

Appendix V

Two-Year Mathematics Questionnaire



SURVEY OF UNDERGRADUATE PROGRAMS IN THE MATHEMATICAL SCIENCES

General Instructions

As part of a random sample, your department has been selected to participate in the CBMS2005 National Survey, the importance of which has been endorsed by all of our major professional societies. Please read the instructions in each section carefully and complete all of the pertinent items as indicated.

If your college does not have a departmental or divisional structure, consider the group of all mathematics instructors to be the "mathematics department" for the purpose of this survey.

Because some campuses are part of a multi-campus two-year college, special instructions may apply. Please consult the cover letter mailed with this questionnaire. If that letter asks you to report on the entire multi-campus system to which you may belong, please check this box and report data for the entire system. If you are NOT asked in that letter to report on your entire multi-campus system, then do not include data for branches or campuses of your college that are geographically or budgetarily separate from yours.

This questionnaire should be completed by the person who is directly in charge of the mathematics program or department on your campus.

Report on all of your courses and instructors that fall under the general heading of the mathematics program or department. Include all mathematics and statistics courses taught within your mathematics program or department.

We have classified your department as belonging to a two-year college, to a college or campus within a two-year system, or to a two-year branch of a university system. If this is not correct, please contact Stephen Rodi at the email address or telephone number given below.

If you have any questions, please contact Stephen Rodi, Associate Director for Two-Year Colleges, by email at srodi@austincc.edu or by phone at 512-223-3301.

Please return your completed questionnaire by October 15, 2005 in the enclosed envelope to:

**CBMS Survey
UNC Survey Research Unit
730 Martin Luther King Boulevard, Suite 103
CB #2400, UNC-CH
Chapel Hill, NC 27599-2400**

Please retain a copy of your responses to this questionnaire in case questions arise.

A. General Information

PLEASE PRINT CLEARLY

A1. Name of campus: _____

A2. Name of your department: _____

A3. Mailing address of the multi-campus organization to which your campus belongs (if any):

A4. We have classified your department as belonging to a two-year college or to a college campus within a two-year college system, or to a two-year branch of a university system. Do you agree?

Yes (1) → go to the next question.

No (2) → please contact Stephen Rodi, Survey Associate Director, by email (srodi@austincc.edu) or by phone (512-223-3301) before proceeding any further.

A5. What is the structural unit (= academic discipline group) that most directly administers the mathematics program on your campus or (if you checked the box in paragraph three on page one) for your system? (Check only one of the following boxes.)

- | | at my
campus | at the district or
multi-campus system
level named in A3 |
|---|------------------------------|--|
| a) Mathematics Department | <input type="checkbox"/> (1) | <input type="checkbox"/> (2) |
| b) Mathematics and Science Department or Division | <input type="checkbox"/> (3) | <input type="checkbox"/> (4) |
| c) Other Department or Division Structure | <input type="checkbox"/> (5) | <input type="checkbox"/> (6) |
| d) None of the above | | <input type="checkbox"/> (7) |

A6. To help us project enrollment for the current academic year (2005–2006), please give the following enrollment figures for the previous academic year (2004–2005).

- a) Fall 2004 total student enrollment in your mathematics program (1)
- b) Entire academic year 2004–2005 enrollment in your mathematics program (2)
- c) Calculus II in Winter/Spring 2005 total enrollment (3)
- d) Calculus II in Winter/Spring 2005 total number of sections (4)

A. General Information (cont.)

A7. Are any of the developmental/remedial mathematics courses at your college administered separately from the mathematics department/program?

Yes (1)

No (2)

A8. Your name or contact person
in your department:

A9. Your email address or contact
person's email address:

A10. Your phone number or contact
person's phone number, including
area code:

A11. Campus mailing address:

B. Mathematics Faculty in the Mathematics Department/Program (Fall 2005)

- If you are part of a multi-campus college, please consult the third paragraph on page 1 before proceeding.
- Underlined faculty categories defined in this section will be used in later sections.

B1. For Fall 2005, what is the **total number of your full-time mathematics faculty**, both permanent and temporary, including those on leave or sabbatical?

Number of full-time mathematics faculty

B2. Of the number in B1, how many are tenured, tenure-eligible, or on your permanent staff (including faculty who are on leave or sabbatical)? We will refer to these as "**permanent full-time faculty**".

