

Office of the Superintendent of Schools
MONTGOMERY COUNTY PUBLIC SCHOOLS
Rockville, Maryland

November 20, 2002

MEMORANDUM

To: Ms. Sharon Cox, Member of the Board of Education

From: Jerry D. Weast, Superintendent of Schools

Subject: Performance of Middle Schools on Standards and Targets for Maryland
Functional Tests in 2002

The three attached tables are in response to your request for information on the performance of the middle schools on the standards and annual improvement targets specified in the System of Shared Accountability (SSA) for the Maryland Functional Tests of reading, mathematics, and writing. The SSA standard of performance for middle schools on each of these tests is 90 percent of students attaining at least the passing score as designated by the Maryland State Board of Education. The SSA also identified annual targets for improvement. The annual improvement targets ranged from a one percentage point increase for middle schools high in performance to an eight percentage point increase for schools with low levels of performance. A review of the results suggests the following conclusions regarding middle school performance on SSA standards and improvement targets.

- Performance compared to standards was highest on the reading test (21 schools meeting the standard), followed by the writing test (12 schools meeting the standard), and then the mathematics test (5 schools meeting the standard).
- Performance compared to the annual improvement targets was greatest on the mathematics test (17 schools meeting their annual improvement targets), followed by the writing test (4 schools meeting their annual improvement targets), and then the reading test (3 schools meeting their annual improvement targets). This pattern suggests that once schools have met the high standard of 90 percent passing, further improvements come slowly and very high-scoring schools may be as likely to slip as to gain a few percentage points. On the other hand, where schools are farthest from the standard (in mathematics), the schools are more likely to attain their annual improvement targets.
- The results suggest relative strength in the mathematics program because 13 of the 30 schools (i.e., 43 percent) that were below standard actually met their annual improvement targets. For the writing test, on the other hand, only 1 of the 23 schools that were below standard met its annual improvement target. For the reading test, none of the 14 schools below standard met its annual improvement target.

Note that the baseline performance level for each school was established by averaging the school's performance levels for three years from 1999 through 2001 (or fewer years for newly-opened schools with no prior data.) The annual improvement targets are cumulative, starting with that baseline performance level. Because annual improvement targets are added from one year to the next, the school's schedule of annual targets for future years mounts higher and higher. This means that the school's challenge to remain on the schedule of targets increases year after year.

The difference between a school's change from baseline and its required change to target is tested statistically. In this first year of tallying the SSA outcomes, many schools showed a one-year change from baseline that lies within the margin of error of their first year's annual improvement target. However, that condition may not persist. For example, if a school makes no progress over several years, it is likely to slip below the statistical margin of error because the gap between its change from baseline and its required change to target will continue to expand.

Analysis of the SSA results for school standards and targets continues, and I will provide you with a summary of the high school outcomes in the near future.

JDW;jcl

Attachment

Copy to:

Members of the Board of Education
Executive Staff
Middle School Principals

Performance of Middle Schools in FY2002 Relative to Standards and Targets from Baseline

Legend for Tables

Column	Item	Description
A.	Baseline Performance	Average of school's performance from the years 1999, 2000 and 2001. For recently opened schools, the available years of data were used.
B.	FY2002 Performance	Percentage of students scoring at or above the MSDE passing criterion.
C.	Did School Meet 90% Std.?	"YES" means the school met or exceeded 90 percent of students attaining the passing criterion. Blank entry means "NO".
D.	FY2002 Change from Baseline	FY2002 performance (col. B) minus baseline performance (col. A).
E.	Scheduled Target from Baseline	The sum of annual improvement targets for each year since the baseline year. Current data include only one year's annual improvement target. The "scheduled target" will thus increase from year to year.
F1.	Did School Meet Target?	Did the change since baseline (col. D) match or exceed the scheduled target change from baseline (col. E)? No statistical tests are applied to this comparison.
F2.	Change Compared to Scheduled Target	FY2002 change from baseline (col. D) minus scheduled target from baseline (col. E).
G.	Margin of Error	The statistical margin of error (90% confidence interval) calculated for the <u>difference</u> score, FY2002 change from baseline (col. D).
H1.	Below Target	A "1" indicates that the change compared to scheduled target (col. F2) is negative and that its absolute value exceeds the margin of error (col. G). This means that the school's FY2002 change from baseline (col. D) fell below its scheduled target (col. E) by a statistically significant margin.
H2.	Within Margin of Error	A "1" signifies that the absolute value of the change compared to scheduled target (col. F2) is less than the margin of error (col. G). Statistically, a difference between the school's FY2002 change from baseline (col. D) and its scheduled target from baseline (col. E) cannot be seen.
H3.	Above Target	A "1" indicates that the change compared to scheduled target (col. F2) exceeds the margin of error (col. G). This means that the school's FY2002 change from baseline (col. D) exceeds its scheduled target (col. E) by a statistically significant margin.

