



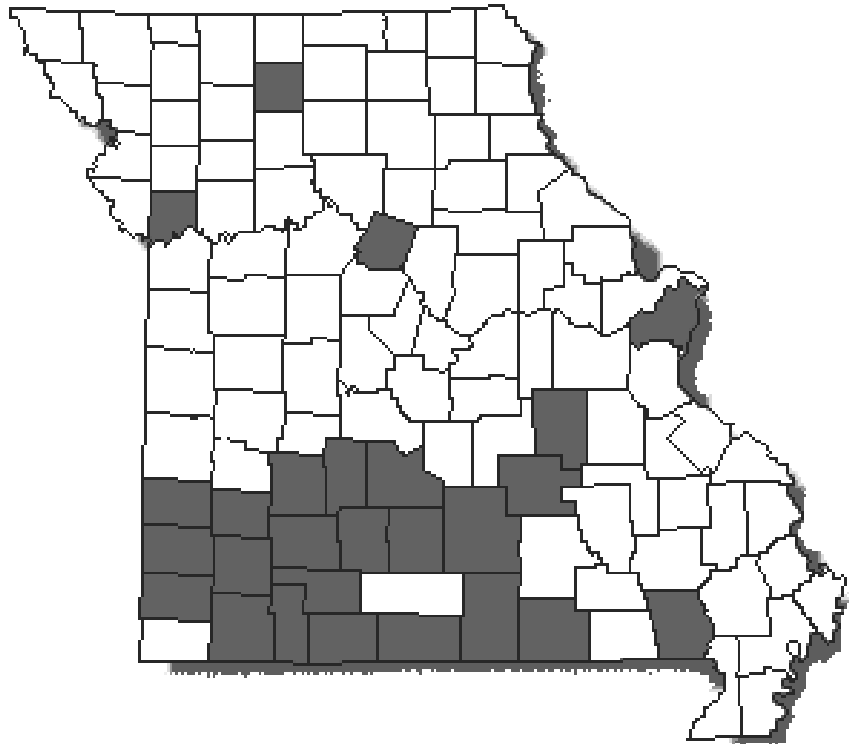
**Institute for School Improvement**  
College of Education  
Missouri State University  
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# MASTER OF ARTS IN TEACHING (MAT) 2001-2005

## Program Evaluation *Title II Teacher Quality Enhancement Initiative*

- ✓ *Preparing teachers to meet critical shortage area needs in Southwest Missouri*
- ✓ *Providing mid-career professional support to enter the teaching profession*
- ✓ *Fostering partnerships between Missouri State University and surrounding school districts*
- ✓ *Reducing teacher turnover in rural districts*
- ✓ *Supporting and nurturing beginning teachers*



**Missouri State University  
Institute for School Improvement**

## BACKGROUND

Teacher quality has long been a focus of educators and policy makers. Since the President's commission report of 1983, there has been increased attention placed on educational reform. In recent years, with the inception of No Child Left Behind (NCLB) the focus on teacher quality has intensified with researchers noting the single most important indicator of students success to be the classroom teacher. In addition to the issues surrounding teacher quality, the nation is also facing a serious teacher shortage. Often these two very important issues have forced proponents into two camps debating how best to address attracting quality candidates to the field of education and producing quality teachers.

The U.S. Department of Education's (US DOE) Teacher Quality initiatives were designed to address the preparation and placement of quality teachers and place them in high need content areas. One such program, the Ozarks Teacher Partnership Enhancement Teacher Initiative (OPTEI) is a five-year grant, October 1999 – September 2004, designed as a partnership among Missouri State University and the following rural school districts: (1) Fair Play R-II; (2) Wheaton R-III; (3) Shell Knob 78; (4) Miller R-II; (5) Cabool R-IV; and (6) Sheldon R-VIII. In addition to these districts, Study Middle school (Springfield R-XII) was also a partner in the grant.

The OPTEI grant addresses seven objectives listed below.

1. Enhance the content and pedagogical knowledge of professional education participants from within partner districts
2. Strengthen the pedagogical content knowledge of professional education faculty from four MSU colleges (i.e. Arts and Letters, Natural and Applied Science, Health and Human Services, and the College of Education)
3. Infuse technology into partner districts and professional education curriculum
4. Enhance the clinical field experiences of pre-service teachers
5. Upgrade the quality of mentoring programs for beginning teachers
- 6. Develop and implement a Master of Arts in Teaching (MAT) program to attract non-traditional candidates to the teaching profession.**
7. Support teacher recruitment and retention in partner districts

The University received an extension of the OPTEI grant for the 2004-05 academic year. The primary focus was to address goal six above, the Master of Arts in Teaching (MAT) program. The following report, prepared by the Institute for School Improvement at Missouri State University, examines data from the five Master of Arts in Teaching cohorts beginning with the 2001 cohort. This report outlines the characteristics of candidates entering the MAT program, their perceptions of the program's eight week summer course, current teaching status of candidates, and follow-up data collected from graduates and their employers.

## REVIEW OF LITERATURE

Alternative certification has been defined as a program that provides non-traditional candidates or individuals looking to change careers a way to earn a teaching license (Podgursky, 2004). The National Center for Alternative Certification divided the various alternative routes to certification into eleven classes, A through K. This classification system includes examples such as programs that involve some type of formal instruction and a period of mentoring, individualized programs in which the state, local school district, or institution of higher education is responsible for the design, programs for specific groups of individuals or those with specific qualifications, and programs in which students are completing requirements through a traditional route (Feistritzer, 2004).

Often adults who may not have been oriented toward the teaching profession during their undergraduate studies become interested in pursuing teacher certification after a period of time in the workforce. These individuals are often discouraged by the amount of course-work requirements associated with traditional teacher education programs. Alternative certification programs rely on new teaching candidates to meet the demand for teachers in under-served locations and in the areas of math and science. The advantage for the students is that they are able to circumvent some of the steps and avoid potential hurdles that traditional graduates may face (Nakai & Turley, 2003).

National predictions of the number of teachers that will be needed to fill United States public school classrooms by the year 2008 reach as high as 2.2 million (Whiting & Klotz, 2000). Such predictions, along with the current emphasis on reducing class size, have motivated several Colleges/Schools of Education to increase efforts to recruit additional teachers by providing alternative pathways to certification (King-Rice & Brent, 2002).

Several states support alternative certification programs in order to assist districts in filling high need positions with certified teachers, thus enabling many who did not graduate with a teaching degree the opportunity to enter the teaching profession (Hawk et al, 1999). Responding to teacher shortages, California has implemented an alternative certification route that takes the form of a “teaching internship” in which students are paid a full salary to begin teaching where they are mentored and fully responsible for students’ learning (McKibbin, 1999). Kentucky’s alternative program involves a combination of formal instruction with supervised classroom teaching experiences over a period of 44 weeks. This program is designed to meet the needs of experienced professionals interested in pursuing a teaching career (Stallion-Barkley, 1999). The Texas alternative program route includes classroom observation and some basic courses before the students begin an internship, as well as additional courses, all of which are usually completed within one year (Shepherd and Brown, 2003). Nevada also has a one year program which consists of courses, practica, and an internship with a mentor teacher. Courses are taught at the schools where the students are teaching, rather than being taught entirely on a college campus (Perkins et al, 2001). Mississippi’s response to the demand for teachers is a Masters of Arts in Teaching program in which students are required to obtain a teaching job before beginning the thirty credit hour program (Whiting & Klotz, 2000).

According to the *Missouri Teacher Supply & Demand Report* (Hough et al., 2000, 2001, 2002), approximately 21,000 Missouri teachers and administrators will be needed by the beginning of the 2010 academic school year, approximately one-third of the current teaching force. Hough et al., analyzed trends for filling teaching positions in Missouri and found that many teaching positions are filled with individuals who are not fully certified, substitutes, teaching subjects outside their certification areas, or by leaving positions unfilled. If such trends continue in the state, a conservative estimate is that

Missouri schools will hire only 10,239 fully certified personnel for 15,378 positions by the 2004-05 school year. If this happens, by the beginning of the 2004-05 academic school year over 5,000 Missouri classrooms (more than one of every ten) would be staffed by individuals not fully certified to teach the subject to which they are assigned (Hough, 2002).

Programs such as Missouri State University's Master of Arts in Teaching (MAT) provide career professionals who may not have chosen teaching as their original career path the opportunity to enter the classroom as teachers. The program emphasizes certifying teachers to meet critical shortage needs of area school districts, especially those in rural areas. The MAT program at Missouri State University was developed by the University's College of Education and was supported through the U.S. Department of Education Title II grant awarded in 1999. Interested candidates must complete the following requirements for admission into the MAT program:

1. *Candidates must hold a bachelor's degree in a field closely related to the area pursued in certification.*
2. *Candidates must have a transcript analysis completed by the College of Education Certification Office.*
3. *Candidates must take the appropriate Praxis II exam in the content area chosen for certification.*
4. *Candidates must submit a letter of interest, resume and letters supporting their intent to enter the program.*
5. *Candidates must apply and be admitted to the Graduate College at Missouri State University.*
6. *Candidates must interview with the University personnel charged with program operation.*

Candidates enrolled in the MAT program are offered both teacher certification and a graduate degree through an extensive site-based clinical experience that is individualized based on each student's strengths/weaknesses. The program involves an intensive eight-week summer course that focuses on the fundamental knowledge, skills, and dispositions of teaching followed by a fall semester of coursework, which includes a 75 hour practicum, and a spring semester of student teaching. In order to meet state certification requirements, students complete additional coursework the following summer and complete graduate program requirements to receive a Masters degree in teaching. All students enrolled in the MAT program who hold a bachelors degree are eligible to receive temporary certification in education.

The pilot cohort (Cohort 1) of eight candidates accepted into the MAT program began their studies in June 2001. During the following years the numbers dramatically increased with 62 individual applying to the MAT program in 2002 with 34 students being accepted into the second cohort. During the spring of 2003, there were 70 applicants to the program with 29

students beginning the program making up Cohort 3. While numbers dropped a bit during the 2004 academic year (applicants = 65; accepted/beginning = 26), Cohort 5 saw the greatest number of applicants (n = 100) as well as an extension of the program. Fifty-with students accepted into the MAT program began coursework during the summer of 2005 with 13 of those students taking part in a collaborative program with Missouri Southern State University (MSSU). Currently, 97% of student entering the program have either completed or are still enrolled. Since 2001, only four students have dropped from the MAT program (see Table A below).

