A Compilation of Survey Data and Focus Group Findings: Texas Elementary Teachers’ Views of Needed Professional Development to Support Mathematics Instruction for English Language Learners

Sandra Richardson, Ph.D.
MaryE. Wilkinson, Ph.D.
Table of Contents

Background....................................................................................................................................................2
Introduction to the Lamar University Project.................................................................................................3
A Summary of Survey Data Findings..................................................................................................................4
A Summary of Four LU MELL Initiative Focus Groups.......................................................................................4
  Summary of Participant Selection and Data Collection....................................................................................4
  Protocol for Focus Groups...............................................................................................................................4
  Findings of Four LU MELL Initiative Focus Groups.......................................................................................4
    Brief Discussion of Questions and Comparison of Focus Group Findings..................................................4
Comparison of Survey Data..................................................................................................................................4
Appendix A – Elementary Teachers’ Training Needs for ELL (English Language Learner) Instruction Survey...............................................................................................4
  Dear Colleague: (Principal)..............................................................................................................................4
  Dear Colleague: (Mathematics Teacher)...........................................................................................................4
  Elementary Teachers’ Training Needs for ELL (English Language Learner) Instruction Survey........................4
Appendix B – Responders’ Comments for the Elementary Teachers’ Training Needs for ELL (English Language Learner) Instruction Survey..............................................................................4
Appendix C: MELL Focus Group Protocol.........................................................................................................4
References............................................................................................................................................................4
A Compilation of Survey Data and Focus Group Findings: Texas Elementary Teachers’ Views of Needed Professional Development to Support Mathematics Instruction for English Language Learners

Background

The Texas State University System Mathematics for English Language Learners Project (TSUS MELL) is a multiyear effort focusing on developing instructional resources designed to increase the effectiveness of mathematics instruction for students who are English Language Learners (ELL). This project is a partnership between the Texas State University System, its component universities, and the Texas Education Agency.

The project will identify common issues associated with teaching mathematics to ELL students, develop tools and training for educators keying classroom practice frameworks to these issues, and develop guidance for policymakers about how to more effectively assist ELL students and teachers in increasing proficiency in mathematics. Resources developed by the project will be made widely available to all schools and universities in Texas. As products are developed, strong partnerships will be built with other universities, K-12 schools, intermediate education service agencies, and state agencies to ensure effective and wide scale distribution.

Students whose native language is not English and who are in the process of developing English speaking and writing skills experience significant challenges in mathematics classes. As a group, ELL students consistently score among the lowest of any student group on the Texas Assessment of Knowledge and Skills (TAKS). Growing evidence suggests that low performance on standardized assessments by ELL students has little to do with innate mathematical ability and much to do with cultural differences in the ways mathematics concepts are taught in other countries and with linguistic (vocabulary) barriers commonly found among non-native English speakers. The direct policy rationale for the MELL project, therefore, is simple: Improved understandings about how to teach mathematics to ELL students will result in improved student achievement. The project is keyed to identifying the underlying cultural and linguistic components of poor mathematics performance among ELL students and to developing practical teaching tools that address those issues.

A group comprised of researchers from institutions across the TSUS system and a number of state and national research advisors serve as the MELL Project Steering Committee. Tasked to oversee the work of the initiative, this committee meets regularly to guide and review project work.

Introduction to the Lamar University Project

The primary goal of this product is to support mathematics instruction for English Language Learner (ELL) students in Texas through citing elementary teachers’ perceptions of needed professional development in this area. Such professional development training needs include, but are not limited to, in-service training, supportive instructional resources and tools, and implementation of specific professional
development programs. The aforementioned perceived training needs were ascertained through the collection and analysis of data from two key resources: survey data and focus group findings.

An interview form survey was distributed to teachers in every region of the state of Texas, with emphasis on areas with high populations of ELL students. 101 of the 450 surveys distributed were returned and analyzed. Select elementary teachers, some of whom completed the survey, were invited to participate in small focus group interviews. Lamar University (LU) hosted a total of three focus groups throughout the state, including focus groups in central Texas, south Texas, and southeast Texas. The number of participants in each focus group varied, ranging from seven to eleven participants. The analysis of data collected from the surveys and focus groups has contributed to the development of a record of teachers’ insight on needed professional development for supporting instruction for ELL students.

The project’s targeted audience included primarily elementary teachers who were currently teaching or had taught a significant number of ELL students. However, the project coordinators also interviewed other educators, including elementary ELL/ESL teachers who taught no specific content discipline, curriculum coordinators, and school administrators. A previous study with a focus on the perceived professional development needs of secondary mathematics teachers was completed prior to this project. A brief comparison of the two groups is presented later in the paper.

