

**The Persistence of Head Start
Program Effects:
What Role Does Subsequent
Schooling Play?**

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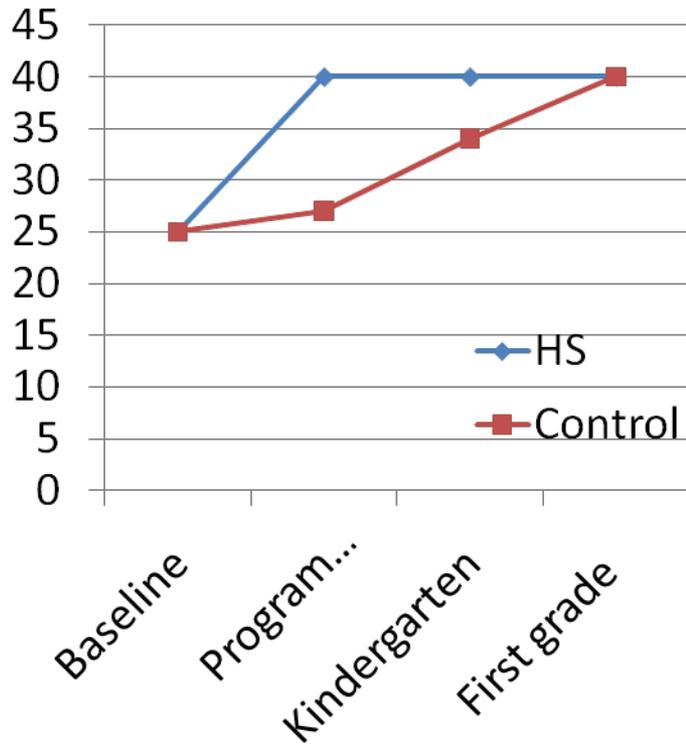
Outline

- Evidence & conceptual question about HS persistence effects
- What do studies tell us about role of subsequent schools
- How to think about the role of subsequent schools
- Focus almost exclusively on achievement outcomes and predominantly on the 4-year-old cohort in the HSIS

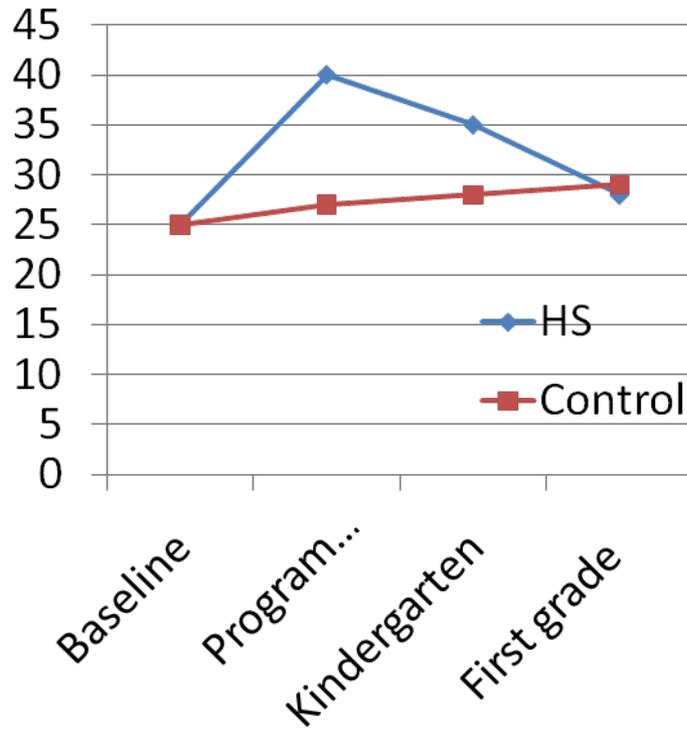
Persistence of HS Impacts

- Accumulated studies point to a “fade out” of program impacts on achievement in early school years
 - May differ in rate of fade out across subgroups, history, etc.
- Non-experimental studies suggest long run benefits of HS even in face of the achievement fadeout
- “Fadeout” occurs when difference between control group and experimental group is reduced

Two types of “fade out”



“catch up”

