

Patterns of Test Score Performance Among Elementary and Middle Schools in 90 of Texas' Largest School Districts

Laurence A. Toenjes

**Abstract**

The main goal of this paper is to demonstrate how scatter plots of school performance, including thousands of schools in dozens of districts, can be disaggregated, by school district, and then further dissected by such factors as the percentages of students classified as “mobile” or as Limited English Proficient (LEP) at each campus. While the overall pattern of performance for all schools, when plotted against the percentages of ED students, exhibits the familiar inverse relationship between performance and poverty, with increasing variation around the regression line at higher levels of economic disadvantage, the patterns within individual districts vary enormously. In addition, large variations in the proportions of mobile and LEP students appear to explain, at least in part, the considerable differences in school performance among the high poverty elementary and middle schools in many of the large, high poverty districts.

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## Introduction

In an article that appeared in the Texas Tribune on August 21, 2019<sup>1</sup> a scatter plot, prepared by the Texas Education Agency (TEA), was included. That plot depicted Texas' school districts' performances on the STAAR test, juxtaposed against their percentages of economically disadvantaged (ED) students. There are two main takeaways from this chart. First, there is a decided negative relationship between districts' average test results and their percentages of ED students. Second, the variation in test results increases with greater proportions of ED students.

The main goal of this paper is to demonstrate how such scatter plots of school performance can be dissected, by school district, and then further dissected by such factors as the percentages of students classified as "mobile" or as Limited English Proficient (LEP) at each campus. While the overall pattern of performance for all schools, when plotted against the percentages of ED students, is similar to the pattern of district performance in the TEA diagram that appeared in Swaby (2019), I show that the patterns within individual districts vary enormously. In addition, large variations in the proportions of mobile and LEP students appear to explain, at least in part, the very great differences in school performance among the high poverty elementary and middle schools in the largest districts.

The following analysis relies on data for elementary and middle schools in 90 of the largest school districts in Texas. The data is for the school year 2017-2018.<sup>2</sup>

A diagram showing test results versus levels of economic disadvantage for the 3,453 schools in the data is presented in Figure 1. Although Figure 1 plots academic performance against the percentages of economically disadvantaged (ED) students in elementary and middle schools only (left-hand graph) the pattern is similar to that of the TEA chart in Swaby (2019). The same downwards-sloping relationship between pass rates and ED is obvious, as is the mushrooming of performance variation at high ED levels.<sup>3</sup> In addition to merely exhibiting examples of the diverse patterns of school performance versus percentages of economically disadvantaged (ED) students, one of the purposes of this paper is to suggest reasons for the ballooning of performance variance at higher levels of student poverty.

Within this picture, however, are very distinct patterns of the performance-ED relationship for schools in different districts. These patterns, for 16 of the State's largest districts, are presented and discussed below, beginning with Round Rock ISD.

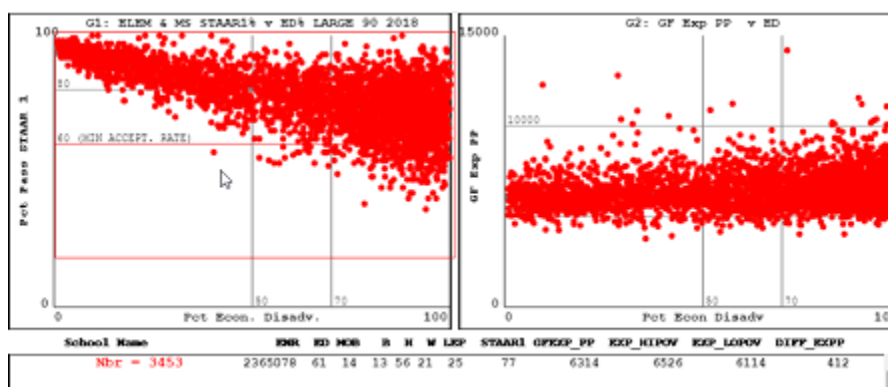
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<sup>1</sup> Swaby, Aliyya, Mandi Cai, "Texas schools with more student poverty got the most Ds and Fs in state ratings", Texas Tribune, August 21, 2019, accessed at <https://www.texastribune.org/2019/08/21/texas-school-ratings-takeaways/> .

<sup>2</sup> Expenditures for plant maintenance were subtracted from the total GF expenditures for each campus. The purpose of the study for which these expenditure data were obtained was to try to determine if the higher poverty schools in each district were actually receiving the compensatory education dollars directed to them by Texas' school finance formula. Some of those results will be referred to in the comments herein. That paper can be obtained from the author. (Toenjes, Laurence A., "Do Texas Elementary and Middle Schools Receive the State Compensatory Education Dollars to Which They are Entitled?", 2019. That paper is unpublished, but, like this one, is available for downloading at [www.polinetworks.com/big90sb](http://www.polinetworks.com/big90sb) , i.e., this website.

<sup>3</sup> Relationships that exhibit this type of increasing variance of the error terms around a regression line are said to be plagued by *heteroscedastic* disturbances.

Figure 1. Elementary and Middle Schools in 90 Large School Districts in Texas: Percentage of Students Passing STAAR 1 Test versus Percent Economically Disadvantaged.



Note: Data were downloaded from the Texas Education Agency, and pertain to the 2017-2018 school year.

As will be seen, the patterns of performance versus poverty among schools in the 16 cases discussed below vary widely. Some will exhibit a large range in ED with very little variation around the regression lines, such as is apparent for Round Rock ISD in Figure 2. In other districts nearly all schools will have very high rates of ED but still exhibit some substantial variation in student performance. And among these latter districts, there can be considerable differences in the average level of student performance for the entire districts.

Each of the following figures will contain two charts. The one on the left will show the STAAR 1<sup>4</sup> pass rate versus the ED percentage. The chart on the right will show general fund expenditures per pupil (GF EXP PER PUPIL) versus ED percentage. These latter charts will provide some indication whether a given district is making any attempt to devote more resources to its higher poverty schools. Of course, if all of the schools in a district have high percentages of ED students, little such opportunity may exist. Both charts will display the regression line, or line of best fit, between the two variables. In all cases, the regression lines are based on all 3,453 schools in the dataset being used. Therefore, schools above or below these lines are, in effect, being compared to other schools with comparable levels of ED, in all 90 districts.

