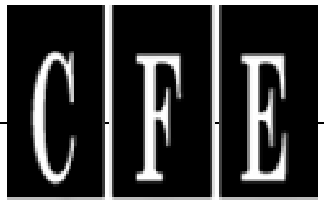


Campaign for Fiscal Equity, Inc.

SOUND BASIC EDUCATION TASK FORCE
Ensuring Educational Opportunity for All

PART II.
ADEQUATE FACILITIES FOR ALL:

Reforming New York State's System
for Providing Building Aid to School Districts
and for Meeting Schools' Urgent Capital Needs

April 13, 2004

6 East 43rd Street • New York, New York 10017
www.cfequity.org

TABLE OF CONTENTS

EXECUTIVE SUMMARY

In recent years, a growing body of research has affirmed what public school parents, educators, and dedicated advocates have long understood: schools that are overcrowded, deteriorated, or that lack science labs, computers, libraries, and auditoriums seriously impede student learning. Recognizing this link, the Court of Appeals in *CFE v. State of New York* held that the state constitution requires all schools to provide minimally adequate facilities, and it found that aspects of the current infrastructure in New York City schools fall far short of meeting this requirement.

New York State's building aid program has helped many districts improve their educational infrastructure over the last decades, with the glaring exception of New York City and certain other urban districts. Current building aid formulas reimburse New York City for approximately 25 percent of the actual costs of a new school, compared with reimbursement rates of over 70 percent for some other high-need districts in the state. This substantial funding gap was clearly a major cause of the overcrowding and other constitutional violations identified in the 2003 *CFE* decision. Moreover, New York City, as well as other urban and small city districts are unable to take full advantage of building aid because of constitutional debt limitations and other factors, such as high construction costs.

In recent years, court mandates in education adequacy cases have resulted in substantial increases in state-level support for local building needs in other states. Indeed, as a result of court orders, Arizona now pays 100 percent of new school construction costs, as does New Jersey for its high-need districts. The Court of Appeals' decision in *CFE v. State of New York* has also now made clear that extensive facilities deficiencies in New York City constitute a major constitutional violation that requires prompt corrective action.

Therefore, in response to the Court of Appeals' order, we propose reforms to New York State's current system for providing building aid and call for the immediate establishment of a new "Building Requires Immediate Capital for Kids" (BRICKS) construction fund for New

York City. This new fund will compensate for past state funding inequities and, over a five-year period, remedy the specific constitutional violations identified by the Court of Appeals (i.e., extensive overcrowding, unacceptably large class sizes, and the lack of sufficient laboratories, libraries, auditoriums, and computers). This BRICKS program would give students in New York City access to reasonable class sizes and essential spaces like science labs and libraries comparable with their counterparts across the state. Based on our extensive analysis of New York City's capital plan and its facilities needs, the cost for such a BRICKS program would be approximately $8.912 billion for New York City and an additional approximately $1 billion for similar projects in other high-need districts around the state. Assuming that these amounts would be bonded and amortized over a 30-year period, at a current interest rate of 5 percent, the total annual cost of the BRICKS fund would be $641 million by the end of a five-year period. Assuming that the reforms to the building aid formulas we recommend will increase annual building aid allocations by the end of the five-year period by about $350 million, the total annual increase in state funding from the package of statewide reforms we recommend would be approximately $997 million.

1. REFORMS TO THE CURRENT BUILDING AID FORMULAS

A. Update and Simplify the Maximum Cost Allowance

The current state system for calculating building aid is based primarily on a "building aid unit" method and construction cost index devised in the 1960s that fail to account for current construction costs, class sizes, special education supports, and other ancillary services. They should be updated. Another key component is a regional cost index, which is tied to average construction costs in a way that minimizes the real range of costs among the counties and recognizes only the labor component of the "hard" construction costs. This index should be also revised to incorporate the full range of items that affect school construction and to reflect fully the cost differences around the state.

In addition, the special needs of New York City—severe urban density, land scarcity, and high construction costs—require utilization of an updated square foot option that would fairly calculate the current square foot needs per student and reasonable square foot construction costs in the city. Basing building aid on realistic construction costs and up-to-date

educational needs, these reforms would allow for equity, simplicity, and predictability for New York City and for all other districts throughout the state.

B. Eliminate Wicks Law Requirements

School districts should be exempted from the time-consuming and costly administrative burden of the Wicks law, which requires multiple construction contracts for public projects. In addition to increasing construction costs by 10 percent to 30 percent statewide, the law increases the time required for construction projects, slowing down needed school improvements and creating greater disruption to students and staff.