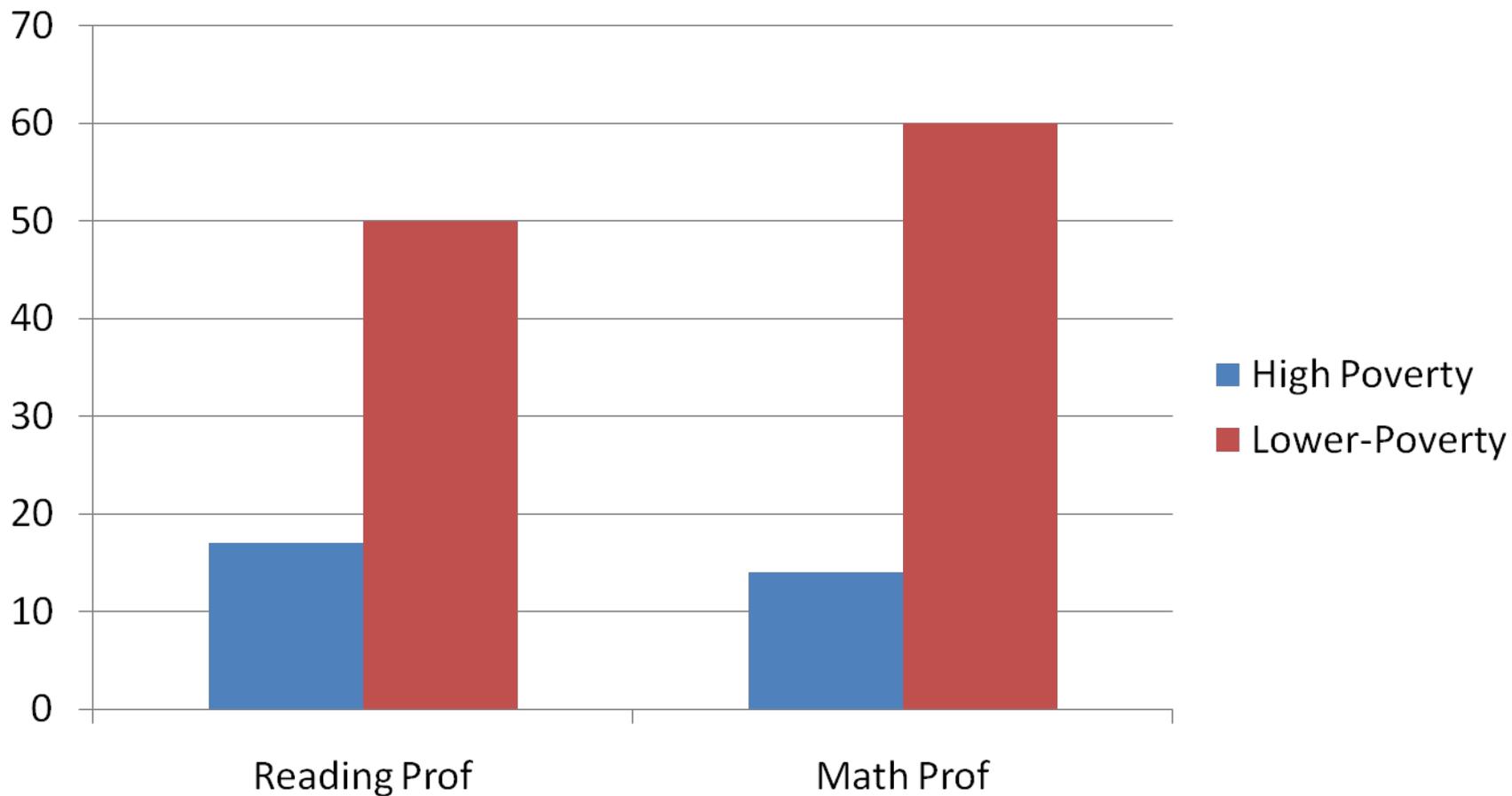


“fall back”

Why look to schools?