Performance of Middle Schools in FY2002 Relative to Standard and Targets from Baseline
Maryland Functional Reading Test

	Baseline Performance*	FY2002 Performance	Did School Meet 90% Std.?	FY2002 Change from Baseline	Scheduled Target from Baseline	Did School Meet Target?	Change Compared to Scheduled Target	Margin of Error	Statistical Test for Change from Baseline Compared to Scheduled Target**		
	A.	B.	C.	D.	E.	F1.	F2.	G.	Below Target H1.	Within Margin of Error H2.	Above Target H3.
ARGYLE MS	86.7%	83.8%		-2.8%	3%		-5.8%	3.7%	1		
BAKER MS	94.5%	94.3%	Yes	-.2%	1%		-1.2%	3.4%		1	
BANNEKER MS	92.6%	87.5%		-5.1%	1%		-6.1%	3.0%	1		
BRIGGS CHANEY MS	93.5%	93.2%	Yes	-.3%	1%		-1.3%	3.4%		1	
CABIN JOHN MS	97.2%	96.2%	Yes	-1.0%	1%		-2.0%	3.2%		1	
CLEMENTE MS	88.7%	85.2%		-3.5%	3%		-6.5%	3.4%	1		
EASTERN MS	87.6%	90.2%	Yes	2.6%	3%		-.4%	3.2%		1	
FARQUHAR MS	95.6%	93.1%	Yes	-2.5%	1%		-3.5%	3.6%		1	
FOREST OAK MS	89.0%	90.6%	Yes	1.6%	3%		-1.4%	3.1%		1	
FROST MS	98.0%	98.7%	Yes	.7%	1%		-.3%	2.9%		1	
GAITHERSBURG MS	88.6%	90.0%	Yes	1.4%	3%		-1.6%	3.6%		1	
HOOVER MS	98.6%	98.1%	Yes	-.5%	1%		-1.5%	2.9%		1	
F.SCOTT KEY MS	87.2%	88.5%		1.3%	3%		-1.7%	3.1%		1	
KING MS	90.4%	88.2%		-2.2%	1%		-3.2%	3.1%	1		
KINGSVIEW MS	90.3%	94.0%	Yes	3.7%	1%	Yes	2.7%	2.7%		1	
LEE MS	89.9%	88.5%		-1.4%	3%		-4.4%	3.7%	1		
MONTGOMERY VILLAGE MS	81.2%	83.5%		2.3%	3%		-.7%	3.6%		1	
NEELSVILLE MS	90.4%	89.9%		-.5%	1%		-1.5%	3.3%		1	
NORTH BETHESDA MS	98.6%	94.1%	Yes	-4.5%	1%		-5.5%	4.0%	1		
ROSA PARKS MS	95.4%	95.9%	Yes	.5%	1%		-.5%	3.1%		1	
PARKLAND MS	83.8%	80.2%		-3.6%	3%		-6.6%	2.7%	1		
JOHN POOLE MS	92.7%	90.7%	Yes	-2.0%	1%		-3.0%	4.6%		1	
PYLE MS	98.8%	98.5%	Yes	-.2%	1%		-1.2%	2.7%		1	
REDLAND MS	95.6%	92.9%	Yes	-2.7%	1%		-3.7%	3.3%	1		
RIDGEVIEW MS	91.9%	94.0%	Yes	2.1%	1%	Yes	1.1%	3.1%		1	
ROCKY HILL MS	94.7%	91.7%	Yes	-3.0%	1%		-4.0%	3.7%	1		
SHADY GROVE MS	90.8%	83.2%		-7.6%	1%		-8.6%	3.6%	1		
SILVER SPRING INT'L MS	85.6%	83.3%		-2.3%	3%		-5.3%	3.4%	1		
SLIGO MS	86.3%	87.8%		1.5%	3%		-1.5%	2.8%		1	
TAKOMA PARK MS	89.9%	91.3%	Yes	1.4%	3%		-1.6%	3.1%		1	
TILDEN MS	94.2%	96.7%	Yes	2.5%	1%	Yes	1.5%	3.7%		1	
JULIUS WEST MS	90.0%	90.2%	Yes	.2%	3%		-2.8%	2.9%		1	
WESTLAND MS	94.6%	94.3%	Yes	-.3%	1%		-1.3%	2.8%		1	
WHITE OAK MS	83.5%	82.2%		-1.3%	3%		-4.3%	3.2%	1		
WOOD MS	91.6%	87.9%		-3.7%	1%		-4.7%	3.1%	1		

* Baseline performance is average of all available scores from 1999, 2000 and 2001

** How does Change Compared to Scheduled Target (Col. F2) compare to the Margin of Error (Col. G)? "1" denotes the answer in the appropriate column.