Number tenured, tenure-eligible, or on permanent staff

B3. Give the number of "**other full-time faculty**" by computing B1 minus B2

B4. For the **permanent full-time faculty** reported in B2,

a) give the required teaching assignment in weekly contact hours (1)

b) give the maximum percentage of the weekly teaching assignment in B4(a) that can be met by teaching distance-learning classes (= classes where at least half the students receive the majority of instruction by technological or other methods where the instructor is not physically present) (2)

c) give the number of office hours required weekly in association with the teaching assignment in B4(a) (3)

B5. Of the **permanent full-time faculty** reported in B2, how many teach extra hours for extra pay at your campus or within your organization or at other schools?

a) Number who teach extra hours for extra pay at your campus or within your organization . (1)

b) Number who teach extra hours for extra pay at other schools (2)

B6. Of the **permanent full-time faculty** reported in B5(a), how many extra hours per week do they teach?

a) Number who teach 1–3 hours extra weekly (1)

b) Number who teach 4–6 hours extra weekly (2)

c) Number who teach 7 or more hours extra weekly (3)

B. Mathematics Faculty in the Mathematics Department/Program (Fall 2005) cont.

B7. For Fall 2005, what is the number of your **part-time mathematics faculty**? (Note: None of these were reported above.)

- a) Number of **part-time mathematics faculty paid by your college** (1)
- b) Number of **part-time faculty paid by a third party**, such as a school district paying faculty who teach dual-enrollment courses (= courses taught in high school by high school teachers for which students may obtain high school credit and simultaneous college credit through your institution) (2)
- c) **Total number of part-time faculty** (add B7(a) and B7(b) to get total) (3)

B8. How many **part-time faculty** in B7(a) (those paid by your college) teach six or more hours per week?

Number in B7(a) teaching six or more hours/week

B9. Of the **part-time faculty** reported in B7(a) (those paid by your college), give the number who are:

- a) employed full-time in a high school (1)
- b) employed full-time in another two-year college (2)
- c) employed full-time in another department of your campus or your larger organization ... (3)
- d) employed full-time in a four-year college or university (4)
- e) employed full-time in industry or other business (5)
- f) graduate students (6)
- g) not graduate students and not employed full-time anywhere (7)

B10. Are office hours required by college policy for the **part-time faculty** reported in B7(a) (those paid by your college)?

- Yes (1)
- No (2)

B11. Is the per contact hour or per course pay scale for the **part-time faculty** reported in B7(a) (those paid by your college) the same as the per contact hour or per course "extra hours" pay scale for **full-time faculty** reported in B5(a) who teach extra hours for extra pay?

- Yes (1)
- No, part-timers paid more ... (2)
- No, part-timers paid less (3)

C. Mathematics Courses (Fall 2005)

The following instructions apply throughout **Section C**. Read them carefully before you begin filling out the tables.

- If you are part of a multi-campus college, please consult the third paragraph on page 1 before proceeding.
- In this section, do **not** include courses taught in other departments, learning centers, or developmental/remedial programs separate from your mathematics program or department.
- Read the row and column labels carefully. If the titles of courses listed below do not coincide exactly with yours, use your best judgment about where to list your courses. List each course only **once**. Note that the **part-time faculty** in Column (6) are those reported in B7(a) (part-time faculty paid by your college). Column (6) should **not** include any of your full-time faculty who teach an overload section.
- If a course is **not** taught at your campus during the fall term or if it is never taught at your campus, leave the cell blank.
- Do not include dual-enrollment sections offered on a high school campus for simultaneous high school and college credit through your institution.

♦Cells left blank will be interpreted as zeros												
LIST THE NUMBER OF SECTIONS FROM COLUMN (4)												
Name of Course (or equivalent)	Total number of students enrolled Fall 2005 via distance learning ^a	Total number of on-campus students enrolled Fall 2005 ^b	Total number of on-campus sections Fall 2005 ^b	that have enrollment above 30	that are taught by part-time faculty ^c	that use graphing calculators	that include a component such as reports or projects	that require computer assignments	that assign group projects	that use commercial or locally produced online-response homework or testing systems	that are taught mostly by the standard lecture method	if not offered in Fall 2005, was this course either offered in 2004-2005 or scheduled for Winter/Spring 2006? Y(es)/N(o)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
C1. Arithmetic/Basic Mathematics												
C2. Pre-Algebra												
C3. Elementary Algebra (high school level)												
C4. Intermediate Algebra (high school level)												
C5. Geometry (high school level)												

a At least half of the students in the section receive the majority of their instruction via Internet, TV, computer, programmed instruction, correspondence courses, or other method where the instructor is **not** physically present.
 b These students or sections are **not** included in column (2).
 c Do **not** include full-time mathematics faculty teaching an overload section in this column. Include only part-time faculty, reported in B7(a), those paid by your college.

