#### SAN BERNARDINO COMMUNITY COLLEGE DISTRICT

**TO:** Board of Trustees

**FROM:** Bruce Baron, Interim Chancellor

**REVIEWED BY:** Dr. Debra S. Daniels, President, SBVC

PREPARED BY: Dr. Larry Buckley, Vice President, Instruction SBVC

**DATE:** March 17, 2011

**SUBJECT:** Consideration of Approval of Curriculum - SBVC

## RECOMMENDATION

It is recommended that the Board of Trustees approve the SBVC curriculum modifications.

## **OVERVIEW**

The courses, certificates and degrees at SBVC are continually being revised and updated to reflect and meet student needs.

## <u>ANALYSIS</u>

These courses, certificates and degrees have been approved by the Curriculum Committee of the Academic Senate and will be included in the 2011-2012 College Catalog.

## **BOARD IMPERATIVE**

II. Learning Centered Institution for Student Access, Retention and Success

## **FINANCIAL IMPLICATIONS**

None

## SAN BERNARDINO VALLEY COLLEGE SUBMITTED FOR BOARD OF TRUSTEE APPROVAL MARCH 17, 2011

## **MODIFY COURSES**

COURSE ID	COURSE TITLE
CIT 144	MEDICAL TERMINOLOGY

**Catalog Description:** The course includes the origin, usage, spelling, pronunciation, and meaning of terminology used to describe the structures of the human body, as well as therapeutic and diagnostic procedures. It is a course for students who are interested in pursuing health occupations such as medical office occupations, nursing, radiological technology, and respiratory care.

**Schedule Description:** The course includes the origin, usage, spelling, pronunciation, and meaning of terminology used to describe the structures of the human body, as well as therapeutic and diagnostic procedures. It is a course for students who are interested in pursuing health occupations such as medical office occupations, nursing, radiological technology, and respiratory care.

Effective Date: FA12
Rationale: Content Review

COURSE ID	COURSE TITLE
MACH 021B	MACHINE SHOP I

Course ID: MACH 021

**Departmental Advisories:** MACH 120. MACH 090. and MACH 075

**Catalog Description:** This course includes machine shop practices, with an emphasis on Occupational Safety and Health Act (OSHA), basic shop mathematics, measurements, and the correct use of the basic machine tools, mills, lathes, saws, drill presses, and introduction to National Institute for Metalworking Skills (NIMS) Standards Level I, Bench and Layout. (Formerly MACH 021B)

**Schedule Description:** This course includes machine shop practices, with an emphasis on Occupational Safety and Health Act (OSHA), basic shop mathematics, measurements, and the correct use of the basic machine tools, mills, lathes, saws, drill presses, and introduction to National Institute for Metalworking Skills (NIMS) Standards Level I, Bench and Layout. (Formerly MACH 021B)

Effective Date: FA12
Rationale: Content Review

Curriculum Meetings: 02-07-2011 Conjoint Meeting: 02-21-11

Board of Trustees Meeting: March 17, 2011

COURSE ID	COURSE TITLE
MACH 022B	MACHINE SHOP II

Course ID: MACH 022

**Departmental Advisory:** MACH 021

**Catalog Description:** This course includes machine shop practices for students with a machining background. Emphasis is placed on mathematical speeds and feed formulas, boring processes on mills and lathes, tool grinding, National Institute for Metalworking Skills (NIMS) Standards. At the completion of this course, students will have completed certain NIMS certification competencies. (Formerly MACH 022B)

**Schedule Description:** This course includes machine shop practices for students with a machining background. Emphasis is placed on mathematical speeds and feed formulas, boring processes on mills and lathes, tool grinding, National Institute for Metalworking Skills (NIMS) Standards. At the completion of this course, students will have completed certain NIMS certification competencies. (Formerly MACH 022B)

Effective Date: FA12
Rationale: Content Review

COURSE ID	COURSE TITLE
MACH 120B	MACHINE SHOP THEORY

Course ID: MACH 120

**Catalog Description:** The basic cutting concepts of machine tools are described and applied with cutting tools emphasizing safe work practices and rules related to machine tool operations. Emphasis will be on the fundamentals of bench work and layout related to the National Institute for Metalworking Skills (NIMS) Standards. (Formerly MACH 120B)