**Table A: Number of MAT students applying, beginning, and dropping by cohort year.**

<b>Cohort Year</b>	<b>Applied</b>	<b>Began</b>	<b>Dropped</b>	<b>Current Status</b>
<b>2001</b>	8	8	0	<b>8</b>
<b>2002</b>	62	34	2	<b>32</b>
<b>2003</b>	70	29	2	<b>27</b>
<b>2004</b>	65	26	0	<b>26</b>
<b>2005</b>	100	58	0	<b>58</b>
<b>Total</b>	<b>305</b>	<b>155</b>	<b>4</b>	<b>151</b>

Missouri State University is committed to quality teacher education. To fulfill this commitment, students meet with the MAT Coordinator and faculty members for initial support to discuss a variety of issues such as classroom management, classroom behavior and best practices in teaching and learning during the eight-week summer course. Embedded in the MAT students' teacher preparation program is the ability to skillfully facilitate and promote the learning of all students they encounter in the classroom. This preparation includes students from diverse cultural, racial, and economic backgrounds as well as students with disabilities. MAT students attend graduate classes staffed by regular Missouri State University faculty. Graduate faculty members are committed to providing educational opportunities that enable MAT students to develop a capacity for scholarly inquiry, critical reasoning, and a life-long pursuit of learning.

The growth of alternative certification programs has caused some concern regarding the level of preparation and the retention rates of teachers prepared in alternative programs, such as the MAT, when compared to those educated in a more traditional manner. An analysis of recent studies indicates that differences exist between classrooms regarding teacher performance. These differences cannot be attributed to the type of license a teacher holds or to a variety of other measured characteristics (Podgursky, 2004). Topolka-Jorissen (2002) wrote that factors influencing retention rates include the length of the preparation program, the level of support from peers and mentors, the level of professional involvement on the part of the teacher, and the support of the principal within the school. The more satisfied an alternatively prepared teacher is with these factors, the longer they are likely to remain in the teaching field. Additional research addressing differences in types of preparation programs and retention rates between candidates opting for the two approaches are warranted. A better understanding of the issues surrounding the preparation of "non-traditional" teacher candidates and mechanisms their retention in the field of education are of utmost importance in addressing teacher shortage issues.

## METHODS

### Data Collection Procedures

#### **Candidate Demographics:**

Demographic characteristics of each MAT cohort are compiled by the MAT program coordinator. These data include information such as candidates' gender, undergraduate degree and grade point average. These data were provided to the research team for inclusion in this report. In addition, the College of Education Certification office tracks all content area Praxis scores for each of the MAT candidates. These data were aggregated and pass rates are reported for each year's cohort.

#### **Pre / Post Survey Questionnaires:**

The Missouri State University Title II program, in coordination with the Institute for School Improvement, administered a survey questionnaire (see Appendix A) to students attending the eight-week summer course both at the beginning and the end of their initial induction into the MAT program. These data collection efforts began in 2002; pre/post survey data are not available for the 2001 pilot cohort. The purpose of the survey questionnaire was to gauge students' perceptions of curriculum issues that surround teaching prior to the eight-week summer course (pre-survey) and then again following the eight-week course to determine if changes occurred in students' knowledge and understanding of the issues pertaining to classroom teaching. The data produced from the survey instrument(s) were tested for reliability, yielding an alpha of .95. In addition, factor analytic techniques were applied to the fifteen Likert-type questions and one factor was extracted accounting for 72% of the variance.

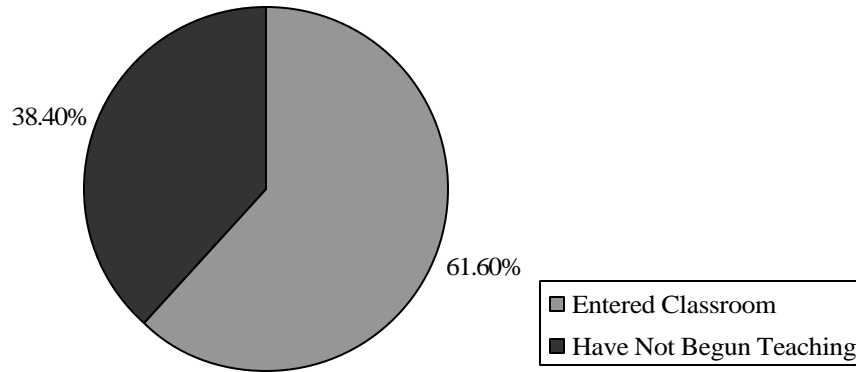
#### **Evaluation of the Eight-Week Summer Course:**

In addition, a survey questionnaire was also designed to evaluate the overall impact of the eight week summer course (see Appendix B). The questionnaire was administered to students attending the eight-week course at the end of their induction into the MAT program. This formative data was collected for both the 2003, 2004, and 2005 cohorts. The survey instrument focused on three elements (1) overall beliefs regarding the summer program, (2) the instructors/"master teacher team", and (3) the resource personnel associated with the program.

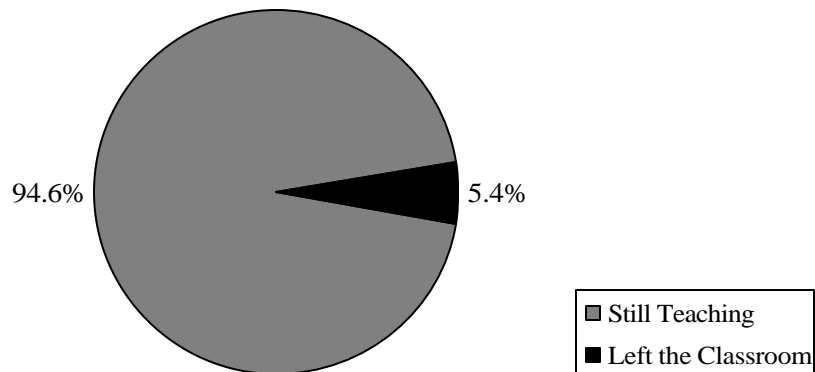
#### **Teaching Status:**

The MAT program coordinator also tracks the teaching status of all MAT students. Since many students entering the program are eligible for temporary certification, many opt to begin work as classroom teachers while enrolled in their first year of the program. Others enter the profession upon completion of the program. Figure A shows the percent of students from the 2001-2005 cohorts who elected to enter the classroom while still enrolled in the MAT program. Of those students who entered the classroom, 94.6% are still currently teaching (See Figure B). This retention rate may be overestimated as it includes the 2005 cohort who are students just entering the classroom during the 2005-06 school. However, when data from the 2005 cohort are removed the retention rate is still impressive at 92%.

**Figure A. Percent of student who choose to enter the classroom while still in the MAT program (n = 151)**

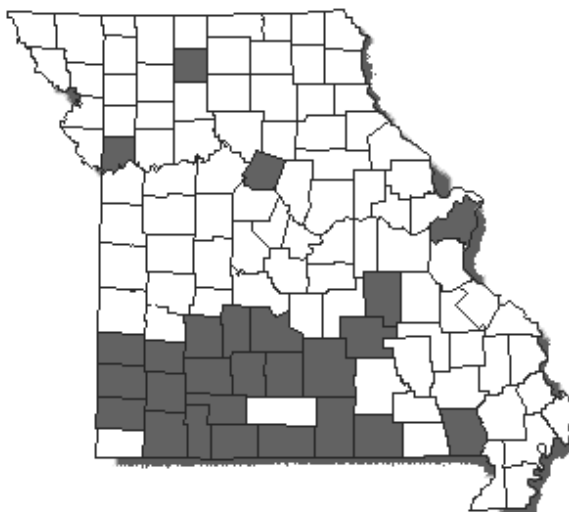


**Figure B. Percent of MAT students still teaching from all cohorts (n = 151)**



Those students who are currently teaching are in classrooms throughout Missouri. The counties where students are teaching include: Barry, Barton, Butler, Christian, Clay, Crawford, Dade, Dallas, Dent, Greene, Grundy, Howard, Howell, Jasper, Laclede, Lawrence, Newton, Oregon, Ozark, Polk, St. Louis, Stone, Taney, Texas, Webster, and Wright, which are highlighted in Figure C. The information regarding MAT students' current teaching status was provided by the MAT coordinator to the research team and is reflective of students' placement as of June 2005.

*Figure C. Counties in which MAT students are currently teaching*



#### **Follow-up Survey Questionnaires:**

Upon completion of their first year of teaching, students from cohorts 2001-2003 who are also certified in their specific content area are surveyed. The instrument contains the same fifteen questions as the pre/post survey (see Appendix C). Since students can be in various stages of “teaching” and “certification,” the MAT coordinator tracks students through their certification process so data collection is ongoing. In addition, administrators and colleagues in schools working with these students were also surveyed so that comparisons across groups can be examined. During the spring 2005, the Missouri State University’s College of Education conducted a graduate follow-up survey. MAT students were included in the data collection process and information obtained from that survey is also included in this report.

#### **MAT Student Biographies:**

The evaluation team also collected descriptive information about MAT students to share with the general public to understand better the types of people who have chosen to pursue this degree. These personal narratives are included in Appendix E. Key elements of the narrative include personal information such as age, gender, past and current employment history, and the reason individuals decide to enroll in alternative programs such as the MAT.