**Performance of Middle Schools in FY2002 Relative to Standard and Targets from Baseline
Maryland Functional Math Test**

	Baseline Performance*	FY2002 Performance	Did School Meet 90% Std.?	FY2002 Change from Baseline	Scheduled Target from Baseline	Did School Meet Target?	Change Compared to Scheduled Target	Margin of Error	Statistical Test for Change from Baseline Compared to Scheduled Target**		
	A.	B.	C.	D.	E.	F1.	F2.	G.	Below Target H1.	Within Margin of Error H2.	Above Target H3.
ARGYLE MS	59.3%	64.4%		5.1%	6%		-9%	5.6%		1	
BAKER MS	79.5%	85.7%		6.2%	4%	Yes	2.2%	5.1%		1	
BANNEKER MS	86.5%	75.7%		-10.8%	3%		-13.8%	4.6%	1		
BRIGGS CHANEY MS	76.7%	61.6%		-15.1%	4%		-19.1%	5.0%	1		
CABIN JOHN MS	87.7%	83.2%		-4.5%	3%		-7.5%	4.9%	1		
CLEMENTE MS	63.7%	74.9%		11.2%	5%	Yes	6.2%	5.2%			1
EASTERN MS	64.7%	70.2%		5.5%	5%	Yes	.5%	4.8%		1	
FARQUHAR MS	87.7%	90.9%	Yes	3.1%	3%	Yes	.1%	5.4%		1	
FOREST OAK MS	65.9%	67.8%		2.0%	5%		-3.0%	4.7%		1	
FROST MS	89.7%	93.2%	Yes	3.5%	3%	Yes	.5%	4.3%		1	
GAITHERSBURG MS	58.1%	77.3%		19.2%	6%	Yes	13.2%	5.4%			1
HOOVER MS	93.0%	95.3%	Yes	2.3%	1%	Yes	1.3%	4.3%		1	
F.SCOTT KEY MS	52.3%	48.7%		-3.6%	6%		-9.6%	4.7%	1		
KING MS	78.8%	77.6%		-1.1%	4%		-5.1%	4.7%	1		
KINGSVIEW MS	72.5%	80.3%		7.8%	4%	Yes	3.8%	4.1%		1	
LEE MS	67.3%	80.9%		13.7%	5%	Yes	8.7%	5.5%			1
MONTGOMERY VILLAGE MS	52.4%	47.3%		-5.1%	6%		-11.1%	5.4%	1		
NEELSVILLE MS	64.4%	66.3%		1.9%	5%		-3.1%	5.0%		1	
NORTH BETHESDA MS	86.1%	91.2%	Yes	5.1%	3%	Yes	2.1%	6.0%		1	
ROSA PARKS MS	76.7%	84.4%		7.7%	4%	Yes	3.7%	4.6%		1	
PARKLAND MS	52.3%	59.8%		7.5%	6%	Yes	1.5%	4.1%		1	
JOHN POOLE MS	73.9%	82.7%		8.9%	4%	Yes	4.9%	7.0%		1	
PYLE MS	92.0%	90.5%	Yes	-1.5%	1%		-2.5%	4.1%		1	
REDLAND MS	77.8%	70.2%		-7.6%	4%		-11.6%	4.9%	1		
RIDGEVIEW MS	71.0%	77.1%		6.1%	4%	Yes	2.1%	4.7%		1	
ROCKY HILL MS	66.6%	70.1%		3.6%	5%		-1.4%	5.4%		1	
SHADY GROVE MS	59.5%	56.3%		-3.2%	6%		-9.2%	5.5%	1		
SILVER SPRING INT'L MS	43.7%	42.7%		-1.1%	8%		-9.1%	5.1%	1		
SLIGO MS	42.8%	55.4%		12.6%	8%	Yes	4.6%	4.1%			1
TAKOMA PARK MS	62.7%	70.1%		7.3%	5%	Yes	2.3%	4.7%		1	
TILDEN MS	84.8%	81.7%		-3.1%	3%		-6.1%	5.4%	1		
JULIUS WEST MS	74.2%	63.2%		-11.0%	4%		-15.0%	4.3%	1		
WESTLAND MS	82.2%	78.6%		-3.6%	3%		-6.6%	4.2%	1		
WHITE OAK MS	62.0%	69.3%		7.2%	5%	Yes	2.2%	4.9%		1	
WOOD MS	63.9%	59.8%		-4.1%	5%		-9.1%	4.5%	1		

* Baseline performance is average of all available scores from 1999, 2000 and 2001

** How does Change Compared to Scheduled Target (Col. F2) compare to the Margin of Error (Col. G)? "1" denotes the answer in the appropriate column.