C. Mathematics Courses (Fall 2005) cont.

Name of Course (or equivalent)	Total number of students enrolled Fall 2005 via distance learning ^a	Total number of on-campus students enrolled Fall 2005 ^b	Total number of on-campus sections Fall 2005 ^b	LIST THE NUMBER OF SECTIONS FROM COLUMN (4)							if not offered in Fall 2005, was this course either offered in 2004–2005 or scheduled for Winter/Spring 2006? Y(es)/N(o) (13)	
				that have enrollment above 30	that are taught by part-time faculty ^c	that use graphing calculators	that include a writing component such as reports or projects	that require computer assignments	that assign group projects	that use commercial or locally produced online- response homework or testing systems		that are taught mostly by the standard lecture method
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	
C6. College Algebra (level beyond Intermediate Algebra)												
C7. Trigonometry												
C8. College Algebra and Trigonometry, combined												
C9. Introduction to Mathematical Modeling												
C10. Precalculus/Elementary Functions/Analytic Geometry												

a At least half of the students in the section receive the majority of their instruction via internet, TV, computer, programmed instruction, correspondence courses, or other method where the instructor is **not** physically present.
 b These students or sections are **not** included in column (2).
 c Do **not** include full-time mathematics faculty teaching an overload section in this column. Include only part-time faculty, reported in B7(a), those paid by your college.

C. Mathematics Courses (Fall 2005) cont.

Name of Course (or equivalent)	Total number of students enrolled Fall 2005 via distance learning ^a	Total number of on-campus students enrolled Fall 2005 ^b	Total number of on-campus sections Fall 2005 ^b	LIST THE NUMBER OF SECTIONS FROM COLUMN (4)								
				that have enrollment above 30	that are taught by part-time faculty ^c	that use graphing calculators	that include a writing component such as reports or projects	that require computer assignments	that assign group projects	that use commercial or locally produced online- response homework or testing systems	that are taught mostly by the standard lecture method	if not offered in Fall 2005, was this course either offered in 2004–2005 or scheduled for Winter/Spring 2006? Y(es)/N(o) (13)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
C11. Calculus I (typically for mathematics, physics, engineering majors)												
C12. Calculus II (typically for mathematics, physics, engineering majors)												
C13. Calculus III												
C14. Non-Mainstream Calculus I ^d												
C15. Non-Mainstream Calculus II ^d												
C16. Differential Equations												
C17. Linear Algebra												
C18. Discrete Mathematics												

a At least half of the students in the section receive the majority of their instruction via Internet, TV, computer, programmed instruction, correspondence courses, or other method where the instructor is **not** physically present.

b These students or sections are **not** included in column (2).

c Do **not** include full-time mathematics faculty teaching an overload section in this column. Include only part-time faculty, reported in B7(a), those paid by your college.

d Typically for business, life sciences, and social science majors.

C. Mathematics Courses (Fall 2005) cont.

◆Cells left blank will be interpreted as zeros

		LIST THE NUMBER OF SECTIONS FROM COLUMN (4)										
Name of Course (or equivalent)	Total number of students enrolled Fall 2005 via distance learning ^a	Total number of on-campus students enrolled Fall 2005 ^b	Total number of on-campus sections Fall 2005 ^b	that have enrollment above 30	that are taught by part-time faculty ^c	that use graphing calculators	that include a writing component such as reports or projects	that require computer assignments	that assign group projects	that use commercial or locally produced online- response homework or testing systems	that are taught mostly by the standard lecture method	if not offered in Fall 2005, was this course either offered in 2004–2005 or scheduled for Winter/Spring 2006? Y(es)/N(o) (13)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
C19. Elementary Statistics (with or without probability) ^d												
C20. Probability (with or without statistics) ^d												
C21. Finite Mathematics												
C22. Mathematics for Liberal Arts/ Math Appreciation												
C23. Mathematics for Elementary School Teachers												

a At least half of the students in the section receive the majority of their instruction via Internet, TV, computer, programmed instruction, correspondence courses, or other method where the instructor is **not** physically present.

b These students or sections are **not** included in column (2).

c Do **not** include full-time mathematics faculty teaching an overload section in this column. Include only part-time faculty, reported in B7(a), those paid by your college.

d Do **not** count the same course in both lines C19 and C20.

C. Mathematics Courses (Fall 2005) cont.

Name of Course (or equivalent)	Total number of students enrolled Fall 2005 via distance learning ^a	Total number of on-campus students enrolled Fall 2005 ^b	Total number of on-campus sections Fall 2005 ^b	LIST THE NUMBER OF SECTIONS FROM COLUMN (4)								if not offered in Fall 2005, was this course either offered in 2004-2005 or scheduled for Winter/Spring 2006? Y(es)/N(o) (13)
				that have enrollment above 30	that are taught by part-time faculty ^c	that use graphing calculators	that include a writing component such as reports or projects	that require computer assignments	that assign group projects	that use commercial or locally produced online- response homework or testing systems	that are taught mostly by the standard lecture method	
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)
C24. Business Mathematics (not a transfer course to four-year colleges)												
C25. Business Mathematics (transfer course)												
C26. Non-Calculus-Based Technical Mathematics (not a transfer course)												
C27. Calculus-Based Technical Mathematics (transfer course)												
C28. Other Mathematics Courses												

a At least half of the students in the section receive the majority of their instruction via Internet, TV, computer, programmed instruction, correspondence courses, or other method where the instructor is **not** physically present.

b These students or sections are **not** included in column (2).

c Do **not** include full-time mathematics faculty teaching an overload section in this column. Include only part-time faculty, reported in B7(a), those paid by your college.