## FINDINGS

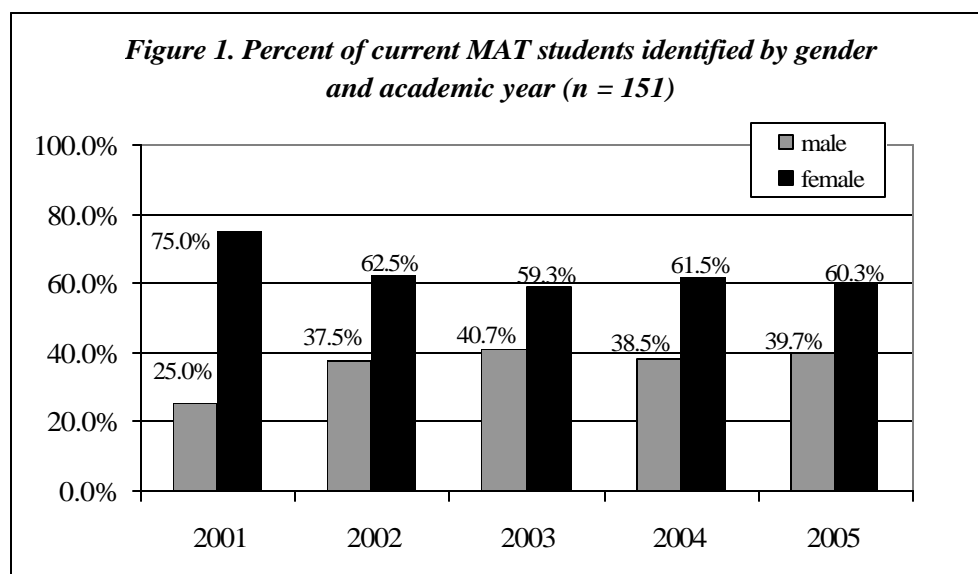
### Characteristics of MAT Cohort Participants:

- **Gender**

MAT student gender (2001 through 2005) is shown in Table 1 and Figure 1. In 2001, eight MAT students were enrolled with 25% (n = 2) of the students male and 75% (n = 6) female. Thirty – two students comprised the 2002 cohort with 37.5% (n = 12) male and 62.5% (n = 20) female. In the 2003 school year, eleven males (40.7%) participated in the MAT program compared to sixteen females (59.3%). Ten males (38.5%) and sixteen females (61.5%) were accepted into the 2004 cohort. Twenty three males (39.7%) and thirty five females (60.3%) were accepted into the 2005 cohort. Over the past 5 years the majority of students have been female (61.6%; n = 93).

*Table 1. Number and percent of current MAT students identified by gender and by academic year*

Academic Year	Gender		Total
	Male	Female	
2001	2 25.0%	6 75.0%	8 100.0%
2002	12 37.5%	20 62.5%	32 100.0%
2003	11 40.7%	16 59.3%	27 100.0%
2004	10 38.5%	16 61.5%	26 100.0%
2005	23 39.7%	35 60.3%	58 100.0%
<b>Total</b>	<b>58</b> <b>38.4%</b>	<b>93</b> <b>61.6%</b>	<b>151</b> <b>100.0%</b>

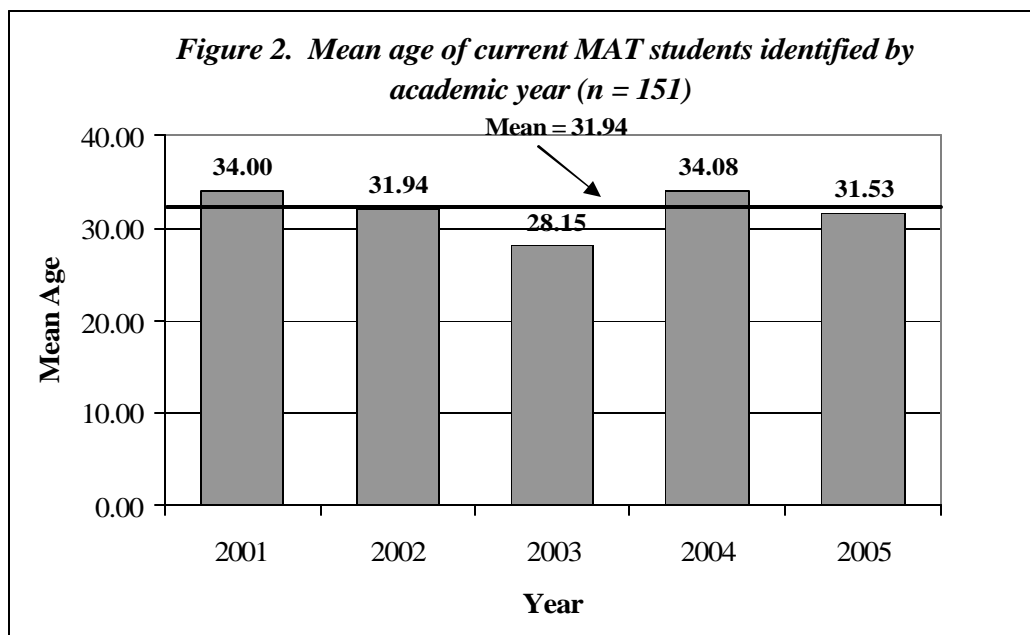


- Age

The age of MAT students ranged from 22 years in age to 50+ years with the approximate age of MAT students is 32 years for academic years 2001 through 2005. Overall, more than half the students (54.9%; n = 83) who have entered the MAT program were in their mid to late twenties. When data are disaggregated by academic year, the mean age of MAT students is 34.00 years (2001), 31.94 years (2002), 28.15 years (2003), 34.08 years (2004) and 31.53 years (2005) as shown in Table 2 and Figure 2.

**Table 2. Number and percent of current MAT students identified by age and academic year (n = 151)**

Academic Year	Age Group							Total	Mean Age
	21-24	25-29	30-34	35-39	40-44	45-50	> 50		
2001	1	3	1	0	1	2	0	8	34.00
	12.5%	37.5%	12.5%	0.0%	12.5%	25.0%	0.0%	100.0%	
2002	9	8	4	4	2	5	0	32	31.94
	28.1%	25.0%	12.5%	12.5%	6.3%	15.6%	0.0%	100.0%	
2003	11	8	4	3	0	1	0	27	28.15
	40.7%	29.6%	14.8%	11.1%	0.0%	3.7%	0.0%	100.0%	
2004	6	7	2	3	3	2	3	26	34.08
	23.1%	26.9%	7.7%	11.5%	11.5%	7.7%	11.5%	100.0%	
2005	17	13	11	4	6	7	0	58	31.53
	29.3%	22.4%	19.0%	6.9%	10.3%	12.1%	0.0%	100.0%	
<b>Total</b>	<b>44</b>	<b>39</b>	<b>22</b>	<b>14</b>	<b>12</b>	<b>17</b>	<b>3</b>	<b>151</b>	<b>31.94</b>
	<b>29.1%</b>	<b>25.8%</b>	<b>14.6%</b>	<b>9.3%</b>	<b>7.9%</b>	<b>11.3%</b>	<b>2.0%</b>	<b>100.0%</b>	

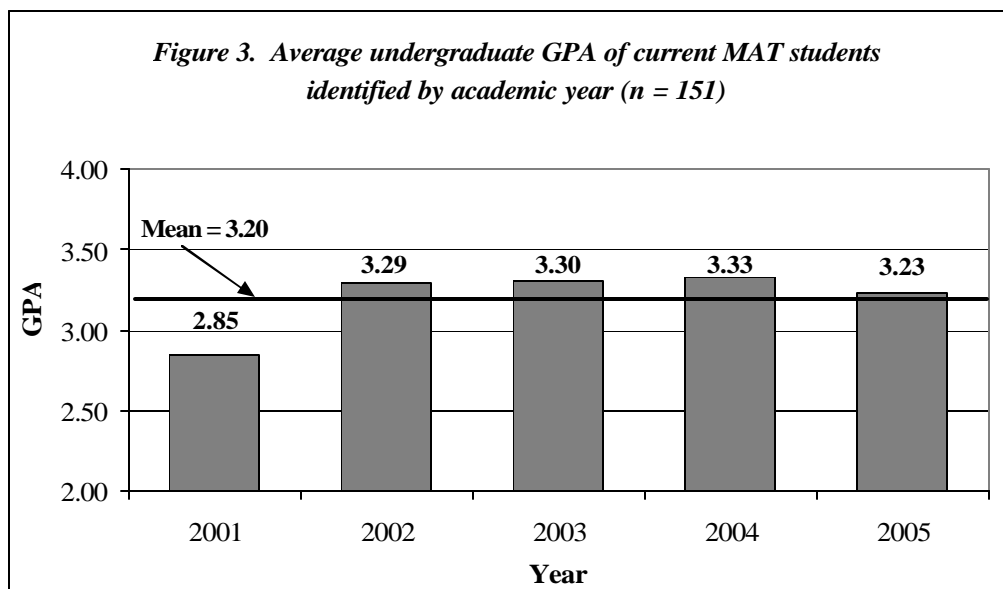


- **GPA**

Present data regarding GPA scores of MAT students for all Cohorts are shown in Table 3 and Figure 3. The overall mean GPA of all 151 MAT students is 3.20 (on a four point scale). When data are disaggregated by academic year, the average GPA of students are 2.85 (2001), 3.29 (2002), 3.30 (2003), 3.33 (2004) and 3.23 (2005).

