Assignment 8

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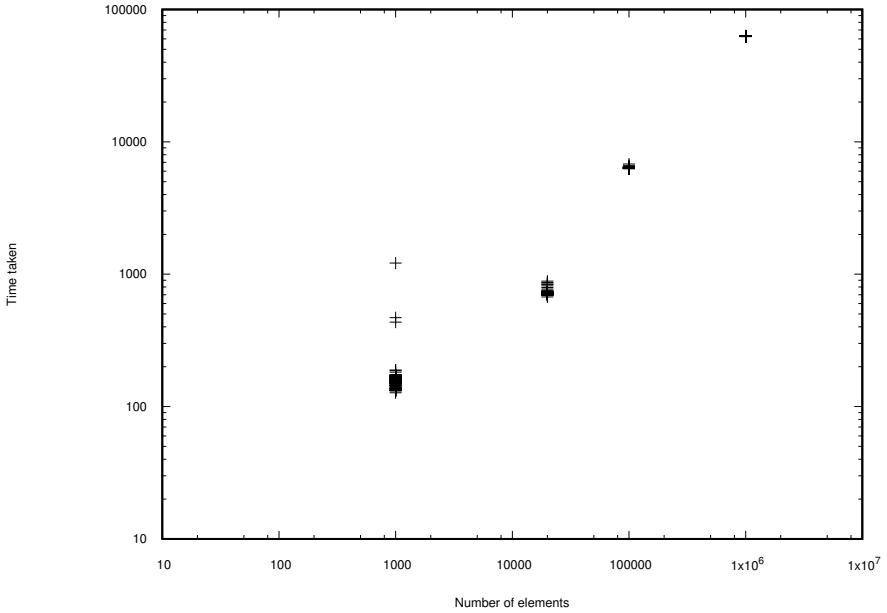

Figure 1: 1 Thread

This is a scatter plot of time taken for execution v/s Number of elements passed for for no. of Threads = 1.
X-axis contains the number of elements passed 1000,10000,100000,1000000 and Y-axis displays the time taken correspondingly for 100 executions.

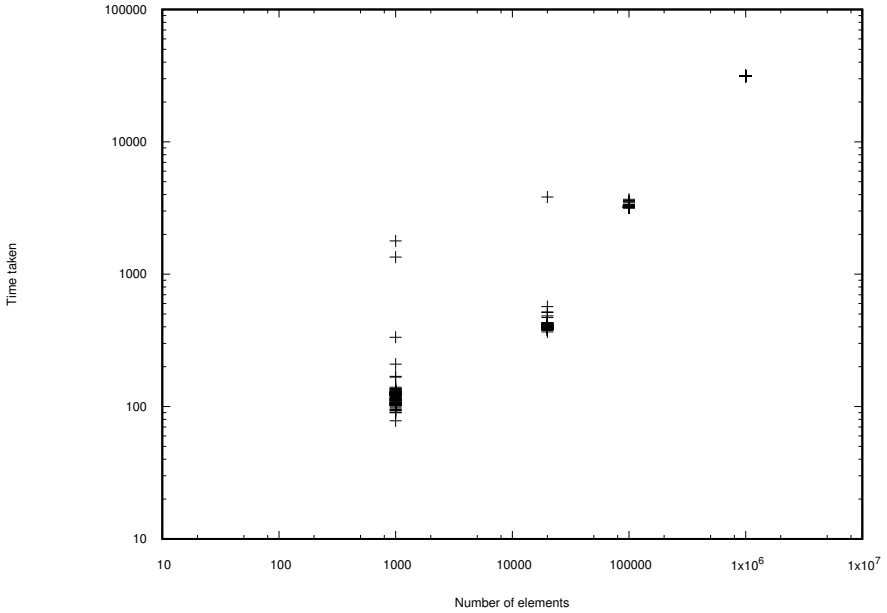

Figure 2: 2 Threads

This is a scatter plot of time taken for execution v/s Number of elements passed for for no. of Threads = 2.
X-axis contains the number of elements passed 1000,10000,100000,1000000 and Y-axis displays the time taken correspondingly for 100 executions.