Several data items will be displayed beneath each pair of graphs, relating to the districts whose schools are highlighted. The meanings of each should be obvious, but the four right-most, involving expenditure data, need to be described more fully:

- **GFEXP\_PP.** This refers to general funds expenditures per pupil for a given school, or for the student-weighted average for groups of schools, such as all of the schools in a given district. These data were downloaded from the Texas Education Agency's website, from the PEIMS section, including actual expenditures. The amounts listed for plant maintenance were subtracted from the totals.
- **EXP\_HIPOV.** This refers to those expenditures as described above, but are averaged for roughly the half of the elementary and middle schools in each district that have the highest percentages of economically disadvantaged students. Students are classified, and funded, as economically disadvantaged (ED) if they qualify for the federal free- or reduced-price lunch program.

<sup>4</sup> The term STAAR 1 refers to the evaluation of Texas' statewide assessment evaluated with the "Approaching Grade Level" criterion, the most lenient measure of those used.

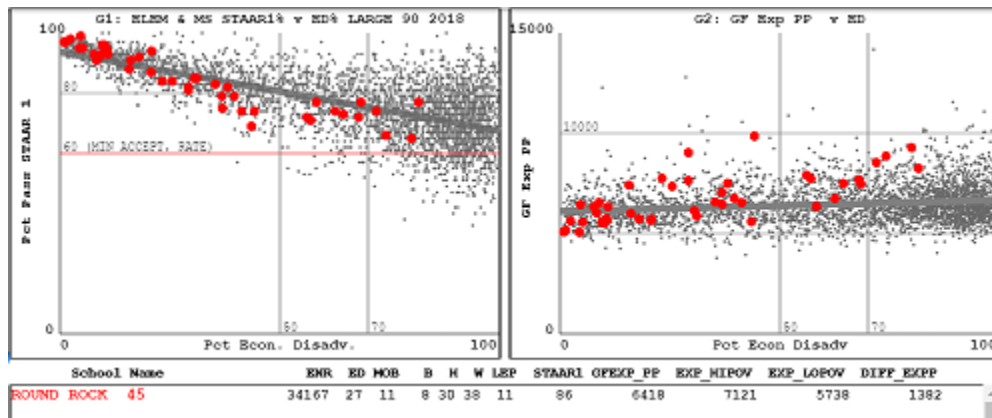
- EXP\_LOPOV. Same as previous, but for the approximately half of the schools in a given district with the lower rates of ED students.
- DIFF\_EXPP. Amounts in this column are merely the difference between the previous two—EXP\_HIPOV – EXP\_LOPOV. Positive values thus indicate that, on average, operations expenditures per pupil are greater in a district’s schools with the higher levels of ED students.

In the following figures data will be shown that represent all of the schools in a given district. But it should be pointed out that the amounts in the last three data columns just described are averages for each district, whether all of the schools are being displayed or not. This warning is for those who might go to the website where the software permits data to be queried for individual schools or for groups of schools not corresponding to a given district. (Available at [www.polinetworks.com/big90g2](http://www.polinetworks.com/big90g2).) Using this website should allow the reader to duplicate most of the observations and assertions that appear below, as well as additional observations.

### Round Rock ISD

In Round Rock ISD, the STAAR 1 passing rates appear to be somewhat above this average relationship line for schools with very low poverty rates, but somewhat below for the higher poverty schools. The background of gray dots represents all of the other schools in the largest 90 districts being analyzed that are not in Round Rock ISD.

Figure 2: Round Rock ISD



In the paper referred to in footnote 2, it was found that general fund expenditures (GF EXP) in the highest poverty campuses—those that included approximately one-half of the students—exceeded such expenditures in the low poverty half by \$1,382 per pupil, for Round Rock ISD. This amount is displayed in the extreme right-hand position in the line of data beneath the charts. The locations of the highlighted points--schools-- in the right-hand graph reflect this difference, although with considerable variation.

One conclusion suggested by these charts is that while the test results in Round Rock ISD’s higher poverty schools are clearly below the test results in the lower poverty schools, and even below the average performance levels of all schools in the state with comparable poverty levels, the extra resources being directed to the higher poverty schools, on average, appear to show the district’s concern and

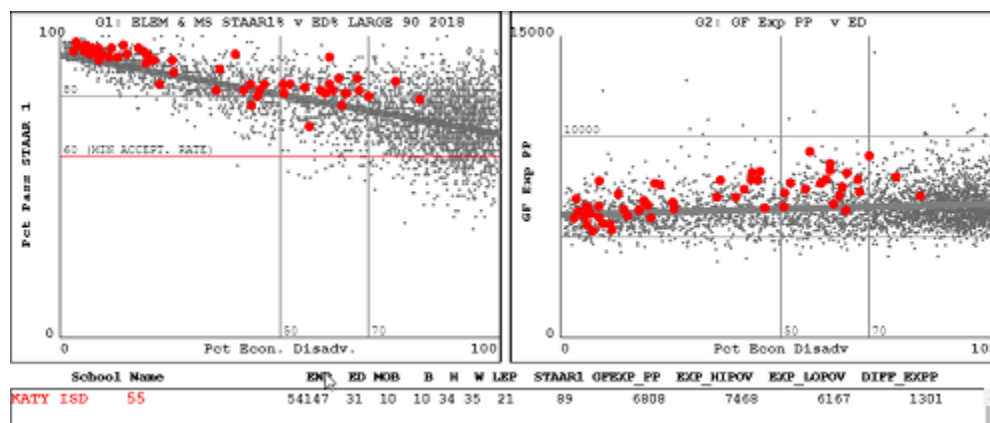
intention to address the issue. Whether those extra resources will be effective in reducing the performance gap between Round Rock ISD’s low poverty and high poverty schools remains to be seen.

Unlike other districts that will be discussed below, the variation around the regression line in Round Rock ISD is relatively restricted. In spite of the fact that more funds are being devoted to the higher poverty schools the remaining close association of test results with poverty in this district indicates the heavy influence of poverty upon academic performance. It is noted that Round Rock ISD has a relatively low district ED rate of 27 percent, less than half the level for all of the schools in this study. Just 20 percent of its students attend schools that have more than 50 percent ED students. Therefore, Round Rock ISD has considerably more opportunity to shift resources to the higher poverty schools than many districts might have.

### Katy ISD

Katy ISD appears very similar to Round Rock ISD. Among the data elements shown beneath the graphs for the two districts, the largest difference is Katy ISD’s 21 percent LEP rate, as compared to Round Rock ISD’s 11 percent rate. In terms of the pattern of test results versus ED, in the left hand graph, Katy ISD shows a definite up tick at the higher poverty end. These two observations may be related.