- Head Start can not be expected to “inoculate a child against continuing disadvantage” (Zigler & Berman, 1983, p. 894)
- Research found faster fade out for blacks compared with whites, and that black HS attendees attended lower quality schools than the black control group children (Currie & Thomas, 2000)
- High poverty schools “produce” lower achieving students

NAEP, 4th grade Percent Proficient, by School Poverty Rates

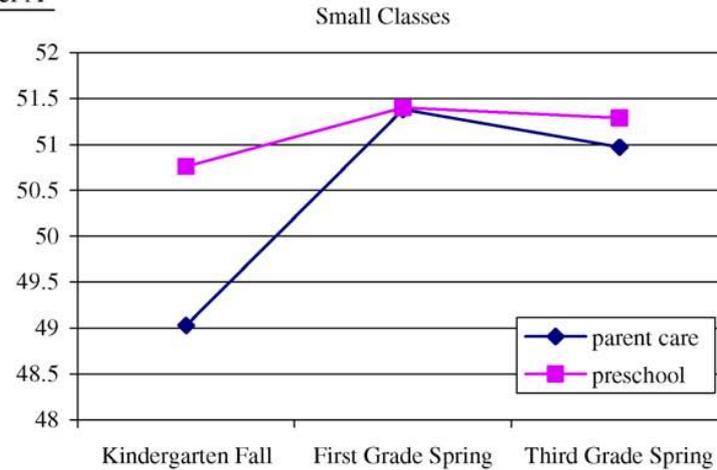
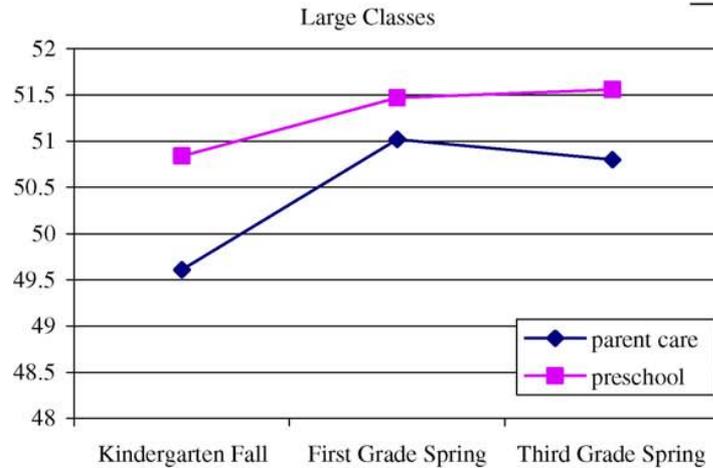


Prior research on subsequent school environments

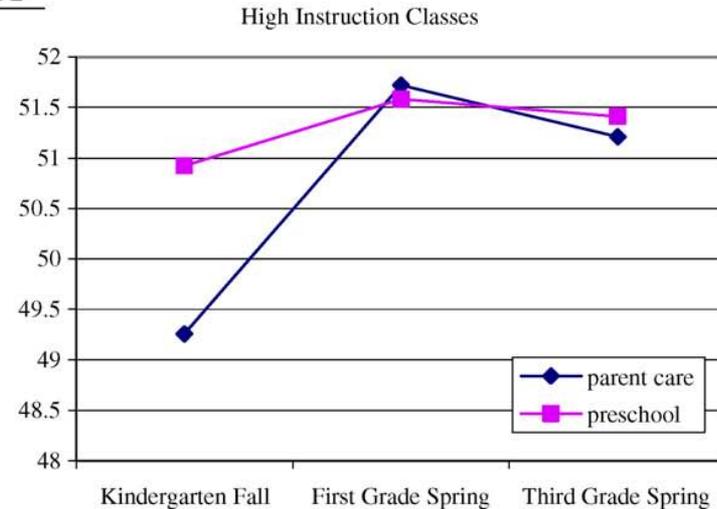
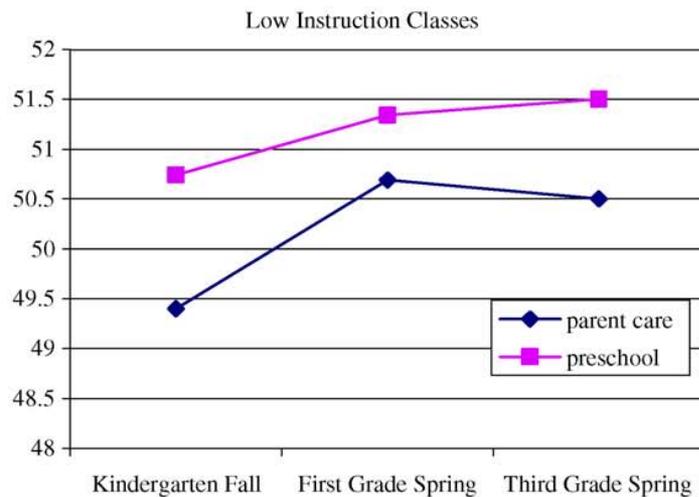
- Head Start Transition Demonstration Study
 - No benefit of transition services
 - *But* poorly implemented
- Abecedarian
 - Randomized school add on program
 - Mixed evidence of effectiveness in maintaining program effects
- Chicago Parent Child Centers
 - Non-randomized school add on program
 - Evidence of greater benefits for those receiving school-age intervention, *but* concerns about selection

