Evaluation of Mississippi Teacher Corps 2009-2010

Submitted by

Maxine Harper, Ed.D. Joey Rutherford



The University of Mississippi Guyton Hall University, MS 38677 Phone 662-915-6729

April 2011

Introduction

The Mississippi Teacher Corps is a two-year program, similar to the Peace Corps, which recruits college graduates to teach in Mississippi schools, primarily in the Mississippi Delta. The program is designed for non-education majors and offers a host of benefits, including teacher training and certification, full scholarship for a master's degree in education from The University of Mississippi, job placement that includes full pay (\$30,000+) and benefits, and the opportunity to make a difference in the lives of students in one of the poorest areas of the country.

The Center for Educational Research and Evaluation (CERE) was commissioned to perform an evaluation of scores obtained by students served by teachers in the Teacher Corps program as compared with scores obtained by students served by teachers not in the Teacher Corps program. The purpose of the evaluation was to determine how student scores of Teacher Corps teachers compared with student scores of non-Teacher Corps teachers both by subject area and by years of teaching.

Procedure

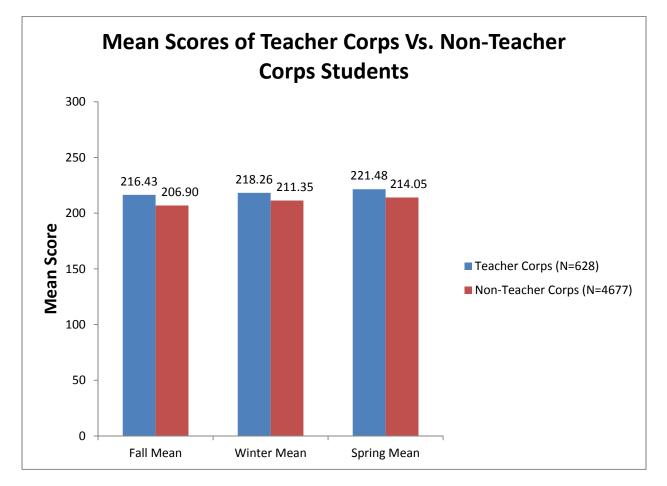
Mississippi Teacher Corps provided mean subject area test scores by class for fall 2009, winter 2009, and spring 2010 for students in Marshall County. The subject areas for which test scores were provided were language, reading, math, and math/algebra in grades 4-12. Data were also provided regarding the number of years each teacher had taught. In addition, class sizes were provided so that means could be weighted by class size. There were 24 teachers from Teacher Corps and 188 non-Teacher Corps teachers.

The evaluators compared weighted scores for fall 2009, winter 2009, and spring 2010 for all Teacher Corps teachers and all non-Teacher Corps teachers. In addition, the evaluators made the same comparison for Teacher Corps and non-Teacher Corps teachers who had taught the same subject areas, as well as for Teacher Corps and non-Teacher Corps teachers who had taught the same number of years. There were 126 non-Teacher Corps teachers who had taught five or more years and for whom there was no comparison with Teacher Corps teachers with regard to number of years of teaching.

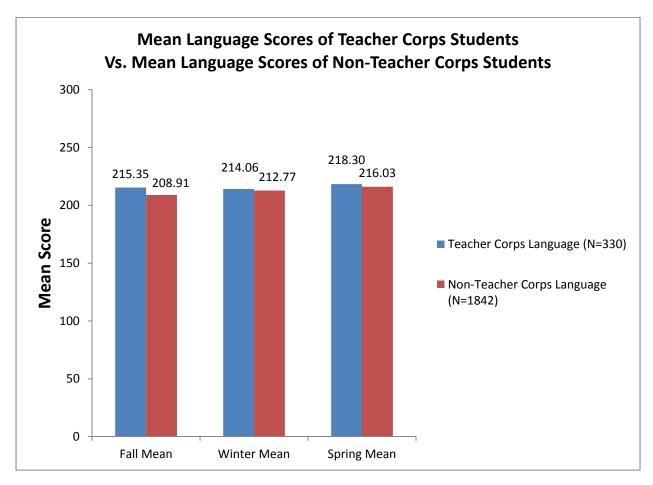
The following charts present the comparison of weighted mean scores of classes of Teacher Corps vs. non-Teacher Corps teachers. Each chart provides a specific breakdown with regard to subject area taught or number of years taught. In each chart, the N indicates the number of students represented (obtained by weighting the data by class size).

