Seminar and TRB Conference Attendance: Year 7

By

Michael D. Anderson, Ph.D.
Department of Civil and Environmental Engineering
University of Alabama in Huntsville
Huntsville, Alabama

Virginia P. Sisiopiku, Ph.D.
Department of Civil, Construction, and Environmental Engineering
University of Alabama at Birmingham
Birmingham, Alabama

And

Yingyan Lou, Ph.D.
Department of Civil, Construction, and Environmental Engineering
University of Alabama
Tuscaloosa, Alabama

Prepared by

UTCA

University Transportation Center for Alabama

The University of Alabama, The University of Alabama in Birmingham, and The University of Alabama at Huntsville

UTCA Report Number 09307 June 2011 Technical Report Documentation Page

1.Report No FHWA/CA/OR-	2.Government Access	ion No.	3.Recipient Catalog No.
4.Title and Subtitle		5.Report Date	
Seminar and TRB Conference	e Attendance: Year 7	June 2011	
7.Authors		8. Performing	Organization Report No.
Michael Anderson, Virginia Sisiopiku, and Yingyan Lou		UTCA Report 09307	
9.Performing Organization Name and Address Department of Civil and Environmental Engineering University of Alabama in Huntsville		10.Work Unit No.	
Huntsville, AL 35899	ntsvine	11.Contract or	Grant No.
12.Sponsoring Agency Name and	I Address	13.Type of Rep	port and Period Covered
University Transportation Center for Alabama Box 870205		Final Report: 10/01/2009 – 2/28/2010	
1105 Bevill Building		14.Sponsoring	Agency Code
Tuscaloosa, AL 35487-0205		, , , , ,	
45 Owner laws and a Market			

15.Supplementary Notes

16.Abstract

Students from the three campuses of the University of Alabama System are engaged in a variety of transportation-related research activities. This project intended to provide a forum for transportation students to present their research results to faculty and students from the University of Alabama System as well as transportation professionals in a professional setting. The students selected to make presentations by faculty representatives from the three campuses were rewarded with travel money to cover the cost of attending the Transportation Research Board Annual Meeting in Washington, DC.

17.Key Words Student Seminar, TRB Annual Meeting		18.Distribution Statement	
19.Security Class (of this report)	20.Security Class (of this page)	21.No. of pages	22.Price

Contents

Cor	itents	. iii
List	of Figures	. iv
Exe	cutive Summary	v
	Introduction	
2.0	Selection of Students	2
3.0	Student Seminar	4
4.0	TRB Attendance	5
5.0	Conclusions	6

List of Figures

Number		Page
2-1	Announcement for UAH students	2
3-1	Program for student seminar	4

Executive Summary

There were two issues examined in this project. First, students from the three University of Alabama campuses need the opportunity to present the results of their research in a professional forum. Second, students need the opportunity to attend international meetings to learn firsthand research being conducted at other universities. This project addressed these issues by identifying deserving students and providing a forum to highlight their research and a means to explore other research being performed nationwide through attendance at the Transportation Research Board Annual Meeting.

Section 1 Introduction

The issues examined in this project were twofold. First, there is a variety of quality transportation research being performed by undergraduate and graduate students from the three universities in the Alabama System. Unfortunately, no mechanism existed for students to present the results of their research to the other faculty members from their home campus or the other campuses. The solution developed in this project was the development of a transportation student seminar hosted by the Institute of Transportation Engineers student chapter at the University of Alabama at Birmingham (UAB). Students from the three campuses were required to submit an original abstract and resume to faculty members from the three schools. The faculty members then formed a review board and selected students to make presentations at the technical session.

The second issue addressed in this proposal was the lack of funding to send some of the best students in Alabama to the Transportation Research Board Annual Meeting in Washington, DC. This meeting is one of the premiere transportation conferences in the world, attracting over 10,000 participants from around the globe. Attendance at this meeting enabled our students to experience firsthand the research questions being studied and the solutions to those questions. Attendance at this meeting represented an incredible opportunity for students from the University of Alabama System to learn about the future of transportation and how their education and research will help realize the future.

This project combined these two issues by awarding travel funds to students to attend the Transportation Research Board Meeting as a reward for being selected to present in the student seminar. This report is divided into five chapters. The introduction presents the basis of the project. Chapter two discusses the selection and review process used to pick the students invited to present. Chapter three provides a review of the student seminar. Chapter four presents the impact from the students attending the TRB Annual Meeting. The final chapter of this report provides an overview of results and expectations for future projects.

Section 2 Selection of Students

The initial task for this project focused on advertising and selecting the students to present at the seminar designed for student research. The advertising was accomplished through an announcement requesting students to submit an abstract of their potential research for consideration. As an example, the announcement for the University of Alabama in Huntsville (UAH) is shown in Figure 2-1. Copies of the announcement were distributed to the project's campus representatives; they were responsible for placing these so students would see the announcements and become interested.

UA-Huntsville Students Performing Transportation Research

The University Transportation Center for Alabama (UTCA) is sponsoring a student research competition with a chance to present your research at a professional forum and earn a trip to the Transportation Research Board Meeting in Washington, D.C., January 2010.