The persistence of preschool effects: Do subsequent classroom experiences matter? (Magnuson et al., 2007)

Panel A



Panel B



Findings from HSIS (2010)

- Do not look the same as those of earlier studies...
 - (Largely) Equal fade out across groups
 - Schools are of equal quality for experimental and control group
 - Schools with 66% of students eligible for FRL
 - About 40% of students are non-Hispanic white
 - State proficiency achievement levels average 55%-64%

HSIS Findings

- Suggests that differential school quality can not easily explain differences in effects
- Points to fadeout resulting from differential learning within same schools as a function of...
 - Time in an enriched learning environment
 - Point in skill distribution

What about schools matter?

- It is hard to define classroom “quality”
 - Often rely on achievement as an indicator of quality (we know it is of good quality by gains in achievement).
- Transitional Practices
 - more is better (Schulting et al., 2005)
 - but no good reason to expect differential effects across HS and non-HS children (unless perhaps control group is better prepared for transition to early schooling?)

What about schools matter?

- Classroom and Instruction Characteristics
 - Amount of instruction
 - More is better
 - Type or mode of instruction
 - Prevalence of aptitude by instruction interactions (Morrison & Connor, in press)
 - Quality of emotional and instructional interactions with teacher (Pianta et al., 2008)

Instruction

- Key dimensions (that may work together, and differ a lot across classrooms):
 - Activity direction (child vs. teacher)
 - Level of instruction (whole class vs. groupings)
 - Explicit vs. Implicit
 - Content
- Increasing evidence of distributional effects across these dimensions
 - Ex: children with high vocabulary skills learn more from child-directed reading/literacy than children with low vocabulary skills
- How well do teachers support learning across the skill distribution? Do they teach to the median child? The lowest common denominator? OR are they able to individualize instruction so that all children learn at a comparable rates (or to the best of their abilities)?

How might aptitude by instruction interactions affect persistence of HS impacts?

- HS children are at a higher point in the skills distribution than the control group at school entry:
 - In high-poverty, low-achieving schools their teachers may be more likely to use instructional techniques better suited for lower skilled students & this would lead to a “catch up” type of fade out
 - In higher achieving schools teachers may use instructional techniques better suited for higher skilled children & if HS children are sufficiently high enough in the skill distribution this may lead to the persistence of HS impacts

What do we need to know?

- 1) Do former Head Start students who attend higher quality elementary schools have larger gains in academic achievement than those who attend lower quality schools?
 - Can use HSIS to answer this question
- 2) If so, which malleable characteristics of elementary schools are most important for sustaining early academic gains attributable to Head Start?
 - Can use HSIS to partially explore this question
- In general, we need to be willing to really spend time measuring important features of classrooms (perhaps in a small more localized setting) to answer these questions

In sum...

- Fade out of achievement impacts in early elementary school appears to be robust
- The answer to the fade out issue is not simply “better quality schools”
- Need to place more attention on instruction by student aptitude interactions (or distributional effects of instruction)
- But, important long-run effects may persist even when fade out occurs