A Summary of Survey Data Findings

As a first step in identifying elementary teachers’ perceived professional development needs to better support mathematics instruction for their ELL students, survey packets (with three surveys in each packet) were mailed to 150 randomly selected elementary schools throughout the state of Texas, including each of the 20 Texas Education Service Areas. 101 of the surveys were returned, representing a 22% return rate. Each packet in the January 2005 distribution was addressed directly to the school’s principal with a cover letter requesting that the principal distribute the survey to three of the school’s teachers who teach mathematics to a significant population of ELL students. Below is a brief summary of survey questions and corresponding responses, along with data plots that represent responses from selected questions. A copy of the survey form, with letters, can be found in Appendix A. Complete transcribed comments are in Appendix B.

1. What do you see as your school’s greatest training need for enhancing mathematics instruction for ELL students?

Question #1 was a free response item seeking comments about the school’s greatest training need for enhancing mathematics instruction for ELL students. The 101 responses can be grouped into 6 broad categories, with some cross-category responses. The largest category, with 45 responses were requests for specific teaching techniques to help ELL students succeed in mathematics, with special attention on realigning the curriculum, providing needed training on manipulative usage, and providing ready-made mathematics activities to use in classrooms with ELL students. Fifteen comments dealt
directly with language and/or vocabulary, including vocabulary training for teachers, training on understanding how ELL students learn, and methods to assist students learning new vocabulary. More than ten responses implied concerns about administrative issues such as requiring teachers to attend workshops, hiring teachers qualified to teach ELL students, more time for planning, and motivation for teachers to look kindly upon ELL students. Four responses focused on students themselves, suggestions included placing students in special classes or providing smaller class sizes for teachers of ELL students. Only two comments were requests for authentic ways to assess ELL students’ abilities and needs and four comments indicated a need for improving parental involvement and teacher collaboration.

2. Do you hold any specialized credentials for instructing ELL students?

Question #2 requested specific information about credentials related to teaching ELL students. Responses indicate that almost 81% of the teachers surveyed hold either a Bilingual certificate, ESL certificate, or Bilingual/ESL certificate.

3. Does your school have an employed ELL teacher on staff?

4. Do you think it is necessary for your school to employ an ELL teacher?

Responses to Questions #3 and #4 implied that 40% of the responders’ schools had no ELL teacher on staff, while 71% of the responders felt that their schools should fill this position. Comments on Question #4 indicated that classroom aides proficient in Spanish, as well as school based ELL coordinators would be extremely beneficial. Additionally, it was suggested that ELL advisors should be full time and proficient in teaching the content areas, specifically mathematics.

5. Have you received any training or professional development in working with ELL students?

6. If yes, how helpful was the training?

Questions #5 and #6 requested information about previous professional development experienced by the responders. 87% of the responders indicated that had received professional development, ranging from a half-day program to extensive workshops. Of those who have experienced professional development, 27% found the programs to be very helpful and 31% found the experiences to be somewhat helpful.

7. Approximately how many ELL students do you currently teach?
   1. 0  2. 1-10  3. 10-20  4. 20-30  5. more than 30

8. Rank the population size of the ethnic background of ELL students you currently teach, with 1 representing the largest population).

Question #7 asked about how many ELL students are typically enrolled in a responder’s classes. 10 responders reported more than 30 students per school year, 21% reported
having 20 to 30 students in classes, 20% reported having 10 to 20 students in classes, and 26% reported having 1 to 10 students in classes. Responses to Question #8 indicated that 97% of the ELL students in responders’ classrooms are Hispanic.

9. In comparison to the general student population of your school, how well do your ELL students perform in mathematics? 

   3 = very well, 2 = similar, and 1 = not as well

In Question #9, responders were asked to compare the achievement of their ELL students with the rest of their students. Only 8% of ELL students outperform other students, while 46% perform about as well as other students. Comments on this question mentioned language and economic disadvantages for many students.

10. Are you aware of the kinds of instructional and assessment modifications that should be used in order to make your lesson content comprehensible to your ELL students?

   In Question #10, approximately 82% of the responders said that they are aware of instructional and assessment modifications, but comments most often mentioned “common sense” and requests for more useful teaching techniques rather than accommodations for ELL students.

11. Would you support extended day opportunities for ELL students so that they can receive help with their schoolwork and/or participate in extracurricular activities?

   Question #11 asked if teachers would support extended day opportunities so that ELL students could receive help with their schoolwork and/or participate in extracurricular activities. While 90% of the responders felt that such opportunities should be provided, many stated that opportunities are already available, but most comments raised issues of staffing, funding, and/or students with after school jobs.

