

Course: GUID 419                      Division: 10                      Also Listed As:

Term Effective: 200930, INACTIVE COURSE

Short Title: DEVEL CONFID MATH

Full Title: Developing Confidence in Mathematics

<u>Contact Hours/Week</u>	<u>Units</u>	<u>Number of Weeks</u>	<u>Total Contact Hours</u>
Lecture: 1	1	17.34	Lecture: 17.34
Lab: 0			Lab: 0
Other: 0			Other: 0
Total: 1			Total: 17.34

Credit Status: C - Credit - Degree Non Applicable

Grading Modes: P - Pass/No Pass

Repeatability: Repeatability: N - Course may not be repeated

Schedule Types: 02 - Lecture and/or discussion

**Course Description:**

Uncovering and changing habitual responses that block the learning of mathematics. Math autobiography, math diary, guided images, relaxation techniques; experiencing success in mathematics through selected topics including graphing, functions, area and perimeter, word problems, logic problems, strategy games, spatial visualization and calculators. This is a pass/no pass course.

## ARTICULATION and CERTIFICATE INFORMATION

Associate Degree:

CSU GE:

IGETC:

CSU TRANSFER:

Not Transferable

UC TRANSFER:

Not Transferable

## PREREQUISITES:

## COREQUISITES:

## STUDENT LEARNING OUTCOMES:

1. To become aware of and change habitual responses that block the learning of mathematics.
2. To develop the confidence needed to handle stressful mathematics situations.
3. To learn some general strategies for approaching mathematical problems.
4. To analyze one's thoughts, feelings, and physical responses when confronted by mathematical situations.
5. To convert debilitating math anxiety into facilitating math anxiety by integrating the following behavioral strategies into one's repertoire of responses to mathematical situations:
  - a) relaxation techniques
  - b) constructive use imagery
  - c) use of a "discount log"; use of a math diary
  - d) general strategies such as working backwards, using pictures, using guess tables, using charts, and simplification
6. To reevaluate one's past experiences in mathematics as a result of feeling successful in math through: graphing and function tables; solving area and perimeter problems; work problems; spatial relations; logic problems; statistics problems, & use of the calculator.
7. To change one's self-image about one's ability to succeed in math as a result of synthesizing mathematical success experiences with new behavioral repertoires when confronted by mathematical situations.

## TOPICS AND SCOPE:

Inactive Course: 12/08/2008

- 1 1 A. Instructor's Autobiography  
B. Cooperative Solving of Logic Problems in Groups
- 2 1 A. Students Share Math Autobiographies in Groups  
B. Safeplace Guided Imagery and Discussion  
C. Barriers to Learning Guided Imagery & Discussion
- 3 1 A. Discuss Math Diary #1  
B. Discuss Constructive Self-Talk Sheet  
C. Discuss "Mathophobia" Article

- 4 1 A. Sentence Completion Exercise & Discussion  
 B. Relaxation Induction
- 5 1 A. Graphing  
 B. Functions
- 6 1 A. Discuss Math Diary #2  
 B. Homework Discussion
- 7 1 A. Relaxation Induction with Six Main Scenes  
 B. "Discount Log" Discussion
- 8 1 A. "A Glorious Day" Worksheet & Discussion
- 9 1 A. Discussion of "Sample Math Problems" worksheet
- 10 1 A. Instant Log Worksheet & Discussion  
 B. Area & Perimeter
- 11 1 A. Area on Geoboards
- 12 1 A. Sample Statistics and Probability Problems
- 15 1 A. Strategy Games
- 16 1 A. Spatial Relationships
- 17 1 A. Calculator  
 1) Order of Operations  
 2) Constant Feature  
 3) Percent Key
- 18 1 A. Calculator  
 1) Memory Key  
 2) Number Pattern Worksheet  
 B. Course Summary and Evaluation
- WEEK 1 \* Prepare Math Autobiographies
- WEEK 2 \* Prepare Math Diary #1; Read "Mathophobia" Article
- WEEK 3 \* Prepare Math Diary #2
- WEEK 4 \* Practice Relaxation Techniques 20 Min/day
- WEEK 5 \* Text Worksheets 2.1-2.9
- WEEK 6 \* Text Worksheets 2.10-2.18
- WEEK 7 \* Practice relaxation induction daily; keep discount log on a daily basis.
- WEEK 8 \* Practice relaxation techniques; keep diary of "self-discounts"
- WEEK 9 \* Practice relaxation techniques; keep diary of "self-discounts"
- WEEK 10 \* Text Worksheets 4.1-4.9
- WEEK 11 \* Text Worksheets 4.10-4.19
- WEEK 12 \* Text Worksheets 6.1-6.7
- WEEK 13 \* Text Worksheets 5.1-5.10
- WEEK 14 \* Text Worksheets 7.1 and problems 1-7
- WEEK 15 \* Text Worksheet 7.2
- WEEK 16 \* Text pages 266 through 273
- WEEK 17 \* Text Worksheets 3.1-3.4
- WEEK 18 \* Text worksheets 3.5-3.7
- COURSE OBJECTIVES:**
- WEEK 1 \*\* To practice logical thinking, organizing data, ordering, predicting and checking, and cooperating.
- WEEK 2 \*\* 1. To become aware of and change habitual responses that block the learning of Mathematics.
- \*\* 2. To experience that one is not alone in

feeling "math anxiety."

WEEK 3 \*\* Same as 1 & 2 in week 2

WEEK 4 \*\* 3. To convert debilitating math anxiety into facilitating math anxiety.

WEEK 5 \*\* 4. To experience success in mathematics through coordinate graphing & functions.

WEEK 6 \*\* Same as 1 and 4 above. (see week 2 & 5)

WEEK 8 \*\* Same as 1 and 3 above.

WEEK 9 \*\* Same as 1 and 3 above.

WEEK 10 \*\* To experience success in math through area and perimeter problems; also, same as 1 & 3 above

WEEK 11 \*\* To experience success in math through correctly solving area problems.

WEEK 12 \*\* To experience success in math through correctly solving statistics and probability problems.

WEEK 13 \*\* To experience success in math through solving word problems

WEEK 14 \*\* To experience success in math through logic problems

WEEK 15 \*\* To experience success in math through strategy games

WEEK 16 \*\* To experience success in math through succeeding at spatial relationships problems.

WEEK 17 \*\* To experience success in Math through succeeding with the calculator.

WEEK 18 \*\* To experience success in math through succeeding with the calculator; to recognize relationships

#### METHODS OF INSTRUCTION:

Lecture/Discussion/Small Group Work

#### REPRESENTATIVE TEXTBOOKS:

Langbort, C. & Thompson, V, <sup>u</sup>Building Success in Math<sup>s</sup>, Wadsworth, Belmont, CA 1985.

Reference Materials: "Mathophobia: Some Personal Speculations," article by Mitchell Lazarus, Educational Development Center, Newton, Mass.

#### SUPPLEMENTAL DATA:

Basic Skills: B

Classification: B

Noncredit Category: Y

Cooperative Education:

Program Status: 2 Stand-alone

Special Class Status: N

CAN:

CAN Sequence:

CSU Crosswalk Course Department:

CSU Crosswalk Course Number:

Prior to College Level: C

Non Credit Enhanced Funding: N

Funding Agency Code: Y

In-Service: N

Occupational Course: E

Maximum Hours:

Minimum Hours:

Course Control Number: CCC000456093

Sports/Physical Education Course: N

Taxonomy of Program: 170100