

# ADVANCED COMPUTER APPLICATIONS SECTION

**PURPOSE:** This course presents several application programs, enabling the computer to become a tool for the student. Programs will include but not be limited to the following: word processing, spreadsheet, database, desktop publishing, internet, multimedia. Students who complete this course will have advanced computer and technical skills that will greatly enhance their employment potential.

## HIGH ACHIEVEMENT UNIT OUTCOMES:

**Outcome I:** Students will demonstrate advanced word processing tools/applications

### Components:

1. Copy and move text
2. Search and replace text
3. Uses outline tool
4. Format and print multi-page reports
5. Key multi-columnar document
6. Compose and format a resume
7. Compose and format a letter of application
8. Complete a job application
9. Create a macro

**Outcome II:** Students will create, edit, and use databases

### Components:

1. Create a database
2. Enter fieldnames
3. Add new records
4. Delete records
5. Search for specific information
6. Sort a database
7. Design a report form
8. Print a database report
9. Customizing forms
10. Using advanced filters to search
11. Creating relationships in a database

**Outcome III:** Students will create, edit, and use spreadsheets

### Components:

1. Create a spreadsheet
2. Enter text and numbers
3. Format a spreadsheet
4. Create spreadsheet formulas
5. Use functions within formulas
6. Perform a “what-if” analysis with spreadsheet data
7. Create and print various types of graphs using spreadsheet data
8. Add text and graphics to a graph

**Outcome IV:** Students will integrate word processing, database, and spreadsheet data.

**Components:** .

1. Integrate data from database to word processing
2. Integrate data from spreadsheet to database
3. Integrate data from database to spreadsheet
4. Mail merge

**Outcome V:** Students will demonstrate Desktop Publishing techniques

**Components:**

1. Identify and use tools, menus, and palettes
2. Utilize the Page Setup command to print documents
3. Create text boxes and enter text
4. Change font characteristics
5. Add graphics and create objects
6. Create text that flows or wraps around graphics
7. Copy and paste text and objects
8. Create a publication using clip art, boxes, shading, lines
9. Insert a scanned graphic/photo into an existing page layout

**Outcome VI:** Students will develop web pages

**Components:**

1. Use a web page authoring program to produce a web page
2. Add images and text to a web page
3. Create Links
4. Add background
5. Format text
6. Create easy to navigate pages
7. Create visually interesting pages
8. Demonstrate consistency in design
9. Create, edit, and print HTML documents
10. Add graphics to HTML documents
11. Describe the difference between constructing a web page using HTML and a web page authoring program
12. Demonstrate an awareness of digital image file saving strategies
13. Demonstrate skills of image capturing using a flatbed scanner

**Outcome VII:** Students will use calendaring and electronic mail

**Components:**

1. Adding, deleting, sorting and printing a task list
2. Scheduling appointments or meetings
3. Sending and receiving messages
4. Saving electronic messages
5. Printing electronic messages
6. Establishing and using an address book
7. Replying to electronic messages
8. Formatting text
9. Sending attachments

**Outcome VIII:** Students will demonstrate career development skills

**Components:**

1. Sets Priorities
2. Punctuality
3. Exhibits Respect for Equipment
4. Listens/follows Oral Instructions
5. Reads/Follows Written Instructions
6. Uses Time Wisely
7. Maintains Clean Work Area
8. Demonstrates respect for others
9. Demonstrates willingness to learn
10. Responds positively to criticism

**Outcome IX:** Students will exhibit leadership skills

**Components:**

1. Displays courtesy, tactfulness, and patience
2. Control emotions under demands, time, pressure, and opposition
3. Ask appropriate questions
4. Apply one or more problem-solving processes to a given situation(s).
5. Accept responsibility for personal decisions and actions
6. Display appropriate image and dress
7. Recognize the accomplishments of others
8. Recognize those who help and contribute
9. Identify leadership opportunities in the school and community
10. Responds positively to criticism

**Outcome X:** Students will integrate Science, language arts, and math

**Components:**

1. Explain how the advancement of technology has affected our lives
2. Describe the positive and negative impacts of technology on the environment
3. Use Basic Research Techniques
4. Interpret information from manuals
5. Select appropriate reading method for a particular situation
6. Proofread documents to ensure that they are complete and concise
7. Recognize, describe, and predict patterns of data
8. Construct and solve an algebraic equation for a given problem
9. Apply the order of operations principle when using mathematical processes
10. Identify multiple applications for using algebraic equations to solve problems