NEOSHO COUNTY COMMUNITY COLLEGE
MASTER COURSE SYLLABUS

COURSE IDENTIFICATION

Course Code/Number: CSIS 237

Course Title: Java Programming

Division: [x] Applied Science (AS)   [ ] Liberal Arts (LA)   [ ] Workforce Development (WD)

[ ] Health Care (HC)   [ ] Lifetime Learning (LL)   [ ] Nursing   [ ] Developmental

Credit Hour(s):   Three (3)

Effective Date: Fall 2013

Assessment Goal Per Outcome: 70%

COURSE DESCRIPTION

This course will be taught using the **ACM CS1 Model.** This course begins the development of discipline in program design, in style and expression, in debugging and testing, especially for larger programs using the Java programming language. It will introduce the student to fundamentals of the Java language, simple data structures, algorithmic analysis, basic aspects of object oriented processing, and programming methods.

MINIMUM REQUIREMENTS/PREREQUISITES AND/OR COREQUISITES

None

TEXTS

The official list of textbooks and materials for this course is found on *my*Neosho.

http://www.neosho.edu/ProspectiveStudents/Registration/CourseSyllabi.aspx

GENERAL EDUCATION OUTCOMES

1.   Practice Responsible Citizenship through:

- identifying rights and responsibilities of citizenship,
- identifying how human values and perceptions affect and are affected by social diversity,
- identifying and interpreting artistic expression.
2. Live a healthy lifestyle (physical, intellectual, social) through:
   - listing factors associated with a healthy lifestyle and lifetime fitness,
   - identifying the importance of lifetime learning,
   - demonstrating self-discipline, respect for others, and the ability to work collaboratively as a team.
3. Communicate effectively through:
   - developing effective written communication skills,
   - developing effective oral communication and listening skills.
4. Think analytically through:
   - utilizing quantitative information in problem solving,
   - utilizing the principles of systematic inquiry,
   - utilizing various information resources including technology for research and data collection.

COURSE OUTCOMES/COMPETENCIES (as Required)

Upon successful completion of the course the student should be able to:

1. Describe and demonstrate the usage of contemporary programming methodology, specifically Java programming.
   a) Describe the process of visual program design and development.
   b) Explain the term object-oriented programming.
   c) Describe the various files that make up a Java project.
   d) Identify syntax errors, run-time errors, and logic errors.

2. Analyze, design, code, document and test Java programs using the most common features and standards of the language.
   a) Explain the concepts of classes, objects, properties, methods, and events.
   b) Write, run, save, print, and modify your first Java project.
   c) Differentiate among the various data types.
   d) Perform calculations using variables and constants.
   e) Understand and use nested Ifs.
   f) Evaluate conditions using the relational operators.
   g) Combine conditions using And and Or.
   h) Test the Checked property of radio buttons and check boxes.
   i) Perform validation on numeric fields.

3. Create user-friendly interfaces and help systems using Java as a tool for creation and front-end interface.
   a) Use text boxes, group boxes, check boxes, radio buttons, and picture boxes effectively.
   b) Set the BorderStyle property to make controls appear flat or three-dimensional.
   c) Select multiple controls and move them, align them, and set common properties.
   d) Make projects easy for the user to understand and operate by defining access keys, setting a default and a cancel button, controlling the tab sequence, resetting the focus during

program execution, and causing ToolTips to appear.

4. Use structured design tools to document program logic.

5. Use reference manuals, help tools, and debugging tools to solve problems.
   a) Look up Java topics in Help.
   b) Find and use examples from the textbook

MINIMUM COURSE CONTENT

The following topics must be included in this course. Additional topics may also be included.

A.   Introduction to Computers and Programming.
B.   Introduction to Object-Oriented Programming.
C.   Getting started with Java.
D.   Variables, Constants, and Calculations
E.   Classes.
F.   Decisions and Conditions.
G.   Iteration
H.   Characters and Strings
I.   Arrays
J.   Sorting and Searching
K.   Additional topics as time allows.

STUDENT REQUIREMENTS AND METHOD OF EVALUATION

INSTRUCTIONAL METHODS

Programming in Java.

STUDENT REQUIREMENTS

1. Students will be expected to complete all lessons, exercises, and exams as provided. Students will be awarded 0% for all work that is not submitted to the Instructor.

