Impact Evaluation of the School District of Philadelphia's Renaissance Initiative

Findings from the study's second year

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Schools included in the Renaissance Initiative analyses: Five District-run turnaround schools and two Renaissance Charter schools; all seven schools entered the Renaissance Initiative in 2016-2017

2016-2017 Renaissance Initiative schools	District-run turnaround schools	Renaissance Charter
E. Washington Rhodes School	X	
Honorable Luis Munoz-Marin School	X	
Jay Cooke School	X	
S. Weir Mitchell School	X	
Theodore Roosevelt School	X	
Global Leadership Academy at Huey (Formerly Samuel B. Huey School)		X
Mastery Charter School at Wister (Formerly John Wister School)		X

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Study research questions

- **What are the impacts of the Renaissance Initiative on School Progress Report (SPR) scores for the seven schools that entered the Renaissance Initiative in 2016-2017?**

- **Do impacts on SPR scores differ for the two Renaissance Charter schools and the five District-run turnaround schools that entered the Renaissance Initiative in 2016-2017?**

- **What are the impacts on attendance, behavior, and achievement for School District of Philadelphia (SDP) students in the five District-run turnaround schools that entered the Renaissance Initiative in 2016-2017?**

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Summary of findings

Among the seven schools that entered the Renaissance Initiative in 2016-2017:

- We found **evidence that overall SPR scores improved** over two years
- This improvement is driven by **gains in climate and progress scores**
- Evidence suggests that **climate improved more in Renaissance Charter schools**
- We found **no evidence of improvement in achievement scores** over two years

Among students in the five District-run turnaround schools:

- We found no impacts on behavior or achievement outcomes over two years, but estimates are imprecise

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Results for the school-level impact analysis of the seven schools that entered the Renaissance Initiative in 2016-2017
(two Renaissance Charters and five District-run turnaround schools)

Summary of impacts on SPR scores

- **What are the impacts of the Renaissance Initiative for the seven schools that entered the Renaissance Initiative in 2016-2017?**
  - Improved overall SPR scores for these seven schools over two years
  - Improved climate scores for these seven schools over two years
  - Improved progress scores for these seven schools over two years
- **Is there evidence that either the Renaissance Charter model or the district-run turnaround model was more effective?**
  - Suggestive evidence that the Renaissance Charter model was more effective at improving climate than the District-run turnaround model

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Methods for school-level impact analysis

We identified comparison schools that had similar trends in SPR outcome measures before 2016-2017

- We selected schools <u>not</u> participating in the Acceleration Network or receiving turnaround supports before 2018-2019

We used a statistical method that adjusted for potentially important differences between schools over time

- Any year-to-year changes in outcomes that were common to all schools
- Any fixed differences between schools (e.g., constant differences in student populations)
- Changes in student demographics where available (although these are unavailable for Renaissance Charter schools in 2016)

We estimated impacts on schools' overall SPR score, climate score, progress score, and achievement score

- These are the primary outcomes that are available for both charter and District-run schools

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Comparison schools in school-level analysis

|			
Andrew Jackson School	Francis Hopkinson School	James Rhoads School	Robert E. Lamberton School
Anna B. Day School	Francis S. Key School	John H. Webster School	Samuel Pennypacker School
Avery D. Harrington School	General George A. McCall School	Joseph Greenberg School	Southwark School
Bayard Taylor School	George W. Childs School	Joseph W. Catharine School	Thomas G. Morton School
Benjamin Franklin School	George W. Nebinger School	Julia de Burgos School	Thomas Holme School
Bridesburg School	Henry A. Brown School	Lewis C. Cassidy Academics Plus School	Vare-Washington School
Edward T. Steel School	Henry H. Houston School	Mary M. Bethune School	William Cramp School
Edwin Forrest School	James J. Sullivan School	Olney School	William H. Hunter School

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For each SPR measure, we calculated:

- **<u>Impact</u> estimates between comparison schools and the seven schools that entered the Renaissance Initiative in 2016-2017**

  - These estimate the change in size of the average gap between the seven schools that entered the Renaissance Initiative in 2016-2017 and comparison schools before and after these schools entered the initiative.

  - We compare impacts between two groups: (1) District-run turnaround schools versus comparison schools and (2) Renaissance Charter schools versus comparison schools.

Causal analysis: Shows what would have happened to schools in the absence of the Renaissance Initiative

- **Average <u>trends</u> from 2012-2013 through 2017-2018 for different groups of schools, including:**

  - The comparison schools

  - The seven schools that entered the Renaissance Initiative in 2016-2017

  - The five District-run schools and the two Renaissance Charter schools that entered the Renaissance Initiative in 2016-2017

  - The other 14 schools in the Acceleration Network as of 2018-2019

*Descriptive analysis: Shows relationships without explaining them. There could be many explanations for patterns.*

- **In each subsequent figure, we show trends graphically, and accompanying text shows the impact estimates**

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The seven schools that entered the Renaissance Initiative in 2016-2017 had improved <u>overall SPR</u> scores, on average
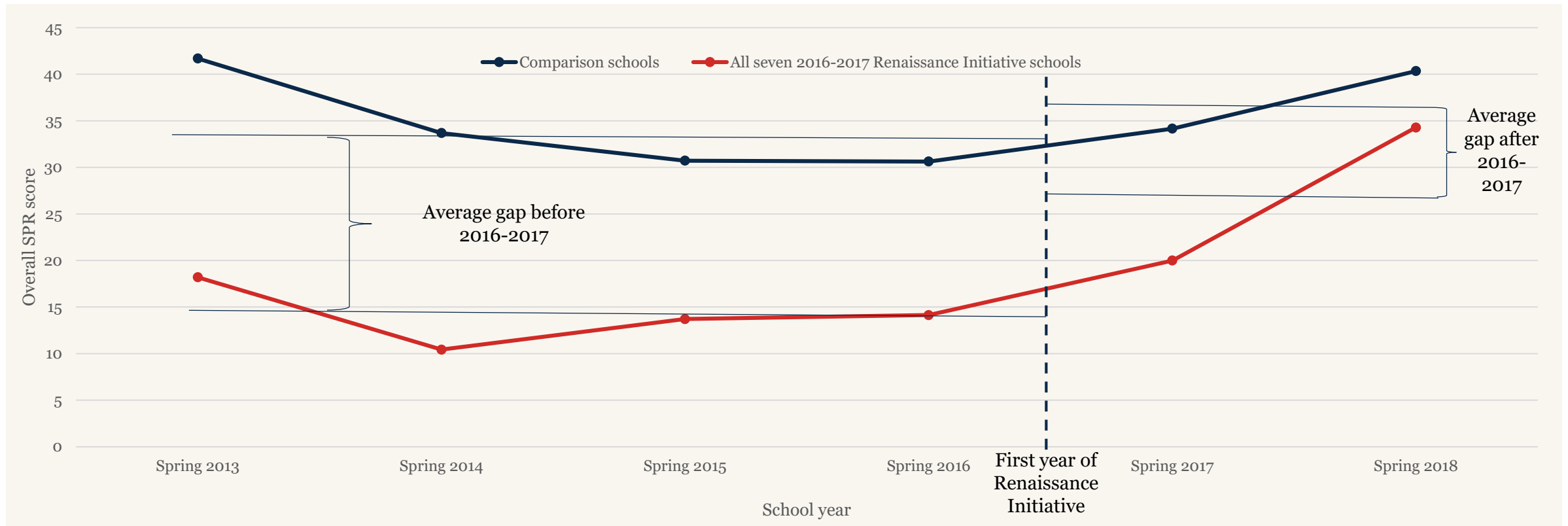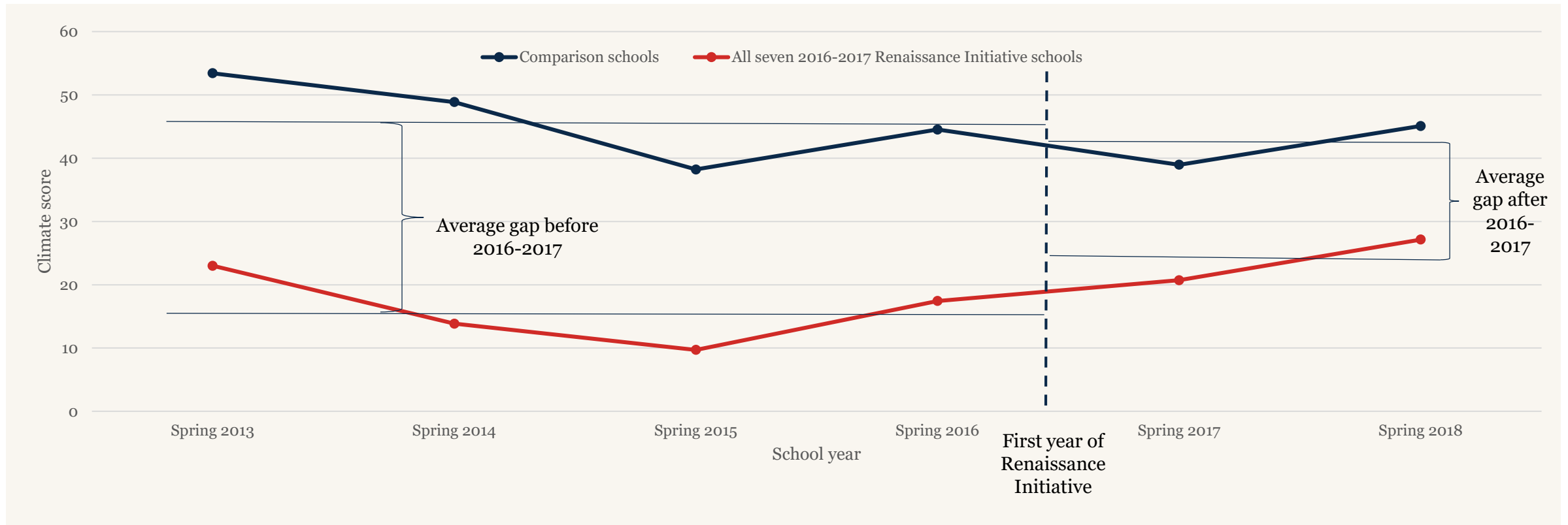