D. Faculty Educational Level, by Subject Field

D1. For the **permanent full-time faculty** (including those on leave) reported in B2, complete the following table showing the area of each faculty member's highest earned degree. The total of all faculty listed in this table should equal the number reported in B2.

- If you are part of a multi-campus college, please consult the third paragraph on page 1 before proceeding.

HIGHEST DEGREE	MAJOR FIELD OF HIGHEST DEGREE			
	MATHEMATICS (1)	STATISTICS (2)	MATHEMATICS EDUCATION (3)	OTHER (4)
DOCTORATE (1)				
MASTERS (2)				
BACHELOR'S (3)				
LESS THAN BACHELOR'S (4)				

D. Faculty Educational Level, by Subject Field cont.

D2. For the **part-time faculty** reported in B7(c) (including those paid by your college and those paid by a third party), complete the following table showing the area of each faculty member's highest earned degree. The total of all faculty listed in this table should equal the number reported in B7(c).

- If you are part of a multi-campus college, please consult the third paragraph on page 1 before proceeding.

HIGHEST DEGREE	MAJOR FIELD OF HIGHEST DEGREE			
	MATHEMATICS (1)	STATISTICS (2)	MATHEMATICS EDUCATION (3)	OTHER (4)
DOCTORATE (1)				
MASTER'S (2)				
BACHELOR'S (3)				
LESS THAN BACHELOR'S (4)				

E. Faculty by Gender and Ethnicity/Race

Instructions:

- If you are part of a multi-campus college, please consult the third paragraph on page 1 before proceeding.
- For the **permanent full-time faculty** (including those on leave) reported in B2 and for the **part-time faculty** reported in B7(a) (those paid by your college), complete the following table giving data about gender and ethnicity/race.
- The total of full-time faculty should equal the figure given in B2. The total of part-time faculty should equal the figure reported in B7(a).

ETHNIC/RACIAL STATUS AND GENDER	PERMANENT FULL-TIME FACULTY FROM B2		PART-TIME FACULTY FROM B7(a)
	AGE < 40 (1)	AGE ≥ 40 (2)	
AMERICAN INDIAN, ESKIMO, ALEUT	MALE (1)		
	FEMALE (2)		
ASIAN, PACIFIC ISLANDER	MALE (3)		
	FEMALE (4)		
BLACK OR AFRICAN AMERICAN (NON-HISPANIC)	MALE (5)		
	FEMALE (6)		
MEXICAN AMERICAN, PUERTO RICAN, OR OTHER HISPANIC	MALE (7)		
	FEMALE (8)		
WHITE (NON-HISPANIC)	MALE (9)		
	FEMALE (10)		
STATUS NOT KNOWN OR OTHER	MALE (11)		
	FEMALE (12)		

G. Faculty Employment and Mobility

• If you are part of a multi-campus college, please consult the third paragraph on page 1 before proceeding.

G1. How many of the **permanent full-time faculty** members in B2 were newly appointed to a permanent full-time position this year (2005–2006)?

Number of faculty newly appointed on a permanent full-time basis

if “zero” **—————>** go to G5.

if “1 or more” **—————>** go to G2.

G2. Of the faculty members counted in G1, how many had the following as their main activity in the academic year preceding their appointment? Report only **one** main activity per person. The total in G2 should equal the number reported in G1.

- a) Attending graduate school (1)
- b) Teaching in a four-year college or university (2)
- c) Teaching in another two-year college (3)
- d) Teaching in a secondary school (4)
- e) Part-time or full-time temporary employment by your college (5)
- f) Nonacademic employment (6)
- g) Unemployed (7)
- h) Status unknown (8)

G3. How many of the faculty reported in G1 had ever taught at your campus or in your larger organization either part-time or full-time?

G. Faculty Employment and Mobility cont.

G4. For each **permanent full-time faculty** member reported in G1, give the following data. Add more lines at the bottom of the table if necessary. For each new hire complete an entire row.

	Age (1)	Gender (2)	Ethnicity/Race (3)	Highest Degree Earned (Bachelor's, Master's, or Doctorate) (4)
New Hire #1 (1)				
New Hire #2 (2)				
New Hire #3 (3)				
New Hire #4 (4)				
New Hire #5 (5)				
New Hire #6 (6)				

G5. How many of your faculty who were **permanent full-time faculty** in the previous year (2004–2005) are no longer part of your **permanent full-time faculty**?