2. Students will be evaluated by the level of competency attained as measured by participation in the exercises.

3. Participation in online forums and discussions is crucial to the development of a student's knowledge and skills. Student evaluation is therefore based upon active class participation in addition to written assignments, and completed projects; thus, student evaluation will be affected by class participation.

4. Student grades will be calculated as follows:

Labs 40%

Midterm ……..….30%
Final..30%

Total... 100%

GRADING SCALE

Letter grades will be assigned based on the following scale:

> 90 - 100% = A
> 80 - 89% = B
> 70 - 79% = C
> 60 - 69% = D
> 0 - 59% = F

ASSESSMENT OF STUDENT GAIN

The purpose of assessing student learning at Neosho County Community College is to ensure the educational purposes of the institution are met and appropriate changes are made in program development and classroom instruction to allow for student success. The instructor(s) of this course will determine the methods of assessment most appropriate and complete an assessment report at the end of the course.

Pre-assessment ideally begins at the beginning of the course when the instructor and the student determine through conference and observation the skill level of the student. Post-assessment to determine gain in competency will be measured at the end of each unit of study and at the end of the course.

Attendance Policy

1. NCCC values interactive learning which promotes student engagement in the learning process. To be actively engaged, the student must be present in the learning environment.

2. Unless students are participating in a school activity or are excused by the instructor, they are expected to attend class. If a student's absences exceed one-eighth of the total course duration, (which equates to one hundred (100) minutes per credit hour in a face-to-face class) the instructor has the right, but is not required, to withdraw a student from the course. Once the student has been dropped for excessive absences, the registrar's office will send a letter to the student, stating that he or she has been dropped. A student may petition the chief academic officer for reinstatement by submitting a letter stating valid reasons for the absences within one week of the registrar's notification. If the student is reinstated into the class, the instructor and the registrar will be

notified.   Please refer to the Student Handbook/Academic Policies for more information

3. Absences that occur due to students participating in official college activities are excused except in those cases where outside bodies, such as the State Board of Nursing, have requirements for minimum class minutes for each student. Students who are excused will be given reasonable opportunity to make up any missed work or receive substitute assignments from the instructor and should not be penalized for the absence. Proper procedure should be followed in notifying faculty in advance of the student's planned participation in the event. Ultimately it is the student's responsibility to notify the instructor in advance of the planned absence.

ACADEMIC INTEGRITY

NCCC expects every student to demonstrate ethical behavior with regard to academic pursuits. Academic integrity in coursework is a specific requirement. Definitions, examples, and possible consequences for violations of Academic Integrity, as well as the appeals process, can be found in the College Catalog, Student Handbook, and/or Code of Student Conduct and Discipline.

ELECTRONIC DEVICE POLICY

Student cell phones and other personal electronic devices not being used for class activities must not be accessed during class times unless the instructor chooses to waive this policy.

NOTE

Information and statements in this document are subject to change at the discretion of NCCC. Students will be notified of changes and where to find the most current approved documents.

ACCOMMODATIONS

If you are a student with a disability who may need accommodation(s), in compliance with Section 504 of the Rehabilitation Act of 1973 and the Americans with Disabilities Act (ADA) of 1990, please notify the Dean of Student Services in the Student Services Office, Sanders Hall, 620-432-0304, on the Chanute Campus, or the Dean for the Ottawa and Online Campuses, 785-248-2798, on the Ottawa Campus as soon as possible. You will need to bring your documentation for review in order to determine reasonable accommodations, and then we can assist you in arranging any necessary accommodations.

NON-DISCRIMINATION POLICY

The following link provides information related to the non-discrimination policy of NCCC, including persons with disabilities. Students are urged to review this policy.

SEXUAL MISCONDUCT POLICY (TITLE IX)

At NCCC, it is the responsibility of an instructor to help create a safe learning environment in the classroom, including both physical and virtual classrooms.   All instructors are considered mandatory reporters at NCCC, therefore any information regarding sexual misconduct that is shared by a student in one-on-one meetings with the instructor must be reported to appropriate personnel at the College. Instructors will keep the information private to the greatest extent possible, but it is not confidential. Generally, climate surveys, classroom writing assignments or discussions, human subjects research, or events such as Take Back the Night events do not provide notice that must be reported to the Coordinator by employees, unless the reporting party clearly indicates that they wish a report to be made.

The following link provides information related to the sexual misconduct policy of NCCC, including resources, reporting options, and student rights. Students are urged to review this policy.

http://www.neosho.edu/TitleIX.aspx

COURSE NOTES