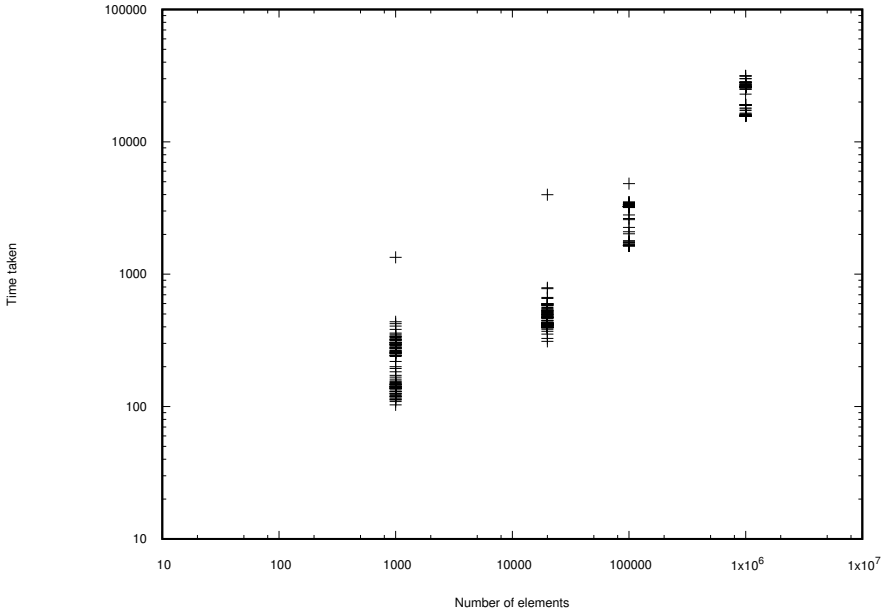

Figure 3: 4 Threads

This is a scatter plot of time taken for execution v/s Number of elements passed for for no. of Threads = 4.
X-axis contains the number of elements passed 1000,10000,100000,1000000 and Y-axis displays the time taken correspondingly for 100 executions.

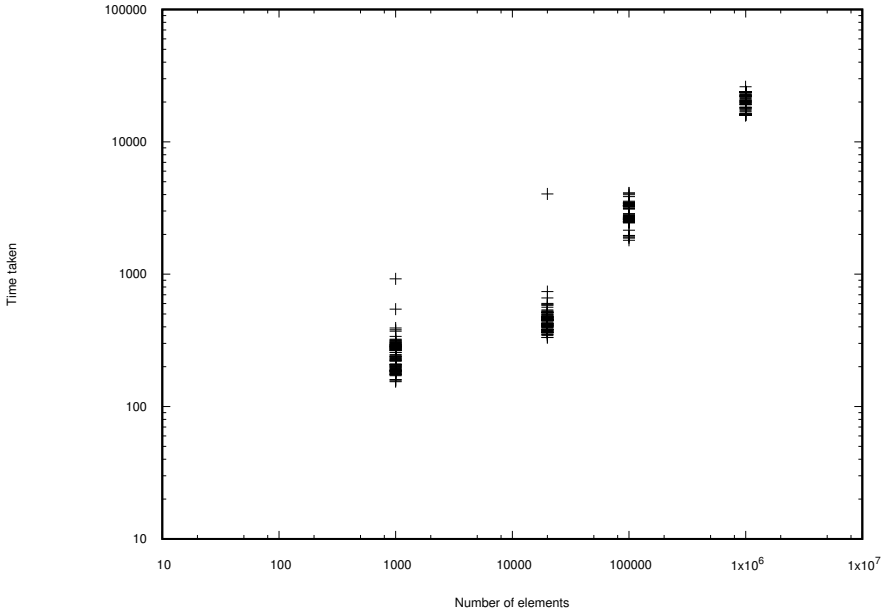

Figure 4: 8 Threads

This is a scatter plot of time taken for execution v/s Number of elements passed for for no. of Threads = 8.
X-axis contains the number of elements passed 1000,10000,100000,1000000 and Y-axis displays the time taken correspondingly for 100 executions.