G6. Give the number of **permanent full-time faculty** (total for G6 should equal number reported in G5) who:

- a) died while in full-time service (1)
- b) left full-time service due to retirement (2)
- c) left to teach at a four-year college or university (3)
- d) left to teach at another two-year college (4)
- e) left to teach at a secondary school (5)
- f) left for a nonacademic position (6)
- g) left to attend graduate school (7)
- h) other (specify) _____ (8)
- i) unknown (9)

H. Professional Activities of Permanent Full-Time Faculty

• If you are part of a multi-campus college, please consult the third paragraph on page 1 before proceeding.

H1. Is some form of continuing education or professional development required of your **permanent full-time faculty** reported in B2?

Yes (1) → go to H2.

No (2) → go to Section I.

H2. Estimate the number of **permanent full-time faculty** reported in B2 who fulfill the requirement in H1 in one or more of the following ways:

- a) Activities provided by your college or organization at one of its locations (1)
- b) Participation in professional association meetings and minicourses or other professional association activities (2)
- c) Publishing expository or research articles or textbooks (3)
- d) Continuing graduate education (4)
- e) Unknown (5)

I. Resources Available to Part-Time Mathematics Faculty

• If you are part of a multi-campus college, please consult the third paragraph on page 1 before proceeding.

I-1. How many of the **part-time faculty** paid by your college (reported in B7(a)) have campus office space that contains:

- a) their own individual desk? (1)
- b) a desk shared with one other person? (2)
- c) a desk shared with more than one other person? (3)

I-2. How many of the **part-time faculty** paid by your college (reported in B7(a)) have no campus office space at all?

• Note: The sum of all entries in I-1 and I-2 should equal the number reported in B7(a).

I-3. How many of the **part-time faculty** paid by your college (reported in B7(a)) have:

- a) a computer in their campus office? (1)
- b) no computer in their campus office but shared computers nearby? (2)
- c) no convenient access, or no access at all, to a computer at your college? (3)

I-4. For which mathematics faculty do you periodically evaluate teaching? Check all that apply.

- a) All **permanent full-time faculty** (reported in B2) (1)
- b) All **part-time faculty** paid by your college (reported in B7(a)) (2)

If you checked either I-4(a) or I-4(b), then \longrightarrow go to I-5.

If you checked neither I-4(a) nor I-4(b), then \longrightarrow go to J.

Mathematics Questionnaire

I. Resources Available to Part-Time Mathematics Faculty cont.

I-5. Check all evaluation methods that are used for **part-time faculty** paid by your college (reported in B7(a)) or for **permanent full-time faculty** (reported in B2).

EVALUATION METHOD	Part-Time Faculty in B7(a) (1)	Full-Time Faculty in B2 (2)
a) Observation of classes by other faculty members or department chair		
b) Observation of classes by division head (if different from chair) or other administrator		
c) Evaluation forms completed by students		
d) Evaluation of written course material such as lesson plans, syllabi, or exams		
e) Self-evaluation such as teaching portfolios		
f) Other (specify) _____		

J. Academic Support and Enrichment Opportunities for Students

• If you are part of a multi-campus college, please consult the third paragraph on page 1 before proceeding.

J1. Does your department or college offer a mathematics placement program for entering students?

Yes (1) → go to J2.

No (2) → go to J7.

J2. What is the source of the placement test(s)? (Check all that apply.)

a) Test written by your department (1)

b) Test provided by Educational Testing Service (ETS) (2)

c) Test provided by American College Testing Program (ACT) (3)

d) Test provided by professional association (4)

Name of professional association _____

e) Test provided by other external source (5)

Name of external source _____

J3. Is the placement examination usually required for first-time enrollees?

Yes (1) → go to J4.

No (2) → go to J7.

J4. Is it usually required that first-time enrollees discuss the results of the placement test with an advisor or a counselor before registering for their first mathematics course?

Yes (1)

No (2)

J5. Is placement in the student's first mathematics course mandatory based on:

Placement test score alone (1)

Placement test score and other information. . . . (2)

Not mandatory (3)

J. Academic Support and Enrichment Opportunities for Students cont.

J6. Does your department periodically assess the effectiveness of the mathematics placement test?

Yes (1)

No (2)

J7. Does your department or college operate a mathematics lab or tutoring center?

Yes (1) → go to J8.

No (2) → go to J9.

J8. Check all services available to students through your mathematics lab or tutoring center.

a) Computer-aided instruction (1)

b) Computer software such as computer algebra packages or statistical packages (2)

c) Internet resources (3)

d) Media such as CDs or DVDs (4)

e) Organized small group tutoring or study sessions (5)

f) Tutoring by students (6)

g) Tutoring by paraprofessional staff (7)

h) Tutoring by part-time mathematics faculty (8)

i) Tutoring by full-time mathematics faculty (9)

j) Other mathematics lab or tutoring center services (specify) _____ (10)

J. Academic Support and Enrichment Opportunities for Students cont.

J9. Check all opportunities available to your mathematics students.