- Compared to comparison schools, the average gap in overall SPR scores for the seven schools that entered the Renaissance Initiative in 2016-2017 was almost 11 points smaller in the two years after entering the Renaissance Initiative than it was between spring 2013 and spring 2016. The impact estimate is 10.5 points on overall SPR scale (*p*-value = 0.04).

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The seven schools that entered the Renaissance Initiative in 2016-2017 had higher <u>overall SPR</u> scores than the other Acceleration Network schools by 2017-2018
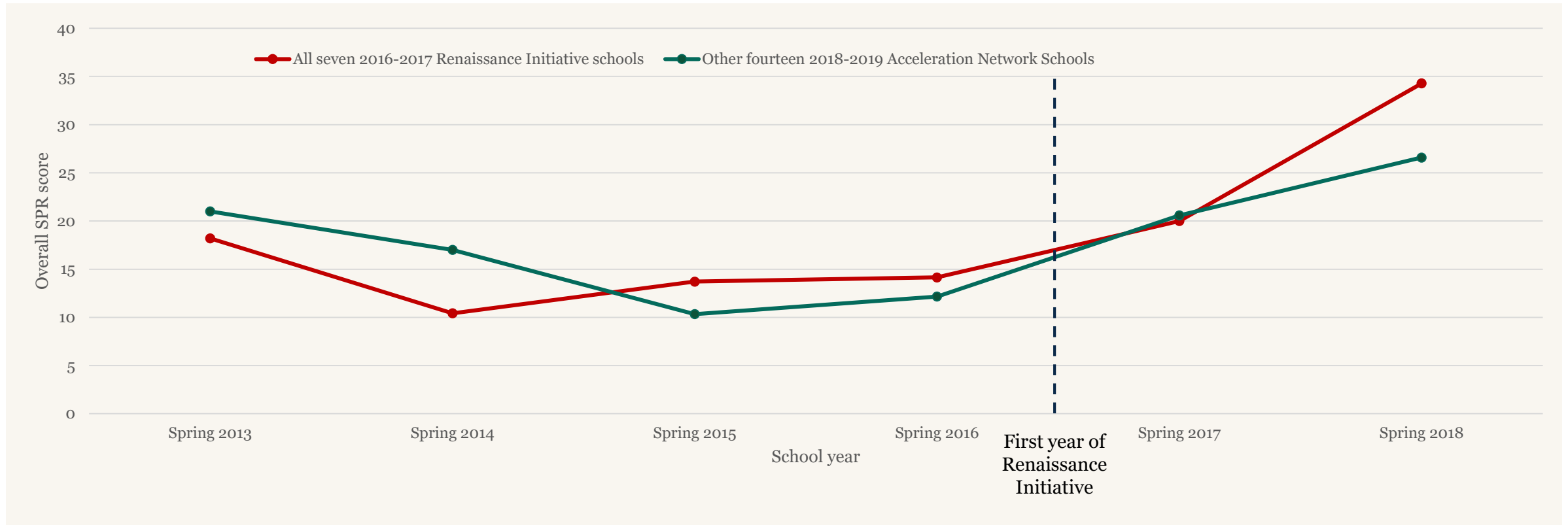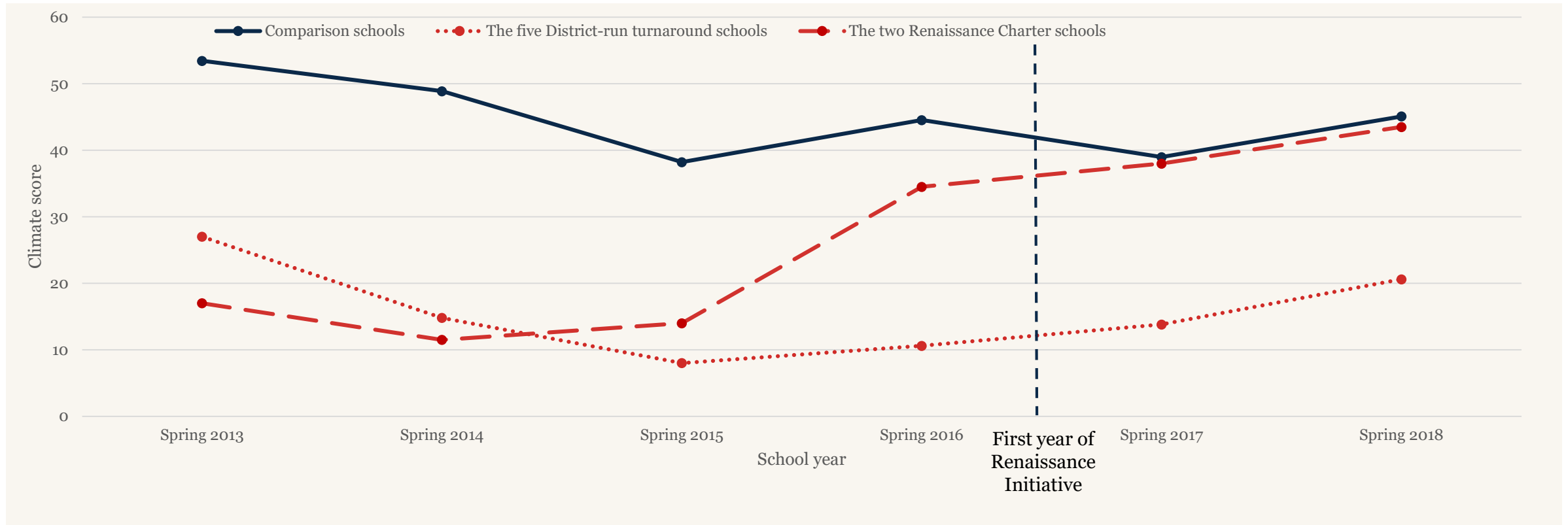

- We did not estimate the impact between schools that entered the Renaissance Initiative in 2016-2017 and those that were in the Acceleration Network in 2018-2019 because data are not yet available for 2018-2019.

