Careers And Technical Programs Division
Fall 2009
ELT 1200 : Beginning Industrial Electronics
Lecture: 6:30 – 9:20 pm Monday, Bldg D, Room 101

Instructor: Steven Malavolti
malavoltiso@yahoo.com, steve@industrialsemi.com
(815) 326-0199 (cell), before 9 pm
Jim Gibson’s Office Phone: (815) 224-2720 ext. 453, 455 (lab)
Home Phone: (815) 326-0199
Office: D - 107A
Office Hours: By appointment as needed.

Text (required)

Course overview
This course is designed to enhance the student’s knowledge of Basic Industrial
Electricity. Basic theory and construction of semiconductors and operation of transistor
circuits, including converting alternating current to direct current, introduction to
integrated circuit construction and operation, semiconductor theory and transistor
characteristics. Furthermore, the diode as applied to rectification, logic and clamping is
investigated, as well as transistor biasing, load line analysis and amplification. Class A, B
and C amplifiers, SCRs, TRIACs, photo-devices and high-power devices are covered.

Attendance
Students are expected to attend all classes regularly and should not miss more than two
classes. If absence from a class is unavoidable, it is the student's responsibility to explain
the absence and arrange to complete any work missed. If a student stops coming to class
without an appropriate explanation, a grade of F will be issued at the end of the term. It
is the student’s responsibility to officially withdrawal from this class.
If you are a student with a documented cognitive, physical or psychiatric disability you may be eligible for academic support services such as extended test time, texts on disc, note taking services, etc... If you are interested in learning if you can receive these academic support services, please contact either Tina Hardy (HYPERLINK "mailto:tina_hardy@ivcc.edu" tina_hardy@ivcc.edu, or 224-0284) or Judy Mika (224-0350), or stop by the Disability Services Office in B-204.

Cell phones, pagers, two-ways, etc., must be turned off or set to vibrate during class time. Do not initiate a conversation during class. If you receive a call, you may leave the classroom. If cell phone usage, is observed and deemed disruptive, one homework score will be deducted (set to zero) from your grade.

Homework
Weekly chapter Workbook homework will be assigned. Grades will be based on the number of correct answers.

Quizzes
As needed basis to check code understanding. (Approximately 4)

Exams
Mid Term and Final will be comprehensive (covering all material up to the week of the exam).

Points (approximate)
- Midterm exam = 100 points
- Final exam = 100 points
- 4 Quizzes = 100 points
- Workbook assignments = 100 points
- Completion of Lab and class participation (mandatory) = 100 points

Grading
90 – 100% = A
80 – 89% = B
70 – 79% = C
60 – 69% = D

REQUIRED Supplies / tools
Scientific calculator
## ELT 1200: Beginning Industrial Electronics

*Tentative* Class Schedule  
Fall 2009

<table>
<thead>
<tr>
<th>Week #</th>
<th>Topic</th>
</tr>
</thead>
<tbody>
<tr>
<td>Week 1</td>
<td>Classes begin, intro, TOOLS,</td>
</tr>
<tr>
<td>Week 2</td>
<td>Chapter 1, 2  (August 28, last day for refund)</td>
</tr>
<tr>
<td>Week 3</td>
<td>Chapter 3</td>
</tr>
<tr>
<td>Week 4</td>
<td>No School</td>
</tr>
<tr>
<td>Week 5</td>
<td>Chapter 4</td>
</tr>
<tr>
<td>Week 6</td>
<td>Test 1, Chapter 5</td>
</tr>
<tr>
<td>Week 7</td>
<td>Chapter 6</td>
</tr>
<tr>
<td>Week 8</td>
<td><strong>MID TERM EXAM</strong></td>
</tr>
<tr>
<td>Week 9</td>
<td>No School (Fall Break)</td>
</tr>
<tr>
<td>Week 10</td>
<td>Chapter 8, 9</td>
</tr>
<tr>
<td>Week 11</td>
<td>Chapter 10</td>
</tr>
<tr>
<td>Week 12</td>
<td>Chapter 10  (Nov 6 last date to withdrawal)</td>
</tr>
<tr>
<td>Week 13</td>
<td>Chapter 11</td>
</tr>
<tr>
<td>Week 14</td>
<td>Chapter 12</td>
</tr>
<tr>
<td>Week 15</td>
<td>Review and Lab Completions</td>
</tr>
<tr>
<td>Week 16</td>
<td><strong>FINAL EXAM</strong></td>
</tr>
</tbody>
</table>