**Table 3. Number and percent of current MAT students identified by GPA and academic year (n = 151)**

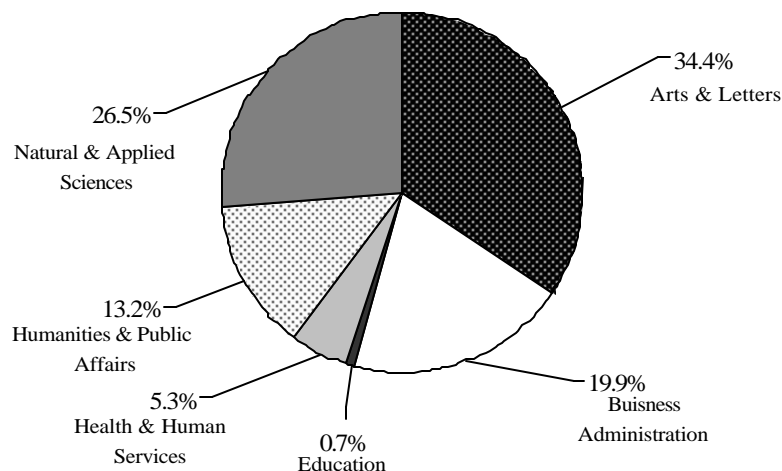
Academic Year	GPA Range					Total	Average GPA
	2.0-2.4	2.41-2.8	2.81-3.2	3.21-3.6	3.61-4.0		
<b>2001</b>	1 12.5%	1 12.5%	6 75.0%	0 0.0%	0 0.0%	<b>8</b> <b>100.0%</b>	2.85
<b>2002</b>	0 0.0%	5 15.6%	10 31.3%	10 31.3%	7 21.9%	<b>32</b> <b>100.0%</b>	3.29
<b>2003</b>	0 0.0%	4 14.8%	8 29.6%	8 29.6%	7 25.9%	<b>27</b> <b>100.0%</b>	3.30
<b>2004</b>	0 0.0%	1 3.8%	13 50.0%	4 15.4%	8 30.8%	<b>26</b> <b>100.0%</b>	3.33
<b>2005</b>	3 5.2%	9 15.5%	17 29.3%	14 24.1%	15 25.9%	<b>58</b> <b>100.0%</b>	3.23
<b>Overall</b>	4 2.6%	20 13.2%	54 35.8%	36 23.8%	37 24.5%	<b>151</b> <b>100.0%</b>	<b>3.20</b>



- **Undergraduate Degree**

The undergraduate degrees of MAT students are depicted in Table 4 and Figure 4 by academic year. The undergraduate degrees were categorized based on the six academic colleges at Missouri State University. Three students (37.5%) comprising the 2001 cohort hold bachelor's degrees in Humanities and Public Affairs, three students (37.5%) have a bachelor's degree in Natural and Applied Sciences and two students (25%) graduated with a bachelor's degree in Arts and Letters. The 2002 cohort had ten students (31.3%) with Natural and Applied Sciences degrees, seven students (21.9%) with Business Administration degrees, six students (18.8%) with Health and Human Services degrees, five students (15.6%) with Arts and Letters degrees, and four students (12.5%) with Humanities and Public Affairs degrees. The 2003 cohort had twelve students (44.4%) with Arts and Letters degrees, seven students (25.9%) with Business Administration degrees, two students (7.41%) with Humanities and Public Affairs degrees, five students (18.5%) with Natural and Applied Sciences degrees, and one student (3.7%) with a Health and Human Services degree. The 2004 cohort was comprised of eleven students (42.3%) with Arts and Letters degrees, six students (23.1%) with Natural and Applied Sciences degrees, four students (15.4%) with degrees in Humanities and Public Affairs, four (15.4%) with Business Administration, and one student (3.9%) with an Education degree. The 2005 cohort is comprised of twenty-two students (37.9%) with Arts and Letters degrees, sixteen students (27.6%) with Natural and Applied Sciences degrees, seven students (12.1%) with degrees in Humanities and Public Affairs, twelve (20.7%) with Business Administration, one (1.7%) with Health and Human Services degrees. Over the five year period, only one MAT student has held an undergraduate degree in Education. This student was considered to be a "special case" as her degree was granted from another country. The majority of students (60.9%) taking part in the MAT program (2001-2005) represent undergraduate degrees in Natural and Applied Sciences and Arts and Letters.

**Figure 4. Percent of current MAT students identified by undergraduate degree [All cohorts combined (n = 151)]**



- **Praxis Test**

Upon entering the MAT program students are required to take their specific content area Praxis exam. Currently, 85.4% of students in the program have passed their Praxis II. In order to complete the program and received certification, 100% must pass the Praxis. Table 5 displays the current Praxis pass rates for each cohort (2001-2005). Praxis score data was not available for 15 MAT students (9.9%). The majority of students with data not available are members of the 2005 cohort. These data will be available at a later date.

*Table 5. Number and percent of current MAT students' passing their respective Praxis content area test (n = 151)*

<b>Year</b>	<b>Passing</b>	<b>NOT Passing</b>	<b>Missing Data/Not Available</b>	<b>Total</b>
<b>2001</b>	7	1	0	<b>8</b>
	87.5%	12.5%	0.0%	<b>100.0%</b>
<b>2002</b>	31	1	0	<b>32</b>
	96.9%	3.1%	0.0%	<b>100.0%</b>
<b>2003</b>	27	0	0	<b>27</b>
	100.0%	0.0%	0.0%	<b>100.0%</b>
<b>2004</b>	23	2	1	<b>26</b>
	88.5%	7.7%	3.8%	<b>100.0%</b>
<b>2005</b>	41	3	14	<b>58</b>
	70.7%	5.2%	24.1%	100.0%
<b>Total</b>	<b>129</b>	<b>7</b>	<b>15</b>	<b>151</b>
	<b>85.4%</b>	<b>4.6%</b>	<b>9.9%</b>	<b>100.0%</b>

## Pre and Post Survey Results for MAT Cohort Participants:

- **2002 Cohort**

Table 6 displays the perceptual data for the fifteen survey questions associated with the pre and post questionnaires administered to the 2002 cohort ( $n = 32$ ). A review of these data indicate that before beginning the eight-week summer course in the MAT program candidates believed their knowledge of the issues surrounding classroom teaching to be somewhat limited. However, post survey results indicate candidates' perceptions increased positively on each of the fifteen questions. This increased knowledge measured by the pre / post survey is statistically significant. The greatest mean difference between the pre and post survey was found to be with question eleven, classroom management (pre:  $\underline{M} = 2.57$ , post:  $\underline{M} = 5.63$ ; diff: 3.05), and question seven, learning theory (pre:  $\underline{M} = 2.29$ , post:  $\underline{M} = 5.22$ ; diff: 2.93). While means for each question were found to increase significantly, the smallest increase in candidates' understanding appears to be with questions pertaining to crisis planning / prevention [Q 15 (pre:  $\underline{M} = 1.64$ , post:  $\underline{M} = 3.09$ ; diff: 1.45) and administrative issues [Q2 (pre:  $\underline{M} = 2.22$ , post:  $\underline{M} = 3.94$ ; diff: 1.72)].

*Table 6. Mean comparison of MAT 2002 cohort pre / post survey questionnaire responses ranked by Mean Difference ( $n = 32$ )*

Curriculum Topics/Issues	2002 ( $n=32$ )		
	Pre	Post	Difference (post-pre)
Q 11: Classroom Management	2.57	5.63	3.05
Q 7: Learning Theory	2.29	5.22	2.93
Q 5: Lesson Plan Development	2.21	5.03	2.82
Q 8: Assessment & Evaluation	2.52	5.13	2.61
Q9: Student Motivation	2.86	5.47	2.61
Q 4: Instructional Techniques	2.81	5.38	2.56
Q 6: Student Learning Objectives	2.64	5.19	2.54
Q 10: Course Outlines & Syllabi	2.75	5.00	2.25
Q 13: Legal Issues	1.86	4.00	2.14
Q 14: Meeting the Needs of Special Needs Students	1.93	4.07	2.14
Q 12: Educator Resources	2.37	4.50	2.13
Q 3: Community/ Parent Involvement	2.96	4.84	1.88
Q 1: Board of Education Policies/ Procedures	2.04	3.88	1.84
Q 2: Administrative Policies/ Procedures	2.22	3.94	1.72
Q 15: Crisis Planning/ Prevention	1.64	3.09	1.45
<b>Grand Mean Score and Overall Difference</b>	<b>2.38</b>	<b>4.69</b>	<b>2.31</b>
	<b>t (58) = -7.790; p &lt; .001</b>		

Scale: 0 = No Knowledge, 1 = Very Limited Knowledge, 2 = Limited Knowledge, 3 = Somewhat Knowledgeable, 4 = Adequate amount of knowledge, 5 = More than Adequate Knowledge, 6 = Significant Knowledge, 7 = Extremely Knowledgeable

- **2003 Cohort**

Surveys were again administered prior to the 2003 cohort (n = 29) beginning the eight-week initial training in the MAT program and again following their training [Note: Twenty-nine students took part in the eight-week summer course but two students have dropped from the program since that time]. Table 7 shows the mean scores associated with both the pre and post survey results along with the mean differences for each of the fifteen questions on the survey questionnaire. Differences in candidates' perception of their knowledge of educational practices were compared. The post survey results indicates that the 2003 cohort believed their knowledge level had indeed increased significantly as noted by each of the fifteen questions on the questionnaire. The greatest mean difference between the pre and post survey was found to be with question six, pertaining to student learning objectives (pre:  $\underline{M}$  = 2.18, post:  $\underline{M}$  = 5.32; diff: 3.10), and question five, lesson plan development (pre:  $\underline{M}$  = 2.21, post:  $\underline{M}$  = 5.28; diff: 3.07). While means for each question were found to increase significantly, the smallest increase in candidates' understanding appears to be with the question pertaining to board policies / procedures [Q 1 (pre:  $\underline{M}$  = 1.52, post:  $\underline{M}$  = 3.17; diff: 1.66) and administrative issues [Q2 (pre:  $\underline{M}$  = 1.79, post:  $\underline{M}$  = 3.45; diff: 1.66)].

*Table 7. Mean comparison of MAT 2003 cohort pre / post survey questionnaire responses ranked by Mean Difference (n = 29)*

Curriculum Topics/Issues	2003 (n=29)		
	Pre	Post	Difference (post-pre)
<b>Q 6: Student Learning Objectives</b>	2.18	5.32	3.10
<b>Q 5: Lesson Plan Development</b>	2.21	5.28	3.07
<b>Q 7: Learning Theory</b>	1.66	4.66	3.00
<b>Q 14: Meeting the Needs of Special Needs Students</b>	1.52	4.38	2.86
<b>Q 12: Educator Resources</b>	2.00	4.71	2.69
<b>Q 8: Assessment &amp; Evaluation</b>	2.21	5.00	2.68
<b>Q 4: Instructional Techniques</b>	2.55	4.97	2.41
<b>Q9: Student Motivation</b>	2.62	5.00	2.38
<b>Q 13: Legal Issues</b>	1.31	3.62	2.31
<b>Q 11: Classroom Management</b>	2.83	5.10	2.28
<b>Q 3: Community/ Parent Involvement</b>	2.36	4.54	2.26
<b>Q 10: Course Outlines &amp; Syllabi</b>	2.21	4.21	2.00
<b>Q 15: Crisis Planning/ Prevention</b>	1.38	3.24	1.86
<b>Q 1: Board of Education Policies/ Procedures</b>	1.52	3.17	1.66
<b>Q 2: Administrative Policies/ Procedures</b>	1.79	3.45	1.66
<b>Grand Mean Score and Overall Difference</b>	<b>2.02</b>	<b>4.44</b>	<b>2.41</b>
	<b>t (56) = -8.417; p &lt; .001</b>		

