

Construction Technology	PROGRAM COURSES										GENERAL EDUCATION										
	CST 110 Blueprint Reading 1	CST 111 Construction Orientation	CST 116 Construction Estimating	CST 118 Building Construction	CST 119 Building Construction Surveying	CST 122 Construction Codes	CST 211 Blueprint Reading 2	CST 280C Cooperative Education	CST 283 Introduction to Bricklaying	Arts and Letters	CIS 101 Computer Fundamentals	Directed Electives	Distribution Requirement	DRF 167 CAD 1	DRF 208 Residential Buildings	DRF 210 Commercial Buildings	HE 125 Workplace Safety	Human Relations	MTH 076 Applied Geometry for Technicians	Science/Math/Computer Science	WR 121 English Composition
Associate Degree Credit Hours (97 Total Credits)	3	2	4	15	3	2	3	9	1	3	3	18	3	4	4	4	3	3	4	3	3
One-year Certificate Credit Hours (53 Total Credits)	3	2	4	15	3	2	3		1		3			4			3	3	4		3
Program Learning Outcomes																					
Demonstrate employability skills required for initial employment and advancement in the industry that include: attendance, proper attire, customer relations, following directions, working in teams, and understanding work rules and ethics.	P	P	P	P	P	P	P	P	P			S		S	S	S	P	P			
Demonstrate safe work practices and tool usage while performing operations in a shop environment.	P	P	P	P	P	P	P	P	P			P		S	S	S	P				
Demonstrate basic carpentry skills for the construction industry including: cut, fit and assemble wood and other materials; knowledge and use of laser leveling and field elevations; and, reading and properly constructing from blueprints.	P	P	P	P	P	P	P	P	P			S		S	S	S					
Perform computations for construction including: estimations, conversions, and use of precision measuring tools.	P	P	P	P	P	P	P	P	P		S	P	S	S	S	S			P	P	
Demonstrate technical abilities in researching, accessing and interpreting written, computer program or web-based reference materials for construction and carpentry.	S	S	S	S	S	S	S	S	S	P		S	P	S	S	S				S	P
Core Abilities																					
Communicate effectively.	P	P	P	P	P	P	P	P	P									P			P
Think critically and solve problems effectively.	P	P	P	P	P	P	P	P	S			P	P	P		P	P	P	P	P	S
Increase understanding of the relationship between self and community, including self-awareness and personal responsibility.	S	S	S	S	S	S	S	S	P		S	S	S	S		P		P			
Explore academic disciplines of liberal arts, social sciences, and physical sciences.											S	S	S	S		P	P	P	P	P	P
Learning College Principles																					
Learners are active partners in the learning process.	P	P	P	P	P	P	P	P	P			S	P	P	P	P	S				
Learners are self-directed.	P	P	P	P	P	P	P	P	P			P	P	P	P	P	S				
Multiple learning options for diverse learners.	P	P	P	P	P	P	P	P	P		S	S	S	S	S	S	S	S	S	S	S
Learning is promoted across organizational boundaries.										P	P	P	P	P	P	P	P	P	P	P	P
Learning is substantive and documented.	P	P	P	P	P	P	P	P	P	P	S	P	P	P	P	P	S	S	S	S	S
Assessment Methods																					
Technical Skill Performance Observation/Evaluation	P	P	P	P	P	P	P	P	P					P	P	P					
Employability Skills Evaluation	P	P	P	P	P	P	P	P	P					P	P	P					
Group Project																					
Journaling																					
Library Research																					
Oral Report/Presentation																					
Peer Assessment																					
Portfolio																					
Pre and Post Test																					
Project Evaluation																					
Quizzes																					
Self Assessment																					
Written Report																					
Written Tests/Examinations																					

P = this is a primary course for meeting the program learning outcome, core ability, learning college principle, or assessment method.

S = this course meets some of the program learning outcome, core ability, learning college principle or assessment method.