Figure 2: Katy ISD



While the district LEP rate is 21 percent, in the 15 elementary schools with more than 50 percent ED students, the LEP rate is 38 percent, but in the middle schools with more than 50 percent ED the LEP rate is just 14 percent. According to Heather Smalley at TEA, “LEP students in years 2-4 in US schools were able to meet Index 1 through the English Language Learner Progress Measure (ELL PM) which is easier than STAAR 1 Approaches Grade Level standard.”<sup>5</sup>

In addition, statistical regression runs, using all of the schools in the data set, show that the percentages of LEP (Limited English Proficient) students are positively related to the STAAR 1 performances of those students in elementary schools, but are negatively related to STAAR 1 performance for middle schools. Therefore, the positive “bump” in scores for higher poverty schools in Katy ISD could, at least in part, be explained by this phenomenon.

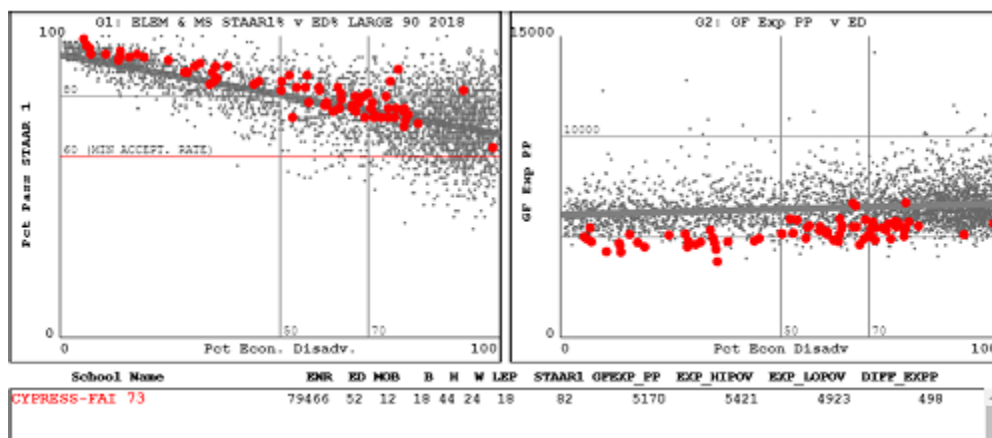
<sup>5</sup> From email correspondence with Ms. Smalley. Ms. Smalley’s “Index 1” is being referred to as “STAAR 1” herein.

On the positive side, it is noted that higher poverty schools in Katy ISD show \$1,301 per student greater GF Expenditures than their lower poverty counterparts. As in Round Rock ISD, this indicates the district is actually allocating more resources to their higher poverty schools. But also, like Round Rock ISD, the relatively wide range in ED per student at the various campuses helps make such redistributions feasible.

### Cypress-Fairbanks ISD

The pattern of test results versus ED for Cypress-Fairbanks ISD (Cy-Fair ISD) is quite similar to that of Katy ISD. Cy-Fair’s LEP percentage, at 18 percent, is 3 points less than that for Katy ISD. And similarly to Katy’s, the LEP students appear to be concentrated in the higher poverty schools. In fact, for the elementary schools with more than 50 percent ED students, 29 percent are classified as LEP, but only 12 percent are so classified in middle schools with more than 50 percent ED rates.

Figure 4: Cypress-Fairbanks ISD



General Fund expenditures per pupil (GFEXP PP) for the Cy-Fair schools are just \$5,170, as compared to \$6,808 at Katy. Still, Cy-Fair’s higher poverty schools are showing \$498 more GFEXP PP than its lower poverty schools.

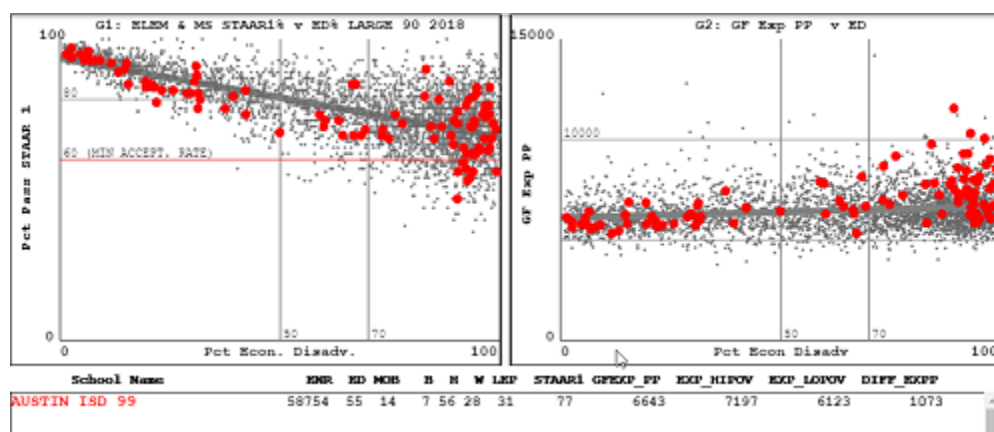
It is noted that in all three districts commented upon thus far, relatively few elementary and middle schools fell below the regression line, and none had STAAR 1 pass rates below the minimum 60 percent passing rate.

### Austin ISD

Austin ISD is the first district in this subset of Texas school districts that might be termed a large central city district. For the elementary and middle schools in the largest Texas districts being analyzed here, most students attend schools where the average ED rate exceeds the state average. In Austin, the graphs suggest that the schools tend to be bunched up at each extreme, relative to the poverty measure. For example, 36 percent of all students in these 99 Austin schools are in schools with more than 85 percent ED. Some researchers have found that the impact of economic and social dysfunction upon school performance is non-linear; that as the proportions of students with various degrees of economic and

social problems increase, the academic performance of the schools that they attend tends to fall off more rapidly.<sup>6</sup>

Figure 5: Austin ISD



The picture for Austin ISD is complicated by the larger proportions of students classified as LEP and mobile in the higher poverty populations. Higher poverty elementary schools with higher rates of LEP students seem to have an advantage, and schools with lower rates of student mobility also tend to have an advantage. Focusing on the schools in Austin ISD with ED rates exceeding 70 percent, the 9 highest scoring schools had an average mobility rate of 19 percent and a LEP rate of 69 percent. The STAAR 1 pass rates for these 9 schools averaged 83 percent. Among the 7 lowest scoring schools with ED rates exceeding 70 percent, their mobility rates averaged 25 percent, LEP averaged 49 percent, and the STAAR 1 success rate was just 54 percent. While it is not suggested that these two factors—mobility and LEP status—fully explain this large difference in academic performance, it is clear that the incidence of these factors does increase at very high levels of school poverty, and that they help explain, to some extent, the wide variation of average performance among schools with high poverty levels—70 percent or greater—observed among all of Texas’ large central city districts.