Scale: 0 = No Knowledge, 1 = Very Limited Knowledge, 2 = Limited Knowledge, 3 = Somewhat Knowledgeable, 4 = Adequate amount of knowledge, 5 = More than Adequate Knowledge, 6 = Significant Knowledge, 7 = Extremely Knowledgeable

- **2004 Cohort**

Table 8 displays the mean scores for 2004 cohort (n = 28) on the pre and post survey results and mean differences for each of the fifteen questions on the survey questionnaire. [Note: Twenty-eight students took part in the eight-week summer course but two student have dropped from the program since that time]. Differences in candidates' perception of their knowledge of educational practices were compared. The post survey results indicates that the 2004 cohort believed their knowledge level had indeed increased significantly as noted by each of the fifteen questions on the questionnaire. The greatest mean difference between the pre and post survey was found with question seven, pertaining to learning theory (pre:  $\underline{M}$  = 1.56, post:  $\underline{M}$  = 4.48; diff: 2.92), and question five, lesson plan development (pre:  $\underline{M}$  = 2.36, post:  $\underline{M}$  = 4.86; diff: 2.50) and question six, student learning objectives (pre:  $\underline{M}$  = 2.36, post:  $\underline{M}$  = 4.86; diff: 2.50). While means for each question were found to increase significantly, the smallest increase in candidates' understanding appears to be with school related issues pertaining to designing course syllabi/outline [Q10 (pre:  $\underline{M}$  = 2.54, post:  $\underline{M}$  = 3.96; diff: 1.42)], crisis planning/prevention [Q15 (pre:  $\underline{M}$  = 1.71, post:  $\underline{M}$  = 3.14; diff: 1.43) and community/parent involvement [Q3 (pre:  $\underline{M}$  = 2.64, post:  $\underline{M}$  = 4.07; diff: 1.43)].

**Table 8. Mean comparison of MAT 2004 cohort pre / post survey questionnaire responses ranked by Mean Difference (n = 28)**

Curriculum Topics/Issues	2004 (n=28)		
	Pre	Post	Difference (post-pre)
<b>Q 7: Learning Theory</b>	1.56	4.48	2.92
<b>Q 5: Lesson Plan Development</b>	2.36	4.86	2.50
<b>Q 6: Student Learning Objectives</b>	2.36	4.86	2.50
<b>Q 11: Classroom Management</b>	2.64	5.00	2.36
<b>Q 8: Assessment &amp; Evaluation</b>	2.21	4.54	2.33
<b>Q 4: Instructional Techniques</b>	2.50	4.75	2.25
<b>Q 14: Meeting the Needs of Special Needs Students</b>	1.50	3.61	2.11
<b>Q 13: Legal Issues</b>	1.61	3.57	1.96
<b>Q 12: Educator Resources</b>	1.93	3.89	1.96
<b>Q 2: Administrative Policies/ Procedures</b>	1.39	3.14	1.75
<b>Q 9: Student Motivation</b>	2.79	4.43	1.64
<b>Q 1: Board of Education Policies/ Procedures</b>	1.32	2.93	1.61
<b>Q 3: Community/ Parent Involvement</b>	2.64	4.07	1.43
<b>Q 15: Crisis Planning/ Prevention</b>	1.71	3.14	1.43
<b>Q 10: Course Outlines &amp; Syllabi</b>	2.54	3.96	1.42
<b>Grand Mean Score and Overall Difference</b>	<b>2.07</b>	<b>4.08</b>	<b>2.01</b>
	<b>t (54) = -6.215; p &lt; .001</b>		

Scale: 0 = No Knowledge, 1 = Very Limited Knowledge, 2 = Limited Knowledge 3 = Somewhat Knowledgeable, 4 = Adequate amount of knowledge, 5 = More than Adequate Knowledge, 6 = Significant Knowledge, 7 = Extremely Knowledgeable

- **2005 Cohort**

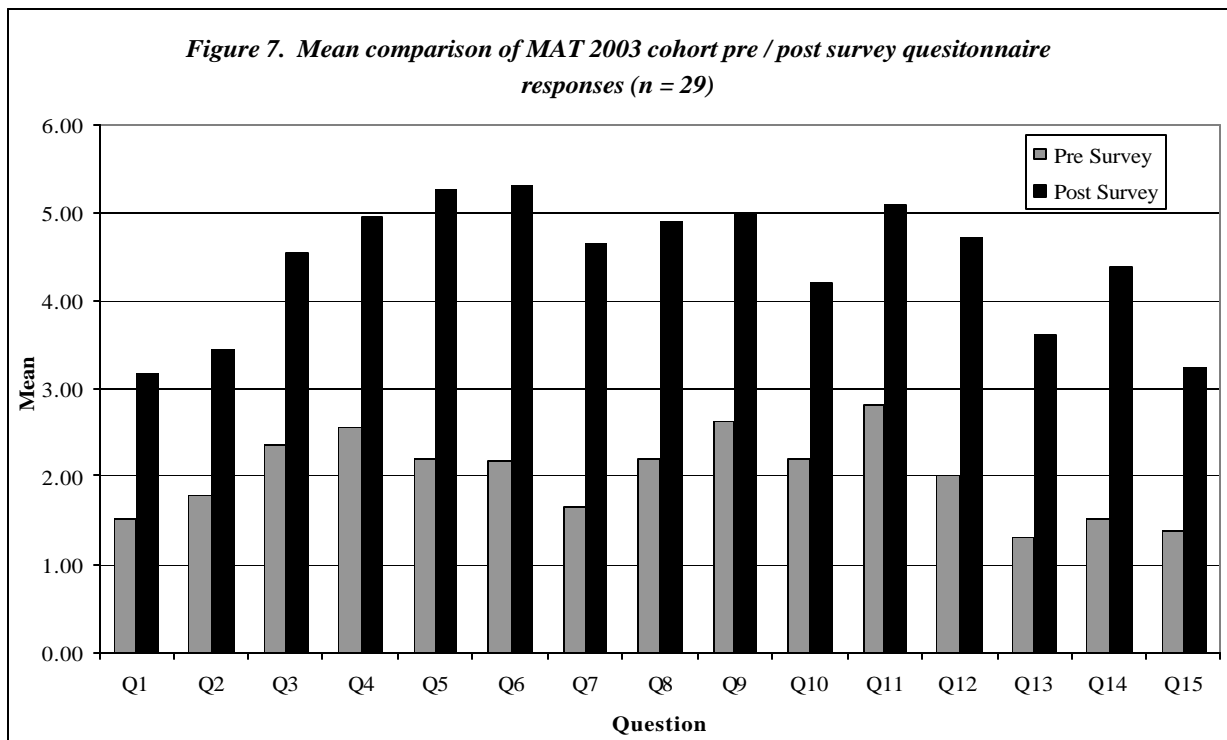
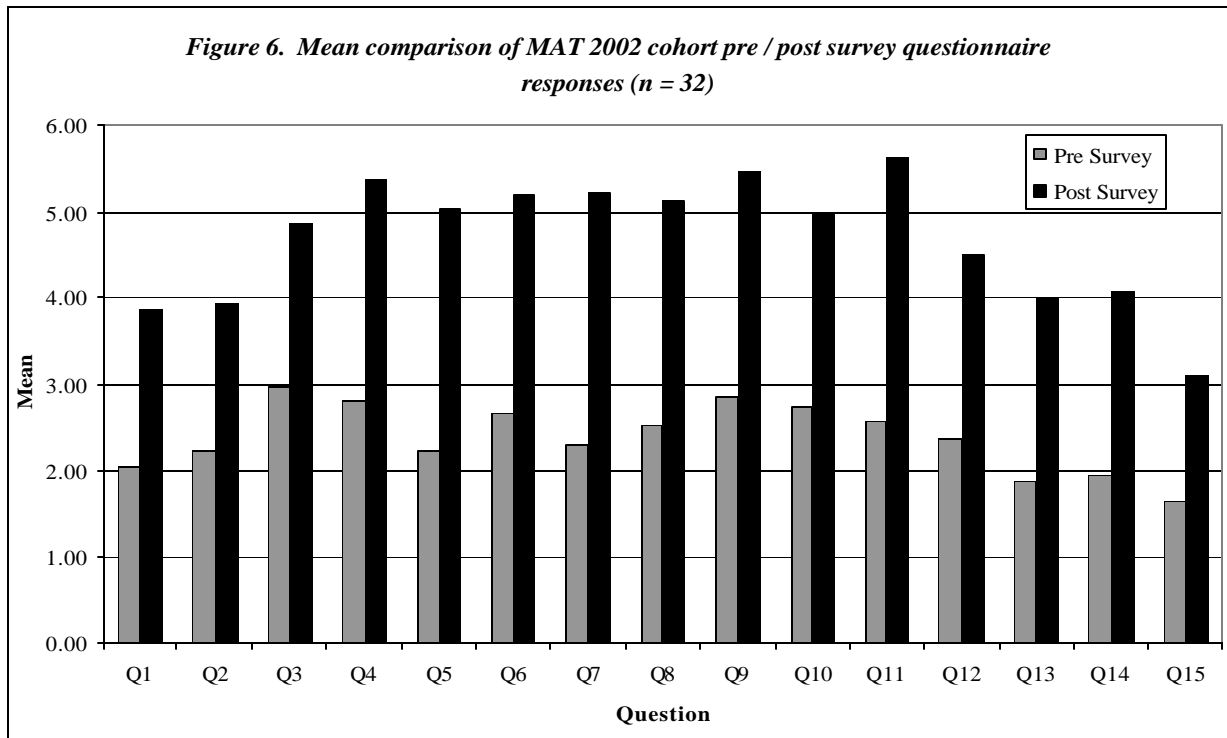
Results of the pre and post survey, as well as the mean differences for each of the fifteen questions on the survey questionnaire, are shown in Table 9 for the 2005 cohort (n = 59). Differences in candidates' perception of their knowledge of educational practices were compared. The post survey results indicates that the 2005 cohort believed their knowledge level had indeed increased significantly as noted by each of the fifteen questions on the questionnaire. The greatest mean difference between the pre and post survey was found with question five, pertaining to lesson plan development (pre:  $\underline{M}$  = 2.86, post:  $\underline{M}$  = 5.64; diff: 2.78), and question seven, learning theory (pre:  $\underline{M}$  = 2.66, post:  $\underline{M}$  = 5.42; diff: 2.76) and question six, student learning objectives (pre:  $\underline{M}$  = 2.78, post:  $\underline{M}$  = 5.51; diff: 2.73). While means for each question were found to increase significantly, the smallest increase in candidates' understanding appears to be with community and parent involvement [Q3 (pre:  $\underline{M}$  = 3.10, post:  $\underline{M}$  = 4.22; diff: 1.12)] and legal issues [Q13 (pre:  $\underline{M}$  = 2.22, post:  $\underline{M}$  = 3.71; diff: 1.49)].

