The purpose of this study was to determine how well selected leadership competencies were remembered and used 1, 2, and 3 years after the completion of a structured collegiate leadership course. The study also investigated self-perceived leadership skills of the students 1, 2, and 3 years removed from the course and the use of selected leadership competencies compared to leadership experience. A 3-part survey was prepared and e-mailed to 25 members of the spring 2000 class, 24 members from spring 2001, and 25 members of the spring 2002 class. Students reported the same "amount" of knowledge comprehension about the 12 leadership competencies whether they had taken the class, 1, 2, or 3, years earlier. Students applied the competencies with the same regularity whether they had taken the course 1, 2, or 3 years earlier. There were no statistically significant differences between self-perceived leadership skills and the number of years after the collegiate leadership course. Findings did suggest that the use of certain leadership competencies was enhanced with time. (SLD)
Intellectual Capacity of Leadership Competencies as Perceived by Past Members of a Collegiate Sophomore Leadership Course

Jennifer R. Williams
Christine D. Townsend
July 16, 2003
THE INTELLECTUAL CAPACITY OF LEADERSHIP COMPETENCIES AS PERCEIVED BY PAST MEMBERS OF A COLLEGIATE SOPHOMORE LEADERSHIP COURSE

Jennifer R. Williams, M.S.
Texas A&M University
jwilliams@aged.tamu.edu

Christine D. Townsend, Ph.D
Texas A&M University
leader@tamu.edu

Summary
Over the past thirty years, there has been an increase of interest in leadership from researchers and the business world. Leadership models have been developed along with numerous leadership theories that aim to make leadership a functional subject. Leadership scholars know that leadership theory can be taught, (Bennis, 1994) but not a substantial amount of research has looked at the retention and use of these theories.

The purpose of this study was to determine how well selected leadership competencies were remembered and utilized one, two, and three years after the completion of a structured collegiate leadership course. This study also investigated self-perceived leadership skills of the students one, two, and three years removed from the course and the use of selected leadership competencies compared to leadership experience.

Summary of Review of Literature

“Leadership has a setting, a historical framework, a wholeness of meaning and diversity of influences” (Thomas & Bainbridge, 2002). Leadership is a discipline like all other disciplines in the fact that there are constant discussions and scholarly debate over theories and ideas. One issue that is constantly being pondered revolves around the question “are leaders born or made.” Most leadership scholars believe that it a little of both. Leaders are born with some characteristics that make them more effective, but proper instruction and experience shapes leader success. “Making” leaders is also entitled leadership education. “It includes those learning activities and educational environments that are intended to enhance and foster leadership abilities” (Brungardt, 1996).

Many institutions of higher education have recently realized the importance of formal leadership education. In 1996, Brungardt reported that there were between two hundred and five hundred colleges and universities that offered leadership development programs. Since 1996, the numbers have only increased and four-year degree programs are now offered at many leading institutions. “Leadership
development is important and useful because it can enrich the undergraduate experience, empower students, and give them a greater sense of control over their lives" (Astin & Astin, 2000).

Love and Yoder (1980) reported that more than two-thirds of the students, whom they surveyed, indicated that they developed leadership skills as a direct result of curricular or extracurricular activities in college. Adding to the argument, Flaum said, “Leadership is gritty, requires gumption, and demands what can’t be faked-hard work, integrity, and credibility” (2002). Leadership simulations and activities are known ways to teach students about leadership but the true test of leadership comes from actual experiences. The principles of andragogy also state that learning becomes more effective when the student can draw upon experiences. (Knowles, 1998)

Hypotheses

In the following null hypotheses, “leadership competencies” included: Trait Theory, Theory X/Theory Y, Task v Relationship, Blake and Mouton’s Managerial Grid, Image, Motivation, Situational Leadership, Delegation, Teams, Tuckman’s Team Development Model, Vision, Power, Transactional/Transformational, and Consensus.

H01: Following participation in a structured, collegiate leadership class, there is no difference in student perception of selected leadership competency knowledge among 2000, 2001, 2002 classes.

H02: Following participation in a structured, collegiate leadership class, there is no difference in student perception of selected leadership competency use among 2000, 2001, 2002 classes.

H03: There is no difference in self-perceived leadership skills (working with others, decision-making, positional leadership, understanding of self, and communication) among members of 2000, 2001, 2002 classes.