Advanced Technology Division – Assessment Plans 9/22/05

Construction

Program Learning Outcomes/Goals	Assessment Indicators
1) Demonstrate employability skills required for initial employment and advancement in the industry that include: attendance, proper attire, customer relations, following directions, working in teams, and understanding work rules and ethics.	80% of the first year students will qualify for the "select student" status by receiving a recommendation from a full-time contracted faculty member. 90% percent of the second year students will complete their programs in the "entry level employee" status. Criteria to qualify for the "select" status will be determined and published by the faculty prior to the start of the academic year.
2) Demonstrate safe work practices and tool usage while performing operations in a shop environment.	90% of all students will pass a safety written and demonstration test.
3) Demonstrate basic carpentry skills for the construction industry including: cut, fit and assemble wood and other materials; knowledge and use of laser leveling and field elevations; and, reading and properly constructing from blueprints.	90% of the "select" students will gain entry level employment in a construction or related field within 12 months of completing the program.
4) Perform computations for construction including: estimations, conversions, and use of precision measuring tools.	90% of the program completers will pass a final program computations examination with a 70% or better score.
5) Demonstrate technical abilities in researching, accessing and interpreting written, computer program or web-based reference materials for construction and carpentry.	All students will conduct research with citations in a written report in both the first and second year of the program.

Program Operating Analysis - FY 2006

Construction

	Fiscal Year 2006	Expected Model	Actual	Difference	IRAP	Analysis
1	Enrollment	M				High, Medium or Low Cost Program
2	Reimbursable Student FTE	21.15	30.42		30.4	510 contact hours = 1 R-SFTE
3	Credit Hour Student FTE	14.88	21.40		24.4	45 Credit Hours = 1 CrdHr-SFTE
4	Staffing					
5	Full-time Equivalent Faculty	0.744	0.750	1%		Actual = Enrollment Reports FY06
6	Part-time Equivalent Faculty	0.186	0.180	-3%		Actual = Enrollment Reports FY06
7	Total Faculty FTE	0.930	0.930	0%		
8	Budget					
9	FT Faculty Dollars	45,571	49,368	8%		Actual = Banner FY06, Period 14
10	PT Faculty Dollars	7,405	7,147	-3%		Actual = Banner FY06, Period 14
11	Lab Assistant Dollars	3,720	3,233	-13%		Actual = Banner FY06, Period 14
12	OPE	28,558	30,733	8%		Actual = Banner FY06, Period 14
13	Materials and Supplies	2,790	3,352	20%		Actual = Banner FY06, Period 14
14	Equipment	3,720	-	-		Actual = Banner FY06, Period 14
15	Direct Instruction Costs	91,764	93,833	2%	85,949	Expenses are higher than expected.
16	Operating Ratios					
17	R-SFTE/Total Faculty FTE	22.74	32.71	44%		
18	CrdHr-SFTE/Total Faculty FTE	16.00	23.01	44%		Faculty are serving more students.
19	Cost / R-SFTE	4,338	3,085	-29%	2,830	
20	Cost / CrdHr-SFTE	6,167	4,385	-29%		Cost per student is lower than expected.
21						
22	Revenue		Revenue	Difference	IRAP	
23	Tuition		62,114		72,893	FY06 Tuition Rate x CrdHr SFTE x 45
24	Program Fees (Differential)		-		-	Credit Hours x \$27.92
25	Public Support / CrdHr SFTE	3,807	115,809		115,928	RFTE*\$3,807
26	Other Instructional Revenue					
27	Total Operating Revenue		177,922		188,821	Contribution to Total College Revenue
28	Instructional Function Revenue	54.5%	96,968			Based on Model's Functional Cost Ratios
29	Direct Instruction Revenue	83.3%	80,773	-14%		Expenses are Greater than Revenue
30						Faculty, Lab Assts, M&S, Equip Costs
31	Indirect Instruction Revenue	16.7%	16,195			Portion of indirect instructional costs
32	Other Functions Revenue	45.5%	80,955			Student Svs, College Svs, etc.