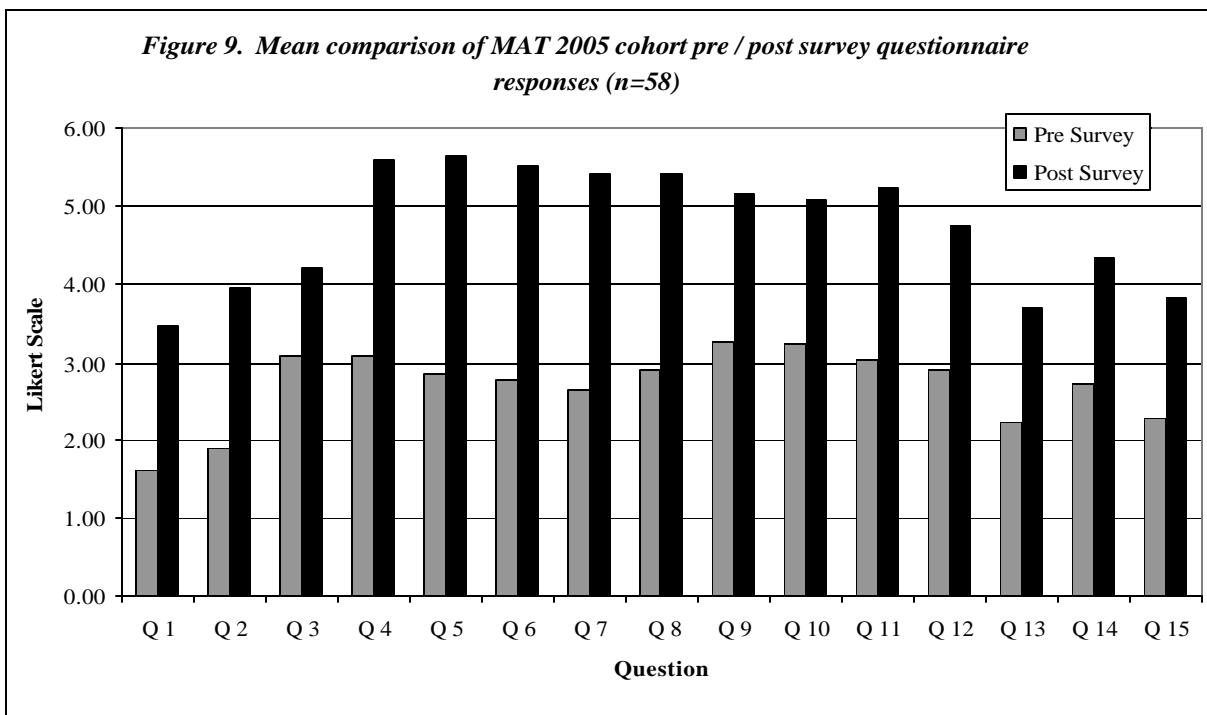
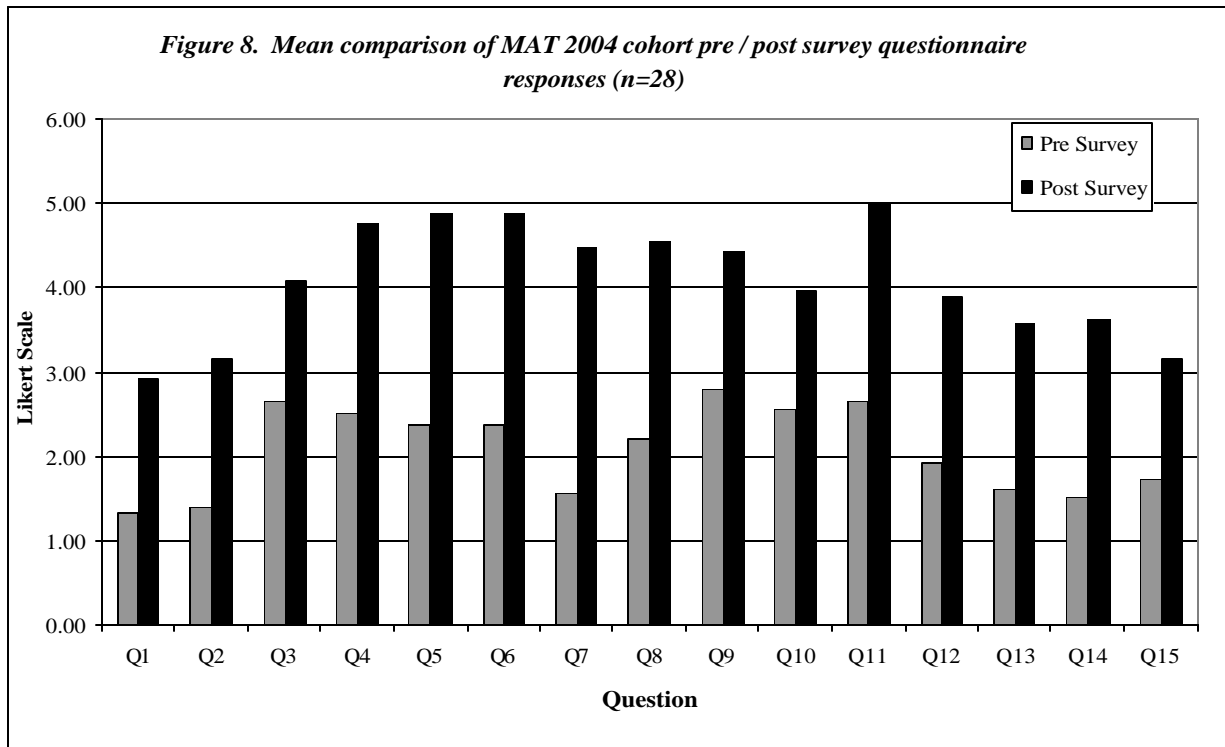
**Table 9. Mean comparison of MAT 2005 cohort pre / post survey questionnaire responses ranked by Mean Difference (n = 58)**

Curriculum Topics/Issues	2005 (n=58)		
	Pre	Post	Difference (post-pre)
<b>Q 5: Lesson Plan Development</b>	2.86	5.64	2.78
<b>Q 7: Learning Theory</b>	2.66	5.42	2.76
<b>Q 6: Student Learning Objectives</b>	2.78	5.51	2.73
<b>Q 8: Assessment &amp; Evaluation</b>	2.90	5.42	2.52
<b>Q 4: Instructional Techniques</b>	3.10	5.58	2.48
<b>Q 11: Classroom Management</b>	3.03	5.24	2.21
<b>Q 2: Administrative Policies/ Procedures</b>	1.90	3.96	2.06
<b>Q 9: Student Motivation</b>	3.28	5.16	1.88
<b>Q 1: Board of Education Policies/ Procedures</b>	1.61	3.47	1.86
<b>Q 12: Educator Resources</b>	2.91	4.76	1.85
<b>Q 10: Course Outlines &amp; Syllabi</b>	3.24	5.07	1.83
<b>Q 14: Meeting the Needs of Special Needs Students</b>	2.73	4.33	1.60
<b>Q 15: Crisis Planning/ Prevention</b>	2.27	3.82	1.55
<b>Q 13: Legal Issues</b>	2.22	3.71	1.49
<b>Q 3: Community/ Parent Involvement</b>	3.10	4.22	1.12
<b>Grand Mean Score and Overall Difference</b>	<b>2.71</b>	<b>4.75</b>	<b>2.05</b>
	<b>t (102) = -9.689; p &lt; .001</b>		

Scale: 0 = No Knowledge, 1 = Very Limited Knowledge, 2 = Limited Knowledge 3 = Somewhat Knowledgeable, 4 = Adequate amount of knowledge, 5 = More than Adequate Knowledge, 6 = Significant Knowledge, 7 = Extremely Knowledgeable

Figures 6 through 9 display the data contained in Tables 6-9 graphically.





Comparisons among the cohorts responses to the pre/post survey were also examined using an analysis of variance technique to determine if the three groups were essentially homogenous. While differences among MAT students' response to the pre-survey were noted, the cohorts' responses to the post survey were not found to be significantly different. Table 10 displays the mean comparisons for this analysis.