12. Would you encourage training on designing alternative assessment tasks and a meaningful assessment plan that uses a diversity of assessment measures to assess ELL students?

   In response to Question #12, 17% of responders did not favor training on designing alternative assessment tasks and a meaningful assessment plan that uses a diversity of assessment measure to assess ELL students.

13. Would you support providing rigorous professional development to teachers of ELL students with a goal of introducing best practices into mathematics classrooms?

   In response to Question #13, teachers overwhelmingly accepted providing needed
professional development to teachers of ELL students, with an emphasis on mathematics.

14. Are you interested in participating in a teacher focus group where the focal point will be to identify and discuss current secondary mathematics teachers’ training needs for enhancing the effectiveness of mathematics instruction for ELL students? 

15. Are you interested in participating in a week-long summer institute where the focus will be to provide teachers with effective teaching strategies and materials for teaching ELL students?

Questions #14 and #15 solicited information about teachers’ interest in attending focus group sessions and summer workshops for ELL issues. Some of the responders attended Lamar University focus group sessions and some may possibly be invited to attend a summer professional development workshop at Lamar University.

16. If you could change one thing about your school’s approach to educating ELL students, what would it be?

Questions #16 was a free response item allowing teachers to dream about a change that would improve instruction for ELL students. A final section allowed room for any additional comment that the responder wanted to provide. While many responses in both areas were very similar to those seen in Question #1, many more teachers took this opportunity to make suggestions that should be directed toward administrators. Teachers are concerned about class sizes, the numbers of ELL students in each class, additional faculty and staff to support ELL students in general and Hispanic students in particular, the availability of quality professional development in mathematics for teachers of ELL students, ensuring that everyone within a school becomes invested in helping ELL students, and their own overloaded work schedules. The comments in these sections should be read as they were written – in the teachers’ voices. While it is not feasible to include all these comments here, all transcribed comments from the survey are provided in Appendix B.

Clearly, teachers have strong opinions about mathematics for ELL students. This survey was designed to determine their perceived needs for professional development to assist ELL students achieve at a high level. Survey data are subjective; the questions asked for opinions and desires. It is obvious that few teachers have experienced professional development that they consider valuable and that many teachers desire the chance to do so. The vast majority of teachers want to help their ELL students make adequate progress in mathematics.

A Summary of Three Lamar University (LU) MELL Initiative Focus Groups

Summary of Participant Selection and Data Collection

Focus groups are one means of complementing survey data and are an
increasingly popular way to learn about teachers’ opinions and attitudes. They are in-depth, qualitative interviews with a small number of carefully selected people who are brought together to discuss a particular topic (Morgan, 1988). In order to ascertain teachers’ perceived training needs to better support mathematics instruction to their ELL students, LU hosted four focus group interview sessions. The first focus group (FG1) was held in Beaumont, TX, the second (FG2) was held in Round Rock, TX, and the third (FG3) was held in Brownsville, TX.

- FG1: Beaumont, TX; 11 participants from southeast Texas school districts
- FG2: Round Rock, TX; 7 participants from central Texas school districts
- FG3: Brownsville, TX; 9 participants from south Texas school districts

Each group offered a unique perspective on identifying the greatest professional development needs in Texas for enhancing mathematics instruction for elementary ELL students. Detailed information on each session is given in the focus group findings section of this report.

Participants for each focus group were selected based on their documented interest expressed in the surveys distributed prior to formation of the focus groups, recommendations made by school principals and vice-principals, and recruitment from LU MELL project investigators based on their prior knowledge of schools with high ELL student populations. As previously mentioned, participants were primarily elementary teachers who were currently teaching or had taught a large number of ELL students. The composition of each focus group consisted of teachers from different schools and/or school districts. Care was taken to ensure that teachers who knew one another were not recruited for the same sessions because research indicates that focus group participants are generally more open and less guarded with people they do not know (Morgan, 1988).

As potential participants were recruited, they received a brief description of what the group would be about, as well as assurances that their participation was entirely voluntary and that their confidentiality would be protected. Each participant was also paid a small stipend, reimbursed for travel expenses, and provided lunch before the start of the session. In hopes of ensuring participants were relaxed about the sessions, a comfortable, relaxed atmosphere was created for each of the focus group sessions. Data from each focus group was captured through video recording, audio recording, and manual note taking. The video recording captured both verbal and nonverbal information and did not seem to inhibit any of the participants, audio recording allowed for verbal information to be obtained verbatim, and manual note taking involved publicly capturing the key points of the discussion by handwriting them on easel pads positioned around the room.