Results

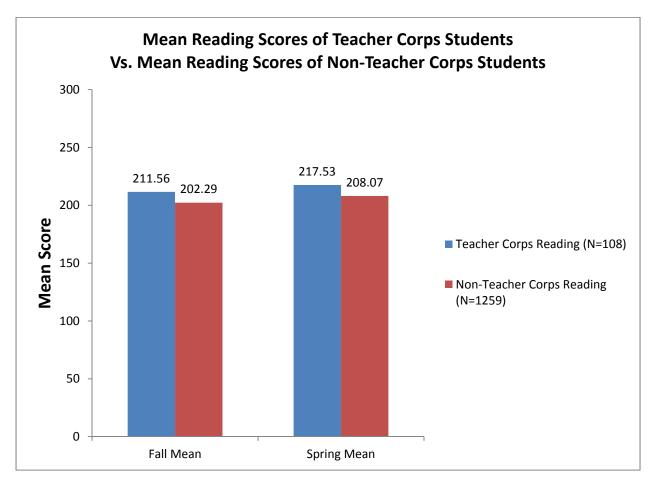
As shown in the following chart, overall mean scores of Teacher Corps students were higher in fall, winter, and spring than were overall mean scores of non-Teacher Corps students. Although non-Teacher Corps students made slightly higher gains than Teacher Corps students, spring 2010 scores overall were 7.43 points higher for Teacher Corps students. An independent samples t-test indicated a significant difference in favor of Teacher Corps for all three sets of scores. Although there was a significant gain for non-Teacher Corps students from fall to winter and from fall to spring, the mean scores were still higher for Teacher Corps students.



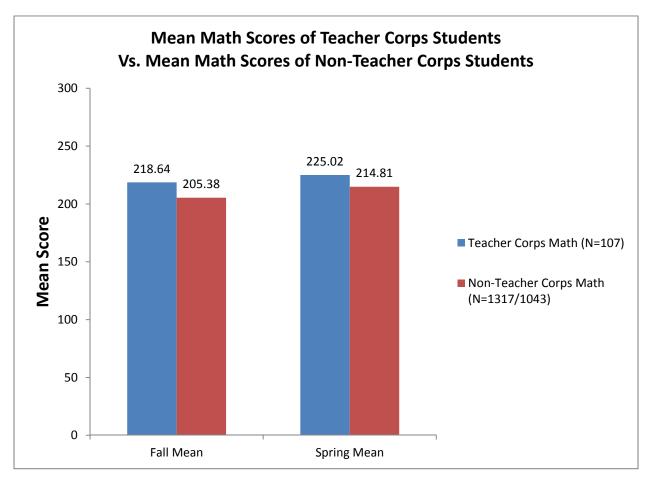
As shown in the following table, the mean language scores of Teacher Corps students were higher than those for non-Teacher Corps students in fall, winter, and spring. Although the non-Teacher Corps students made slightly higher gains in language than did Teacher Corps students, the Teacher Corps students scored approximately 2 points higher than the non-Teacher Corps students in spring 2010.



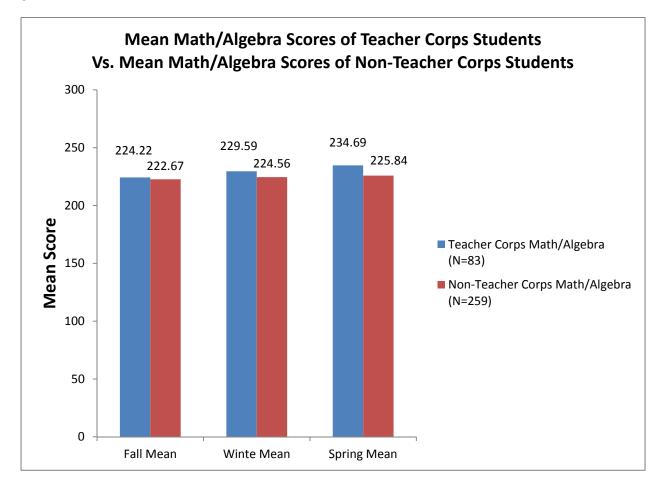
The following table compares the mean reading scores of Teacher Corps students vs. non-Teacher Corps students for fall 2009 and spring 2010. The mean scores for Teacher Corps students were approximately 9 points higher than non-Teacher Corps students in both fall and spring, and the average gain was 5 to 6 points for both. The difference between the mean scores for fall and spring was significant, but the gains were not significantly different.



