

Architecture Assessment Plan Rev. 4/4/2018

<b>Architecture</b>	<b>14-15</b>	<b>15-16</b>	<b>16-17</b>	<b>17-18</b>	<b>18-19</b>	<b>19-20</b>
<b>ARCHB1 - Introduction to Architecture and Environmental Design</b>						
• Upon completion the student will be able to: Develop an awareness of the importance of the field of architecture in today's society and market place and their relationship to the other environmental design fields.		X				X
• Be cognizant of the Bakersfield College requirements for graduation and the process required for transferring to a four-year college or university.					X	X
• Demonstrate an understanding of the educational opportunities and curriculum in Architecture and other environmental design fields.			X			
• Become familiar and acquainted with qualified leaders in the field.				X		
<b>ARCHB6 - Materials of Construction</b>						
• Upon completion the student will be able to: Explain the relationship between materials, architecture and technology.		X				
• Be able to compare and contrast the appearance of materials.				X		
• Be able to compare and contrast the compatibility of different materials and applications.				X		
• Be able to compare and contrast the relationship of cost and availability of materials.					X	
• Demonstrate the ability to analyze how technology affects materials and their selection.						X
<b>ARCHB11 - Design and Perspective Drawing</b>						
• Upon completion the student will be able to: Demonstrate an understanding of and an ability to use drafting tools and instruments.		X				
• Demonstrate the ability to express three-dimensional objects using orthographic and isometric projection as well as one-point and two-point perspective principles.				X		
• Demonstrate a working knowledge of the principles of shade and shadow.				X		
• Demonstrate an understanding of and an ability to use computer software as it relates to the generation of perspective drawings for use in the production of professional quality presentation drawings.					X	
• Demonstrate a working knowledge of the detail required and become cognizant of the exactness to make renderings appear professional in appearance						X
<b>ARCHB12 - Design Drawing and Color</b>						
• Upon completion the student will be able to: Understand the fundamental visual cues by which people perceive depth in the physical environment and develop the skill to graphically represent them to create the illusion of depth on a two dimensional surface.		X				
• Synthesize the various principles and skills in this course as an integral tool to visualize, analyze and communicate ideas.				X		
• Provide the principles and skills of freehand drawing as an integral tool of concept development and communication.					X	
• Demonstrate a working knowledge of the principles of color theory and their application to graphic presentation.						X
<b>ARCHB16 - Digital Tools for Graphics Communication</b>						
• Upon completion the student will be able to: 1. Manipulate a variety of presentation software and obtain the ability to distinguish the best application for each; to contribute to a higher level of design presentation formats.				X		
• 2. Use modern technology such as a scanner, a printer, a computer and the network to create exceptional graphic presentations.				X		
• 3. Manipulate and enhance images by importing and exporting them in and out of graphic software for professional prints and presentations.					X	
• 4. Experiment and quickly determine if spatial design solutions will produce genuine useable designs.		X				
• 5. Create sophisticated design systems that will aid in conveying a spatial thought or develop concrete physical structures.						X

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<b>ARCHB21 - Architectural Design Fundamentals I</b>						
• Upon completion the student will be able to: Demonstrate an awareness of two and three-dimensional design composition, space and spatial sequence and the ability to be critical of the appropriate use of these design elements.					X	
• Recognize a wide range of creative problem solving processes and methods.				X		
• Identify, analyze and employ the fundamental principles and elements of design and composition.					X	
• Reconstruct the design process of problem analysis and synthesis by transferring this knowledge to new situations or problems.						X
• Define a value and relevance or communication theory to design through graphic presentation and physical models.						X
• Understand the importance of and employ the discipline of craftsmanship and basic joinery as an extension of design.				X		
<b>ARCHB22 - Architectural Design Fundamentals II</b>						
• Upon completion the student will be able to: Demonstrate an awareness of problems in the built environment and the fundamental understanding of a systematic approach to problem solving.				X		
• Demonstrate the ability to verbally and graphically communicate potential solutions to design problems.				X		
• Be able to employ previously abstract basic design principles into rational, concrete methods and forms that relate directly to the built environment.					X	
• Integrate previously gained knowledge into increasingly complex solutions.						X
<b>ARCHB30 - Residential Building Information Modeling</b>						
• Upon completion the student will be able to: know how to use BIM software as a design tool and utilize the software to develop a full set of working drawings to be used for construction.				X		
• be able to apply methods and techniques used in developing architectural working drawings, understanding architectural drafting communication methods.				X		
• develop a complete set of working drawings including construction and architectural details for wood frame structures.					X	
• a basic understanding of city or county zoning ordinances and the CA Building Code as well as a basic understanding of state of CA mandatory energy measures.						X
• will have knowledge of how a building is put together by drawing necessary construction details, sections and views that communicate the building process to people in the trades.		X				
<b>ARCHB33 - Architectural Computer Practice</b>						
• Upon completion the student will be able to: Supply methods and techniques used in developing architectural design development drawings and construction documents.				X		
• Utilize and understand the use of BIM (building information model) software in the design process, from the design development phase to the construction phase, and develop construction documents for a light commercial structure.				X		
• Demonstrate an understanding of architectural conventions and symbols and be able to organize this material onto the set of documents.					X	
• Display an understanding of city or county ordinances and its requirements and limitations upon the construction of buildings.		X				
• Display an understanding of the CA Building Code, the scope, requirements and impact on the design and construction process.						X
<b>ARCHB48WE - Occupational Work Experience Education</b>						
• Upon completion the student will be able to: Articulate the specific work experience objectives in architecture as described by employer and identify the various skills, knowledge and attitudes necessary to the accomplishment of those objectives.				X		
• Upon completion the student will be able to: Demonstrate the acquisition of the various skills, knowledge and attitudes necessary to the completion of the work experience objectives in Architecture and the ability to effectively meet employer's job expectations.					X	
• Upon completion the student will be able to: Identify and analyze the application of acquired skills, knowledge and attitudes to career opportunities in architecture.						X

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<b>ARCHB55 - Residential Building Codes</b>						
• Upon completion the student will be able to: Demonstrate a knowledge of the contents within the California Building Code.						X
• Demonstrate the effective application of the significant commercial code requirements.				X		
• Demonstrate the ability to research the code for the purpose of answering questions of code compliance.					X	
<b>ARCHB56 - Commercial Codes</b>						
• Upon completion the student will be able to: Demonstrate knowledge and application of the contents of the California Building Code.						X
• Demonstrate the effective application of the significant commercial code requirements.				X		
• Demonstrate the ability to research the code for the purpose of answering questions of code compliance.					X	