**Protocol for Focus Groups**

All focus groups were conducted by two facilitators. Both facilitators were skilled in maintaining good group dynamics, had the responsibility of keeping the group focused, and ensured the generation of lively and productive discussions about needed professional development for elementary teachers in Texas. Moderating styles were tailored to fit respective groups. However, in general, each 2 hour session began with a
general discussion of the purpose of the session, structure of the focus group, anticipated protocol for the session, and an introduction of the three key questions participants were expected to discuss during the session. The questions were formulated by the project researchers based on the project goals. The group then discussed the questions through talking with one another, asking public questions about what they heard, and reacting to one another’s comments. The three keys questions posed at each session were:

**Question #1:** What is good about professional development for teachers of English Language Learners in Texas?

**Question #2:** What aspects of professional development for teachers of English Language Learners in Texas need improvement?

**Question #3:** What do you believe are the greatest professional development needs in Texas for enhancing mathematics instruction for elementary English Language Learner students?

Each question was purposely phrased in a neutral, open-ended manner in order to secure multiple responses and to ensure that the formulation of the question had no effect on the responses. The questions were carefully sequenced so that the general questions preceded the more difficult ones. Leading questions that suggested the facilitator’s opinion or an anticipated answer were avoided. After participants finished discussing Question #1, Question #2 was introduced. Likewise, Question #3 was introduced after the conclusion of the discussion of Question #2. After all questions were discussed, participants were asked to consensually rank the top three responses for each question. The ranked responses, along with other responses, on perceived needed professional development are discussed in the following section.

**Findings of Four LU MELL Initiative Focus Groups**

The following list summarizes the most frequent responses from focus group participants and hence identify Texas teachers’ perceptions of needed professional development to better support mathematics instruction for elementary ELL students. A more detailed discussion of each session follows. However, because many discussions for individual questions overlapped, there are common responses for different questions. Keys points from each focus group session are mapped to each question in Tables 1 – 3.

1. Provide mandatory professional development (for all teachers) specific to improving mathematics instruction for ELL students.
2. Provide mentor/mentee training.
3. Offer follow-up training and/or resources.
4. Offer professional development during the academic year when teachers are able to use and experiment with it – not in the summer.
5. Provide training in mathematics content.

**Brief Discussion of Questions and Comparison of Focus Group Findings**

Question #1
In response to Question #1, which addressed favorable aspects of professional development for teachers of ELL students, all participants in all sessions agreed that there is limited professional development available specific to mathematics and teaching ELL students. Many teachers commented that they had attended general professional development sessions but the emphasis of these sessions was language or special education – not mathematics. Hence, the participants were unable to answer question one because none had participated in nor had any knowledge of any professional development for teachers of ELL students that was specific to the content area of mathematics. Participating teachers reasoned that advertising for such professional development programs is nonexistent and that no mention of such programs or training had been distributed to districts or teachers in their respective areas.

*Question #1: What is good about professional development for teachers of English Language Learners in Texas?*

<table>
<thead>
<tr>
<th>Southeast TX</th>
<th>Central TX</th>
<th>South TX</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Limited PD available (when available it is tagged onto PD for special learners)</td>
<td>1. Limited PD available (CGI – but not math specific)</td>
<td>2. Limited PD available (Sharon Wells &amp; Investigations)</td>
</tr>
<tr>
<td>2. Bilingual visiting teacher informally assisted teachers</td>
<td>2. LU MELL training</td>
<td>--------</td>
</tr>
<tr>
<td>3. TABE Conference</td>
<td>--------</td>
<td>--------</td>
</tr>
</tbody>
</table>

Table 1: Question #1 Common Responses From Each Focus Group Session

*Question #2*

In response to Question #2, which addressed perceived professional development improvement needs, each focus group agreed that the first mode of improvements should entail offering some type of consistent, required professional development specific to teaching mathematics to ELL students. Additional comments in response to Question #2 from FG1 included introducing multi-district professional development sessions for mathematics teachers. Participants expressed an interest in communicating with teachers who teach in districts similar to their own and who deal with similar issues. FG1 and FG3 participants also highlighted a need for a consistent professional development program used by teachers in a district. Both groups agreed that often the school district makes constant changes to the professional development program and hence teachers are unable to actually determine its effectiveness or become comfortable using it. Other responses to
Question #2 can be reviewed in Table 2.