Additional examples of the pattern exhibited by Austin ISD will be presented below, namely for Dallas, Fort Worth, and Houston. Others, such as El Paso, may also reflect these considerations.

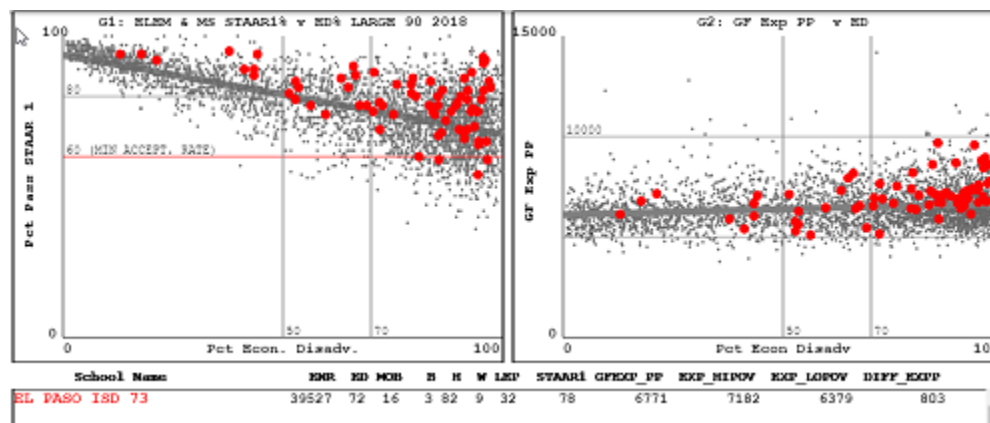
Austin also appears to focus extra GF resources to the higher poverty campuses, with GFEXP PP \$1,073 greater in the higher poverty schools

### El Paso ISD

El Paso ISD has an ED rate of 72 percent, 17 points higher than Austin ISD’s. Eighty-two percent of the students in its elementary and middle schools are Hispanic, compared with 56 percent in Austin ISD. But the STAAR 1 pass rates are essentially the same in both districts—78 percent in El Paso, 77 percent in Austin.

<sup>6</sup> Wool, S., Fermanich, M., & Reichardt, R. (2015), June). “A Review of the Literature of the Effects of Concentrations of Poverty on School Performance and School Resource Needs.” Denver, CO: APA Consulting.

Figure 6: El Paso ISD



El Paso and Austin have similar LEP rates of 32 percent and 35 percent, respectively. However, among schools in El Paso with ED rates of at least 70 percent, the LEP rate in the 42 elementary schools is 44 percent, and in the middle schools it is 32 percent. The STAAR 1 pass rates for these elementary schools with ED rates exceeding 70 percent was 78 percent, while it was just 66 percent for the similar high poverty middle schools.

When one views the left hand graph in Fig. 5 for El Paso, the impression is quite favorable; 57 of the district's 73 elementary and middle schools appear to be on or above the regression line. However, 49 of the 57 elementary schools are above the line, but only 5 of the 16 middle schools appear to be on or above the line. If the hypothesis that the more lenient test given to many elementary LEP students does not account for these differences in performance between elementary and middle schools, then there must be some other factor at work.

El Paso's schools are rather closely distributed around the regression line up to ED levels of 60 percent. It is beyond this poverty rate that the variation around the regression line increases. In this regard, it is noted that the average rate of LEP students in schools with less than 60 percent ED is 16 percent, whereas for schools with ED rates over 60 percent the average LEP rate is 39 percent.

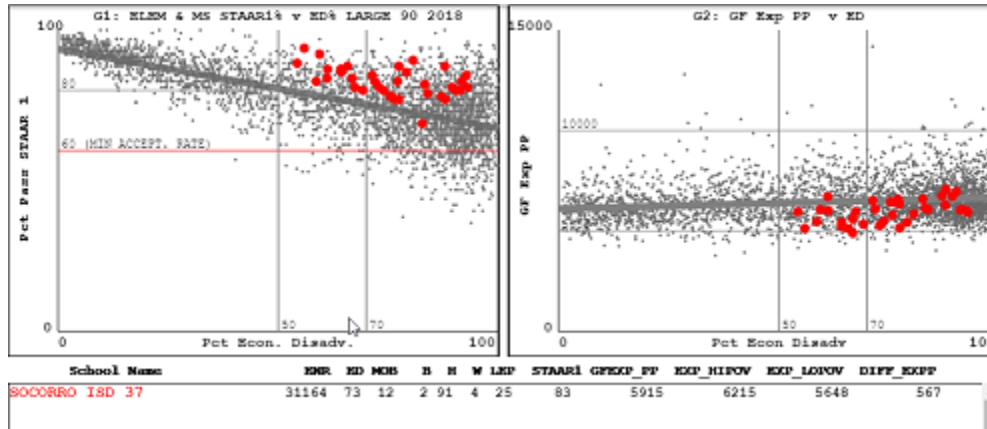
The level of GFEXP PP in El Paso's higher poverty elementary and middle schools is \$803 greater than in the lower poverty schools.

### Socorro ISD

Socorro ISD is somewhat unique among the districts being commented on here. Of its 37 elementary and middle schools, all have ED rates in excess of 50 percent, but only a single school is, just barely, below the regression line. The LEP for all schools is 25 percent, 29 percent for elementary schools, and 14 percent for middle schools. If there is any validity to the hypothesis that LEP students in the elementary grades are advantaged, this 2:1 difference in LEP rates, but with similar STAAR1 pass rates in Socorro contradicts it. For elementary schools the STAAR 1 pass rate is 83 percent; for middle schools it is 82 percent.



Figure 7: Socorro ISD



Even though Socorro ISD has less variation in ED rates among its elementary and middle school campuses than the other districts discussed thus far, it still manages to allocate \$567 per pupil more operations funds to its higher poverty campuses.

Socorro’s somewhat unique pattern of test results versus poverty levels would lie hidden in the overall graphs of this relationship, as in Figure 1 above, were it not revealed in this manner.

