

Changes in Technology

Acknowledgements: Developed by Laura Marmolejo, Faculty of Austin Community College, Austin Texas

Approximate Time Required: 5 hours

Team or Individual Activity: This activity is designed as an individual activity.

Equipment and Tools

- Internet connection (School or most local libraries have internet access)
- Technical magazines
- Technical textbooks

Learning Objectives

1. Identify how a component of a major segment of the electronics industry has changed.
2. Identify how technician skills have changed because of the advances in technology.

Performance and Task Procedures

In order to really appreciate the technology of today, you have to first see how technology has changed over the last 50 years. As you enter the field of electronics, you may wonder why so many years of education are needed to perform the job of technician. In fact, you may even know someone who works as a technician but didn't have to go to school at all. Times have significantly changed the skills required by technicians. By taking a look back in time, you will be amazed at how far we have come, technologically speaking.

This assignment will explore the achievements made in the past and foresee the potential for the future. This assignment will also show why most companies today require some level of education to fill the technician level positions.

To perform this activity, you must identify which of the five segments (components, computers, communications, control and monitoring, or instrumentation and measurement) of the electronics industry most interests you. Since this is still too large an area to research, be more specific by selecting a subgroup.

Some examples are:

<u>Segment selected:</u>	<u>Subgroup:</u>
Computers	Mainframes
Components	Integrated circuits
Communications	Telephones

Segment to be researched: _____

Subgroup selected: _____



Use at least three (3) technical magazines, textbooks, or Internet sources to research the subgroup selected. Identify how things were 40 to 50 years ago and any major leaps in technology through the current year. Explain how these changes affect the quality of our life today. Describe how these changes have impacted the job market and the type of knowledge a technician requires.

Document your findings in a minimum two page final report.

Deliverables

1. A short (minimum two pages) report of the job information that is most interesting to you. Remember all papers must be written in your own words. Words copied exactly as they are written must be placed in quotations and referenced. Failure to do so is deemed as academic plagiarism and is a serious offense.

The report should include:

- Introduction
- Body of the report
- Summary
- List of all works cited in your report

2. Answers to the drill down activity questions
3. Oral presentation to the class (as required by instructor)

Scoring or Grading Criteria

Grading is subject to the instructor's discretion. The following criteria may be used:

- Concise, to the point, and easily understood by other students
- Well written: grammar errors, poor sentence structure, etc. to be reviewed
- Clearly identified the changes in the electronic industry selected

Drill Down Activity Questions

1. Based on the information gathered, how do you think the skill set of a technician has changed?
2. After looking back in time, do you feel the industry has reached its maximum potential? Why or why not?