- | | | |
|--|--------------------------|------|
| a) Honors sections of mathematics courses | <input type="checkbox"/> | (1) |
| b) Mathematics club | <input type="checkbox"/> | (2) |
| c) Special mathematics programs to encourage women | <input type="checkbox"/> | (3) |
| d) Special mathematics programs to encourage minorities | <input type="checkbox"/> | (4) |
| e) Opportunities to compete in mathematics contests | <input type="checkbox"/> | (5) |
| f) Special mathematics lectures/colloquia not part of a mathematics club | <input type="checkbox"/> | (6) |
| g) Mathematics outreach opportunities in local K–12 schools | <input type="checkbox"/> | (7) |
| h) Opportunities to participate in undergraduate research in mathematics | <input type="checkbox"/> | (8) |
| i) Independent study opportunities in mathematics | <input type="checkbox"/> | (9) |
| j) Assigned faculty advisors in mathematics | <input type="checkbox"/> | (10) |
| k) Other (specify) _____ | <input type="checkbox"/> | (11) |

K. Dual-Enrollment Courses

- If you are part of a multi-campus college, please consult the third paragraph on page 1 before proceeding.
- In this questionnaire we use the term “dual-enrollment courses” to mean courses taught **in high school by high school teachers** for which students may obtain high school credit and simultaneous college credit through your institution.

K1. Does your department participate in any dual-enrollment program of the type defined above?

Yes (1) → go to K2.
 No (2) → go to K6.

K2. Please complete the following table concerning your dual-enrollment program (as defined above) for the spring term of 2005 and for the current fall term of 2005.

Course	Total Dual Enrollments Last Term = Spring 2005 (1)	Number of Dual-Enrollment Sections Last Term = Spring 2005 (2)	Total Dual Enrollments This Term = Fall 2005 (3)	Number of Dual-Enrollment Sections This Term = Fall 2005 (4)
a) College Algebra				
b) Precalculus				
c) Calculus I				
d) Statistics				
e) Other				

K3. For the dual-enrollment courses in K2, which of the following are the responsibility of your department?

	Never Our Responsibility (1)	Sometimes Our Responsibility (2)	Always Our Responsibility (3)
a) Choice of textbook			
b) Design/approval of syllabus			
c) Design of final exam			
d) Choice of instructor			

K. Dual-Enrollment Courses cont.

K4. Does your department have a teaching evaluation program in which its own part-time department faculty (see B7(a)) are required to participate?

Yes (1) → go to K5.

No (2) → go to K6.

K5. Are instructors in the dual-enrollment courses reported in K2 required to participate in the teaching evaluation program for part-time departmental faculty?

Yes (1)

No (2)

K6. Does your department assign any of its own full-time or part-time faculty (faculty paid by your college as reported in either B1 or B7(a)) to teach courses on a high school campus for which high school students may receive both high school and college credit through your institution?

Yes (1) → go to K7.

No (2) → go to Section L.

K7. Please complete the following table describing high school student enrollments as taught by your faculty on a high school campus. See K6.

Course	Total Dual Enrollments Last Term = Spring 2005 (1)	Number of Dual-Enrollment Sections Last Term = Spring 2005 (2)	Total Dual Enrollments This Term = Fall 2005 (3)	Number of Dual-Enrollment Sections This Term = Fall 2005 (4)
a) College Algebra				
b) Precalculus				
c) Calculus I				
d) Statistics				
e) Other				

K8. For the courses described in K6 taught by your faculty, which of the following are the responsibility of your department?

	Never Our Responsibility (1)	Sometimes Our Responsibility (2)	Always Our Responsibility (3)
a) Choice of textbook			
b) Design/approval of syllabus			
c) Design of final exam			

L. Mathematics Preparation of K–12 Teachers

• If you are part of a multi-campus college, please consult the third paragraph on page 1 before proceeding.

L1. Does your department have a faculty member assigned to coordinate mathematics program courses for pre-service elementary school teachers?

Yes (1)

No (2)

L2. Other than the course “Mathematics for Elementary School Teachers” reported on line C23, do you designate any sections of your other mathematics program courses as “especially designed for pre-service elementary school teachers”?

Yes (1)

No (2)

L3. Which of the following groups can meet their entire mathematics course or licensure requirement for teaching via an organized program in your department? Consider “pre-service” and “career switchers” as distinct categories. “Career switchers” usually are post-baccalaureate older adults returning for teaching licensure after a non-teaching career and often under state-approved special licensure rules.

a) Pre-service elementary school teachers (1)

b) Pre-service middle school teachers (2)

c) Pre-service secondary school teachers (3)

d) In-service elementary school teachers (4)

e) In-service middle school teachers (5)

f) In-service secondary school teachers (6)

g) Career switchers moving to elementary school teaching (7)

h) Career switchers moving to middle school teaching (8)

i) Career switchers moving to secondary school teaching (9)

L4. Does your institution offer pedagogical courses in mathematics for teacher licensure?