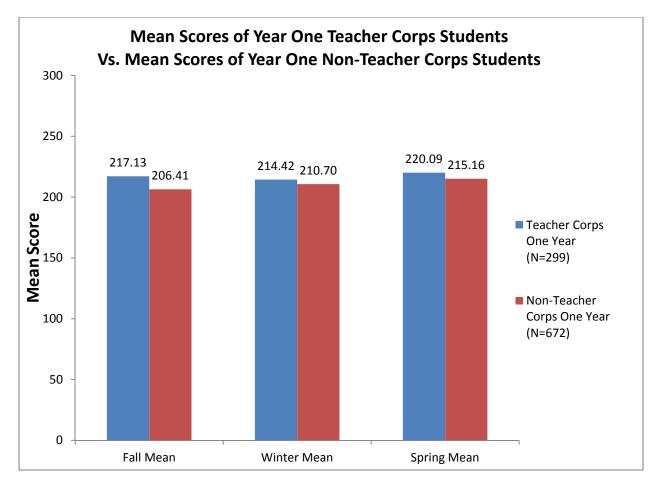
The following table compares the mean math scores of Teacher Corps students vs. non-Teacher Corps students for fall 2009 and spring 2010. The mean scores for Teacher Corps students were 13.26 points higher than for non-Teacher Corps students in fall 2009 and 10.21 points higher in spring 2010, and the average gain was 6.38 for Teacher Corps students and 9.43 for non-Teacher Corps students. The difference between the mean scores for fall and spring was significant in favor of Teacher Corps, while the difference between the mean gains was significant in favor of non-Teacher Corps.



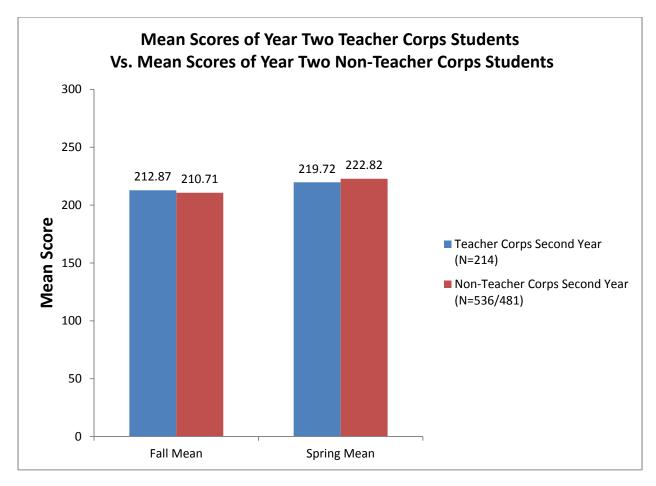
The following table compares the mean math/algebra scores of Teacher Corps students vs. non-Teacher Corps students for fall 2009, winter 2009, and spring 2010. The mean scores for Teacher Corps students were 1.55 points higher than the mean scores for non-Teacher Corps students in fall 2009, 5.03 points higher in winter 2009, and 8.85 points higher in spring 2010. The average gain from fall to spring was 10.47 for Teacher Corps students and 3.17 for non-Teacher Corps students. The difference between all three mean scores was significant in favor of Teacher Corps, as was the difference between the mean gains.



