WASHTENAW COMMUNITY COLLEGE

MASTER SYLLABUS

Course Discipline Code & No: CPS 295 **Title:** Advanced C# .Net and ASP.Net
Effective Term 200701

Division Code: BCT **Department Code:** CISD **Org #:** 13400

Don't publish: ☐ College Catalog ☐ Time Schedule ☐ Web Page

Reason for Submission. Check all that apply.

- ☐ New course approval
- ☒ Three-year syllabus review/ Assessment report
- ☒ Course change
- ☐ Reactivation of inactive course
- ☐ Inactivation (Submit this page only.)

Change information: Note all changes that are being made. Form applies only to changes noted.

- ☐ Consultation with all departments affected by this course is required.
- ☐ Course discipline code & number (was _____)*
  *Must submit inactivation form for previous course.
- ☒ Course title (was Advanced Visual C++ Windows Prog.
- ☒ Course description
- ☒ Course objectives (minor changes)
- ☐ Credit hours (credits were: _____)
- ☐ Total Contact Hours (total contact hours were: _____)
- ☐ Distribution of contact hours (contact hours were: lecture: _____ lab _____ clinical _____ other _____)
- ☒ Pre-requisite, co-requisite, or enrollment restrictions
- ☐ Change in Grading Method
- ☒ Outcomes/Assessment
- ☒ Objectives/Evaluation
- ☐ Other _____

Rationale for course or course change. Attach course assessment report for existing courses that are being changed.

C# is becoming the dominant programming platform for Microsoft and an important platform for software developers. (See "Reg Developer" article, attached). Our current intermediate C# course is becoming very popular, and students have frequently been asking for an Advanced C# course.

Approvals Department and divisional signatures indicate that all departments affected by the course have been consulted.

Department Review by Chairperson ☐ New resources needed ☐ All relevant departments consulted

Print: Philip Geyer/Neil Gudsen Faculty/Preparer Signature Philip Geyer Date: 11-22-06

Print: Philip Geyer Department Chair Signature Philip Geyer Date: 11-22-06

Division Review by Dean

☒ Request for conditional approval

Recommendation ☒ Yes ☐ No Dean's/ Administrator's Signature Date 11/27/06

Curriculum Committee Review

Recommendation _____

☐ Tabled ☒ Yes ☐ No Curriculum Committee Chair's Signature Date 3/14/07

Vice President for Instruction Approval

Vice President's Signature Date 3/28/07

Approval ☒ Yes ☐ No ☐ Conditional

Do not write in shaded area.
Log File 11/30/06 Ecopy ☐ Banner 4/5 C&A Database 4/5 C&A Log File 4/5 Basic skills ☐ Contact fee ☐

Please return completed form to the Office of Curriculum & Assessment and email an electronic copy to sjohn@wccnet.edu for posting on the website.

***Complete ALL sections which apply to the course, even if changes are not being made.**

Course:	Course title:
CPS 295	Advanced C# .Net and ASP.Net

Credit hours: 4

If variable credit, give range:

_____ to _____ credits

Contact hours per semester:

	Student	Instructor
Lecture:	60	60
Lab:		
Clinical:		
Practicum:		
Other:		
Totals:		

Are lectures, labs, or clinicals offered as separate sections?

☐ Yes - lectures, labs, or clinicals are offered in separate sections

☒ No - lectures, labs, or clinicals are offered in the same section

Grading options:

☐ P/NP (limited to clinical & practica)

☐ S/U (for courses numbered below 100)

☒ Letter grades

Prerequisites. Select one:

☒ College-level Reading & Writing

☐ Reduced Reading/Writing Scores (Add information at Level I prerequisite)

☐ No Basic Skills Prerequisite (College-level Reading and Writing is not required.)

In addition to Basic Skills in Reading/Writing:

Level I (enforced in Banner)

	Course	Grade	Test	Min. Score	Concurrent Enrollment (Can be taken together)	Corequisites (Must be enrolled in this class also during the same semester)
					☐	
☐ and ☐ or					☐	
☐ and ☐ or					☐	
☐ and ☐ or					☐	

Level II (enforced by instructor on first day of class)

	Course	Grade	Test	Min. Score
	CPS 293	C		
☐ and ☐ or				
☐ and ☐ or				

Enrollment restrictions (In addition to prerequisites, if applicable.)

☐ and ☒ or Consent required

☐ and ☐ or Admission to program required

Program: _____

☐ and ☐ or Other (please specify):

_____

Please send syllabus for transfer evaluation to:

Conditionally approved courses are not sent for evaluation.

Insert course number and title you wish the course to transfer as.