Eight additional graphs of district performance among elementary and middle schools will be presented. The purpose is to further demonstrate the various patterns of school performance among the 3,453 data points in Figure 1

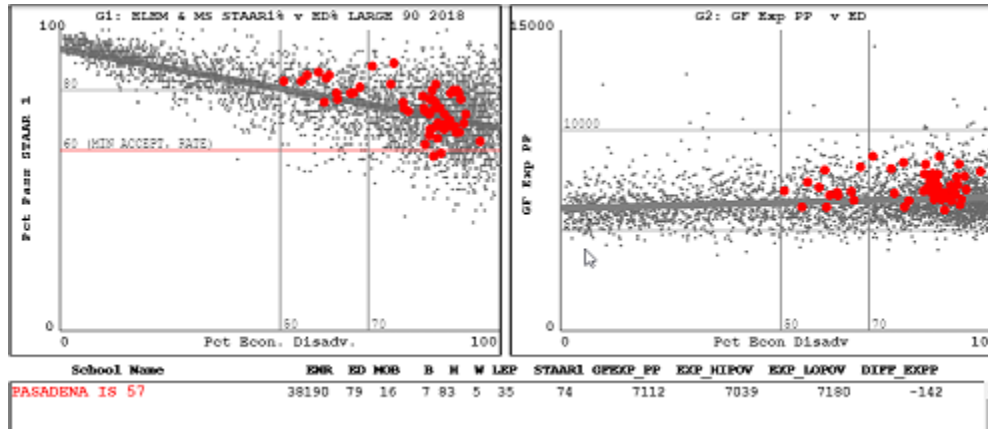
**Pasadena ISD**

Pasadena ISD’s students are 83 percent Hispanic, 79 percent low income, with 49 percent of all students in schools with 85 percent ED or greater.

Only 2 of Pasadena’s elementary and middle schools had STAAR 1 pass rates below 60, both being 58, just one or two percentage points short. Overall, Pasadena ISD makes a pretty strong showing. But it should be noted that there still remains a strong, declining relationship between the percentages of ED students and how well the students perform, on average, at Pasadena ISD’s elementary and middle schools. This has also been the case for the previous 6 school districts considered above.

The GF EXP PP figures for Pasadena’s elementary and middle schools actually show lower expenditures in its higher poverty schools. Of course, when the average level of ED for the entire district is so high and the range from low poverty to high poverty so narrow, there is not nearly as much opportunity to redistribute resources from very low poverty schools with high academic performance to higher poverty, lower performing schools, as was the case in some of the districts already considered, such as Round Rock ISD and Katy ISD

Figure 8: Pasadena ISD



### Houston ISD

The pattern of highlighted points in Fig. 9, representing elementary and middle schools in Houston ISD, dramatically illustrates the ballooning of high and low STAAR 1 pass rates at rates of ED above approximately 80 percent. Again, the question is, why do some schools appear to do very well in spite of having large percentages of ED students, while others seem to take a nosedive?

A first step in answering this question is to look at the makeup of schools with ED above 80 percent and which are in the highest scoring region for this group. These will be compared with the characteristics of those Houston ISD schools with similarly high ED rates, but which have the lowest STAAR 1 pass rates. In other words, these are the high and low scoring schools from the right hand side of the first graph shown in Fig. 9. The characteristics of these elementary and middle schools are summarized in the following table, Table 1.

Figure 9: Houston ISD

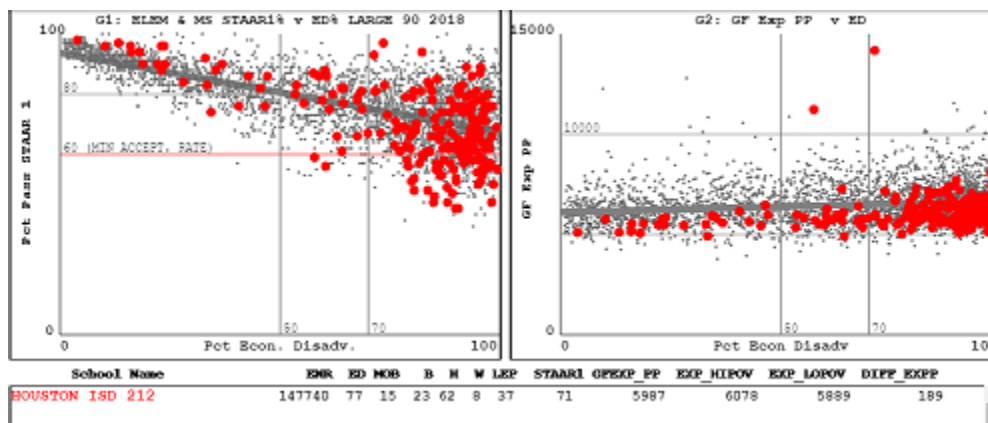


Table 1. Demographics and STAAR 1 results, Houston ISD Elementary and Middle Schools, SY 2017-2018, ED &gt;= 80 Percent

Performance Level	Nbr Schools	Enroll	Econ Disadv. (%)	Mobile Students (%)	Black (%)	Hisp (%)	White (%)	LEP (%)	STAAR 1 Pass Rate (%)
Highest	71	49,985	91	14	18	78	2	47	76
Lowest	79	48,370	91	22	34	63	2	40	58

The two groups have similar numbers of schools, enrollments, and percentages of students who are ED and White. They differ on (a) percentage of mobile, Black, Hispanic, and LEP students. These latter differences are in all likelihood related to the marked differences in STAAR 1 passing rates. A similar pattern is observed in Dallas ISD, Fort Worth ISD, and for the schools in all 90 of the districts being analyzed here as a whole. The comparable numbers for this latter group are presented in Table 2.

Table 2. Demographics and STAAR 1 results in 1,407 High Poverty Elementary and Middle Schools in the Largest 90 Texas School Districts, SY 2017-2018, ED &gt;= 80 percent

Performance Level	Nbr of Schools	Enroll	Econ Disadv. (%)	Mobile Students (%)	Black (%)	Hisp (%)	White (%)	LEP (%)	STAAR 1 Pass Rate (%)
Highest	714	435,200	90	17	8	86	4	46	78
Lowest	693	434,036	90	21	21	72	4	39	62

The observations for this larger set of schools are similar to those for the schools in Houston ISD only. The higher-performing schools have fewer mobile students, fewer Black students, more Hispanic students, more LEP students, and higher STAAR 1 passing rates.