**Question #2: What aspects of professional development for teachers of English Language Learners in Texas need improvement?**

<table>
<thead>
<tr>
<th>Southeast TX</th>
<th>Central TX</th>
<th>South TX</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Be consistent with implementation of PD programs. Stop jumping around.</td>
<td>2. Offer training specific to mathematics.</td>
<td>1. Offer training for math content preparation and offer variety of training (their district only offers Sharon Wells).</td>
</tr>
<tr>
<td>1. PD should not be stressful for teachers to learn and use.</td>
<td>3. Offer training specific to teaching problem solving.</td>
<td>1. Offer more pedagogical training (i.e. training in use of manipulatives, etc.).</td>
</tr>
<tr>
<td>3. Develop workshops or PD sessions where community of teachers can share ideas.</td>
<td>3. Attempt to modify/alter current PD to fit needs of ELL students in math classrooms.</td>
<td>3. Stop constant jump from PD program to program.</td>
</tr>
<tr>
<td></td>
<td></td>
<td>4. PD should be aligned with TAKS and TEKS requirements.</td>
</tr>
</tbody>
</table>

Table 2: Question #2 Responses From Each Focus Group Session

**Question #3**

In response to Question #3, which addressed perceived greatest professional development needs, all three focus groups ranked the need for follow-up resources and support after receiving professional development. FG2 expressed a need of having a universal professional development program used throughout the district and require all schools to participate in the training. FG3 agreed that all needs discussed were their greatest and hence had difficulty shortening the list. However, FG3 added that professional development should be mandatory for all teachers and should be held on an inservice day. They also agreed that implementing a mentoring program for new teachers of ELL students to be mentored by veteran teachers would be helpful. FG1 suggested partnering with or frequently observing teachers at schools with a high success rate of ELL students.

**Question #3: What do you believe are the greatest professional development needs in**
Texas for enhancing mathematics instruction for secondary English Language Learner students?

1. Need for follow-up resources and support after PD implementation.
3. Partner with, visit, and/or observe teachers at schools using successful programs.
4. Include TAKS related activities for ELL students.

Comparison of Survey Data of Texas Elementary and Secondary Teachers’ Perceived Professional Development Needs for Improving Mathematics Instruction of English Language Learner Students

Although there was some similarity among the survey data collected by both the elementary and secondary teachers, the emphasis from both groups was different. The elementary teachers were primarily concerned with receiving professional development on integrating various mathematics teaching strategies, with specific interest on integrating manipulative usage in such activities; whereas, the secondary teachers were primarily interested in learning about resources, tools, and techniques that have been
proven to be successful. Unlike many of the elementary teachers, the secondary teachers naturally had strong content knowledge and were hence not in need of content training. A comparison of main points from both groups can be found in Table 4.

<table>
<thead>
<tr>
<th>Secondary Teachers’ Responses</th>
<th>Elementary Teachers’ Responses</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Tools and techniques proven to be successful</td>
<td>2. Using manipulatives to teach ELL students mathematics</td>
</tr>
<tr>
<td>1. Mathematics specific vocabulary</td>
<td>2. Mathematics specific vocabulary</td>
</tr>
<tr>
<td>1. Making training applicable to mathematics</td>
<td>2. Comparing learning styles of ELL students and native English speaking students</td>
</tr>
<tr>
<td>1. Team teaching opportunities</td>
<td>2. Incorporation of technology and ready-made activities into lessons</td>
</tr>
<tr>
<td>1. Assessment training</td>
<td>2. Differentiation (multiple ways to teach a concept)</td>
</tr>
</tbody>
</table>

Survey Question 2 asked responders if they held any specialized certifications. As Figure 1 shows, an overwhelming number of the secondary teachers did not but over ¾ of the elementary teachers had such certifications.

Q2: 86% of the surveyed secondary teachers had no specialized credentials for instructing ELL students; whereas, 81% of surveyed elementary teachers did.

![Figure 1: Elementary/Secondary Teachers’ Responses to Survey Question 2](image)

Survey Question 5 surveyed the number of teachers who had received any professional development specific to working with English Language Learners students. Again, the
elementary teachers were more experienced in this area than the secondary teachers (see Figure 2). Figure 3 shows that low percentages of both groups found the received professional development extremely helpful.

Q5: 47% of the secondary teachers surveyed had received no ELL professional development; whereas, only 13% of the elementary teachers had not.

Q6: Only 16% of the secondary teachers who received professional development in the area of ELL found that it was extremely helpful; whereas, 27% of the elementary found it extremely helpful.

In response to survey question 9, half of the secondary teachers surveyed indicated that their ELL students do not achieve at a comparable level as their non-ELL students; whereas, only 10% of the elementary teachers surveyed agreed.
Q9: Of the secondary teachers surveyed, half of their ELL students do not achieve at a comparable level to their non-ELL students.

