and oblique views.</li> </ul>	
<b>UNIT 3</b>	<b>PERSPECTIVE DRAWING</b>	<b>6 HRS</b>
	<ul style="list-style-type: none"> <li>- Principles of perspective drawings.</li> <li>- Drawing one-point, two-point, and three-point perspectives.</li> <li>- Basic rendering techniques (line weight, texture, shading).</li> </ul>	

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			END SEM University Exam	Two Term Exam	Teachers Assessment*	END SEM University Exam	Teachers Assessment*				
BDNP – 205 N	STUDIO	DESIGN DRAWING	0	0	0	0	100	0	0	3	3

**Legends:** L – Lecture; T – Tutorial/Teacher Guided Student Activity; S – Studio ; C – Credit;

**\*Teacher Assessment** shall be based following components: Quiz/Assignment/ Project/Participation in Class, given that no component shall exceed more than 10 marks.

<b>UNIT 4</b>	<b>DETAIL DRAWINGS</b>	<b>6 HRS</b>
	<ul style="list-style-type: none"> <li>- Principles of sectional views and detail drawings</li> <li>- - Creating sectional views and detail drawings of products</li> </ul>	
<b>UNIT 5</b>	<b>PRESENTATION TECHNIQUES</b>	<b>6 HRS</b>
	<ul style="list-style-type: none"> <li>- Principles of rendering and presentation techniques</li> <li>- Creating rendered drawings and presentations of products</li> <li>- Importance of visual communication in product design.</li> <li>- Sketching techniques for product design.</li> <li>- Best practices for creating clear and accurate technical drawings.</li> </ul>	

#### REFERENCE:

- "Technical Drawing" by Giesecke et al.
- "Engineering Drawing and Design" by Madsen and Madsen.
- "Product Design and Development" by Ulrich and Eppinger.

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### Choice Based Credit System (CBCS) Scheme in the light of NEP-2020

#### B.Des. Product Design

#### BDNP – 206 N FORM TRANSITION

COURSE CODE	Course Typology	COURSE NAME	TEACHING & EVALUATION SCHEME								
			THEORY			STUDIO		L	T	S	CREDITS
			END SEM University Exam	Two Term Exam	Teachers Assessment*	END SEM University Exam	Teachers Assessment*				
BDNP – 206 N	STUDIO	FORM TRANSITION						0	0	4	4

**Legends:** L – Lecture; T – Tutorial/Teacher Guided Student Activity; S – Studio ; C – Credit;

**\*Teacher Assessment** shall be based following components: Quiz/Assignment/ Project/Participation in Class, given that no component shall exceed more than 10 marks.

#### Course Educational Objectives (CEOs):

<b>CEO 1</b>	Apply the principles of form transition to develop innovative product designs through hands-on experimentation.
<b>CEO 2</b>	Analyze and evaluate the effectiveness of form transition in product design through iterative prototyping.

#### Course Outcomes (COs):

After completion of this course the students are expected to be able to demonstrate following knowledge, skills and attitudes.

<b>CO -1</b>	Proficiency in applying form transition principles to product design.
<b>CO -2</b>	Ability to analyze and evaluate the effectiveness of form transition through iterative prototyping.
<b>CO - 3</b>	Effective communication of form transition concepts through visual and verbal presentations.

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			END SEM University Exam	Two Term Exam	Teachers Assessment*	END SEM University Exam	Teachers Assessment*				
BDNP – 206 N	STUDIO	FORM TRANSITION	0	0	0	60	40	0	0	4	4

**Legends:** L - Lecture; T - Tutorial/Teacher Guided Student Activity; S – Studio ; C - Credit;

**\*Teacher Assessment** shall be based following components: Quiz/Assignment/ Project/Participation in Class, given that no component shall exceed more than 10 marks.

#### Syllabus

<b>UNIT 1</b>	<b>INTRODUCTION TO PRODUCT FORM AND TRANSITION</b>	<b>6 HRS</b>
	<ul style="list-style-type: none"> <li>- Overview of form transition and its importance in product design</li> <li>- Historical context and examples of form transition in design</li> <li>- Introduction to key concepts and terminology</li> <li>- Studio exercise: Exploring form transition principles through sketching</li> </ul>	
<b>UNIT 2</b>	<b>FORM DEVELOPMENT THROUGH TRANSITION</b>	<b>6 HRS</b>
	<ul style="list-style-type: none"> <li>- Introduction to techniques for developing forms through transition (e.g., extrusion, lofting, sweeping)</li> <li>- Analysis of how form development techniques are used in product design</li> <li>- Studio exercise: Applying form development techniques to design problems</li> </ul>	

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BDNP – 206 N	STUDIO	FORM TRANSITION	0	0	0	60	40	0	0	4	4

**Legends:** L - Lecture; T - Tutorial/Teacher Guided Student Activity; S – Studio ; C - Credit;

**\*Teacher Assessment** shall be based following components: Quiz/Assignment/ Project/Participation in Class, given that no component shall exceed more than 10 marks.

<b>UNIT 3</b>	<b>FORM TRANSITION PRINCIPLES</b>	<b>6 HRS</b>
	<ul style="list-style-type: none"> <li>- Understanding of form transition principles (e.g., continuity, proportion, emphasis)</li> <li>- Analysis of how form transition principles are applied in product design</li> <li>- Studio exercise: Applying form transition principles to design problems</li> </ul>	
<b>UNIT 4</b>	<b>ITERATIVE PROTOTYPING</b>	<b>6 HRS</b>
	<ul style="list-style-type: none"> <li>- Introduction to iterative prototyping techniques</li> <li>- Analysis of how iterative prototyping is used in product design</li> <li>- Studio exercise: Iterative prototyping of form transition concepts</li> </ul>	
<b>UNIT 5</b>	<b>FINAL PROJECT</b>	<b>6 HRS</b>
	<ul style="list-style-type: none"> <li>- Application of form transition principles to a comprehensive design project</li> <li>- Development of a refined prototype and visual presentation</li> <li>- Final critique and review</li> </ul>	

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BDNP – 206 N	STUDIO	FORM TRANSITION						0	0	4	4

**Legends:** L - Lecture; T - Tutorial/Teacher Guided Student Activity; S – Studio ; C - Credit;

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#### REFERENCES:

- The subjective experience and objective rationale of Color, Wiley Publications, 1997 .
- Hannah, Gail Greet; Elements of Design, Princeton Architectural Press, 2002
- Byers, Mel; The Design Encyclopedia, Publisher::John Wiley & Sons Publications
- Gyorgy Kepes, Language of Vision, Dover Publications, 1995
- Kimberly Elam, Geometry of Design: Studies in Proportion and Composition, Princeton Architectural Press, 2001
- Gaston Bachelard and Maria Jolas (Translator), The Poetics of Space, Beacon Press; Reprint edition, 1994
- Gail Greet Hannah, Elements of Design, Princeton Architectural Press, 2002

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