**Schedule Description:** The basic cutting concepts of machine tools are described and applied with cutting tools emphasizing safe work practices and rules related to machine tool operations. Emphasis will be on the fundamentals of bench work and layout related to the National Institute for Metalworking Skills (NIMS) Standards. (Formerly MACH 120B)

Effective Date: FA12
Rationale: Content Review

Curriculum Meetings: 02-07-2011 Conjoint Meeting: 02-21-11

Board of Trustees Meeting: March 17, 2011

COURSE ID	COURSE TITLE
MACH 123A	MACHINE SHOP III

Course ID: MACH 123

**Departmental Advisory:** MACH 022

**Catalog Description:** This course includes machine shop practices for those with intermediate machining and mathematics backgrounds. Emphasis is placed on manufacturing of tools and surface grinding. At the completion of the course, students may qualify for National Institute for Metalworking Skills (NIMS) certification competencies in turning between centers and turning chucking skills. (Formerly MACH 123A)

**Schedule Description:** This course includes machine shop practices for those with intermediate machining and mathematics backgrounds. Emphasis is placed on manufacturing of tools and surface grinding. At the completion of the course, students may qualify for National Institute for Metalworking Skills (NIMS) certification competencies in turning between centers and turning chucking skills. (Formerly MACH 123A)

Effective Date: FA12
Rationale: Content Review

COURSE ID	COURSE TITLE
MACH 124A	MACHINE SHOP IV

Course ID: MACH 124

**Departmental Advisory:** MACH 123

**Catalog Description:** This course includes machine shop practices for students with advanced machining background. Emphasis is placed on advanced math applications, special tool grinding, part indexing, carbide usage and application, and tool manufacturing. At the completion of the course, students should have completed the National Institute for Metalworking Skills (NIMS) certification competency tests in Manual Milling and Grinding Skills I. (Formerly MACH 124A)

**Schedule Description:** This course includes machine shop practices for students with advanced machining background. Emphasis is placed on advanced math applications, special tool grinding, part indexing, carbide usage and application, and tool manufacturing. At the completion of the course, students should have completed the National Institute for Metalworking Skills (NIMS) certification competency tests in Manual Milling and Grinding Skills I. (Formerly MACH 124A)

Effective Date: FA12
Rationale: Content Review

Curriculum Meetings: 02-07-2011 Conjoint Meeting: 02-21-11

Board of Trustees Meeting: March 17, 2011

COURSE ID	COURSE TITLE
MATH 090	ELEMENTARY ALGEBRA

**Prerequisite:** MATH 952 or MATH 952D or eligibility for MATH 090 as determined through the SBVC assessment process

**Catalog Description:** This course includes the basic concepts typically introduced in high school algebra, including operations on polynomials, exponents, solving linear and quadratic equations, linear inequalities, word problems, factoring, rational expressions, and graphing linear equations.

**Schedule Description:** This course includes the basic concepts typically introduced in high school algebra, including operations on polynomials, solving linear and quadratic equations, and factoring.

Effective Date: FA12
Rationale: Content Review

COURSE ID	COURSE TITLE
MATH 093	PLANE GEOMETRY

**Catalog Description:** This course provides a review of high school geometry, including mathematical logic, geometric constructions, congruences, similarities, and other properties of basic closed plane figures.

**Schedule Description:** This course provides a review of high school geometry, including mathematical logic, geometric constructions, congruences, similarities, and other properties of basic closed plane figures.

Effective Date: FA12
Rationale: Content Review

COURSE ID	COURSE TITLE
MATH 095	INTERMEDIATE ALGEBRA

**Prerequisite:** MATH 090 or eligibility for MATH 095 as determined through the SBVC assessment process **Catalog Description:** This course includes finding solutions to quadratic equations and inequalities, rational exponents and radicals, solving linear systems of equations and inequalities, functions, and application problems.

