CBM003 ADD/CHANGE FORM

1. Department: COSC  College: NSM
2. Person Submitting Form: D. Hill/Pavlidis  Telephone: 3-3256
3. Course Information on New/Revised course:
   - Instructional Area / Course Number / Long Course Title: COSC / 4355 / Introduction to Ubiquitous Computing
   - Instructional Area / Course Number / Short Course Title (30 characters max.) COSC / 4355 / INTRO TO UBQUITOUS COMPUTING
   - SCH: 3.00  Level: SR  CIP Code: 1102020006  Lect Hrs: 3  Lab Hrs: 0
4. Justification for adding/changing course: Successfully taught as a selected topics course
5. Was the proposed/revised course previously offered as a special topics course?  Yes  No
   If Yes, please complete:
   - Instructional Area / Course Number / Long Course Title: COSC / 4397 / Ubiquitous Computing
   - Content ID: 298476  Start Date (yyyy3): 20063
6. Authorized Degree Program(s): BS
   - Does this course affect major/minor requirements in the College/Department?  Yes  No
   - Does this course affect major/minor requirements in other Colleges/Departments?  Yes  No
   - Are special fees attached to this course?  Yes  No
   - Can the course be repeated for credit?  Yes  No
7. Grade Option: Letter (A, B, C . . .)  Instruction Type: lecture ONLY  (Note: Lect/Lab info. must match item 3, above.)
8. If this form involves a change to an existing course, please obtain the following information from the course inventory: Instructional Area / Course Number / Long Course Title
   ______ / ______ / ______
   - Start Date (yyyy3): ______  Content I.D.: ______
9. Proposed Catalog Description: (If there are no prerequisites, type in "none").
   Cr: 3. (3-0).  Prerequisites: some programming experience.  Description (30 words max.): Introduction to software development for ubiquitous devices such as PDAs and cell phones.
10. Dean's Signature: ___________________________ Date: 11 Oct 07
    Print/Type Name: ___________________________
COSC4355 - Introduction to Ubiquitous Computing

Overview

The course aims to introduce students to software development for ubiquitous devices such as PDAs and cell phones. The software platform of choice is the .NET Compact Framework and the programming language of choice is C#. Emphasis is given on project work and the development of small and large-scale software products, especially geared towards computer games. The course is meant to introduce students to modern software development practices for hand-held devices - the fastest growing area of the computer industry. As a by-product, the course familiarizes students with modern programming tools, such as the .NET Compact Framework and C#. The course includes undergraduate level projects that feature modules of introductory sophistication.

Topics

Foundations of .NET Compact Framework
Advanced Game Programming Techniques
User Interface in .NET Compact Framework
Managing Device Data in .NET Compact Framework
Creating Graphical Output in .NET Compact Framework
Writing Games in .NET Compact Framework

Prerequisites

Some programming experience

Workload

4 Homeworks x 10% each = 40%
1 Project 50%
Class Participation 10%

Readings

.NET Compact Framework Programming with C# by Paul Yao and David Durant, Addison-Wesley Professional, ISBN 0321174038 (Required)

Pocket PC Game Programming by Jonathan S. Harbour, Musk and Lipman/Premier Trade, ISBN 0761530576 (Recommended)

Beginning C# Game Programming by Ron Penton, Course Technology PTR, ISBN 1592005179 (Recommended)

An assortment of on-line material at: http://www.gamedev.net/ and http://www.pocketgear.com

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