

## **Class size**

The articles, which I have read and notes from those articles, are listed after these basic conclusions that I have found from my research.

1. Having a quality teacher is key regardless of the class size. Those teachers should have the resources they need to teach, as well.
2. Smaller class sizes are very important the younger the children, but benefits all children even in college. The longer the smaller class sizes are able to extend the longer lasting the positive results.
3. Smaller class sizes are expensive and the more recent budget constraints forces people to look at instructional format, co-teaching, and distant learning.
4. Smaller class sizes generally lead to more academic success and less classroom management because students are more apt to be engaged.
5. Smaller class size allows for more individual time with teacher for instruction, but also to develop relationships.
6. Smaller class size especially benefits those in poverty and minorities.
7. Smaller class size has been found to reduce the achievement gap often associated with at risk children.
8. Smaller class size leads to less drop outs, more high school graduations, better attendance in college, completed college degrees, and degrees in higher earning fields.
9. Smaller class sizes lead to less retention and fewer special education referrals.
10. Smaller class sizes provide more time for exploration, problem solving, and extended language experiences. (This one reminds me of common core.)

There were also benefits for teachers with smaller class sizes.

1. Less teacher turnover
2. More time for planning
3. More time to communicate with parents
4. More time to give to individual students
5. More time to build relationships with students
6. Less classroom management and behavior disruptions

**Article:** *Minimum Class size and Number of Students Per Classroom* by C. Kenneth Tanner of the University of Georgia 9.1.09

- High density influences achievement negatively
- Conclusion - no more than 17 students per average class size in areas on Table 1

**Article:** *The renewed debate over class size* from the [learningcurve.pearson.com](http://learningcurve.pearson.com) dates of contributing information ranged from 2010 – 2012

- Fiscal necessity is pushing to have larger class sizes.
- Other countries have large class sizes South Korea (36), Japan (33), and China (as many as 50) and are high performing education systems.
- Asian students are better behaved and more homogenous than those in the US, which makes it easier to teach large classes.
- Positives of smaller classes are better management, fewer distractions, more time for individual students, more time to develop lessons, more time to contact parents, if needed.
- In the 80's STAR, Tennessee's Student/Teacher Achievement Ratio, found that classes of 13 – 17 from K – Grade 3 had bigger improvements in early learning and also performed better in the long term than those classes with larger sizes.

**Article:** *Class Size* from [www.edweek.org](http://www.edweek.org) 7.1.2011

- Reduced class size allows for more individual instructional time with students.
- With budget cuts other ways have been to restructure class formats, co-teaching, and distance learning. Examples of this were altering teaching practices such as dropping lecture style approaches and providing more frequent feedback and interaction.
- 1980 – 2008 class size was 17.6 – 15.8 per teacher. (Sparks – 2010) US Dept. of Ed estimates closer to 25 students per teacher.
- Article cites the STAR research which links smaller classes to improvement in achievement especially for poverty and minority students. (Kruger 2001, Sparks, 2011)
- SAGE, Student Achievement Guarantees in Education, researched by the university of Wisconsin-Milwaukee in 2001 five year old program showed smaller class size related to higher achievement for children living in poverty. Similar findings from Columbia University Teachers College in New York (Ready, 2008).
- STAR report mentioned with small class size of 13 – 17 leads to gains long after students have moved into larger classes.

- Accordingly (Kreuger 2001) (Sparks 2011) small class size in earlier years had better academic and personal outcomes through school years and beyond.

- Smaller class size is expensive and sometimes causes unqualified and unprepared teachers to work in the classroom if not enough good teachers are available.

**Article:** *Class Size and Student Achievement: Research Based Policy Alternatives* by Allan Odden from University of Southern California (Multiple studies)

- Dynarski, E., Hyman, J., & Schanzenbach D.W. (2011) Experimental Evidence on the Effect of Childhood Investment on Postsecondary Attainment and Degree Completion.

- Smaller class sizes leads to increases in the rate of college attendance, especially, blacks and poor students. Attending a small class increases the probability of earning a college degree, and the shift to earning degrees in high-earning fields.

- Bascia, N. (2010) Reducing Class Size: What do we Know? Ontario Institute for Studies in Education

- Teachers reported that smaller classes led to the quality of their relationships with students improving and that students were more engaged in learning. Parents said children appeared to be learning more and were more comfortable in school.

- Konstantopoulos, S., & Chun, V. (2009) What Are the Long-Term Effects of Small Classes on the Achievement Gap? Evidence from the Lasting Benefits Study – American Journal of Education

- Class size reduction appears to be an intervention that increases the achievement levels for all students while simultaneously reducing the achievement gap.

- Heilig, J.V., Williams, A. & Jez, S.U. (2010) Input and student achievement: An analysis of Latina/o serving urban elementary schools.

- Decreasing class size increases proficiency on reading 3% and math 4%.

- Rumberger, R. W. (2011) Dropping out: Why Students Drop out of High School and What Can Be Done about It. Cambridge, MA: Harvard UP

- Two early interventions, preschool programs and class – size reduction in early elementary school, both produce significant and improvements in high school graduation rates.

**Article:** *Class Size: What Research Says and What it Means for State Policy* by Matthew M. Chingos and Grover J. “Russ” Whitehurst from [www.brookings.edu](http://www.brookings.edu)

- This article talked about the STAR research. One suggestion about budget crisis and the need to increase class sizes was that if teachers are to be reduced, make certain that it is the least effective teacher. That increased teacher quality would help to negate some of the negatives.