Yes, in our mathematics department (1)

Yes, elsewhere in the institution (2)

No (3)

L. Mathematics Preparation of K–12 Teachers cont.

L5. How many mathematics courses (including general education requirements, if any) are required of students seeking their entire elementary school teacher licensure at your institution?

- a) We have no students seeking elementary school teaching licensure entirely from us (1)
- b) Number of mathematics courses required for early elementary grade licensure. (2)
- c) Number of mathematics courses required for later elementary grade licensure (3)

L6. How do students seeking their entire secondary school teaching licensure at your institution learn about the history of mathematics?

- a) We have no students seeking secondary school teaching licensure entirely from us (1)
- b) We offer a course in the history of mathematics which students seeking secondary school teaching licensure are required to take (2)
- c) There is no required mathematics history course for students seeking secondary school teaching licensure but these students learn mathematics history from other courses they are required to take (2)
- d) Students in our secondary licensure program are not required to learn about mathematics history (4)

M. Issues of Professional Concern

M1. Below are problems often cited by two-year college mathematics departments. Please read each item carefully and check the box in each row that best reflects your view. (Check only **one box per row.**)

	Not a problem for us (1)	Minor problem for us (2)	Moderate problem for us (3)	Major problem for us (4)
a) Maintaining vitality of faculty	<input type="checkbox"/> (1)	<input type="checkbox"/> (2)	<input type="checkbox"/> (3)	<input type="checkbox"/> (4)
b) Dual-enrollment (high school and college credit) courses ^a	<input type="checkbox"/> (5)	<input type="checkbox"/> (6)	<input type="checkbox"/> (7)	<input type="checkbox"/> (8)
c) Staffing statistics courses	<input type="checkbox"/> (9)	<input type="checkbox"/> (10)	<input type="checkbox"/> (11)	<input type="checkbox"/> (12)
d) Unrealistic student understanding of the demands of college work	<input type="checkbox"/> (13)	<input type="checkbox"/> (14)	<input type="checkbox"/> (15)	<input type="checkbox"/> (16)
e) Need to use part-time faculty for too many courses	<input type="checkbox"/> (17)	<input type="checkbox"/> (18)	<input type="checkbox"/> (19)	<input type="checkbox"/> (20)
f) Faculty salaries too low	<input type="checkbox"/> (21)	<input type="checkbox"/> (22)	<input type="checkbox"/> (23)	<input type="checkbox"/> (24)
g) Class sizes too large	<input type="checkbox"/> (25)	<input type="checkbox"/> (26)	<input type="checkbox"/> (27)	<input type="checkbox"/> (28)
h) Low student motivation	<input type="checkbox"/> (29)	<input type="checkbox"/> (30)	<input type="checkbox"/> (31)	<input type="checkbox"/> (32)
i) Too many students needing remediation	<input type="checkbox"/> (33)	<input type="checkbox"/> (34)	<input type="checkbox"/> (35)	<input type="checkbox"/> (36)
j) Successful progress of students through developmental courses to more advanced mathematics courses	<input type="checkbox"/> (37)	<input type="checkbox"/> (38)	<input type="checkbox"/> (39)	<input type="checkbox"/> (40)
k) Low success rate in transfer-level courses	<input type="checkbox"/> (41)	<input type="checkbox"/> (42)	<input type="checkbox"/> (43)	<input type="checkbox"/> (44)
l) Too few students who intend to transfer actually do transfer	<input type="checkbox"/> (45)	<input type="checkbox"/> (46)	<input type="checkbox"/> (47)	<input type="checkbox"/> (48)
m) Inadequate travel funds for faculty	<input type="checkbox"/> (49)	<input type="checkbox"/> (50)	<input type="checkbox"/> (51)	<input type="checkbox"/> (52)
n) Inadequate classroom facilities for teaching with technology	<input type="checkbox"/> (53)	<input type="checkbox"/> (54)	<input type="checkbox"/> (55)	<input type="checkbox"/> (56)
o) Inadequate computer facilities for part-time faculty use	<input type="checkbox"/> (57)	<input type="checkbox"/> (58)	<input type="checkbox"/> (59)	<input type="checkbox"/> (60)
p) Inadequate computer facilities for student use	<input type="checkbox"/> (61)	<input type="checkbox"/> (62)	<input type="checkbox"/> (63)	<input type="checkbox"/> (64)

^a Courses taught in high school by high school teachers for which students may obtain high school credit and simultaneous college credit through your institution.