H04: There is no relationship between leadership experience (number of activities, leadership courses taken, hours spent per week in student activities, and level of involvement) and self-perceived use of leadership competencies learned in a structured collegiate leadership course.

Summary of Methodology

A three-part instrument was used in this study (Appendix A). Responses to each statement were chosen from the five point Likert scale provided. A higher numeric value for a particular statement indicated a stronger agreement or self-perception of the question.
The first section of the instrument focused on how much the respondent remembered and used the information (competencies) presented in collegiate leadership class. These leadership competencies included: Trait Theory, Theory X/Theory Y, Task v Relationship, Blake and Mouton's Managerial Grid, Image, Motivation, Situational Leadership, Delegation, Teams, Tuckman's Team Development Model, Vision, Power, Transactional/Transformational, and Consensus.

The second section was used to assess the respondent's self-perceptions of leadership skills. The Leadership Skills Inventory (LSI) was developed and tested by Carter and Townsend at Iowa State University in 1981 (Townsend, 1981). The LSI consisted of twenty-one statements describing various leadership and life skills. These statements corresponded to five internal scales used for analysis: working with others, decision-making, positional leadership, understanding of self, and communication. This section of the instrument was selected due to consistent reliability coefficients revealed in the earlier studies of Thorp (1997), Bruck (1997), and Taylor (1998).

The final section of the instrument covered personal characteristics that included gender, identifying which year the respondent took the class, number of collegiate activities, leadership courses taken, hours spent per week in student activities, and self-perceived level of involvement. A leadership experience score was calculated by summing the scores from number of collegiate activities, leadership courses taken, hours spent per week in student activities, and self-perceived level of involvement.

Graduate students within the department of Agricultural Education, who had taken AGED 340, field tested the instrument. In addition, the statements were analyzed for consistency and reliability. The reliabilities for the five scales were as follows: working with groups (0.42), decision-making (0.60), positional leadership (0.82), understanding of self (0.58), and communication (0.49). An alpha level of .05 was utilized in the data analysis.

Each participant was e-mailed the link for the questionnaire. In order to start the surveying process, the participant had to agree to the Informed Consent Form provisions stated and approved by the Institutional Review Board (Appendix B). Each participant was issued a code-number in his or her contact e-mail, to be used for tracking purposes only. The code had to be entered for the student to continue with the survey. Once the student completed the survey and selected the "submit form" button, the information was instantaneously downloaded into an excel spreadsheet that was housed on a secure departmental network.
Population

The population for this study was experienced collegiate leaders who completed an academic leadership course. The purposive sample (Babie, 1998) consisted of seventy-four students who were experienced leaders and had completed a collegiate leadership course. The collegiate course was taught at Texas A&M University and was cataloged as AGED 340, Professional Leadership Development: special sophomore leader section. The purposive sample included the twenty-five members of the Spring 2000 class, twenty-four members of the Spring 2001 class, and twenty-five members of the Spring 2002 class.

Findings and Conclusions Related to Hypothesis One

Hypothesis one stated: Following participation in a structured, collegiate leadership class, there is no difference in student perception of selected leadership competency knowledge among students enrolled in the 2000, 2001, or 2002 classes. To obtain the results for this hypothesis, a ONE-WAY ANOVA and Tukey's post-hoc test were calculated. Differences in means were considered to be significantly significant at the 0.05 level. Findings showed that in thirteen leadership competencies, Trait Theory, Theory X/Theory Y, Image, Motivation, Situational Leadership, Delegation, Teams, Tuckman's Team Development Model, Vision, Power, Transactional/Transformational, and Consensus, no statistical significance was found among students one, two, and three years after the course. Therefore, students retained their knowledge over time. It did not matter if they took the leadership course one, two, or three years ago; the students reported the same "amount" of knowledge comprehension in these particular leadership competencies.

There were statistically significant differences found one, two, and three years after the course in the students' self-perceived knowledge of Task v Relationship and Blake and Mouton's Managerial Grid. Results indicated that students enrolled in the Spring of 2000 had lower self-perceived knowledge in Task v Relationship than the classes of Spring 2001 and Spring 2002. Results also showed that there was a significant difference between self-perceived knowledge about Blake and Mouton's Managerial Grid in the class of 2001 and 2002. The class of 2001 has a lower self-perceived knowledge.