The general impact of ED, LEP, and mobility upon test results have also been demonstrated by applying statistical regression analysis to all of the schools in the working data set— 3,453—and to elementary and middle schools separately. In all three regressions, Econ. Disadv. and Mobility had highly significant negative coefficients, indicating that higher rates of these factors resulted in, on average, lower STAAR 1 pass rates. The coefficients for LEP percents were also highly significant in two of the three cases: (a) using both elementary and middle schools in the same regression the coefficient for LEP was positive (0.076,  $p=0.000$ ); (b) using elementary schools only, it was also positive (0.060,  $p=0.000$ ); but using middle schools only, the LEP coefficient was negative (-0.031,  $p=0.113$ ) and not significant.

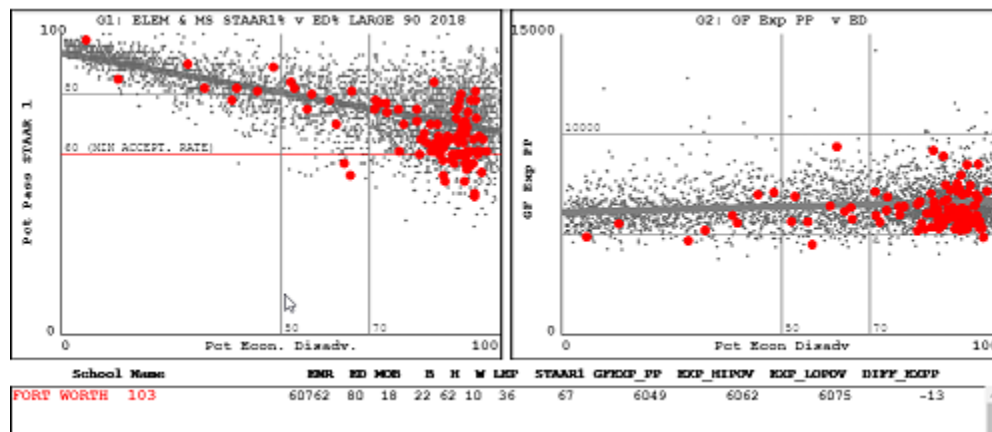
As a result, it is hypothesized that the striking number of Houston ISD's high-poverty high-scoring elementary schools is related to both greater proportions of students being tested under the different rules that apply for LEP students still learning English (EL), and to lower average rates of student mobility associated with them. It is also hypothesized that the striking number of Houston ISD's high-poverty low-scoring elementary schools is related to the lower rates of eligibility for being tested as LEP students, and to much higher rates of student mobility among these students. It is further hypothesized that these same phenomena are also present in Dallas ISD, Fort Worth ISD, and to some extent in Austin ISD, and for the state as a whole.

In addition, it is likely that the reversal of the effects of LEP when going from elementary schools to middle schools is related to the fact that students in the learning-English category are only eligible to be tested under the terms of the English Language Learner Progress Measure (ELL PM) for a limited time, which would normally expire upon reaching middle school status. For LEP students in middle schools, without the same benefit of being tested under more lenient procedures and standards, the association between LEP and ED would result in the negative effects of ED upon school performance once again holding sway.

### Fort Worth ISD

Much of the discussion above for Houston ISD also applies to Fort Worth ISD. A comparison of the data beneath the graphs for the two districts shows a high degree of similarity between the two.

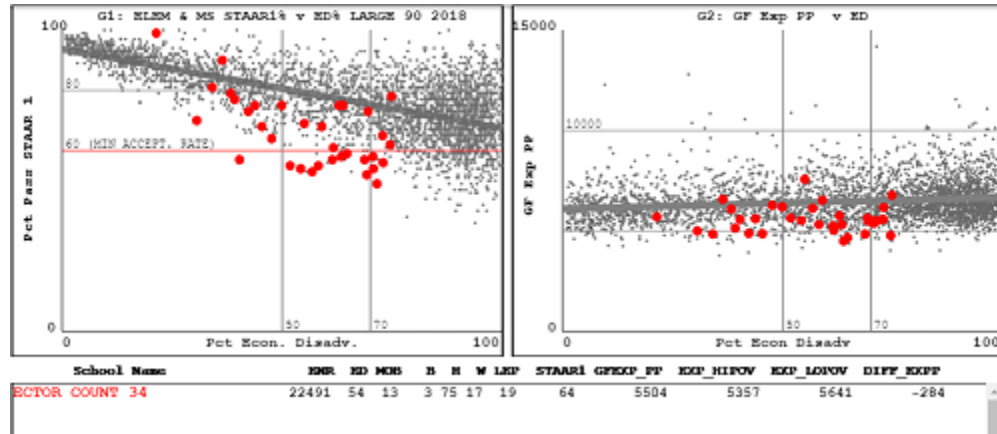
Figure 10: Fort Worth ISD



### Ector County ISD

Ector County ISD seems to be in a class of its own (although Midland ISD is quite similar). This district has considerably lower ED rates than either Houston ISD or Fort Worth ISD, but the average pass rate on STAAR 1 for its 34 elementary and middle schools in 2018 was just 64 percent. Fourteen schools are below the minimum pass rate of 60 percent. This is an additional case of how quite different the pictures are for different school districts, pictures which normally lie hidden in the diagrams that represent all schools or school districts in the State.

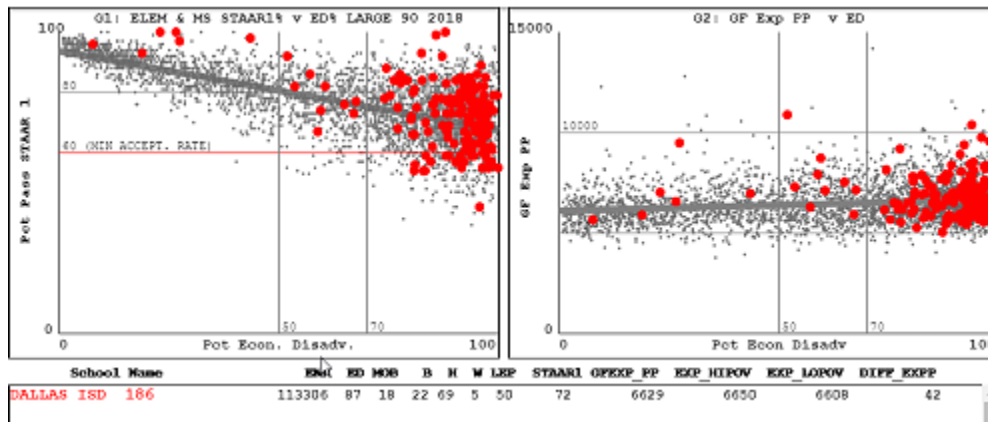
Figure 11: Ector County ISD



**Dallas ISD**

While Dallas ISD is basically the same as Houston ISD and Fort Worth ISD, its ED rate is several points greater than the other two largest districts. Their respective ED rates are: Dallas—87%; Fort Worth—80%; Houston—77%.