Anyone interested in the UTCA student research competition needs to submit an abstract of current research and a resume via email to Dr. Michael Anderson by October 28, 2009. The abstract must be less than 500 words and detail a transportation related project. From the submitted abstracts, up to three students will be selected to possibly present their research at a professional meeting to be held in late November/early December and receive money to attend the Transportation Research Board Meeting in Washington, D.C. in January 2010. The students who travel to Washington D.C. will be required to prepare a brief report documenting their experience. Any student who will be enrolled full-time through the spring 2010 semester is eligible.

For more information, please contact Dr. Anderson in the Department of Civil and Environmental Engineering at 256-824-5028 or mikea@cee.uah.edu.

Figure 2-1. Announcement for UAH students

Each announcement directed students to submit their abstracts and resumes to the on-campus representative. Then the two representatives from the other campuses reviewed the abstracts and resumes. This process helped remove any bias that might exist from the review process, as faculty who had worked closely with applicants were not allowed to judge those applicants. In addition, the abstracts were made available to external members of the UTCA advisory board for review. The reviews from the faculty representatives were then forwarded to Dr. Anderson, summaries were developed, and letters of acceptance to present a paper or a poster at the conference were sent to the students.

Overall, 12 students from all three campuses—4 from University of Alabama (UA), 3 from UAB, and 5 from UAH—submitted abstracts and resumes for the program. Based on the travel

funds and seminar time available, one student from each campus was selected to present a formal paper at the seminar and receive funding to attend the TRB Annual Meeting, and six students (two each from UA, UAB, and UAH) were selected to receive funding to attend the TRB Annual Meeting.

Section 3 Student Seminar

The second task conducted in this project was to host a student seminar. The student seminar was developed and hosted by UAB's student chapter of the Institute of Transportation Engineers (ITE) and held on November 20, 2009 in the Business and Engineering Complex on the UAB campus, a location easily accessible to students and faculty from the three campuses and to representatives from around the state. The announcement for the student seminar, including presenters and presentation titles, is included in Figure 3-1.

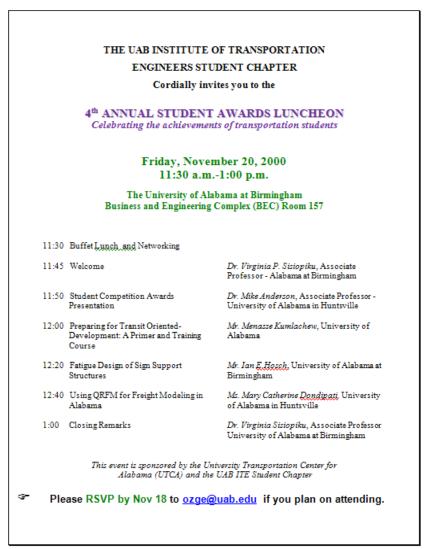


Figure 3-1. Program for student seminar

Section 4 TRB Attendance

The final task conducted in this project was to provide travel money for select students to attend the Transportation Research Board Conference in January 2010. Before attending the TRB Meeting, each student was responsible for preparing an itinerary of sessions or committee meetings she intended to participate in and discuss these with her on-campus representative. Some of the session topics the students identified follow:

- Asset Management
- Pavement Management Systems
- Statewide Transportation Planning
- Transportation Safety

- Traffic Simulation
- Intelligent Transportation Systems
- Pavement Testing
- Aviation

In addition, each student attending the TRB Meeting was required to prepare a written summary of the sessions attended and the relationship between conference sessions and her current research or interest in transportation. Here are excerpts from student summaries:

- "The sessions that I attended at the TRB conference were valuable both to my upcoming undergraduate thesis and for my general knowledge and understanding of the field I seek to work in the future. The session on sustainability featured presentations primarily focused on prioritizing projects according to a variety of factors, including economic, environmental, and social. The presentations also served as an introduction to the mathematics and statistics used in the field of transportation."
- The TRB Annual Meeting involved a morning committee meeting at which I presented a paper to the Traffic Structures Subcommittee. Other research ideas were discussed whereby on my return to UAB I will be able to expand upon during my postdoctoral activities. I attended other research-oriented meetings, including nanotechnology, and observed an interesting TRB Nanotechnology-based Concrete Materials Task Force meeting. I participated in other TRB activities, including the poster sessions as well as exhibits. I was able to meet with government officials such as the FHWA to discuss future project aspirations. In general, my overall experience at the TRB conference was beneficial and helped me to better pursue my career as a civil engineer.

Overall, the students took advantage of the opportunity to learn from top researchers and identify how those research ideas can be incorporated into the student's work.

Section 5 Conclusions

This project worked toward the development of a community of students from the University of Alabama System, highlighting the work the students are performing and providing a means to explore other research being performed nationwide.

The relevance of this project was far reaching. The project allowed students from all three campuses to compete against one another and to present their research results in a professional forum attended by transportation professionals from across the state. In addition, this project allowed students to learn firsthand what research questions were being examined internationally through attendance at the TRB Annual Meeting. The student's experiences and education gained through this project is anticipated to become evident in the graduate-level work being performed in the University of Alabama System.