The seven schools that entered the Renaissance Initiative in 2016-2017 had improved <u>climate</u> scores, on average
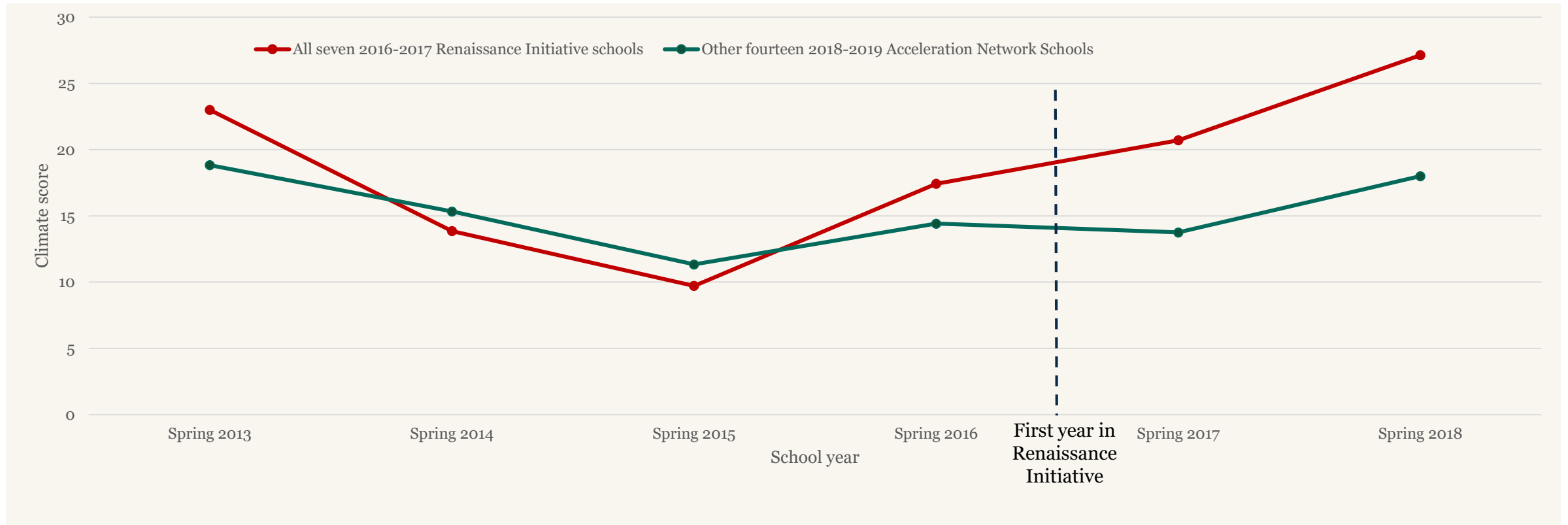

- Compared to comparison schools, the average gap in climate scores for the seven schools that entered the Renaissance Initiative in 2016-2017 was about 8 points smaller in the two years after entering the Renaissance Initiative than it was between spring 2013 and spring 2016. The impact estimate is 8.18 points on the climate score scale (p-value = 0.01).

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Impacts on <u>climate scores</u> were greater for schools that were one of the two Renaissance Charters than for those that were one of the five District-run turnaround schools


- The change in the average gap between Renaissance Charter schools and comparison schools was larger than the change in the average gap between District-run turnaround schools and comparison schools (p-value = 0.10).

The seven schools that entered the Renaissance Initiative in 2016-2017 had higher <u>climate</u> scores than the other schools in the Acceleration Network by 2017-2018
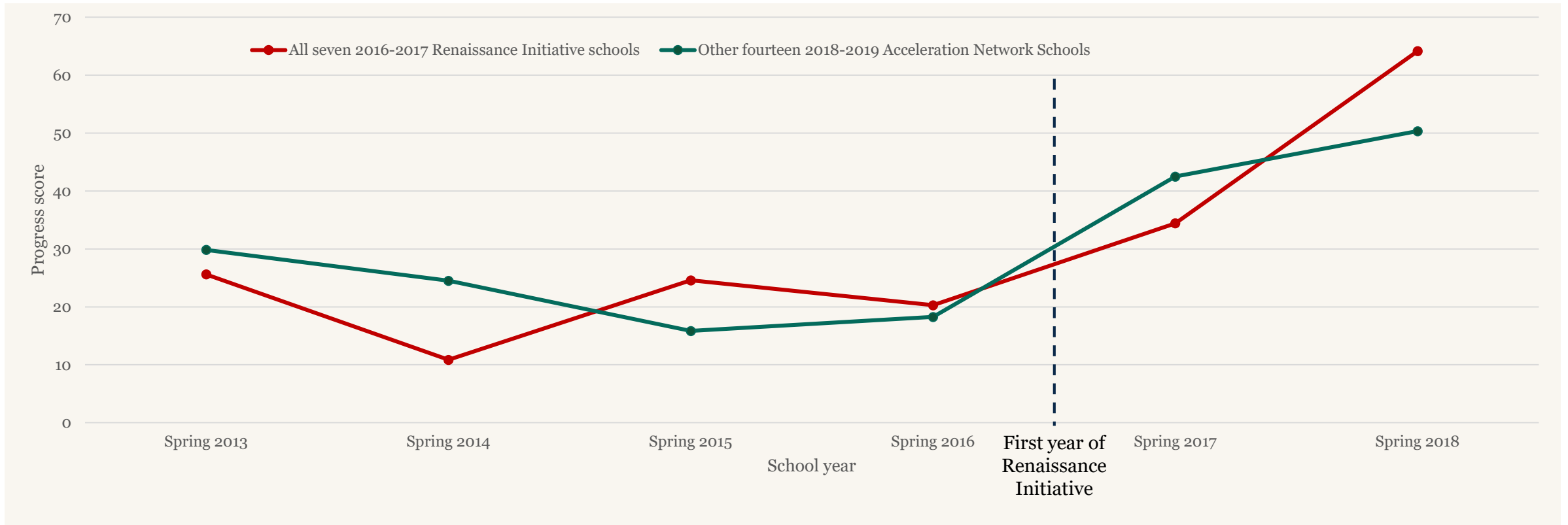

- We did not estimate the differences in impacts between schools that entered the Renaissance Initiative in 2016-2017 and those that were in the Acceleration Network in 2018-2019 because data are not yet available for 2018-2019.