An overwhelming percentage of both groups of teachers agreed that extended day opportunities for ELL students would benefit them in becoming successful in mathematics.

Q11: 90% of surveyed teachers (both elementary and secondary) would support extended day opportunities for ELL students.
Appendix A - Secondary Mathematics Teachers’ Training Needs for ELL (English Language Learner) Instruction Survey

February 3, 2006

Dear Colleague: (Principal)

The prevailing achievement gap in mathematics between the English Language Learner (ELL) student population and non-ELL student population demands immediate action. Lamar University is part of a major funding effort by the Texas State University System (TSUS) to identify teachers’ training needs for enhancing the effectiveness of mathematics instruction for students who are English Language Learners (ELLs). The grant involves five TSUS universities and has a monetary value in excess of $1,000,000. Our goal is to develop and provide a series of resources for teachers of ELL students throughout the state of Texas that are expected to improve teacher efficacy and ELL student proficiency in the area of mathematics.

We need your school’s help. We are asking that you distribute the surveys included in this packet to a select group of teachers at your school, specifically teachers who have a high enrollment of ELL students in their classes or teachers or other educators who have experience working with ELL students in the area of mathematics. Please encourage the teachers to complete and return the survey. It is important that all teachers selected participate so that results will fairly represent Texas teachers teaching mathematics to ELL students. Also, in helping us identify the specific types of training needs that mathematics teachers and other educators need to improve mathematics instruction, we hope to raise ELL student achievement in mathematics.

Thank you for encouraging your teachers and any other of your school’s educators who have experience working with ELL students in the area of mathematics to complete this survey. Teachers who complete and return surveys by the postmarked deadline may possibly be selected to participate in a paid focus group discussion. Please ensure returned surveys are postmarked by March 3, 2006. Pre-addressed, postage-paid envelopes are provided along with the surveys we request that you distribute.

If you have any questions pertaining to the survey or goals of the project, please contact:

Dr. Sandra Richardson
Mathematics Department
P.O. Box 10047
Beaumont, TX 77710
1-0-0 (Office)
richardson@math.lamar.edu

Sincerely,

Sandra Richardson, Ph.D.
Assistant Professor of Mathematics
Dear Colleague: (Teacher)

Thank you for participating in this survey. The prevailing achievement gap in mathematics between the English Language Learner (ELL) student population and non-ELL student population demands immediate action. The purpose of this survey is to identify current teachers’ training needs for enhancing the effectiveness of mathematics instruction for students who are English Language Learners (ELLs). This project is part of a major funding effort by the Texas State University System (TSUS), involves five TSUS universities, and has a monetary grant in excess of $1,000,000. The joint effort of all involved affiliates is to develop and provide a series of resources for teachers of ELL students. **We need your help.** It is important that all teachers participate so that results will fairly represent Texas teachers teaching mathematics to ELL students. Teachers who complete and return surveys by the postmarked deadline may possibly be selected to participate in a paid focus group discussion.

Your answers will be kept strictly confidential. Results of the survey will be reported only in summary or statistical form, so that neither individuals nor their schools can be identified.

Thank you again for completing this survey. **Please ensure returned surveys are postmarked by March 3, 2006.** Please use the pre-addressed, postage-paid envelope that is provided to seal your response by this date.

If you have any questions pertaining to the survey or goals of the project, please contact:

Dr. Sandra Richardson  
Mathematics Department  
P.O. Box 10047  
Beaumont, TX 77710  
1-0-0  
richardson@math.lamar.edu

Sincerely,

Sandra Richardson, Ph.D.  
Assistant Professor of Mathematics
Survey of Elementary Teachers’ Training Needs for Mathematics Instruction of ELL (English Language Learner) Students

Please answer all questions honestly and candidly by either circling or writing your applicable response. We appreciate all comments. Please include any comments you deem appropriate in the blank space after each corresponding question. Space is allotted for general comments at the end of the survey.

Surveys should be postmarked by March 3, 2006. See cover letter for more detailed information.