C. Replace "Select-Aid" and the "10% Incentive" with a 5-Year Wealth Aid Ratio

Under the current "selected building aid ratio" provision of building aid, districts automatically receive the highest level of state reimbursement based on the district's lowest level of wealth since 1981-82, even if the district has grown much wealthier during that time. We propose a gradual five-year phasing-out of this archaic provision, to be replaced by a district wealth ratio that averages property valuations over a five-year period. The phase-out of "select-aid" should only be applied prospectively, and not to projects already in the pipeline.

The 10 percent incentive, which was added to each district's aid ratio in 1998, has no relation to actual student needs, and has resulted in distorted building aid incentives. The incentive was substantially cut back in 2000; it should now be totally eliminated. All projects currently benefiting from the 10 percent incentive and those projects already in the pipeline should, however, continue to receive the benefit.

D. Create a New Needs-Based Building Aid Ratio

The current building aid ratio for computing state aid reimbursements is based solely on school districts' relative property wealth. It should be revised to include a needs-based index that considers the additional facility needs of districts with large numbers of students from poverty backgrounds.

E. Partially Restore Pay-As-You Go Reimbursement

In 2001, the state eliminated its two-year reimbursement policy for pay-as-you-go capital outlays and now reimburses districts on a 30-, 20-, or 15-year basis. By providing only long-term reimbursements, the state has made it difficult for districts to use operating funds for urgent construction projects. We propose reinstating pay-as-you-go funding, with a five-year reimbursement schedule, to enable districts to upgrade school facilities in a more timely and cost-efficient manner.

F. Reform Lease Aid

Since leasing is often a less expensive, more flexible, and faster way to meet facilities' needs than new construction, long-term leases need to be supported for their full term. The current arbitrary 15-year maximum lease reimbursement should be eliminated. In addition, administrative processing of lease approvals and payments should be automated and streamlined to provide greater service and certainty to districts.

G. Modify Statutory Bonding Restrictions on Urban School Districts

New York City and other urban districts throughout the state are subject to constitutional debt ceiling limitations that impede their ability to advance the necessary local funds for school construction projects. These limitations are exacerbated by the statutory prohibitions on excluding state funds for building aid from local debt ceiling computations. Although we are not at this time proposing any amendments to the constitutional debt ceilings themselves, we call for the repeal of the additional statutory restrictions on excluding building aid receipts from debt limit computations, which are especially onerous for small city school districts.

2. THE BRICKS CONSTRUCTION FUND

These building aid reforms will help strengthen the equity and long-term effectiveness of state aid for school facilities. However, an intensive program must be quickly mounted to eliminate the extensive overcrowding and other serious constitutional violations identified in the Court of Appeals decision. Therefore, we recommend the immediate establishment of a

new "Building Requires Immediate Capital for Kids" (BRICKS) construction fund to remedy, over a five-year period, the specific constitutional violations in the New York City schools identified by the Court of Appeals—extensive overcrowding, unacceptably large class sizes, and insufficient laboratories, libraries, and access to technology. To the extent that other high-needs districts share these needs, we believe they should also qualify for funding under BRICKS.

Based on our detailed analysis of facilities needs, CFE recommends BRICKS funding for New York City in the amount of $8.912 billion **(see Table 2.1).**

TABLE 2.1 BRICKS FUNDING RECOMMENDATIONS FOR NEW YORK CITY

Overcrowding		
New capacity in the New York City capital plan	66,000 seats	$3.81 billion
Eliminating 15-20 year old mini-buildings	2,200 seats	$125.88 million
Class Size Reduction		
K-3 class size reduction to 20	28,014 seats	Included in $3.81 billion for new capacity
4-5 class size reduction to 20	1,897 seats	$108.92 million
6-8 class size reduction to 23	230 seats	$14.86 million
9-12 class size reduction to 24	50,662 seats	$2.60 billion
Access to Specialized Spaces		
Restoring specialized spaces from overcrowding	1,000 seats	$70.35 million
Creating libraries at schools without one	125 schools	$169.33 million
Creating auditoriums at schools without one	363 schools	$204.12 million
Ensuring functional labs in all high schools	64 schools	$168.25 million
Ensuring functional labs in all middle schools	179 schools	$210.95 million
Avoiding Imminent Additional Overcrowding		
Exterior modernizations	58 schools	$351.10 million
Windows	179 schools	$367.80 million
Roofs	119 schools	$115.70 million
Exterior masonry	19 schools	$34.90 million
Climate controls	175 schools	$59.70 million
Heating plant upgrades	43 schools	$47.70 million
Instrumentalities of Learning		
Wiring the final 20% of unwired classrooms		$176.00 million
Purchase of new computers		$125.70 million
Library upgrades	350 schools	$150.50 million
	Total:	**$8.912 billion**

Although other high-need districts throughout the state do not confront systemic overcrowding or larger than average class sizes, they do have some shortages of science labs, libraries, and auditoriums. We estimate that an additional $1 billion will be required for these projects in other high-need districts.