*Table 10. Mean Comparisons of MAT 2002, 2003, 2004, 2005 cohorts' responses to the pre / post survey questionnaire (n = 147)*

Curriculum Topics/Issues	Pre Evaluation				Post Evaluation			
	2002 (n=32)	2003 (n=29)	2004 (n=28)	2005 (n=58)	2002 (n=32)	2003 (n=29)	2004 (n=28)	2005 (n=58)
<b>Board of Education Policies/ Procedures</b>	2.04	1.52	1.32	1.61	3.88	3.17	2.93	3.47
<b>Administrative Policies/ Procedures</b>	2.22	1.79	1.39	1.90	3.94	3.45	3.14	3.96
<b>Community/ Parent Involvement</b>	2.96	2.28	2.64	3.10	4.84	4.54	4.07	4.22
<b>Instructional Techniques</b>	2.81	2.55	2.50	3.10	5.38	4.97	4.75	5.58
<b>Lesson Plan Development</b>	2.21	2.21	2.36	2.86	5.03	5.28	4.86	5.64
<b>Student Learning Objectives</b>	2.64	2.18	2.36	2.78	5.19	5.28	4.86	5.51
<b>Learning Theory</b>	2.29	1.66	1.56	2.66	5.22	4.66	4.43	5.42
<b>Assessment &amp; Evaluation</b>	2.52	2.21	2.21	2.90	5.13	4.90	4.54	5.42
<b>Student Motivation</b>	2.86	2.62	2.79	3.28	5.47	5.00	4.43	5.16
<b>Course Outlines &amp; Syllabi</b>	2.75	2.21	2.54	3.24	5.00	4.21	3.96	5.07
<b>Classroom Management</b>	2.57	2.83	2.64	3.03	5.63	5.10	5.00	5.24
<b>Educator Resources</b>	2.37	2.00	1.93	2.91	4.50	4.69	4.00	4.76
<b>Legal Issues</b>	1.86	1.31	1.61	2.22	4.00	3.62	3.57	3.71
<b>Meeting the Needs of Special Needs Students</b>	1.93	1.52	1.50	2.73	4.07	4.38	3.61	4.33
<b>Crisis Planning/ Prevention</b>	1.64	1.38	1.71	2.27	3.09	3.24	3.14	3.82
<b>Grand Mean Score</b>	<b>2.38</b>	<b>2.02</b>	<b>2.07</b>	<b>2.71</b>	<b>4.69</b>	<b>4.43</b>	<b>4.09</b>	<b>4.75</b>
	<b>F (3, 140) = 3.529; p = .017</b>				<b>F (3, 130) = 2.305; p = .080</b>			

Scale: 0 = No Knowledge, 1 = Very Limited Knowledge, 2 = Limited Knowledge 3 = Somewhat Knowledgeable, 4 = Adequate amount of knowledge, 5 = More than Adequate Knowledge, 6 = Significant Knowledge, 7 = Extremely Knowledgeable

## Evaluation of the Eight-Week Summer course:

In order to gain a better understanding of the impact the eight-week summer course was having on participants, additional formative data regarding MAT students' perceptions were gathered. These data focused on three elements (1) overall beliefs regarding the summer program, (2) the instructors / "master teacher team", and (3) the resource personnel associated with the program. Data collection began in the summer of 2003. Table 11 and Figure 11 display the perspectives of all three, 2003-2005, cohorts.

- **2003 Cohort's Evaluation**

MAT students participating in the 2003 eight-week summer course agreed that the summer course, the instructors and the resource personnel were helpful in providing them with the essential information regarding the topics/content important to educators. Among the four questions related to the summer course, the 2003 cohort rated question three pertaining to the variety of activities designed for adult learners highest ( $\bar{M} = 6.28$ ). The item rated highest regarding the master teacher team was the knowledge they had of the content covered ( $\bar{M} = 6.38$ ). With regard to the resource personnel, the 2003 cohort also rated their knowledge of the content presented highest ( $\bar{M} = 6.34$ ).

- **2004 Cohort's Evaluation**

According to the 2004 cohort, the content areas covered ( $\bar{M} = 6.14$ ), the availability of the master teacher team in addressing questions and concerns ( $\bar{M} = 6.43$ ), and the resource personnel's knowledge of the content presented ( $\bar{M} = 6.39$ ) were the items rated highest among the questions pertaining to the summer course, master teacher team and resource personnel sections of the questionnaire. The only significant difference between Cohorts 3 and 4 concerns the variety of activities designed for adult learners. While the 2003 cohort rated this item highest among those questions related to the summer course, this item was rated lowest among the 2004 cohort.

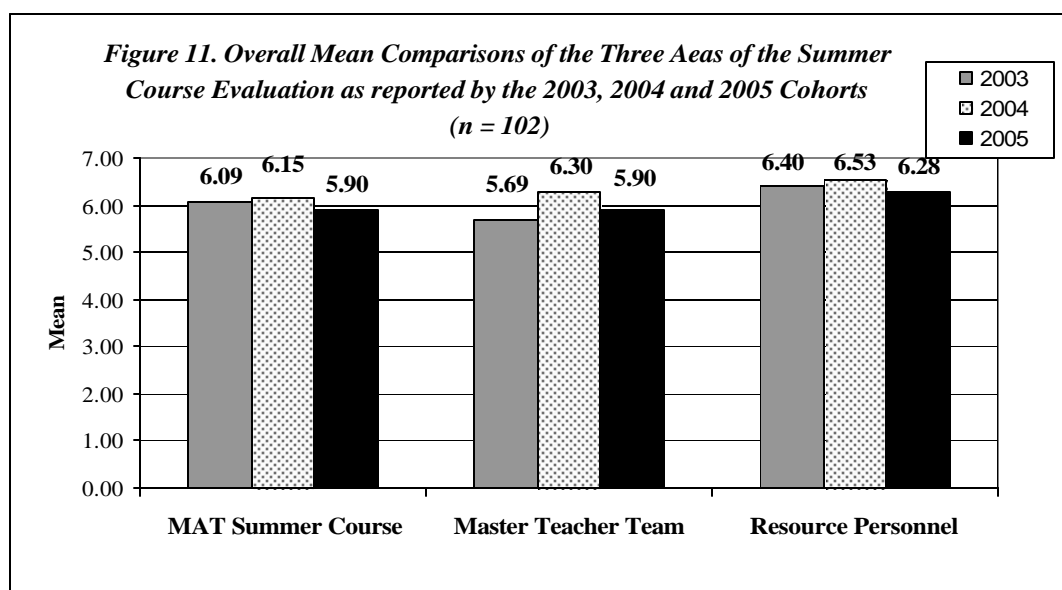
- **2005 Cohort's Evaluation**

The 2005 cohort was also given the same questionnaire regarding the summer course, master teacher team, and resource personnel. Among the questions about the summer course, students rated the question pertaining to providing useful information that can be used immediately in the classroom ( $M = 6.56$ ) the highest. The question concerning how knowledgeable the master teacher team was of content presented ( $M = 6.75$ ) was rated most highly in that section of questions. The same question of knowledge of content presented ( $M = 6.59$ ) was rated the highest of the resource personnel questions. All three cohorts have given the highest rating to the questions related to the knowledge of content presented in the master teacher team and resource personnel sections of the questionnaire.

**Table 11. Mean comparisons of eight-week summer course as reported by the 2003, 2004, and 2005 cohorts (n = 102)**

Topics	Curriculum Topics/Issues			
		2003 (n=29)	2004 (n=28)	2005 (n=45)
The MAT Summer Course	Q1. Covered all content areas as presented in the course syllabus	6.07	6.14	6.40
	Q2. Met my needs as I prepare to enter my first year of classroom teaching	5.83	5.54	6.11
	Q3. Included a variety of activities designed for adult learners	6.28	5.18	6.51
	Q4. Provided useful information that can be used immediately in the classroom	6.17	5.89	6.56
	<b>MAT Summer Course Grand Mean</b>	<b>6.09</b>	<b>5.69</b>	<b>6.40</b>
The Master Teacher Team	Q5. Presented the material in the format that can be easily understood	5.69	5.86	6.52
	Q6. Were knowledgeable of the content presented	6.38	6.63	6.75
	Q7. Made accommodations as needed to meet participant needs	6.21	6.14	6.20
	Q8. Were available to answer questions and address concerns	6.28	6.43	6.64
	Q9. Answered questions and addressed concerns in a timely manner	6.17	6.43	6.52
<b>Master Teacher Team Grand Mean</b>	<b>6.15</b>	<b>6.30</b>	<b>6.53</b>	
The Resource Personnel	Q10. Presented the material in a format that could be easily understood	5.83	5.64	6.22
	Q11. Addressed important topics of interest to educators	5.90	5.71	6.27
	Q12. Were knowledgeable of content presented	6.34	6.39	6.59
	Q13. Made accommodations as needed to meet participant needs	5.52	5.86	6.05
	<b>Resource Personnel Grand Mean</b>	<b>5.90</b>	<b>5.90</b>	<b>6.28</b>
<b>Grand Mean Score and Overall Difference</b>		<b>6.06</b>	<b>5.99</b>	<b>6.41</b>

Scale: 0 = Not Addressed, 1 = Strongly Disagree, 2 = Disagree, 3 = Somewhat Disagree, 4 = Neutral, 5 = Somewhat Agree, 6 = Agree, 7 = Strongly Agree



**Follow-up Survey Results for 2001-2003 MAT Cohort Participants:**

- **Curriculum Topics and Issues**

While pre / post surveys were not completed by the 2001 pilot cohort, a follow-up survey containing the same fifteen questions was sent to the four MAT 2001 cohort participants who had completed one year of teaching and had also received certification. In addition, administrators and colleagues working with these four individuals were also asked to complete a follow-up survey intended to gauge their perception of the MAT student's knowledge of educational topics and issues. In general, students tend to rate their understanding of curriculum topics and issues lower than their respective administrator and colleagues. Interestingly enough, the four topics/issues rated lowest by students tended to rated much higher by their administrators and colleagues. These questions pertain to the MAT students' knowledge of crisis planning / prevention (Students:  $\underline{M}$  = 2.47; Administrators:  $\underline{M}$  = 3.83; Colleagues:  $\underline{M}$  = 4.35), community / parent involvement (Students:  $\underline{M}$  = 3.42; Administrators:  $\underline{M}$  = 4.65; Colleagues:  $\underline{M}$  = 4.92), administrative issues (Students:  $\underline{M}$  = 3.11; Administrators:  $\underline{M}$  = 4.22; Colleagues:  $\underline{M}$  = 4.65), and board of education policies / procedures (Students:  $\underline{M}$  = 2.42; Administrators:  $\underline{M}$  = 4.03; Colleagues:  $\underline{M}$  = 4.27) These data are contained in Table 12.

- **MOSTEP competencies**

In an effort to ensure quality pre-service teacher education programs, the College of Education has a long-term plan to investigate their graduates in order to obtain feedback regarding their perceived level of competency as a result of the MAT program. These data are reported to the Missouri Department of Elementary and Secondary Education (MO DESE) and are aligned to the Missouri Standards for Teacher Education Preparation (MOSTEP). Table 13 presents the data collected from 15 of MAT graduates currently working in southwest Missouri school districts. Data were also collected from traditionally prepared teachers as well. Overall, slight differences were noted between the two groups in regard to their reported level of competence. On average, MAT graduates tend to report their competence levels slightly lower. These differences between the two groups were not tested statistically due to the low sample of MAT graduates.