Name & Position: ___________________________ District: ___________________________
School: ___________________________________ Grade level you teach (if applicable): ________
Total years in position: _______________  Grade level you teach (if applicable): ________

1. What do you see as your school’s greatest training need for enhancing mathematics instruction for ELL students?

________________________________________________________________________
________________________________________________________________________
________________________________________________________________________

2. Do you hold any specialized credentials (such as ESL or ESOL certification, language development specialist, bilingual certificate, etc.) for instructing ELL students?
   Yes (please specify): ___________________________

3. Does your school have an employed ELL teacher on staff?
   Yes   No
If yes, how helpful is the employed ELL teacher in helping you better instruct your ELL students in the area of mathematics?
   5 = extremely helpful, 3 = somewhat helpful, and 1 = not helpful

   5     4     3     2     1

4. Do you think it is necessary for your school to employ an ELL teacher?
   Yes   No

5. Have you received any training or professional development in working with ELL students?
   Yes   No
6. If yes, how helpful was the training?  
   5 = extremely helpful, 3 = somewhat helpful, and 1 = not helpful
   5 4 3 2 1

   a teacher focus group where the focal point will be to identify and discuss

7. Approximately how many ELL students do you currently teach?  
   0 1-10 10-20 20-30 more than 30

8. Rank the population size of the ethnic background of ELL students you currently teach, with 1 representing the largest population.  
   ____ Hispanic  
   ____ Asian/Pacific Islander  
   ____ Other (please specify ____________________________ )

9. In comparison to the general student population of your school, how well do your ELL students perform in mathematics?  
   5 = very well, 3 = similar, and 1 = not as well
   5 4 3 2 1

10. Are you aware of the kinds of instructional and assessment modifications that should be used in order to make your lesson content comprehensible to your ELL students?  
    Yes  No

11. Would you support extended day opportunities for ELL students so that they can receive help with their schoolwork and/or participate in extracurricular activities?  
    Yes  No

12. Would you encourage training on designing alternative assessment tasks and a meaningful assessment plan that uses a diversity of assessment measures to assess ELL students?  
    Yes  No

13. Would you support providing rigorous professional development for teachers of ELL students with a goal of introducing best practices into mathematics classrooms?  
    Yes  No

14. Are you interested in participating in a teacher focus group where the focal point will be to identify and discuss

Lamar University - Richardson & Wilkinson
current teachers’ training needs for enhancing the effectiveness of mathematics instruction for ELL students?

Yes  No

16. If you could change one thing about your school’s approach to educating ELL students, what would it be?

Additional comments are appreciated and welcomed:

Thank you for completing this survey!
Appendix B – Responders’ Comments for the Secondary Mathematics Teachers’ Training Needs for ELL (English Language Learner) Instruction Survey

**Question #1:** What do you see as your school’s greatest training need for enhancing mathematics instruction for ELL students?

**Question #4:** Do you think it is necessary for your school to employ an ELL teacher?

**Question #5:** Have you received any training or professional development in working with ELL students?

**Question #9:** In comparison to the general student population of your school, how well do your ELL students perform in mathematics?

   3 = very well  2 = similar  1 = not as well

**Question #10:** Are you aware of the kinds of instructional and assessment modifications that should be used in order to make your lesson content comprehensible to your ELL students?

**Question #11:** Would you support extended day opportunities for ELL students so that they can receive help with their schoolwork and/or participate in extracurricular activities?

**Question #12:** Would you encourage training on designing alternative assessment tasks and a meaningful assessment plan that uses a diversity of assessment measure to assess ELL students.

**Question #13:** Would you support creating a teacher academy to provide rigorous professional development to teachers of ELL students with a goal of introducing best practices into mathematics classrooms?

**Question #14:** Are you interested in participating in a teacher focus group where the focal point will be to identify and discuss secondary mathematics teacher’ training needs for enhancing the effectiveness of mathematics instruction for ELL students?
Question #15: Are you interested in participating in a week long summer institute where the focus will be to provide teachers with effective teaching strategies and materials for teaching ELL students?

Question #16: If you could change one thing about your school’s approach to educating ELL students, what would it be?

ADDITIONAL COMMENTS:
Appendix C: MELL Focus Group Protocol

Personnel

- One or two facilitators who will nurture the process, but not participate. A facilitator will provide a 10-minute introduction, ensure that the group adheres to the schedule, focus lines of questions, ask for clarification of responses when necessary, and conclude the session with a summarization of the group’s discussion.

- Five to ten elementary teachers with a significant population of ELL students

Supplies and Equipment (some optional)

- Tablets, pencils, pens, bottled water, hard candies
- Three flip charts, multiple colors of felt markers, adhesive tape
- Nametags for participants and facilitators
- Recording device and audio/video tape

Role of the Facilitator

- Collect useful information to meet the goals of the meeting (most important of all roles)
- Record the session and keep track of time. If you use 60-minute recording tapes, please remember to change tapes after 60 minutes.
- Carry out the agenda
- Carefully word each question
- Take notes on the flip chart (and in a personal notebook if necessary)
- Ensure all teachers are participating in discussions and that participation is evenly distributed. This is why nametags are so useful. If the same people seem to be dominating the conversation (or if some people are not participating in the conversation), then ask for opinions – perhaps by going around the table to ask each person to contribute a thought/opinion on a given topic.
- Close the session.

