# **PyCity School data analysis**

PyCity School data consists of school, student data from different public and charter schools in the district for high school students. Data was analyzed according to different categories, and the summarized data was presented in different tables, like - District/School summary, highest/lowest performing schools by %Overall Passing, Math/Reading scores by grade, Scores by School Type/Size which helped draw the following points:

Overall, from the different tables, it is evident that Charter schools have performed better than public district schools. (Overall passing rate of Charter school is 90.43 % vs Overall passing rate of public schools which is 53.67%). We will need more data to ascertain why exactly it is so - But, most likely, reason could be because: (1) The general school population in Charter school is lesser compared to public schools, the teacher to student ratio is better and teachers are able to focus more on students. (2) Also, Teaching methods, syllabus, etc. could vary which contributes to better passing scores/percentage in Charter schools.

Higher spending per student doesn't guarantee better scores. - Though the average spending per student in district school was greater than $ 625 𝑜𝑟 𝑚𝑜𝑟𝑒 𝑡ℎ𝑎𝑛 𝑓𝑜𝑟 𝑎 𝑠𝑡𝑢𝑑𝑒𝑛𝑡 𝑐𝑜𝑚𝑝𝑎𝑟𝑒𝑑 𝑡𝑜 𝐶ℎ𝑎𝑟𝑡𝑒𝑟 𝑠𝑐ℎ𝑜𝑜𝑙 ($580 or less), a student with higher avg budget performed poorly in comparison to a student whose avg budget was lower.

There is not a huge difference between the average math and reading scores across grades and schools.

From the Scores by School Type table, it is clear that small (< 1000) and medium sized schools (1000-2000) have performed better than large (>2000) schools.