Figure 12: Dallas ISD



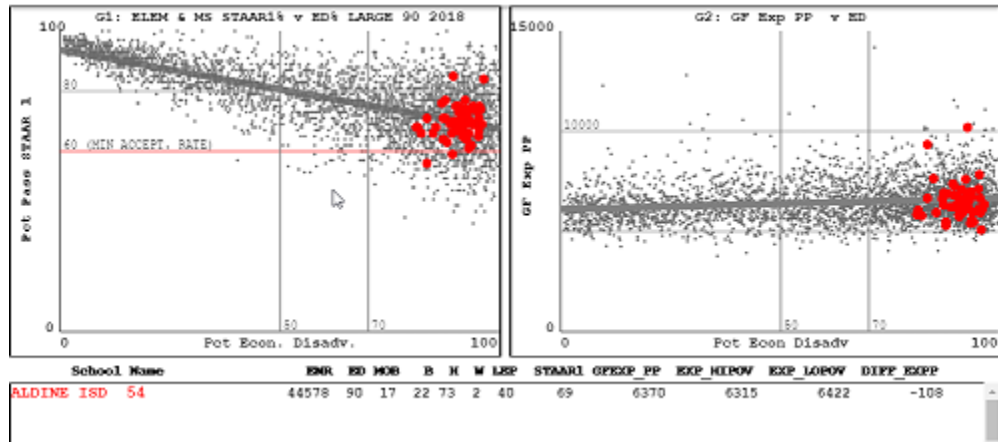
The similar ballooning effect on test results at the high poverty end are also assumed to be primarily due to the impact of differential rates of LEP and mobility, both of which are related to the proportions of students eligible for the free or reduced-price lunch program.

There are two high-poverty schools shown in Fig. 12 that have very high STAAR 1 pass rates. These are Dallas Environmental Science school and Henry W Longfellow Career school. Their STAAR 1 pass rates are 100 and 99 percent, respectively, and their ED rates are 87 and 85 percent. In addition, however, their student Mobility rates are 0 and 1 percent, respectively, which are obviously extremely low. In contrast, the average ED rate for the five schools in the upper-left corner of the left-hand graph in Fig. 12 is 17 percent, and their average mobility rate is 4 percent. Why the mobility rates are so low in Dallas Environmental Science School and Henry W Longfellow Career School is an intriguing question.

### Aldine ISD

Aldine ISD is unique among the districts discussed up to this point in that none of its elementary or middle schools have ED rates below 70 percent. The average ED rate for these schools is 90 percent, two points above that for Dallas ISD. The students in Aldine ISD are 22 percent Black and 69 percent Hispanic. Unlike districts such as Round Rock ISD or Katy ISD, there is little opportunity for Aldine to reallocate resources between its low poverty and high poverty schools. It has no low poverty schools.

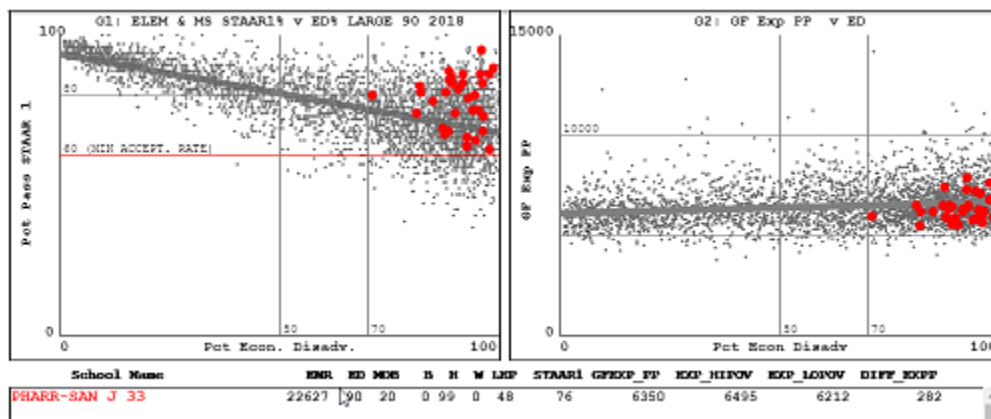
Figure 13: Aldine ISD



### Pharr-San Juan-Alamo ISD

Pharr-San Juan-Alamo ISD (Pharr ISD), similar to the next three districts to be considered, has a very high rate of Hispanic students at 99 percent. It also has nearly 50 percent of its students in the LEP category. Hence, consistent with previous observations and statistical analysis, in spite of its ED rate

Figure 14: Pharr-San Juan-Alamo ISD



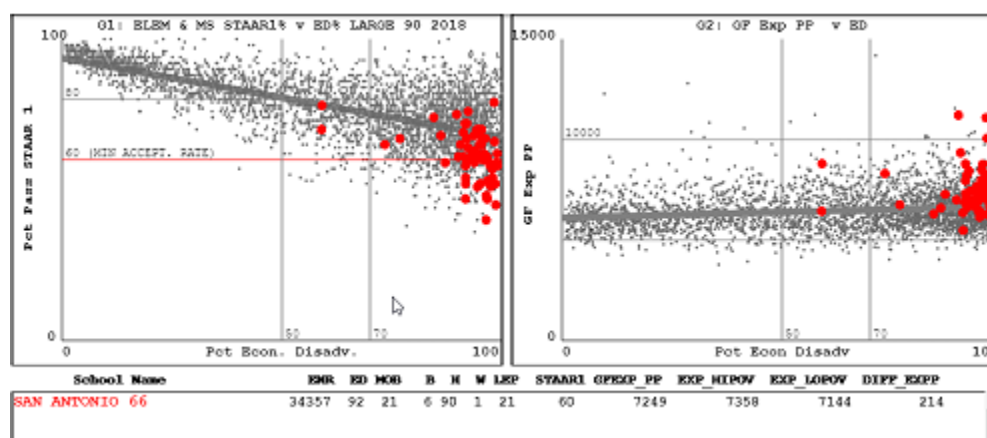
of 90 percent the high rate of LEP students appears to carry enough benefit so that none of its elementary or middle schools fell beneath the 60 percent pass rate in 2018.

There is not one school in Pharr ISD with an ED rate of less than 70 percent.