- This article says perhaps the correlation between small class sizes and positive achievement is because the school or district is in a more affluent school district which can afford smaller classes. Perhaps it is because the researcher has “cherry picked” the evidence to support the cause they want. Perhaps a school that serves students with behavior problems may find it easier to manage them with smaller classes. If these classes were compared to others it may show small class sizes really don’t lead to success, when behavior is the main factor.

- Studies that don’t have a positive correlation may have used inexperienced, ineffective, or not highly skilled educators.

- The larger the reduction in numbers such as 7 – 10 the greater the difference. Most studies show the greatest improvements when introduced in earlier grades and students from disadvantaged family backgrounds.

**Article:** *The Tennessee Study of Class Size in the Early School Grades* by Frederick Mosteller

- In his conclusion of this study when you add within-class groupings inside of the small classes, you have even greater success. Small class sizes along with other teaching techniques, may add even further gains.

**Article:** *Key Lessons: Class Size and Student Achievement* (12.16.2008) from [www.education.com](http://www.education.com)

- Significant findings were smaller classes in K – Gr. 3 improve student achievement in reading and math. A class size of 15 – 18 is the upper limit for capturing benefits in the early grades.

- For every additional year spent in small classes beyond K – 3 there is an even more widening margin of success.

- The benefits of small classes in the primary grades are lasting.

- Minority students often experience even greater gains.

- Smaller classes give more instructional options for teachers.

- Smaller classes means more individual attention to students and less time on classroom management.

**Article:** *Class Size: What’s the best Fit?* by W. Steven Barnett, Karen Schulman, and Rima Shore (12.2004) *Preschool Policy Matters*

- Smaller class sizes allows for more individual attention, reduces the time and devotion to classroom management, and reduces the number of stressful interactions.
  - Smaller class size also lowers the rate of classroom retention and placement in special education programs.
  - Smaller class size and preschool leads to longer term benefits such as higher rates of high school graduation and lower rates of delinquency and arrests.
  - Strongest evidence come from smaller class size and highly capable teachers.
  - Smaller class size provides more stimulating, responsive, warm and supportive interactions. It lends itself to more dialogues with children and spending less time on managing children on more on educational activities.
  - At 36 months this led to more school readiness and language comprehension and few behavior problems.
  - With 3 and 4 year olds it has led to greater gains in receptive language, general knowledge, cooperative behavior, verbal initiative, less hostility, and less conflicts when interacting with others.
  - Gains increased every year the child was in a small class size setting. The earlier this happens the stronger the academic achievement. It also led to fewer retentions.
  - Gains are even greater for minority children.
  - In addition to academic and developmental gains, smaller class size is beneficial for health and safety.
  - Major gains are even greater for class sizes below 20.
  - Children in smaller class sizes took greater initiative in class, exerted more effort in learning activities, and displayed less disruptive, inattentive, and withdrawn behavior.
  - Smaller class sizes allow for more time for supporting exploration and problem solving, and work on extending children's language experiences.
  - More time to mediate children's social interaction is a benefit of smaller class sizes.
- Article:** *Addressing Concerns about the Benefits and Costs of Smaller Class Sizes*  
December 2004 from *Preschool Policy Matters*
- What ever class size, you still need a quality teacher.
  - Smaller classes should decrease teacher turnover.

- Smaller class sizes may attract quality teacher for lower salaries and benefits because of the smaller numbers.

**Article:** *The Answer Sheet* by Valerie Strauss from [www.washingtonpost.com](http://www.washingtonpost.com)

- Class size is just one part of education. We need to consider the best place to educate, staffing, time, what is taught, and measuring performance.

**Article:** *Does Class Size Matter?* by Katherine Schulten from The Learning Network (This article was all about student interviews on the topic.)

- A student said self-disciplined students can survive in a larger class size.

**Article:** *What the class size research REALLY says.* (7.9.2010) from [www.educatedreporter.com](http://www.educatedreporter.com)

- Teacher comments include the larger the class the more tiring for teachers, there is more grading papers, more students needing extra help and trying to contact parents. The question is posted "How many teachers leave the profession due to large classes?"

**Article:** *Class Size* from <http://aplusnyc.org>

- Smaller class sizes leads to better test scores, fewer discipline problems, more likely to graduate from high school and college, own their homes 20 years later, enhance non-cognitive such as persistence, motivation, and self esteem.

- In middle and high schools smaller class sizes students have higher scores, are more engaged, and less likely to drop out of school.

**Article:** *Class Size* by Peter Blatchford from [www.education.com](http://www.education.com)

- Small class size work best in literacy for children with the lowest entry scores who had the most ground to make up. Moving to a class of a different size, especially a larger class, had a negative effect on progress.

- Smaller classes tend to do more teaching overall and less management. They allow teachers to spot problems, give feedback, and target teaching to meet those needs. Smaller classes lead to better relationships with students and more knowledge about individual pupils

- In smaller class sizes children are more engaged and have less disruptive behavior.

- Smaller classes allows for teacher/pupil interaction and less listening.

- Smaller classes are important especially in the first years and with those with the most ground to make up.

**Article:** *The Definitive Article on Class Size* by Alice Horning from WPA31.1/2 (Fall/Winter 2007)

- This article deals with higher education and writing.
- To raise students' level of engagement and learning, smaller classes are needed, which also has a positive impact on students finishing degrees.
- Small classes allows for more individual responses to students' writing.
- Smaller classes size has better outcomes for students, teachers, and instructional outcomes including student behavior and concepts, and teachers' morale and professional growth.

I also read seven other articles, but did not feel they were researched based to utilize in this study.