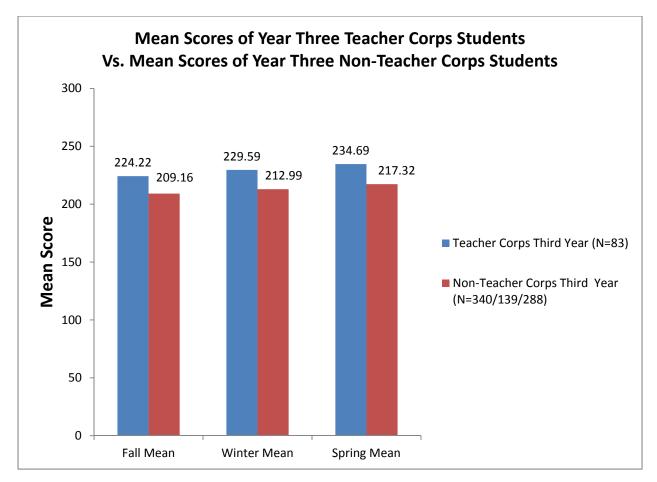
The following table compares the mean fall 2009, winter 2009, and spring 2010 scores of students of Teacher Corps teachers who had taught for one year vs. the mean scores of students of non-Teacher Corps teachers who had taught for one year. The mean scores for Teacher Corps students were 10.72 points higher than the mean scores for non-Teacher Corps students in fall 2009, 3.72 points higher in winter 2009, and 4.93 points higher in spring 2010. The average gain from fall to spring was 2.96 for Teacher Corps students and 8.75 for non-Teacher Corps students. The difference between all three mean scores was significant in favor of the Teacher Corps students, while the difference between the gains was significant in favor of the non-Teacher Corps students.



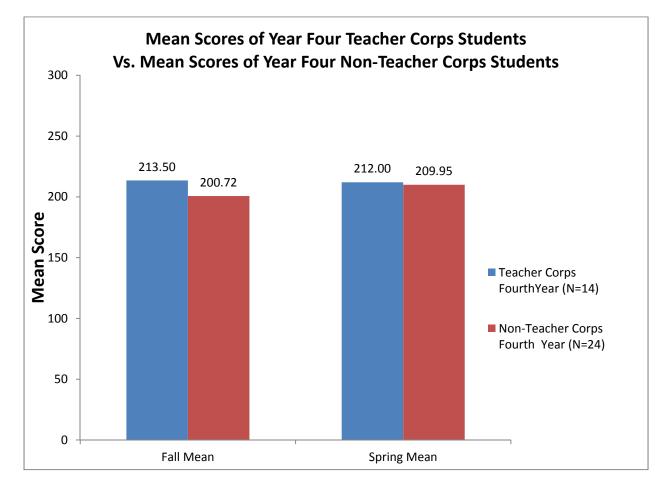
The following table compares the mean fall 2009 and spring 2010 scores of students of Teacher Corps teachers who had taught for two years vs. the mean scores of students of non-Teacher Corps teachers who had taught for two years. The mean scores for Teacher Corps students were 2.16 points higher than the mean scores for non-Teacher Corps students in fall 2009 and 3.1 points lower in spring 2010. The average gain from fall to spring was 6.85 for Teacher Corps students and 12.11 for non-Teacher Corps students. The difference between the fall mean scores was significant in favor of the Teacher Corps students, but the difference between the spring mean scores was not significant. The difference between the gains was significant in favor of the non-Teacher Corps students.



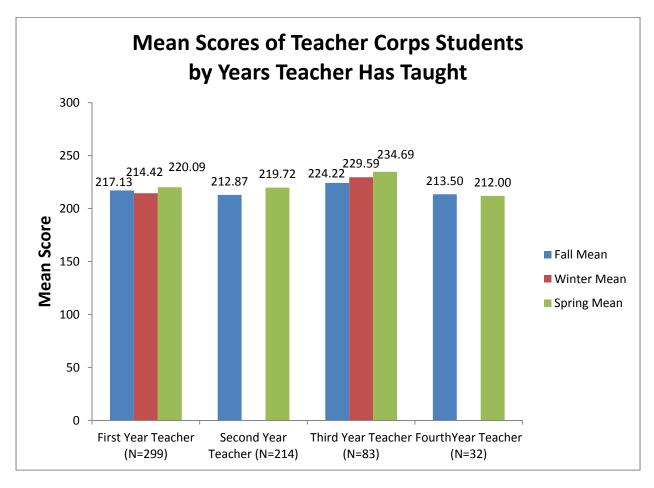
The following table compares the mean fall 2009, winter 2009, and spring 2010 scores of students of Teacher Corps teachers who had taught for three years vs. the mean scores of students of non-Teacher Corps teachers who had taught for three years. The mean scores for Teacher Corps students in fall 2009, 16.6 points higher in winter 2009, and 17.37 points higher spring 2010. The average gain from fall to spring was 10.47 for Teacher Corps students and 8.16 for non-Teacher Corps students. The difference among all three mean scores was significant in favor of the Teacher Corps students. The difference between the fall to winter and fall to spring gains was significant in favor of the Teacher Corps students.