The seven schools that entered the Renaissance Initiative in 2016-2017 had improved <u>progress</u> scores, on average
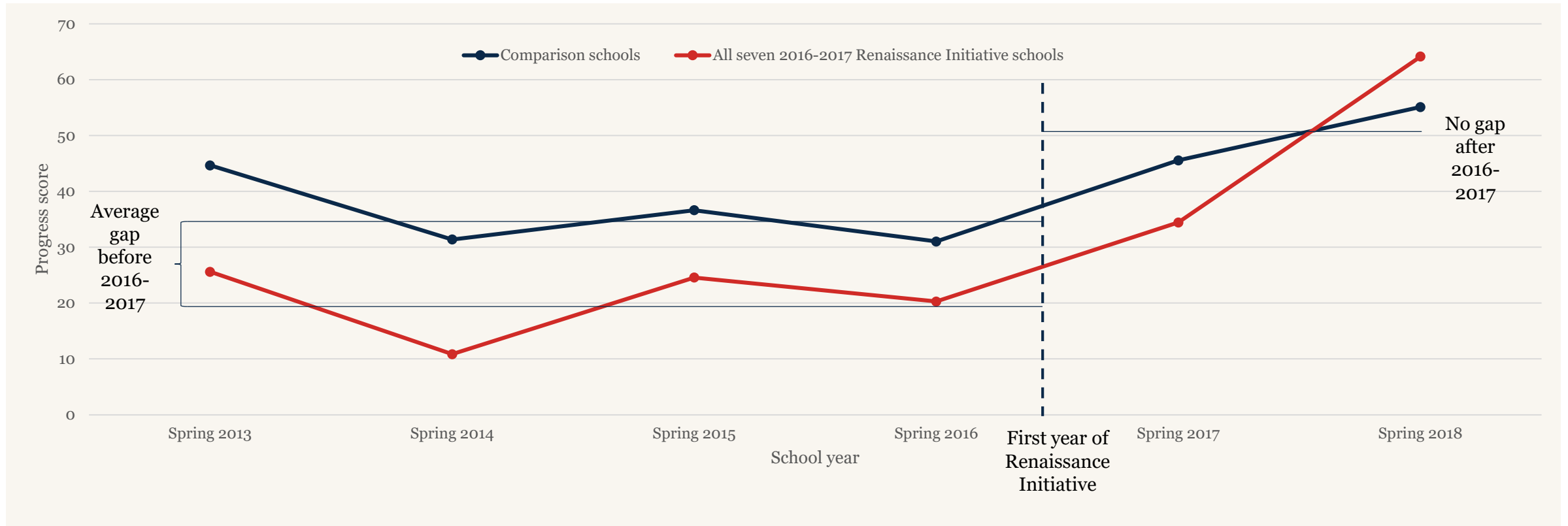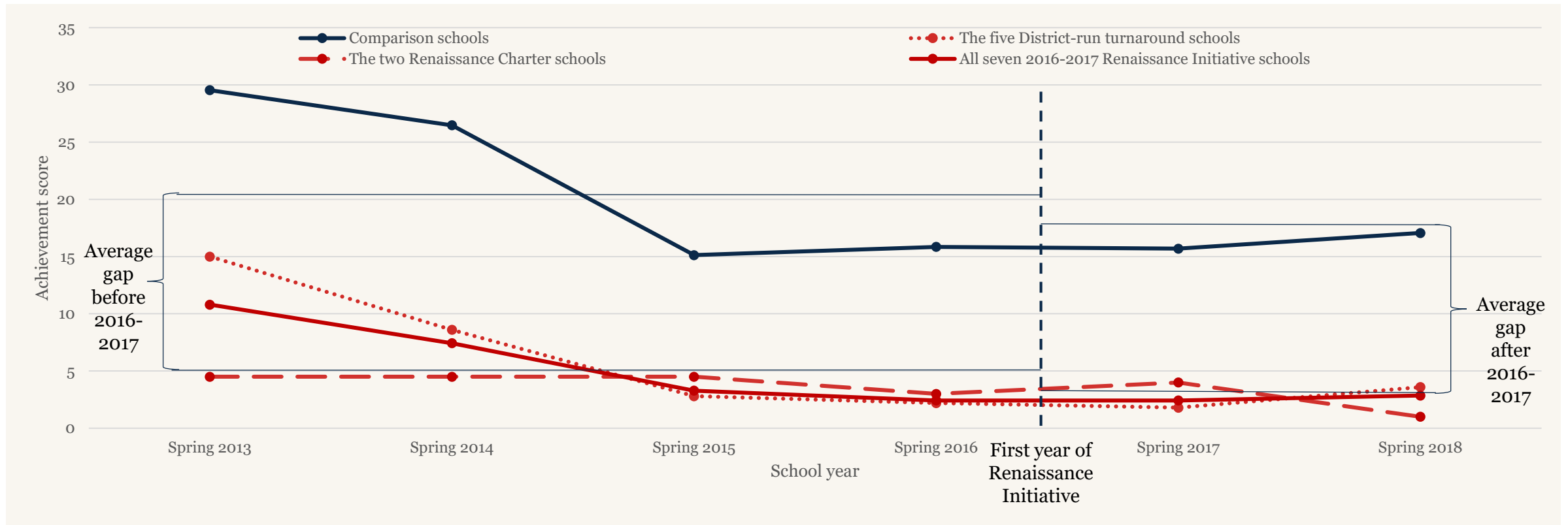

- Compared to comparison schools, the average gap in progress scores for the seven schools that entered the Renaissance Initiative in 2016-2017 was 20 points smaller in the two years after entering the Renaissance Initiative than it was between spring 2013 and spring 2016. The impact estimate is 20.0 points on the progress score scale (p-value = 0.09).

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The seven schools that entered the Renaissance Initiative in 2016-2017 had higher <u>progress</u> scores than the other schools in the Acceleration Network by 2017-2018

- We did not estimate the differences in impacts between schools that entered the Renaissance Initiative in 2016-2017 and those that were in the Acceleration Network in 2018-2019 because data are not yet available for 2018-2019.

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The seven schools that entered the Renaissance Initiative in 2016-2017 did not show improved <u>achievement</u>

- Compared to comparison schools, the average gap in achievement scores for the seven Renaissance Initiative schools was about the same in the two years after entering the Renaissance Initiative than it was between spring 2013 and spring 2016. The impact estimate was not significant (p-value = 0.61). The impact estimate for the two Renaissance Charter schools was not significantly different from the five District-run turnaround schools (p-value = 0.46).

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The seven schools that entered the Renaissance Initiative in 2016-2017 had similar <u>achievement</u> scores as the other schools in the Acceleration Network by 2017-2018
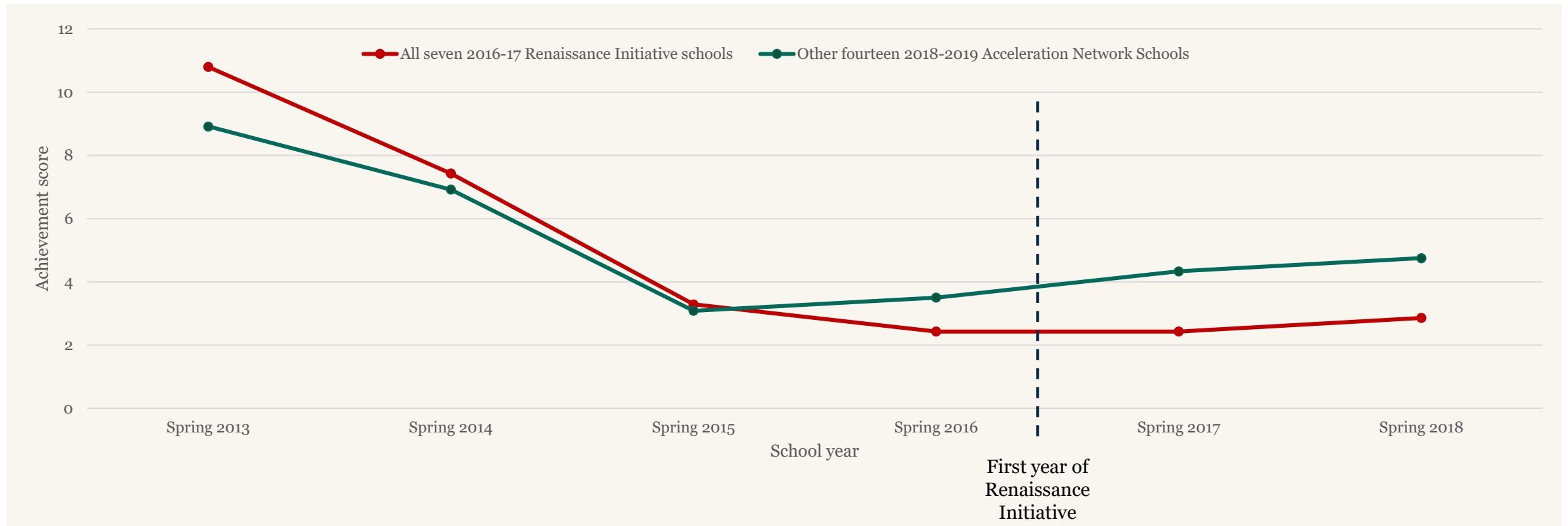