- **Program Strengths and Weaknesses**

In addition to the data collected from the MOSTEP competency areas, students responding to the COE graduate follow-up survey also provided data regarding their perceived strengths and weaknesses of the MAT program. Overall, approximately 49% of students responding indicated support from faculty/staff and accelerated pace of the program as the biggest strengths. While some concerns were noted, these tended to vary based on respondent with no overall consensus for one specific concern/weakness noted. These data shown in Tables 14a-c and Figure 14.

*Table 12. Means and (SD) for MAT students, administrator & colleague survey comparison for 2001, 2002, and 2003 cohorts upon completion of 1st year of teaching. (n=77)*

Curriculum Topics/Issues	Student Evaluation (n=19)	Administrator Evaluation (n=32)	Colleague Evaluation (n=26)
Instructional Techniques	4.95 (0.911)	5.13 (1.385)	5.12 (1.532)
Lesson Plan Development	5.00 (0.943)	5.00 (1.414)	5.12 (1.705)
Student Learning Objectives	4.79 (1.134)	4.88 (1.454)	5.31 (1.644)
Meeting the Needs of Special Needs Students	4.16 (1.344)	4.34 (1.359)	4.79 (1.474)
Learning Theory	4.68 (0.885)	4.56 (1.501)	5.27 (1.485)
Assessment & Evaluation	4.47 (1.307)	4.63 (1.561)	4.92 (1.742)
Course Outlines & Syllabi	4.05 (1.682)	4.87 (1.477)	5.23 (1.751)
Legal Issues	3.11 (1.524)	3.93 (1.484)	4.00 (1.319)
Community/ Parent Involvement	3.42 (1.835)	4.65 (1.380)	4.92 (1.647)
Classroom Management	3.84 (1.537)	4.38 (1.930)	4.92 (2.038)
Educator Resources	3.63 (1.674)	4.80 (1.186)	4.85 (1.541)
Student Motivation	3.79 (1.653)	4.53 (1.849)	5.12 (1.751)
Crisis Planning/ Prevention	2.47 (1.744)	3.83 (1.560)	4.35 (1.056)
Administrative Policies/ Procedures	3.11 (1.696)	4.22 (1.157)	4.65 (1.522)
Board of Education Policies/ Procedures	2.42 (1.539)	4.03 (1.098)	4.27 (1.282)
<b>Grand Mean Score</b>	<b>3.86</b>	<b>4.52</b>	<b>4.86</b>

Scale: 0 = No Knowledge, 1 = Very Limited Knowledge, 2 = Limited Knowledge, 3 = Somewhat Knowledgeable, 4 = Adequate amount of knowledge, 5 = More than Adequate Knowledge, 6 = Significant Knowledge, 7 = Extremely Knowledgeable

**Table 13. Frequencies, (Percent), Means, and Standard Deviations for the MAT graduates responses to MoSTEP Competencies (n=15)**

To what degree do you believe you are competent in your teaching abilities to...	Not Competent	Somewhat Competent	Competent	Quite Competent	Highly Competent	Mean	Standard Deviation
• <b>Understand</b> the discipline and content in society	0 (0.00%)	0 (0.00%)	1 (6.70%)	9 (60.00%)	5 (33.30%)	<b>3.27</b>	0.59
• <b>Provide</b> appropriate learning opportunities	0 (0.00%)	0 (0.00%)	1 (6.70%)	11 (73.30%)	3 (20.00%)	<b>3.13</b>	0.52
• <b>Create</b> instructional opportunities for diverse learners	0 (0.00%)	1 (6.70%)	1 (6.70%)	10 (66.70%)	3 (20.00%)	<b>3.00</b>	0.76
• <b>Develop</b> curriculum based on Missouri standards	0 (0.00%)	2 (13.30%)	2 (13.30%)	8 (53.30%)	3 (20.00%)	<b>2.80</b>	0.94
• <b>Implement</b> curriculum based on Missouri standards	0 (0.00%)	0 (0.00%)	4 (26.70%)	8 (53.30%)	3 (20.00%)	<b>2.93</b>	0.70
• <b>Evaluate</b> curriculum based on Missouri standards	1 (6.70%)	1 (6.70%)	2 (13.30%)	9 (60.00%)	2 (13.30%)	<b>2.67</b>	1.05
• <b>Promote</b> critical thinking and problem solving	0 (0.00%)	0 (0.00%)	3 (20.00%)	7 (46.70%)	5 (33.30%)	<b>3.13</b>	0.74
• <b>Motivate</b> students to learn	0 (0.00%)	0 (0.00%)	5 (35.70%)	3 (21.40%)	6 (42.90%)	<b>3.07</b>	0.92
• <b>Model</b> effective communication techniques in the classroom	0 (0.00%)	0 (0.00%)	4 (26.70%)	5 (33.60%)	6 (40.00%)	<b>3.13</b>	0.83
• <b>Use formal</b> assessments	0 (0.00%)	0 (0.00%)	3 (20.00%)	8 (53.30%)	4 (26.70%)	<b>3.07</b>	0.70
• <b>Use informal</b> assessments	0 (0.00%)	0 (0.00%)	3 (20.00%)	8 (53.30%)	4 (26.70%)	<b>3.07</b>	0.70
• <b>Reflect</b> on practice to improve instruction	0 (0.00%)	0 (0.00%)	2 (13.30%)	7 (46.70%)	6 (40.00%)	<b>3.27</b>	0.70
• <b>Reflect</b> on practice to grow as a professional	0 (0.00%)	1 (6.70%)	3 (20.00%)	7 (46.70%)	4 (26.70%)	<b>2.93</b>	0.88
• <b>Foster</b> relationships with colleagues to support student learning	0 (0.00%)	0 (0.00%)	3 (20.00%)	7 (46.70%)	5 (33.30%)	<b>3.13</b>	0.74
• <b>Foster</b> relationships with parents to support student learning	0 (0.00%)	1 (6.70%)	5 (33.30%)	5 (33.30%)	4 (26.70%)	<b>2.80</b>	0.94
• <b>Foster</b> relationships with the community to support student learning	1 (6.70%)	2 (13.30%)	3 (20.00%)	5 (33.30%)	4 (26.70%)	<b>2.60</b>	1.24

**Table 14a. Number 1 Strength of MAT Program**

Strength of the MAT program	# of response
Total Time Required	6
Support from SMSU staff and faculty	2
Instructional Techniques	2
Teaching Experiences	1
Diversity of Represented Areas	1
Other - program itself, comprehensiveness	2

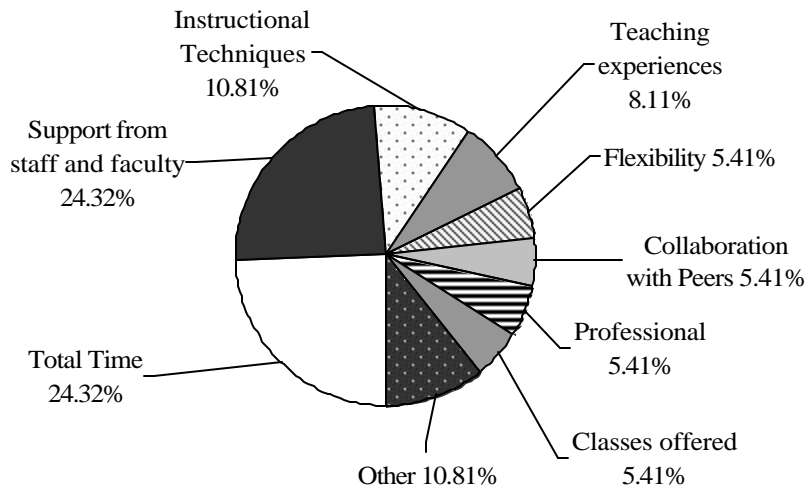
**Table 14b. Number 2 Strength of MAT Program**

Strength of the MAT program	# of response
Total Time Required	2
Support from SMSU staff and faculty	5
Instructional Techniques	2
Classes offered	2
Teaching Experiences	1
Flexibility	1
Collaboration with peers	1
Professional	1

**Table 14c. Number 3 Strength of MAT Program**

Strength of the MAT program	# of response
Total Time Required	1
Support from SMSU staff and faculty	2
Teaching Experiences	1
Flexibility	1
Collaboration with peers	1
Professional	1
Other - not a lot of busy work, education history/significance, uniquely authentic, individualized attention	4

**Figure 14. Overall Strengths of MAT Program**



## FUTURE DIRECTIONS

### **Program Sustainability**

As with other federally funded initiatives, program sustainability must be addressed. With grant funding from the Title II Teacher Quality Initiative ending September 2005, the College of Education began the process of planning for the sustainability of the MAT in the fall of 2004. From this initial planning, there have been three outcomes that will lead to the continued support and success of the MAT program.

First, the University has approved a new position, Director of Special Programs and Accreditation for the COE. The duties associated with the position include directing the MAT program, facilitating accreditation efforts for the COE and Professional Education Unit (PEU), directing secondary education for the teaching courses as appropriate, and coordinating other special programs, as assigned. Missouri State University's efforts to create such a position demonstrates the commitment to continuing an alternative route to teacher certification that provides valuable support to southwest Missouri school districts in need of highly qualified content area teachers.

Second, the Missouri State University Board of Governors and Coordinating Board of Higher Education has just approved a collaborative effort between Missouri State University (MSU) and Missouri Southern State University (MSSU) in Joplin, Missouri to provide MAT students opportunities to take coursework on the MSSU campus as well as on the Missouri State University campus. The summer 2005 cohort was the first group of MAT students given this opportunity. Currently, 78% (n = 45) of Cohort #5 are taking the coursework on the Missouri State University campus with 22% (n = 13) opting to take courses on the MSSU campus. This partnership is yet another example of MSU's commitment to supporting this alternative certification program.

In addition, efforts have also been made by the College of Education in coordination with the Mexican government to begin an exchange program for graduate students in Mexico who are interested in pursuing their Master's degree in education. Utilizing the MAT program, these students could receive a degree from an accredited American institution of higher education, and provide a valuable service to rural districts in southwest Missouri with high immigrant population. While working on their MAT, these students from Mexico would serve as classroom teachers in districts with a high percentage of non-English speaking students.

*(Note: The above text is taken from the MAT Policy Brief published by the Institute for School Improvement August 2005).*