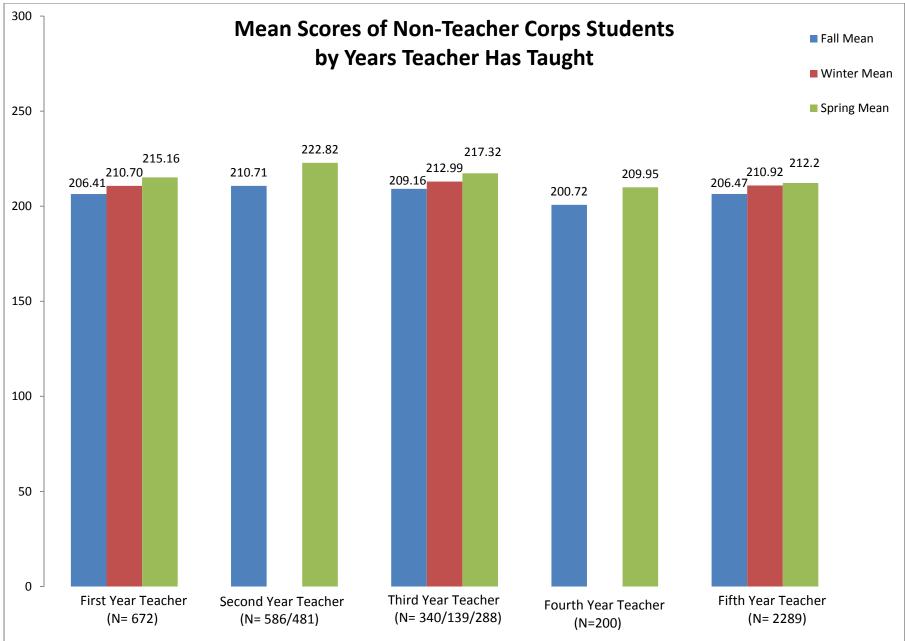
The following table compares the mean fall 2009 and spring 2010 scores of students of Teacher Corps teachers who had taught for four years vs. the mean scores of students of non-Teacher Corps teachers who had taught for four years. The mean scores for Teacher Corps students were 12.78 points higher than the mean scores for non-Teacher Corps students in fall 2009 and 2.05 points higher spring 2010. The average loss from fall to spring was 1.5 points for Teacher Corps students, and the average gain from fall to spring was 9.23 for non-Teacher Corps students. The difference between the fall means was significant in favor of the Teacher Corps students, but the difference between the spring means was not significant. From fall to spring, the Teacher Corps students' scores decreased, while the non-Teacher Corps students' scores increased. The difference was significant. Although there was a significant difference between the fall means in favor of the Teacher Corps students, this difference diminished significantly in the spring.



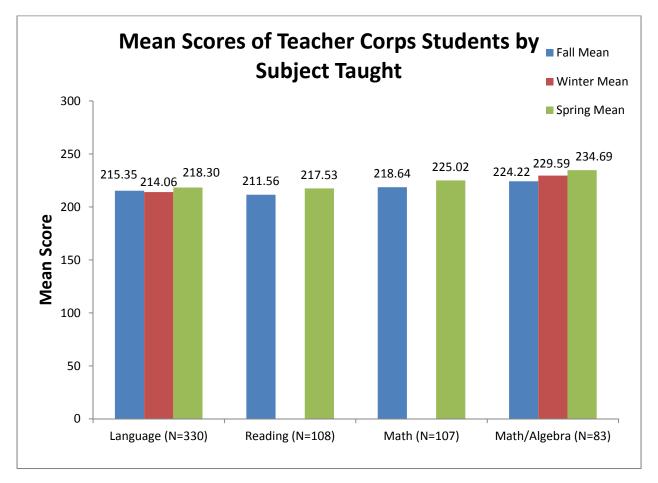
The following chart shows the mean scores of students of Teacher Corps teachers according to the years they had taught. The highest scores were obtained by students of teachers who had taught three years (which means they were in their first year after completing the Teacher Corps program). Among the lowest scores were those of students of fourth year teachers (meaning these teachers were in their second year after completing the Teacher Corps program).