- We did not estimate the differences in impacts between schools that entered the Renaissance Initiative in 2016-2017 and those that were in the Acceleration Network in 2018-2019 because data are not yet available for 2018-2019.

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Results for the student-level impact analysis for the five District-run turnaround schools that entered the Renaissance Initiative in 2016-2017

Summary of impacts for the five District-run turnaround schools

What are the impacts for students in the five District-run turnaround schools that entered the Renaissance Initiative in 2016-2017?

- We examined impacts on behavior outcomes, such as suspensions and attendance rate, and impacts on math, English language arts (ELA), and science achievement outcomes

- Impact estimates were generally imprecise, and we can't rule out positive or negative impacts

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Student-level impact analysis methods

We identified comparison schools that had similar growth in the two years before 2016-2017 implementation

- We selected schools <u>not</u> participating in the Acceleration Network or receiving turnaround supports before 2018-2019

We then selected comparison students from within those schools

- Selected comparison students had to be similar in terms of race, ethnicity, gender, disability status, gifted status, and baseline measures of each outcome
- Students were considered "treated" in 2016-2017 and 2017-2018 if they were in one of the five district-run turnaround schools in 2016-2017, even if they changed schools by 2017-2018
- We controlled for student characteristics, free and reduced-price lunch status, special education status, and disability
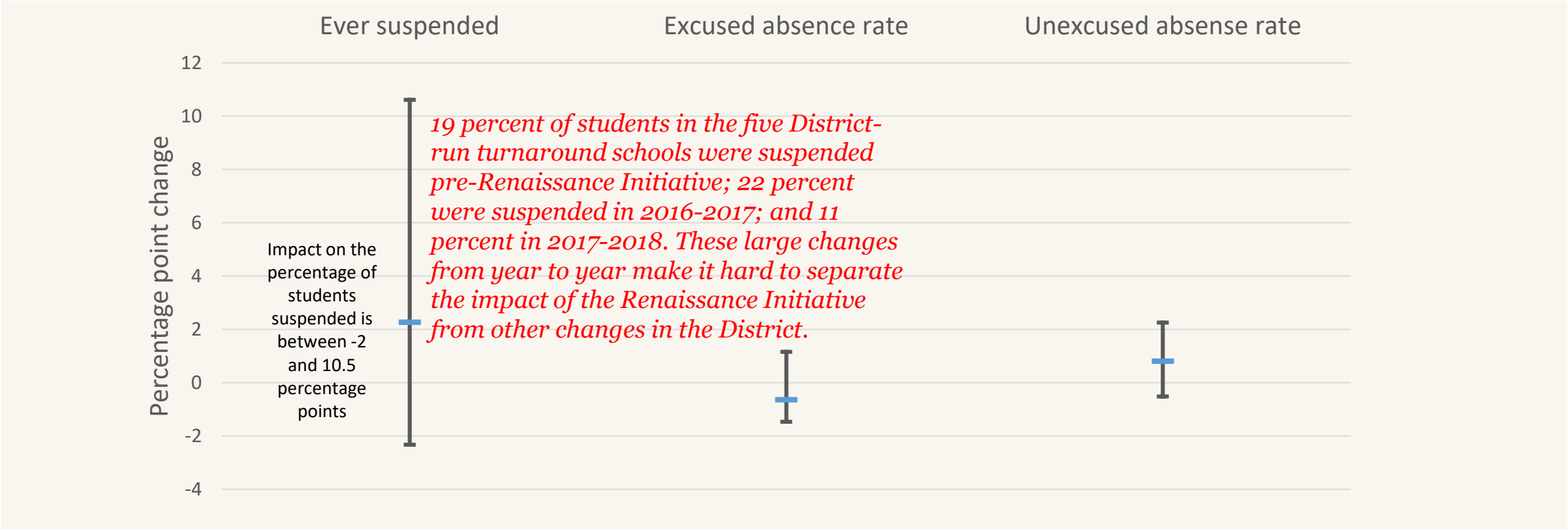
We examined behavior and academic outcomes

We did not include the two Renaissance Charters because we did not have student-level data from those schools

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Comparison schools in student-level analysis

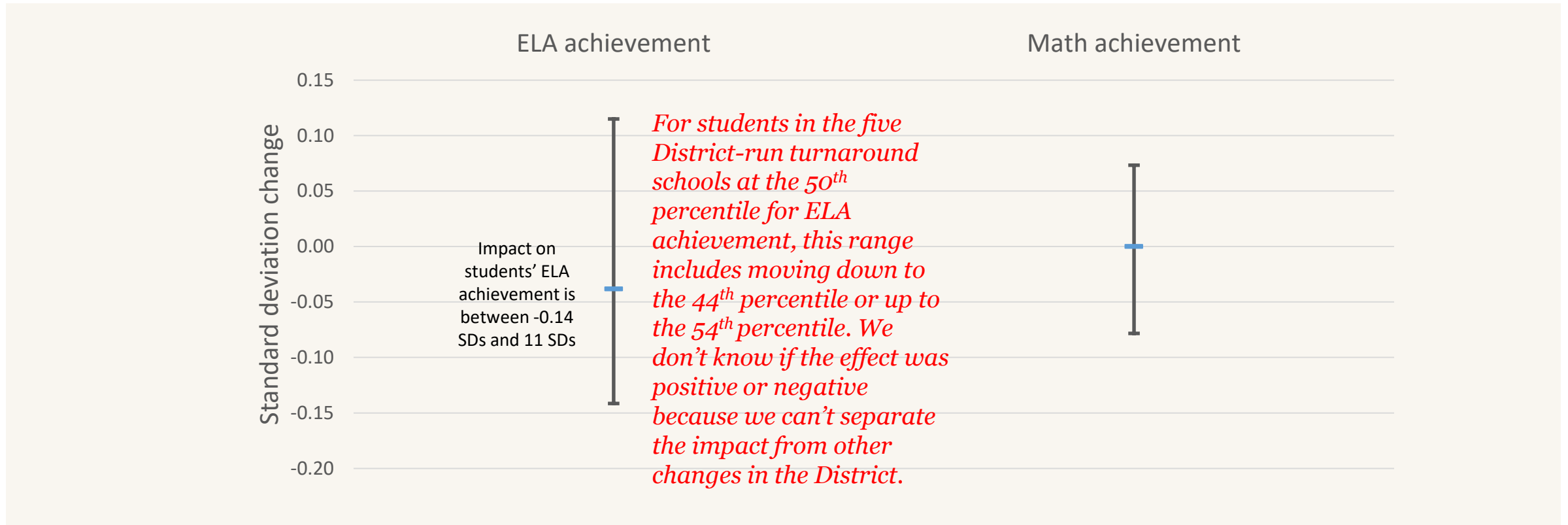|		
Anna B. Day School	General Louis Wagner School	Martha Washington School
Bridesburg School	Henry A. Brown School	Mary M. Bethune School
Bache-Martin School	James Dobson School	Richard R. Wright School
D. Newlin Fell School	James R. Ludlow School	Tanner G. Duckrey School
Delaplaine McDaniel School	James Rhoads School	Warren G. Harding School
Eliza B. Kirkbride School	John F. Hartranft School	William Dick School
F. Amedee Bregy School	Joseph H. Brown School	
General George G. Meade School	Laura W. Waring School	

