

# Calculus Challenge Problem # 9

Only three teams were able to complete this challenge in Mathematical Economics. As a practical matter, this problem is one that you will see play out in American society more than any other. If you haven't worked through the solution, do so.

There was one error in my solution. I mistyped the derivative of  $f(n) = \sum_{i=1}^4 (y_i - x_i^n)^2$  in the computer when I was looking for the minimum value. The solution has been corrected.

We will have three more problems this year. Number 11 and 12 will be before the AP exam. Then we will take several weeks off as your review for the exam. The final challenge will be the week after AP exams to finish out the year.

## Current Results:

School	Teacher	Score	Cumulative Score
Benjamin Cardozo High School Flushing, New York	Ken Rubel	5	39
Bishop Dunne Catholic School Dallas, Texas	Kevin Braun	5	43
Blessed Trinity Catholic High School Roswell, Georgia	Amy Muller		15
Brookwood High School Snellville, Georgia	Chris Michael		7
Eagles Landing Christian Academy Mcdonough, Georgia	Deborah Brown		3.5
Gleneagle Secondary School Coquitlam, British Columbia	Nevena Savovic		21
Head-Royce School Oakland, California	Shahana Sarkar		17.5
Hickman High School Columbia, Missouri	Deanna Wasman	2.5	26.5
Salem Academy BC Winston-Salem, North Carolina	Kris Sorrells		15.5
Salem Academy AB Winston-Salem, North Carolina	Kris Sorrells		16.5
Science Park High School Newark, New Jersey			10.5
Washington High School Washington, North Carolina	Toby McMahon		13
Westminster Schools Team A Atlanta, Georgia	Nurfatimah Merchant		18.5
Westminster Schools Team B Atlanta, Georgia	Nurfatimah Merchant		14