**Schedule Description:** This course includes finding solutions to quadratic equations and inequalities, rational exponents and radicals, solving linear systems of equations and inequalities, functions, and application problems.

Effective Date: FA12
Rationale: Content Review

Curriculum Meetings: 02-07-2011 Conjoint Meeting: 02-21-11

Board of Trustees Meeting: March 17, 2011

COURSE ID	COURSE TITLE
MATH 102	COLLEGE ALGEBRA

**Catalog Description:** This course is designed for students with a strong foundation in algebra. It includes the study of polynomial rational functions and inequalities, exponential and logarithmic functions, conics, systems of nonlinear equations and inequalities, and an introduction to sequences, series, and the Binomial Theorem. **Schedule Description:** This course is designed for students with a strong foundation in algebra. It includes the study of polynomial rational functions, exponential and logarithmic functions, conics, systems of nonlinear equations and inequalities, and an introduction to sequences and series.

Effective Date: FA12
Rationale: Content Review

COURSE ID	COURSE TITLE
MATH 115	IDEAS OF MATHEMATICS

**Catalog Description:** This course includes sets, propositional logic, inductive reasoning and applications, mathematical patterns, counting methods, and finite probability spaces.

**Schedule Description:** This course includes sets, propositional logic, inductive reasoning and applications, mathematical patterns, counting methods, and finite probability spaces.

Effective Date: FA12
Rationale: Content Review

## **DISTRIBUTED EDUCATION**

## **CIT 144 100% ONLINE**

**Effective Date: FA11** 

Rationale: One of the planning themes of San Bernardino Valley College (SBVC) is access. For career technical courses, the issue of scheduling is crucial. Students working the night shift can only take class in the morning while those working traditional day schedules can only take evening classes. Given these variables and difficult schedules, students need the flexibility of time that an online class affords. An asynchronous online class allows students to study when their schedules allow and where they have the space and materials to do so effectively. The online delivery method of these courses supports the mission of SBVC by providing access to education to a diverse community of learners who find themselves in a community with complicated lives and difficult and demanding schedules and responsibilities.

Curriculum Meetings: 02-07-2011 Conjoint Meeting: 02-21-11

Board of Trustees Meeting: March 17, 2011

## **MODIFY DEGREE**

# ASTRONOMY A.S. Degree Major

To graduate with a specialization in Astronomy, students must complete the following required courses plus the general breadth requirements for the Associate Degree (minimum 60 semester units).

Total Units		23	
PHYSIC 200	Physics I	6	
MATH 252	Multivariable Calculus	5	
MATH 251	Single Variable Calculus II	4	
MATH 250	Single Variable Calculus I	4	
ASTRON 125	Astronomy Laboratory	1	
	and		
ASTRON 120	Introduction to Astronomy	3	
REQUIRED COURSES:		Units	

**Effective Date: FA11** 

Rationale: The degree was updated to reflect changes in curriculum.

Curriculum Meetings: 02-07-2011 Conjoint Meeting: 02-21-11

Board of Trustees Meeting: March 17, 2011

## **MODIFY DEGREE**

## Physics A.S. Degree Major

To graduate with a specialization in Physics, students must complete the following required courses plus the general breadth requirements for the Associate Degree (minimum total = 60 units).

Total Units		29
	,	
CHEM 151 <b>H</b>	General Chemistry II - Honors	5
	or	
CHEM 151	General Chemistry II	5
CHEM 150 <b>H</b>	General Chemistry I - Honors	5
	or	
CHEM 150	General Chemistry I	5
RECOMMENDED COURSES:		Units
MATH 252	Multivariable Calculus	5
MATH 251	Single Variable Calculus II	4
MATH 250	Single Variable Calculus I	4
PHYSIC 210	Modern Physics	4
PHYSIC 201	Physics II	6
PHYSIC 200	Physics I	6
REQUIRED COURSES:		Units

**Effective Date: FA11** 

Rationale: The degree was updated to reflect changes in curriculum.

Curriculum Meetings: 02-07-2011 Conjoint Meeting: 02-21-11

Board of Trustees Meeting: March 17, 2011