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For students in the five District-run turnaround schools, we found no impacts on behavior outcomes, but estimates are imprecise

Ever suspended   Excused absence rate   Unexcused absense rate

Percentage point change (y-axis: 12, 10, 8, 6, 4, 2, 0, -2, -4)

Impact on the percentage of students suspended is between -2 and 10.5 percentage points

19 percent of students in the five District-run turnaround schools were suspended pre-Renaissance Initiative; 22 percent were suspended in 2016-2017; and 11 percent in 2017-2018. These large changes from year to year make it hard to separate the impact of the Renaissance Initiative from other changes in the District.

At 5 percent significance level, we can't rule out a wide range of impacts for each outcome:
- Changed school (not shown): -25.0 to 46.4 percent
- Ever suspended: -2.0 to 10.5 percent
- Excused absences: -1.5 to 1.2 percent
- Unexcused absences: -0.5 to 2.4 percent

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For students in the five District-run turnaround schools, impacts on academic outcomes were imprecise and not significant

ELA achievement   Math achievement

Standard deviation change

Impact on students' ELA achievement is between -0.14 SDs and 11 SDs

For students in the five District-run turnaround schools at the 50th percentile for ELA achievement, this range includes moving down to the 44th percentile or up to the 54th percentile. We don't know if the effect was positive or negative because we can't separate the impact from other changes in the District.

At 5 percent significance level, we can't rule out a wide range of impacts for each outcome:
- ELA achievement: -0.14 to 0.11 standard deviations
- Math achievement: -0.08 to 0.07 standard deviations
- Science achievement (not shown): -1.09 to 1.01 standard deviations

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Next steps

Report year	Key study activities
1	• Literature review • Implementation analysis to understand context and supports for Renaissance Initiative schools during 2016-2017 and 2017-2018, and the extent to which the efforts align with literature
2	• **Examine impact of entering the Renaissance Initiative in 2016-2017 (two Renaissance Charters and five District-run turnaround schools) on school- and student-level outcomes after two years**
3	• Follow-up implementation analysis for context and supports during 2018-2019 and 2019-2020s • Conduct cost study

This presentation

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For more information

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Supplemental slides

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Groups of schools that received turnaround supports since 2014

Pre-Turnaround Network, 2014-2015 and 2015-2016		Turnaround Network, 2016-2017	Acceleration Network, 2018-2019
Aspira Charter School at Stetson	Mastery Charter School at Harrity	Dr. Ethel Allen	Dr. Ethel Allen
Cayuga School	Mastery Charter School at Mann	John Barry	Edward Heston
Dr. Ethel Allen School	Mastery Charter School at Pastorius	Morton McMichael	Edward T. Steel
Edward Heston School	Mastery Charter School at Smedley	Paul L. Dunbar	James Rhoads
James G. Blaine School	Memphis Street Academy Charter School at J.P. Jones	Potter-Thomas	John Barry
John Barry School	Morton McMichael School	Roberto Clemente	John Marshall
John Marshall School	Paul L. Dunbar School	William C. Bryant	Morton McMichael
Lindley Academy Charter at Birney	Potter-Thomas School		Paul L. Dunbar
Mastery Charter School at Cleveland	Renaissance Charter		Potter-Thomas
	Roberto Clemente School		Roberto Clemente
Mastery Charter School at Clymer	Rudolph Blankenburg School		Rudolph Blankenburg
Mastery Charter School at Douglass	The Philadelphia Charter School for Arts and Sciences		Thomas A. Edison High School
Mastery Charter School at Gratz	Universal Charter School at Alcorn		West Philadelphia High School
	Universal Charter School at Bluford		William C. Bryant
	Universal Charter School at Creighton		
	Universal Charter School at Daroff		
	Universal Charter School at Vare		
	William C. Bryant School		
	William D. Kelley School		

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Impacts on <u>overall SPR</u> scores were similar whether schools were one of the two Renaissance Charters or one of the five District-run turnaround schools
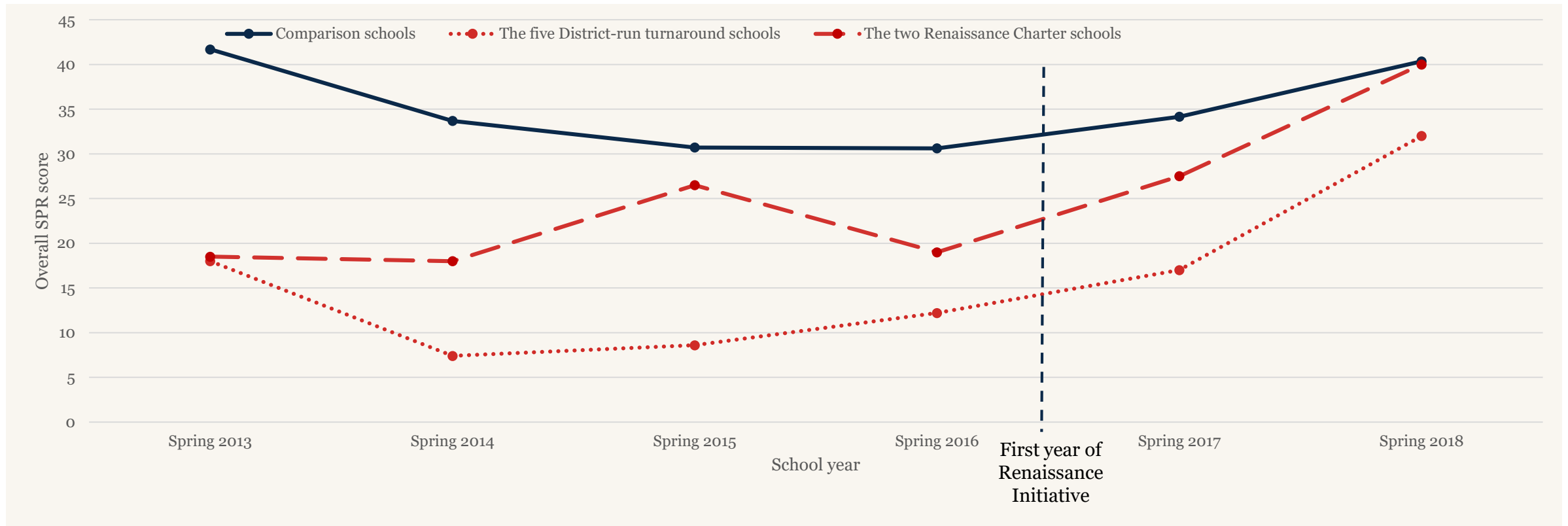

- From spring 2016 and earlier to spring 2017 and later, the change in the average gap between district-run turnaround schools and comparison schools was similar to the change in the average gap between Renaissance Charter schools and comparison schools (p-value = 0.99).