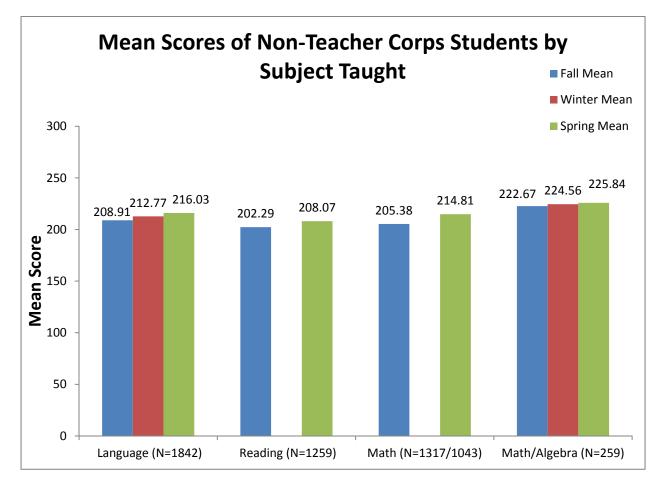
The following chart shows the mean scores of students of non-Teacher Corps teachers according to the years they have taught. The graph for "Fifth Year Teacher" encompasses all teachers who have taught for five years or more. There were no Teacher Corps teachers who fit this description. The students of non-Teacher Corps second year teachers scored highest in both fall and spring. The students of fifth year teachers scored lower in spring than did the students of first year teachers; however, the number of students for fifth year teachers was more than three times the number of students for first year teachers. Teacher Corps students scored higher for all groups of teachers except second year non-Teacher Corps teachers (spring only).



The following chart represents the mean scores of Teacher Corps students according to the subject taught by their teacher. The highest scores were achieved by the students in math/algebra classes. The lowest scores were achieved by students in reading. Students in all subject areas improved from fall to spring.



The following chart represents the mean scores of non-Teacher Corps students according to the subject taught by their teacher. As with Teacher Corps students, the highest scores were achieved by the students in math/algebra classes. Also, as with Teacher Corps students, the lowest scores were achieved by students in reading. Students in all subject areas improved from fall to spring. In all subject areas, students of Teacher Corps teachers scored higher than students of non-Teacher Corps teachers. However, the number of students taught by non-Teacher Corps teachers was dramatically higher than the number of students taught by Teacher Corps teachers.



Summary

The fall 2009, winter 2009, and spring 2010 scores of Teacher Corps students were compared with scores of non-Teacher Corps students to determine the effectiveness of the Teacher Corps program. Scores were compared in three ways: overall scores, scores by number of years the teacher had taught, and scores by subject area taught. The overall mean scores of Teacher Corps students were higher than those of non-Teacher Corps students for fall, winter, and spring. In terms of the number of years the teacher had taught, the mean scores of Teacher Corps students were higher than those of non-Teacher Corps students for gears taught except second year teachers (where scores were higher in the spring for non-Teacher Corps students). With regard to subject area taught, the fall, winter, and spring mean scores of Teacher Corps students were higher than those of non-Teacher Corps students in all areas tested.

There were variations in the gains obtained by Teacher Corps vs. non-Teacher Corps students. Non-Teacher Corps students made higher overall gains as well as higher gains in language and in math. The two groups of students made equal gains in reading. Teacher Corps students made higher gains in math/algebra. The students of non-Teacher Corps teachers who had taught for one, two, or four years made higher gains than students of Teacher Corps teachers who had taught for the same number of years. Only students of Teacher Corps teachers who had taught for three years made higher gains than students of non-Teacher Corps teachers who had taught for three years.

Data for subject area and years taught were also analyzed separately for Teacher Corps students and non-Teacher Corps students. For Teacher Corps, students of teachers who had taught for three years outperformed students of teachers who had taught for any other number of years (no Teacher Corps teachers had taught for more than four years). For non-Teacher Corps, students of teachers who had taught for two years performed better than students of teachers who had taught for any other number of years, including those who had taught for five or more years. With regard to subject area, both Teacher Corps and non-Teacher Corps students performed highest in math/algebra than in any other subject area.

To highlight the results, Teacher Corps students scored higher overall than non-Teacher Corps students, but there were variations in the gains obtained by Teacher Corps vs. non-Teacher Corps students. Despite these variations in gains, Teacher Corps students made higher scores than non-Teacher Corps students in every area and for all levels of teachers except second year teachers.