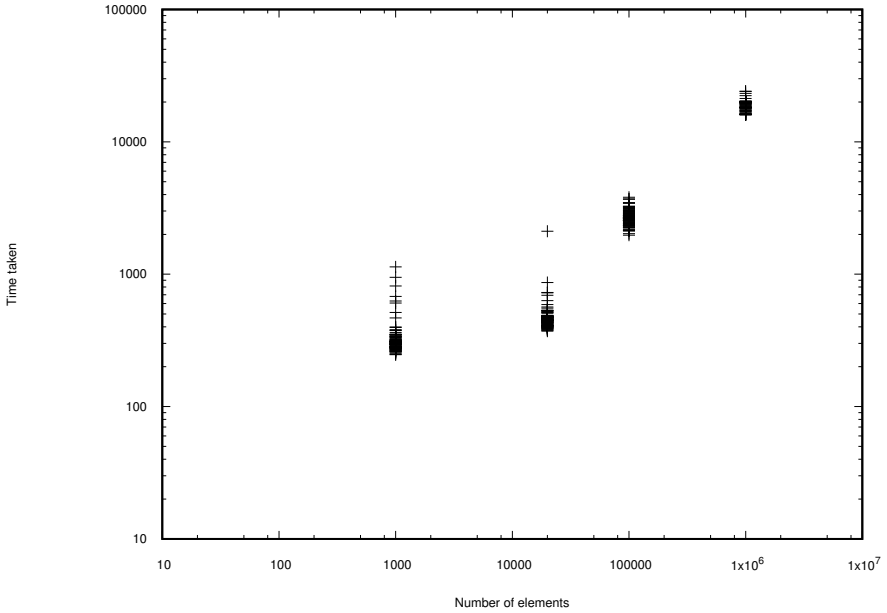

Figure 5: 16 Threads

This is a scatter plot of time taken for execution v/s Number of elements passed for for no. of Threads = 16.
X-axis contains the number of elements passed 1000,10000,100000,1000000 and Y-axis displays the time taken correspondingly for 100 executions.

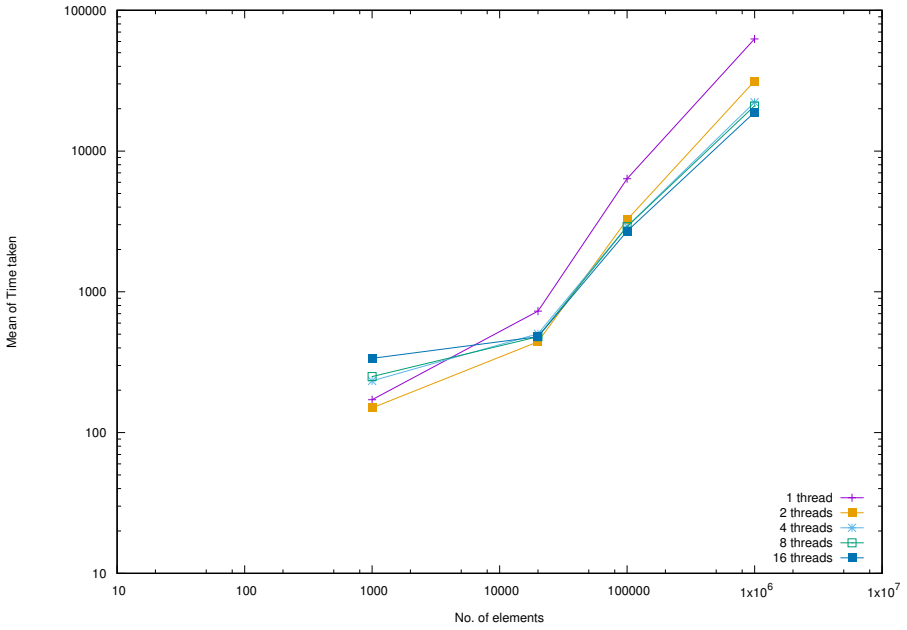

Figure 6: linegraph

This is a line graph of average time taken for execution v/s Number of elements. X-axis holds the number of elements 1000,10000,100000,1000000 and Y-axis displays the time taken correspondingly.
Different lines represent different no. of threads 1,2,4,8,16 as mentioned in the legend.