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Impacts on progress scores were similar whether schools were one of the two Renaissance Charters or one of the five District-run turnaround schools
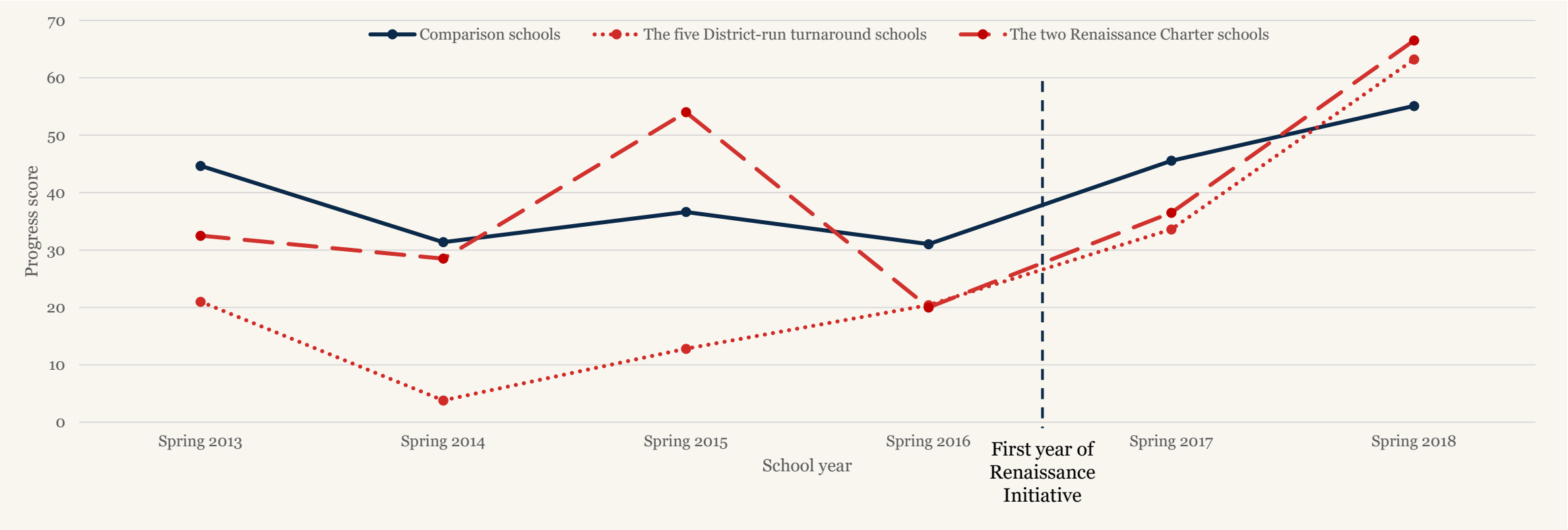

- From spring 2016 and earlier to spring 2017 and later, the change in the average gap between Renaissance Charter schools and comparison schools was similar to the change in the average gap between District-run turnaround schools and comparison schools (p-value = 0.46).
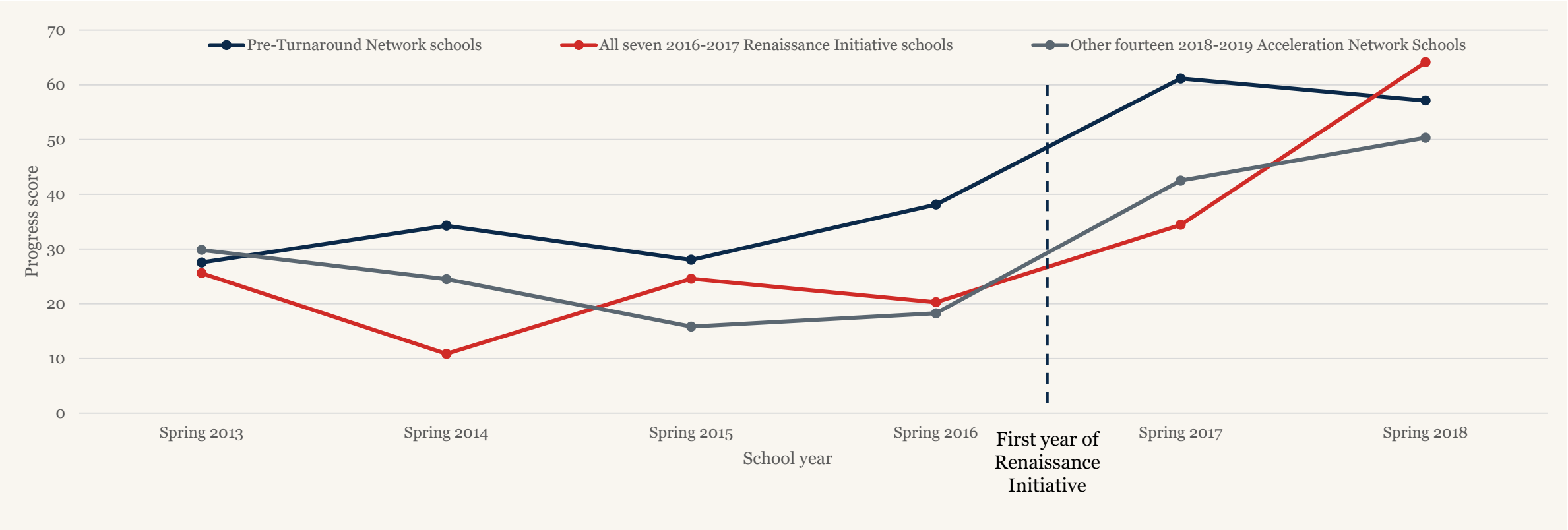
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The seven schools that entered the Renaissance Initiative in 2016-2017 initially had lower <u>overall SPR</u> scores in 2017-2018 than did other schools that received turnaround supports
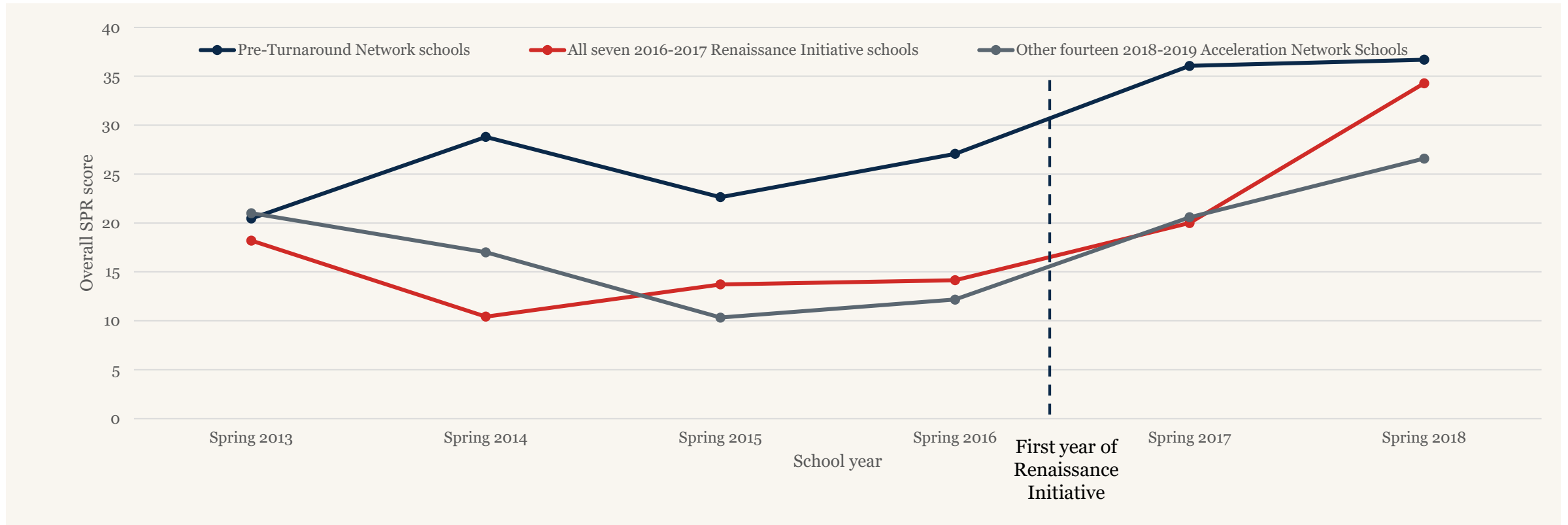
The seven schools that entered the Renaissance Initiative in 2016-2017 had lower <u>climate</u> scores in 2017-2018 than did other schools that received turnaround supports
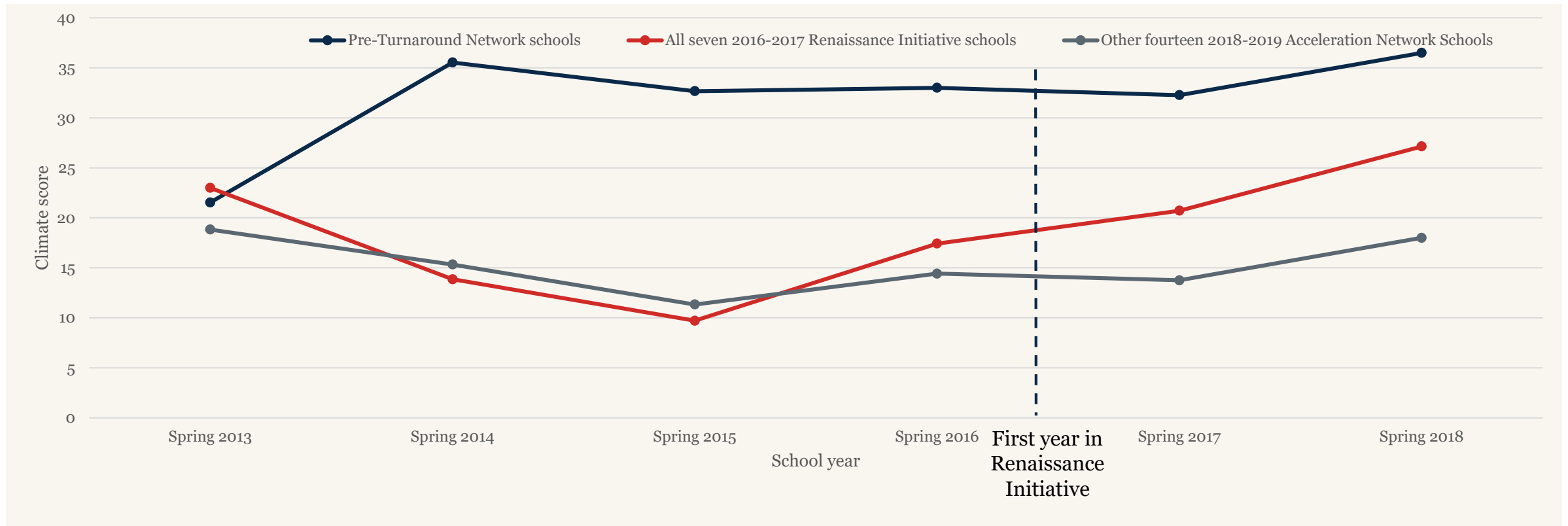
Regarding <u>progress</u> scores, the seven schools that entered the Renaissance Initiative in 2016-2017 caught up to other schools that received turnaround supports