☒ E.M.U. as _____

☐ U of M as _____

☐ _____ as _____

☐ _____ as _____

☐ _____ as _____

☐ _____ as _____

Course	Course title
CPS 295	Advanced C# .Net and ASP.Net

Course description State the purpose and content of the course. Please limit to 500 characters.	This course is a continuation of the CPS 293 C# .Net course, and is intended for students to learn more advanced skills in C# . Class Projects will include many advanced features of Microsoft Visual Studio 2005. There will be a special focus on making full use of the C# Language using XML, Database, Web Services and other technologies. Additional focus will be on creating reusable code, using object oriented techniques such as encapsulation, inheritance, interfaces, delegates and polymorphism.	
Course outcomes List skills and knowledge students will have after taking the course. **Assessment method** Indicate how student achievement in each outcome will be assessed to determine student achievement for purposes of course improvement.	**Outcomes** (applicable in all sections)	**Assessment** Methods for determining course effectiveness
	1. Create object oriented Windows applicatons and custom controls to access and process data from databases, web pages, spreadsheets, etc	Portfolio of programming projects and assignments measured against the project and assignment specifications as well as a rubric of programming standards.
	2. Create Web User controls and custom controls for web based applications and create web services to access and process data from databases, web pages spreadsheets, etc.	Portfolio of programming projects and assignments measured against the project and assignment specifications as well as a rubric of programming standards.
Course Objectives Indicate the objectives that support the course outcomes given above. **Course Evaluations** Indicate how instructors will determine the degree to which each objective is met for each student.	**Objectives** (applicable in all sections)	**Evaluation** Methods for determining level of student performance of objectives
	1. Manipulate Strings, and use Regular expressions -Find all occurrences of a character in a string -Find all occurrences of a string within another string -Control case sensitivity when comparing two strings. -Removing or replacing characters or words within a string. -Enumerating matches -Use common patterns -Use built-in regular expressions -Use StringBuilder and String Classes in C#	Assignments and exams
	2. Build windows and web forms based applications that can address data in databases,web pages, spreadsheets or other documents with ADO.NET ActiveX Data Objects and with DotNet Controls -Build a simple web form -Add controls -Manage session state objects	Assignments and exams

	-Implement Drag and Drop in Wondows forms with C#	
	3. Invoke COM (Component Object Model) components within applications written in C# .Net	Assignments and exams
	4. Create XML (Externsible Markup Language)aware applications -Read XML on the web -Validate XML -Create XML Document Programmatically	Assignments and exams
	5. Create simple DotNet web service -Create a simple XML Web service with Visual Studio .NET that returns a DataSet -Create a .NET client application that uses the DataSet object -Create a Windows application that uses the XML Web service.	Assignments and exams
	6. Use asynchronous Javascript and XML (AJAX) to update user insterfaces	Assignments and exams
	7. Use .Net Remoting to allow ojects residing in different application domains to talk to one another.	Assignments and exams

List all new resources needed for course, including library materials.
None.

Student Materials:

List examples of types		Estimated costs
Texts Supplemental reading Supplies Uniforms Equipment Tools Software	Visual C# How to Program, Second Edition Deitel and Associates 0-13-152523-9 Students must obtain a copy of C# .Net. We will also need to host a version of MS Server 2003 on a PC set up as a server. We already have licenses for MS Server 2003.	$ 93.00 - book $50 - C# .Net

Equipment/Facilities: Check all that apply. (All classrooms have overhead projectors and permanent screens.)

Check level only if the specified equipment is needed for all sections of a course.

- ☐ Level I classroom
  Permanent screen & overhead projector
- ☐ Level II classroom
  Level I equipment plus TV/VCR
- ☒ Level III classroom
  Level II equipment plus data projector, computer, faculty workstation

- ☐ Off-Campus Sites
- ☐ Testing Center
- ☒ Computer workstations/lab
- ☐ ITV
- ☐ TV/VCR
- ☒ Data projector/computer
- ☐ Other _____

Assessment plan:

Learning outcomes to	Assessment tool	When assessment will	Course section(s)/other	Number students to be

be assessed (list from Page 3)		take place	population	assessed
1,2	Portfolio of programming projects and assignments measured against the project and assignment specifications as well as a rubric of programming standards.	Every 3 years. First assessment shall be conducted in Fall of 2008.	Minimum of two sections of CPS 295 over the three year period	A minimum of 20 students randomly selected from a minimum of 2 sections

Scoring and analysis of assessment:

1. Indicate how the above assessment(s) will be scored and evaluated (e.g. departmentally developed rubric, external evaluation, other). Attach the rubric/scoring guide.
   Assignments will be evaluated by CIS faculty against a programming standards rubric, as well as homework specifications, and scored accordingly

2. Indicate the standard of success to be used for this assessment.
   At least 80% of students must score 75% or better on all learning outcome evaluations.

3. Indicate who will score and analyze the data (data must be blind-scored).
   Assessment materials will be evaluated by the CIS Department.

4. Explain the process for using assessment data to improve the course. Based upon the results of the report if 80% or more of students score 75% or higher on all learning outcomes, no action will be taken. If less than 80% of students score 75% or higher on learning outcomes, the department will revise the course accordingly.