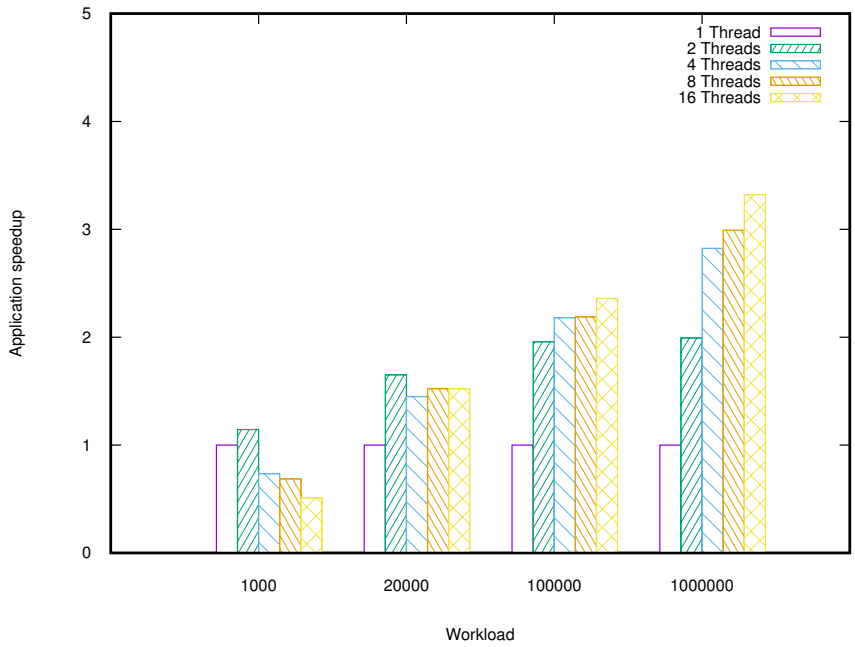

Figure 7: Bargraph

This is a bar graph of average speed for execution w.r.t to the case with 1 thread v/s Number of elements.
X-axis holds the number of elements 1000,10000,100000,1000000 and number of threads 1,2,4,8,16 and Y-axis displays the ratio w.r.t 1 thread.

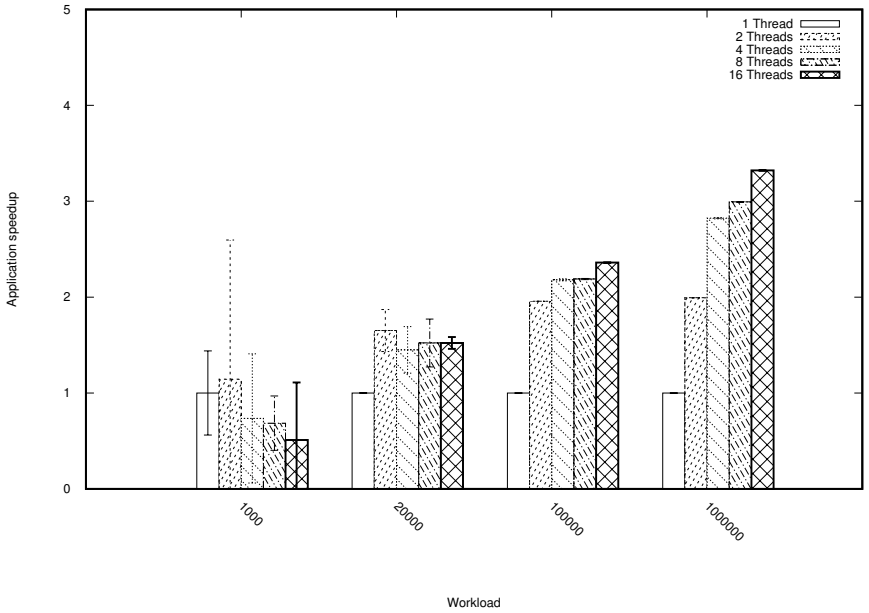

Figure 8: bargraph variance

This is a bar graph of variance in speed of execution w.r.t to the case with 1 thread v/s Number of elements.
X-axis holds the number of elements 1000,10000,100000,1000000 and number of threads 1,2,4,8,16 and Y-axis displays the ratio(speed) w.r.t 1 thread and also its variance.