## San Antonio ISD

In spite of having a 90 percent rate of Hispanic students, San Antonio ISD has a LEP rate of just 21 percent, which is below the average of 25 percent for all of the 90 large districts in this data set. Consequently, without the apparent benefit of being able to test a large proportion of its elementary students under the alternative conditions for eligible English language learners, its very high ED rate of 92 percent, and its relatively high rate of student mobility of 21 percent, results in low pass rates on the STAAR 1 of just 60 percent. As can be seen in Fig. 15, it's as if the bottom fell out. Whereas Pharr-San Juan ISD with its LEP rate of 48 percent had no school with a STAAR 1 pass rate of less than 60, approximately 25 of San Antonio ISD's 66 elementary and middle schools scored less than 60. This is an incredibly large difference.

Figure 15: San Antonio ISD

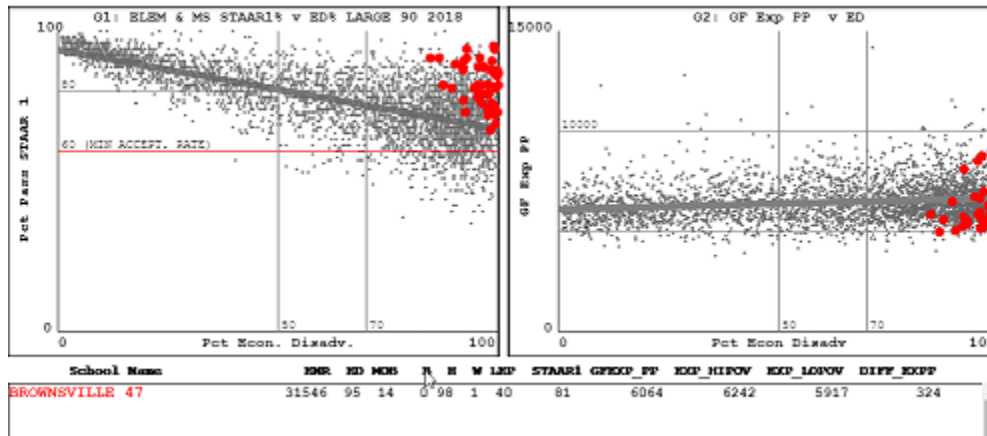


Even with San Antonio ISD's narrow range of ED among its various schools, there is still a visible negative relationship between poverty and performance.

## Brownsville ISD

Brownsville ISD is very similar to San Antonio ISD but with an apparent test score floor, preventing any school from falling beneath the minimum pass rate of 60. The two districts are of similar size, and have similar ED rates. However, they differ on LEP rates—21 versus 40—and therefore STAAR 1 pass rates—60 for San Antonio, versus 81 for Brownsville. While 25 of San Antonio ISD's 60 schools in the data set being used here scored below 60 on the STAAR 1, none of Brownsville ISD's 47 schools fell below 60.

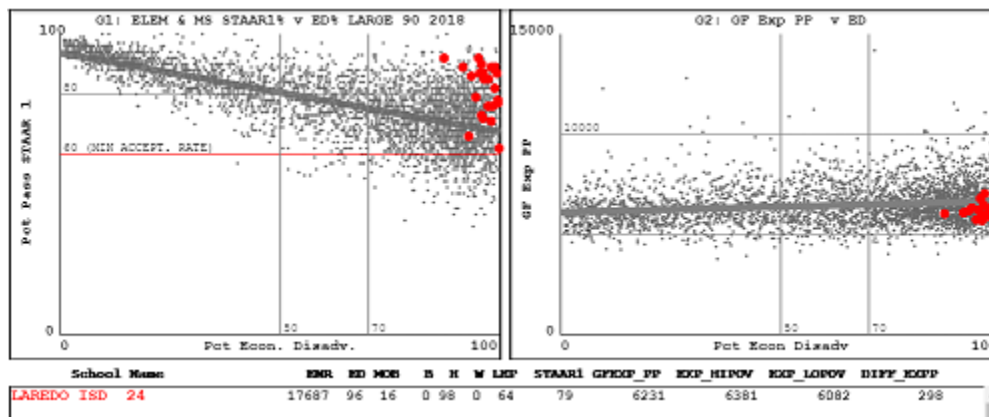
Figure 16: Brownsville ISD



**Laredo ISD**

The graphs in Fig. 17, and the data beneath the graphs, are very similar to those just seen for Brownsville ISD. Laredo ISD has a higher LEP rate—64 as compared to Brownsville ISD’s 40. Laredo ISD’s STAAR 1 results are not quite as high as Brownsville ISD’s—79 versus 81—but it, too, has no school scoring beneath 60

Figure 17: Laredo ISD



**Conclusions**

- School districts that experience a wide range in the levels of economically disadvantaged students among its individual schools have more opportunity to reallocate resources to high poverty, lower performing schools than is the case for districts whose schools all have very high levels of economically disadvantaged students.
- Based on statistical analysis and specific observations on the data for the districts included in this exercise, it appears that higher poverty levels are positively correlated with higher rates of LEP students and with greater percentages of mobile students. In many elementary schools, especially if predominantly Hispanic, the positive effect of the alternative scoring methods used for LEP students outweighs the negative impact of a high incidence of mobile students. In high poverty schools, both



elementary and middle schools, that do not have high levels of LEP students that benefit is absent and the full negative impacts of poverty plus mobility take their toll on student performance.

- It is argued that these effects—the LEP benefit for some, the unmitigated negative effects of higher levels of poverty and of mobile students in others—are the main contributors to the ballooning variance in test scores at levels of ED above 70 percent. These combined effects are most pronounced in the large central city districts of Houston, Dallas, and Fort Worth, and also in San Antonio ISD. The higher LEP rates in many high-poverty elementary schools consisting of predominately Hispanic students appears to result in higher test passage rates. But for the high-poverty schools with average or low levels of LEP students, with larger Black populations and with higher mobility rates, the opposite is true, and on average such schools have lower than average test passing rates. Thus the ballooning or trumpet-shape to the picture as seen in Figure 1, for all schools, and for schools in many individual districts, asserts itself.
- The observed drop-off in academic performance among many high-poverty schools in the largest school districts--those with large proportions of students classified as “mobile” and with low proportions of LEP students in the elementary schools--makes it almost inevitable that they risk having one or more schools on the low-performing list every year.
- Until such structural differences embodied in different rates of LEP and mobile students are acknowledged and their effects properly accounted for it will be very difficult to have a fair and effective accountability system.