M. Issues of Professional Concern cont.

M1. Continued

	Not a problem for us (1)	Minor problem for us (2)	Moderate problem for us (3)	Major problem for us (4)
q) Outsourcing instruction to commercial companies	<input type="checkbox"/> (65)	<input type="checkbox"/> (66)	<input type="checkbox"/> (67)	<input type="checkbox"/> (68)
r) Heavy classroom and other duties prevent personal and teaching enrichment by faculty . .	<input type="checkbox"/> (69)	<input type="checkbox"/> (70)	<input type="checkbox"/> (71)	<input type="checkbox"/> (72)
s) Curriculum alignment between high schools and college	<input type="checkbox"/> (73)	<input type="checkbox"/> (74)	<input type="checkbox"/> (75)	<input type="checkbox"/> (76)
t) Lack of curricular flexibility because of transfer requirements	<input type="checkbox"/> (77)	<input type="checkbox"/> (78)	<input type="checkbox"/> (79)	<input type="checkbox"/> (80)
u) Use of distance education ^b	<input type="checkbox"/> (81)	<input type="checkbox"/> (82)	<input type="checkbox"/> (83)	<input type="checkbox"/> (84)
v) Other (specify) _____	<input type="checkbox"/> (85)	<input type="checkbox"/> (86)	<input type="checkbox"/> (87)	<input type="checkbox"/> (88)

^b At least half of the students in the section receive the majority of their instruction via Internet, TV, computer, programmed instruction, correspondence courses, or other method where the instructor is **not** physically present.

M2. Many departments today use a spectrum of program assessment methods. Please check all that apply to your department's program assessment efforts during the last six years.

- a) We conducted a review of our mathematics program that included one or more reviewers from outside our institution (1)
- b) We asked students in our mathematics program to comment on and suggest changes in our program (2)
- c) Other departments at our institution were invited to comment on the preparation that their students received in our courses (3)
- d) Data on students' progress in subsequent mathematics courses were gathered and analyzed (4)
- e) We have a placement system for first-year students, and we gathered and analyzed data on its effectiveness (5)
- f) Our department's program assessment activities led to changes in our mathematics program (6)

M. Issues of Professional Concern cont.

The next four questions deal with general education requirements at your institution.

M3. Does your institution require all associate degree graduates to have a quantitative course as part of their general education requirements? Choose one of the following.

- a) Yes, all associate degree graduates must have such credit (1) → go to M4.
- b) Not (a), but all Associate of Arts or Associate of Science graduates must have such credit (2) → go to M4.
- c) Neither (a) nor (b) (3) → go to Section N.

M4. If you chose (a) or (b) in M3, is it true that all students (to whom the quantitative requirement applies) must fulfill it by taking a course in your mathematics department?

- Yes (1)
- No (2)

M5. Which courses in your department can be used to fulfill the general education quantitative requirement in M3?

- a) Any course in the department, including all high school-level courses (1)
- b) Intermediate Algebra (see C4) or any course beyond Intermediate Algebra (2)
- c) Not Intermediate Algebra, but any course beyond Intermediate Algebra (3)
- d) Only certain courses beyond Intermediate Algebra (4)

M6. If you chose M5(d), which of the following departmental courses can be used to fulfill the general education quantitative requirement? Check all that apply. If you did not choose M5(d), omit this question and go to Section N.

Course	Can be used
a) College Algebra and/or Precalculus	
b) Calculus (any course)	
c) Introduction to Mathematical Modeling	
d) A basic Probability and/or Statistics course	
e) A special general education course in our department not listed above	
f) Some other course(s) in our department not listed above	

N. Mathematics Enrollments Outside Your Mathematics Department/Program (Fall 2005)

Mathematics Questionnaire

Data to answer the following questions often are beyond the information normally available to a mathematics department chair. Please invest the extra effort needed to give an accurate account of all enrollments in the following courses that are **not** taught in the mathematics department/program. (Give enrollments, not the number of sections taught.)

Instructions:

- Please consult the third paragraph on page 1 before proceeding to determine whether to report on your campus or on your entire multi-campus system.
- Report all enrollments at your campus or in your multi-campus system that are **not** taught in the mathematics department/program (and so are not listed in Section C).
- Please consult appropriate sources outside the mathematics program such as schedules, registrar's data, or the heads of these programs to get accurate data on enrollments.

COURSE (1)	Occupational Programs (2)	Business (3)	Learning Center (4)	Other Dept/Division ^a (5)
N1. Arithmetic/Pre-Algebra				
N2. Elementary Algebra (high school level)				
N3. Intermediate Algebra (high school level)				
N4. Business Mathematics				
N5. Statistics/Probability				
N6. Technical Mathematics				

^a Such as a Developmental Studies Division separate from the mathematics department/program.

O. Comments and Suggestions

- O1. If you have found some question(s) difficult to interpret or answer, please let us know. We welcome comments or suggestions to improve future surveys (e.g., CBMS2010).

Thank you for completing this questionnaire. We know it was a time-consuming process. We hope the final survey report, which should be published and online in spring 2007, will be useful to you and your department.

Please retain a copy of this questionnaire in case questions arise.