### Course Information

**Instructor:** Herb Edwards, Wg 263, Phone 298-1373, OH 11-12 MW  
**Textbook:** (none)  
**Email:** hh-edwards@wiu.edu

<table>
<thead>
<tr>
<th>Date</th>
<th>Topic</th>
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<tbody>
<tr>
<td>8/20</td>
<td>Tissue selection, fixation, dehydration &amp; demo</td>
</tr>
<tr>
<td>22</td>
<td>Critical point drying, coating &amp; demo</td>
</tr>
<tr>
<td>27</td>
<td>Scanning electron microscopy (SEM)</td>
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<tr>
<td>29</td>
<td>Demo of SEM</td>
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<tr>
<td>9/3</td>
<td>Labor Day (No class)</td>
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<tr>
<td>5-19</td>
<td>SEM research</td>
</tr>
<tr>
<td>24</td>
<td>SEM reports</td>
</tr>
<tr>
<td>26</td>
<td>TEM embedment &amp; demo (SEM paper due)</td>
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<tr>
<td>10/1</td>
<td>Ultramicrotome &amp; knives</td>
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<tr>
<td>3</td>
<td>Demo</td>
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<tr>
<td>8</td>
<td>Staining &amp; Transmission Electron Microscopy (TEM)</td>
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<tr>
<td>10</td>
<td>Demo</td>
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<tr>
<td>15</td>
<td>EM photography &amp; TEM negative film development (demo)</td>
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<td>17</td>
<td>Photographic printing &amp; (demo)</td>
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<tr>
<td>22</td>
<td>Immunocytochemistry</td>
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<tr>
<td>24-11/28</td>
<td>TEM research</td>
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<td>11/14</td>
<td>Progress report</td>
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<td>12/3,5</td>
<td>TEM reports</td>
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<tr>
<td>10</td>
<td>TEM paper due</td>
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There is no textbook required for this course; however, there are several books available in Wg 257 that discuss electron microscopes and techniques.

There are no tests given in this course. Your grade will be determined by the quality of your 2 research reports, the 2 research papers, and by my estimation of how you have mastered the techniques of electron microscopy.

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Students are expected to abide by academic policies as described at: [www.wiu.edu/biology/student/policies.php](http://www.wiu.edu/biology/student/policies.php)