Procedures

Facilitator(s) Setup Duties (20 minutes prior to beginning focus group)

- Position the flip charts in convenient places throughout the room.
- List each question on the second page of a flip chart. It is important that the participants do not see the questions until the session actually begins.
  - Question #1 - What is good about professional development for teachers of English Language Learners in Texas?
  - Question #2 – What aspects of professional development for teachers of English Language Learners in Texas need improvement?
Question #3 - What do you believe are the greatest professional development needs in Texas for enhancing mathematics instruction for secondary English Language Learner students?

- Meet and greet the participants
- Provide each participant with a notebook and pencil and/or pen
- Because we want all participants to be comfortable and relaxed, it also may be wise to have either bottled water for each participant or a pitcher of water with plastic cups. Hard candy is sometimes helpful if throats become dry while brainstorming.

Introduction (10-15 minutes)

- Start the recording device.
- Thank participants for participating and introduce yourself as the facilitator of the focus group.
- Explain the means of recording the session and assure the participants that the recording will not be viewed by anyone other than the researchers.
- If you have not already done so, ask each participant to complete a Lamar University Request to Pay Vendor (RPV) form and human consent form.
- If you choose, have each participant briefly introduce him/herself.
- Briefly review the structure of the focus group. (You can say … We will meet for 1.5 to 2 hours today. My intentions are to introduce three questions for group discussion. It is important that everyone participates in the discussion through brainstorming, building on one another’s comments, agreeing or disagreeing with one another, discussing personal experiences with students and teachers, etc… I have three ground rules: 1) Stay focused on the task that we are trying to accomplish; 2) Maintain momentum, and; 3) Achieve consensus on the best responses to the questions.)
- Briefly remind the audience of the purpose of the session. (You can say … As we are all aware, the achievement gap in mathematics between the English Language Learner (ELL) student population and non-ELL student population demands action. The Texas State University System (TSUS) is part of a major funding effort to identify secondary mathematics teachers’ training needs for enhancing the effectiveness of mathematics instruction for ELL students. The grant involves five TSUS universities and has a monetary value in excess of $1,000,000. Our goal is to develop and provide a series of resources for secondary teachers of ELL students throughout the state of Texas, improving ELL student proficiency in the area of mathematics. We hope that the data that we gather from this focus group will significantly impact training needs for teachers.)
- Emphasize that your role is merely that of a facilitator because you want this to be more of a discussion among participants, not a lecture or revelation of your thoughts. Hence, all participants should keep the conversation going (as we know teachers can easily do).
- Ask if there are any questions before you begin.

Phase I (45-60 minutes)

- Introduce the three questions by removing or flipping the first page of each flip chart.
• Ask participants to brainstorm about the questions (5 minutes) with the intent of helping us identify training needs for teachers of ELL students.
• Begin with question 1 (although it is likely that responses will often address all three questions). Ask someone to begin the discussion on question 1.
• When you feel that an opportune segue to the next question presents itself, introduce the next question.
• Record comments on the flip chart under the respective question. As more comments are added, it will likely be necessary to tape a full page to the wall and continue writing comments on the next page. Please number pages. For instance, comments for Question 1 may be labeled Q1-P1, Q1-P2, etc…

Phase II (30-40 minutes)
• Ask participants to review the questions and the recorded information on the pages on the wall.
• Ask participants to rank the top five items for each question – go for consensus. Summarize all information gathered.
• As participants agree on the top five items, transfer the top ranked items to clean pages on the flip charts.

Phase III (10 minutes)
• Ask for any final thoughts, was this session helpful, etc…
• Thank participants again for coming and answer any final questions. They can call Dr. Richardson with any questions.
• They will receive their stipends via mail as soon as the paper work is processed at Lamar University.

Facilitator Post-Focus Group Task
Gather recorded tapes.
Gather notes made on flip chart. Put them in one pile.
Gather any of your written notes (clarify any scratching, ensure pages are numbered, etc...)
Write down any observations that you made during the session that you did not record.
Contact either Sandra Richardson sandra.richardson@lamar.edu or MaryE Wilkinson maryewilkinson@lamar.edu to finalize data pickup arrangements.
References

The TSUS MELL Project Web Site   [http://www.tsusmell.org/pages/1/index.htm](http://www.tsusmell.org/pages/1/index.htm)