Regarding <u>achievement</u>, the seven schools that entered the Renaissance Initiative in 2016-2017 lagged behind other schools that received turnaround supports in 2017-2018
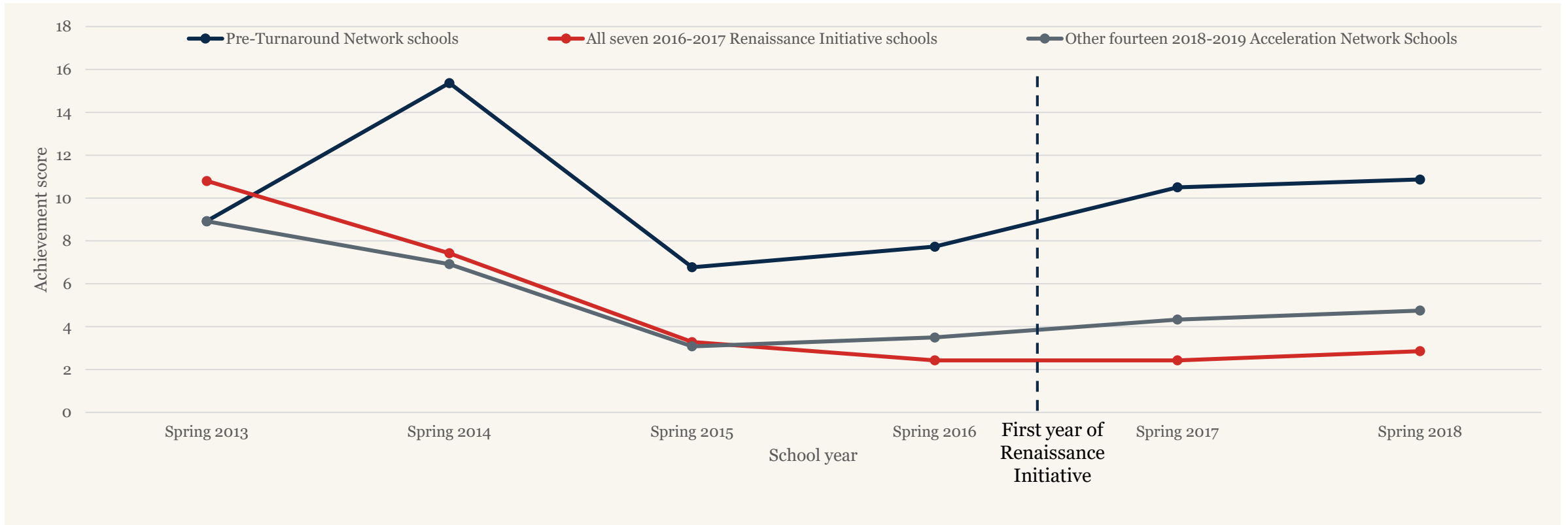
In the student-level analysis, the five District-run turnaround schools performed lower than comparison schools on SPR measures in 2015-2016

	Five District-run turnaround schools	Comparison schools
SPR overall score	12.2	28.0
Achievement score	2.2	13.0
Climate score	10.6	30.3
Progress score	20.4	39.5
Number of schools	5	22

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In the student-level analysis, students in the five District-run turnaround schools had similar demographics as matched comparison students

	Average, five District-run turnaround school sample (percentage)	Average, matched comparison sample (percentage)
Female	44.5	43.9
Black/African American	66.7	67.0
Hispanic/Latino	17.9	18.2
White	1	0.5
Asian	0.2	0.3
Other race	3.8	3.2
Sample size	2,975	2,975

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In the student-level analysis, students in the five District-run turnaround schools had similar behaviors as matched comparison students in 2015-2016

	Average, five District-run turnaround school sample (percentage)	**Average, matched comparison sample (percentage)**
Suspended	18.7	17.6
Unexcused absences	7.5	8.1
Excused absences	2.1	1.9
New to school	35.9	37.4
Sample size	2,975	2,975

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In the student-level analysis, achievement scores were similar between students in the five District-run turnaround schools and matched comparison students in 2015-2016

	Matched sample in five District-run turnaround schools (z-scores)	Matched comparison schools sample (z-scores)
Math achievement (N = 2,847)	-0.25	-0.28
ELA achievement (N = 2,822)	-0.24	-0.28
Science achievement (N = 530)	-0.05	-0.06

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