The findings indicated that twelve leadership competencies were, for the most part, remembered the same amount one, two, and three years after a structured collegiate leadership course. It can be concluded that any experienced leader regardless of age and post-course experience can retain leadership competencies. This conclusion supports Bennis (1994) who stated that certain aspects of leadership can be learned.
There were statistically significant differences found among the student classes and self-perceived knowledge of Task v Relationship. In this case, the older students (three years after the course) remembered less knowledge about the competency. Although Bennis (1994) suggested that leadership can be learned, it was concluded that, unless it was important to a person's real-time activity, knowledge diminished. Bruck (1997) also stated that courses should include activities to simulate leadership problems. Therefore, if, in post-class activities, a student does not experience the competency, knowledge may be lost.

Similarly, for the Blake and Mouton's Managerial Grid competency, the students who took the course two years ago reported they remembered less than the students who took the course one or three years ago. In this case, results indicated an unusual pattern. Since the "middle" class students reported a lower knowledge of this subject, it was concluded that, again, this class was not experiencing, and therefore not reinforcing, the Blake and Mouton competency. Although leadership can be learned (Bennis, 1994), it must be practiced (Bruck, 1997).

Findings and Conclusions Related to Hypothesis Two

The second hypothesis was developed to ascertain the difference between self-perceived leadership competency use one, two, and three years after participation in a collegiate leadership course. To obtain the results for this hypothesis, a ONE-WAY ANOVA and Tukey's post-hoc test were calculated. Differences in means were considered to be significantly significant at the 0.05 level. Findings showed that there was no statistically significant difference between self-perceived leadership competency use and the amount of years post collegiate leadership course. Therefore, the null hypothesis is accepted. In the case of use, students of the leadership course applied the competencies with the same regularity whether they took the course one, two, or three years ago. This conclusion supported the work of Binard and Brungardt (1997) who revealed that students are able to utilize the knowledge they learned in leadership programs. It also supports other researchers who found that leadership can be learned (Bennis, 1994, Brungardt & Crawford, 1996, and Love & Yoder, 1989).

Findings and Conclusions Related to Hypothesis Three

The third hypothesis in this study was created to investigate the differences between self-perceived leadership skills (working with others, decision-making, positional leadership, understanding of self, and communication) and the year enrolled in the collegiate leadership course. To obtain the results for this hypothesis, a ONE-WAY ANOVA and Tukey's post-hoc test was calculated. Differences in means were considered to be significantly significant at the 0.05 level. Findings showed that there was no statistically significant difference between self-perceived leadership skills and the amount of years after the collegiate leadership course. Therefore, the
null hypothesis is accepted. As time passed, the self-perceptions of leadership skills did not change. Those students who finished the course one year ago had the same self-perceived leadership perceptions as the students who participated in the course two and three years ago. Whereas there was no statistically significant difference between self-perceived Leadership Skills Inventory (LSI) score and the number of years following a collegiate leadership course, it was concluded that continued experience does not affect leadership perceptions. This conclusion supports Cummins (1995) who indicated that leadership attitudes are not affected over time. It also supports Brick (1998) who suggested that active leaders have enhanced leadership skill perceptions. Since the students in this study were already “experienced” leaders, their perceptions of their leadership skills remained constants as their experience level was high both prior to and following the course.

Findings and Conclusions Related to Hypothesis Four

The fourth hypothesis was developed to test the relationship between leadership experience (number of activities, leadership courses taken, hours spent per week in student activities, and level of involvement) and self-perceived use of leadership competencies learned in a structured collegiate leadership course. A new variable, “leadership experience score” was created by computing the sums of each participant’s specific leadership responses. Pearson’s correlation coefficient was used to analyze the relationship. Findings showed that there were no statistically significant relationships between leadership experience and the use of particular leadership competencies (Theory X/Theory Y, Task v Relationship, Blake and Mouton’s Managerial Grid, Motivation, Image, Situational Leadership, Teams, Tuckman’s Team Development Model, Power, and Transactional/Transformational Leadership). However, the null hypothesis was rejected because significant relationships were discovered for use of four of the competencies.

There were statistically significant negative correlations between leadership experience and the use of two of the leadership competencies (Trait Theory and Consensus). Therefore, in this case, the more leadership experience a student had, the less they utilized Trait Theory and Consensus. This finding supports Flaum (2002) who indicated that “the true practice of leadership is demonstrated most authentically in the leadership moment.” Trait Theory and Consensus were not demonstrated in “the leadership moment.” Although these competencies were taught in a course, their use was not authenticated for the students and the students did not develop best practices in trait theory and consensus decision making.