Performance of Middle Schools in FY2002 Relative to Standard and Targets from Baseline Maryland Writing Test

	Baseline Performance*	FY2002 Performance	Did School Meet 90% Std.?	FY2002 Change from Baseline	Scheduled Target from Baseline	Did School Meet Target?	Change Compared to Scheduled Target	Margin of Error	Statistical Test for Change from Baseline Compared to Scheduled Target**		
	A.	B.	C.	D.	E.	F1.	F2.	G.	Below Target H1.	Within Margin of Error H2.	Above Target H3.
ARGYLE MS	73.7%	86.3%		12.6%	4%	Yes	8.6%	4.7%			1
BAKER MS	96.6%	97.4%	Yes	.7%	1%		-.3%	4.4%		1	
BANNEKER MS	93.0%	89.7%		-3.4%	1%		-4.4%	3.7%	1		
BRIGGS CHANEY MS	86.8%	80.1%		-6.7%	3%		-9.7%	4.1%	1		
CABIN JOHN MS	96.6%	94.3%	Yes	-2.2%	1%		-3.2%	3.7%		1	
CLEMENTE MS	88.4%	83.5%		-4.9%	3%		-7.9%	4.3%	1		
EASTERN MS	84.9%	82.9%		-2.0%	3%		-5.0%	3.9%	1		
FARQUHAR MS	91.0%	83.1%		-8.0%	1%		-9.0%	4.3%	1		
FOREST OAK MS	79.3%	76.0%		-3.3%	4%		-7.3%	4.1%	1		
FROST MS	98.7%	98.3%	Yes	-.4%	1%		-1.4%	3.5%		1	
GAITHERSBURG MS	80.1%	78.7%		-1.4%	3%		-4.4%	4.3%	1		
HOOVER MS	96.6%	97.8%	Yes	1.2%	1%	Yes	.2%	3.5%		1	
F.SCOTT KEY MS	87.7%	85.4%		-2.3%	3%		-5.3%	3.8%	1		
KING MS	94.3%	90.5%	Yes	-3.7%	1%		-4.7%	3.9%	1		
KINGSVIEW MS	74.3%	66.3%		-7.9%	4%		-11.9%	3.4%	1		
LEE MS	92.0%	76.4%		-15.6%	1%		-16.6%	4.5%	1		
MONTGOMERY VILLAGE MS	77.0%	70.7%		-6.3%	4%		-10.3%	4.3%	1		
NEELSVILLE MS	90.1%	90.1%	Yes	.0%	1%		-1.0%	4.1%		1	
NORTH BETHESDA MS	97.2%	95.4%	Yes	-1.8%	1%		-2.8%	5.6%		1	
ROSA PARKS MS	95.0%	97.6%	Yes	2.7%	1%	Yes	1.7%	3.6%		1	
PARKLAND MS	71.4%	64.6%		-6.8%	4%		-10.8%	3.5%	1		
JOHN POOLE MS	87.1%	80.9%		-6.2%	3%		-9.2%	5.5%	1		
PYLE MS	95.6%	95.1%	Yes	-.5%	1%		-1.5%	3.2%		1	
REDLAND MS	92.0%	87.4%		-4.6%	1%		-5.6%	4.1%	1		
RIDGEVIEW MS	89.8%	78.2%		-11.6%	3%		-14.6%	3.8%	1		
ROCKY HILL MS	83.8%	67.9%		-16.0%	3%		-19.0%	4.1%	1		
SHADY GROVE MS	71.8%	57.2%		-14.6%	4%		-18.6%	5.0%	1		
SILVER SPRING INT'L MS	63.8%	62.4%		-1.4%	5%		-6.4%	5.1%	1		
SLIGO MS	82.0%	75.8%		-6.2%	3%		-9.2%	3.5%	1		
TAKOMA PARK MS	72.3%	69.6%		-2.6%	4%		-6.6%	3.8%	1		
TILDEN MS	92.2%	91.2%	Yes	-1.0%	1%		-2.0%	4.2%		1	
JULIUS WEST MS	88.3%	90.4%	Yes	2.2%	3%		-.8%	3.6%		1	
WESTLAND MS	94.5%	88.8%		-5.7%	1%		-6.7%	3.4%	1		
WHITE OAK MS	92.6%	95.2%	Yes	2.6%	1%	Yes	1.6%	3.9%		1	
WOOD MS	90.6%	70.1%		-20.5%	1%		-21.5%	3.8%	1		

* Baseline performance is average of all available scores from 1999, 2000 and 2001

** How does Change Compared to Scheduled Target (Col. F2) compare to the Margin of Error (Col. G)? "1" denotes the answer in the appropriate column.