

## ARCH2232 - Civil and Structural Integration

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| Credits:           | 3 (2/1/0)   |
| Description:       | This course will review the incorporation of civil and structural engineering drawings in coordination with building systems. Content will include analysis of civil and structural drawings and their relationship to commercial and residential building types.   |
| Prerequisites:     | <ul style="list-style-type: none"> <li>• ARCH1122</li> <li>• ARCH1126</li> </ul>  |
| Corequisites:      |   |
| Pre/Corequisites*: |   |
| Competencies:      | <ol style="list-style-type: none"> <li>1. Determine preliminary beam and column sizes from reference tables.</li> <li>2. Draw structural framing plans and sections for steel structures.</li> <li>3. Draw structural framing connections for steel structures.</li> <li>4. Determine roof and floor joist sizes from reference table for given spans.</li> <li>5. Establish building finished floor elevation based on existing site data.</li> <li>6. Calculate impervious surface calculations based on existing site data.</li> <li>7. Draw building setbacks, easements, utilities and existing conditions for a given site.</li> <li>8. Draw structural framing plans and sections for wood frame structures.</li> <li>9. Draw concrete footings, foundations, piers and pads for a given structure.</li> <li>10. Draw structural framing connections for wood frame structures.</li> </ol> |
| MnTC goal areas:   | None  |

\*Can be taking as a Prerequisite or Corequisite.