There were also statistically significant positive relationships between leadership experience and use of two of the leadership competencies (Delegation and Visioning). The more experienced a leader, the more they used delegation and visioning in their situations. In this case, students, as in the Love and Yoder study (1989), used these competencies in their actual leadership experiences. Therefore,
it was concluded that delegation and visioning were competencies that were enhanced over time. This situation refuted Cummins (1995) who stated that leadership attitudes did not change over time. The use of certain leadership competencies were enhanced with time.
Reproduction Release Form

For each document submitted, ERIC is required to obtain a signed reproduction release form indicating whether or not ERIC may reproduce the document. A copy of the release form appears below or you may obtain a form from the Clearinghouse. Please mail two copies of your document with a completed release form to:

ERIC Clearinghouse on Adult, Career, and Vocational Education

Acquisitions Coordinator

1900 Kenny Road

Columbus, OH 43210-1090

If you have any questions about submitting documents to ERIC, please call 1-800-848-4815, ext 47642 or e-mail <chambers.2@osu.edu>.

ERIC REPRODUCTION RELEASE FORM

I. Document Identification

Title: The Intellectual Capacity of Leadership Competencies as Perce

Author(s): Jennifer R. Williams, Christine D. Townsend

Date of Publication: July 16, 2003

II. Reproduction Release

A. Timely and significant materials of interest to the educational community are announced in the monthly abstract journal of the ERIC system, Resources in Education (RIE). Documents are usually made available to users in microfiche, reproduced paper copy, and electronic media, and sold through the ERIC Document Reproduction Service (EDRS) or other ERIC vendors. Credit is given to the source of each document. If reproduction release is granted, one of the following notices is affixed to the document.

Level 1

"PERMISSION TO REPRODUCE AND DISSEMINATE THIS MATERIAL HAS BEEN GRANTED BY:

http://www.ericacve.org/repro1.htm

9/25/2003
TO THE EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC)."

Level 2A

"PERMISSION TO REPRODUCE AND DISSEMINATE THIS MATERIAL IN MICROFICHE AND IN ELECTRONIC MEDIA FOR ERIC COLLECTION SUBSCRIBERS ONLY HAS BEEN GRANTED BY:

TO THE EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC)."

Level 2B

"PERMISSION TO REPRODUCE AND DISSEMINATE THIS MATERIAL IN MICROFICHE ONLY HAS BEEN GRANTED BY:

TO THE EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC)." Note: The above lines do NOT have to be signed by the person submitting the document. A signature is required below to place the document in the database if it is accepted.

B. If permission is granted to reproduce and disseminate the identified document, please CHECK ONE of the following three options and sign the release.

☑ Permitting reproduction and dissemination in microfiche or other ERIC archival media (e.g., electronic) and paper copy (Level 1).

☐ Permitting reproduction and dissemination in microfiche and in electronic media for ERIC archival collection subscribers only (Level 2A).

☐ Permitting reproduction and dissemination in microfiche only (Level 2B).

Documents will be processed as indicated provided quality permits. If permission to reproduce is granted, but no box is checked, documents will be processed at Level 1.

C. "I hereby grant to the Educational Resources Information Center (ERIC) nonexclusive permission to reproduce and disseminate this document as indicated. Reproduction from the ERIC microfiche or electronic media by persons other that ERIC employees and its system contractors requires permission from the copyright holder. Exception is made for nonprofit reproduction by libraries and other service agencies to satisfy information needs of educators in response to discrete inquires."

Name: Jennifer Williams
Signature: [Signature]
Organization: Texas A&M University
Position: Assistant Lecturer
Address: 131 Scoates Hall
          TAMU 2116
Zip Code: 77843
Telephone No: 979/245-2997

III. Document Availability Information

(Non-ERIC Source)

If permission to reproduce is not granted to ERIC, or, if you wish ERIC to cite the availability of the document from another source, please provide the following information regarding the availability of the document. (ERIC will not announce a document unless it is publicly available, and a dependable source can be specified. Contributors should also be aware that ERIC selection criteria are significantly more stringent for documents that cannot be made available through EDRS.)

Publisher/Distributor: 

Address: 

Price Per Copy: 

Quantity Price: 

IV. Referral to Copyright/Reproduction Rights Holder

If the right to grant this reproduction release is held by someone other than the addressee, please provide the appropriate name and address:

Name: 

Address: 

Zip Code: 

(9/97)