To ensure that the building aid reforms and the BRICKS grant program provide the educational opportunities to which students are constitutionally entitled, it is essential that all of the increased funding provided for school facilities actually be spent on school facilities, and that it not, as presently is the case in New York City, be treated as another revenue stream in the city's general fund. In addition, all high-need districts should be required to adopt comprehensive capital plans and report on cost containment procedures.

INTRODUCTION

In recent years, a growing body of research has affirmed what public school parents, educators, and dedicated advocates have long understood: schools that are overcrowded or deteriorated, that fail to meet health and environmental standards, or that lack science labs, computers, libraries, and auditoriums, make it difficult for students to learn and hard for teachers to teach.[1] At the same time, it has become clear that much of the nation's educational infrastructure, which consists largely of buildings constructed during the 1950s, are nearing the end of their useful lives and cannot adequately meet the needs of the larger school populations of the 21st century, especially in light of contemporary knowledge and standards for healthy school environments.

Recent estimates of the price tag for bringing all of the nation's schools up to good overall condition reach as high as $266 billion.[2] Facility needs are particularly acute in New York City, where more than half of the buildings are over 58 years old and "were built in an era when there was no need for computers, summer school or more than rudimentary laboratory equipment."[3] In 1992, it was estimated that the total cost of meeting the city's capital facilities needs was $25 billion.[4]

---

[1] Healthy Schools Network, "The Healthy and High Performance School in New York State," 2004; Jack Buckley, Mark Schneider, and Yi Shang, "The Effects of School Facility Quality on Teacher Retention in Urban School Districts," National Clearinghouse for Educational Facilities (February 2004); Mark Schneider, "Linking School Facility Conditions to Teacher Satisfaction and Success," National Clearinghouse for Educational Facilities (August 2003); Glen Earthman, "Prioritization of 31 Criteria for School Building Adequacy", Virginia Polytechnic Institute and State University (January 2004); Glen Earthman, "Review of Research on the Relationship between School Buildings, Student Achievement, and Student Behavior," Virginia Polytechnic Institute and State University, July 1996; J. Howard Bowers and Charles Burkett, "Physical Environment Influences Related to Student Achievement, Health, Attendance, and Behavior," *CEFP Journal* (July/August 1988), p. 33-34

[2] Faith E. Carmpton, David C. Thompson, and Janis M. Hagey, "Creating and Sustaining School Capacity In the Twenty-First Century: Funding a Physical Environment Conducive to Student Learning," *Journal of Education Finance* 27 (Fall 2001), p. 641.

[3] *CFE v. State of New York*, 187 Misc. 2d 1, 45 (S. Ct., N.Y. Co. 2001), aff'd 100 N.Y. 2d 893 (2003).

[4] Ibid., p. 40.

Traditionally local school districts have borne most of the financial burden for K-12 capital outlays. In recent years, however, states have begun to take a substantially more active role in helping local districts finance capital projects, in many instances in response to specific mandates from state courts. Specifically, 17 states have revised their capital funding methods in response to lawsuits.[5] Courts in Alaska, Arizona, New Jersey, Ohio, Wyoming, and elsewhere have expressly determined that adequate facilities are an important component of the state's constitutional responsibility.[6]

Under court order, a number of these states have been called upon to dramatically increase their support for school construction and renovation. In Ohio, the governor and state assembly passed a 12-year program calling for the commitment of $10 billion in state funding, and from 1998 to 2002 the state authorized $2.7 billion for school construction. In Arizona, nearly $1.5 billion was appropriated in three years, from 1999 to 2001, for building and renovating schools. In New Jersey, $8.6 billion was authorized in legislation in 2000 for the purposes of school construction -- $6 billion for the state's 30 most needy districts (the "Abbott districts"). If the state of New York were to follow the experience of these other states, based on its enrollment it would need to increase its *annual* support for school facilities by $1.7 billion.[7]

New York State's building aid program has helped many districts improve their educational infrastructure over the last decades. However, New York City and certain other urban districts have been the glaring exception to this pattern. For example, under the current building aid formulas, New York City is reimbursed for only approximately 25 per cent of its actual new school construction costs, compared with reimbursement rates of over 70 per cent

[5] Tennessee's Office of Educational Accountability, *School Capital Funding* (August 2002), p. 6.

[6] American Civil Liberties Union of Maryland, *Funding for Educational Facilities*, (March 2003).

[7] Subsequent to litigation, the average annual per pupil increase for school facilities in the aforementioned states is $541. If New York targeted its resources to high-need districts in the way some of these other states have, it would spend even more. For example, New Jersey allocated $8.6 billion over 10 years for school facilities, but $6 billion was earmarked for facilities in the state's 30 high-need districts, which enroll 281,701 students ($21,299 per high-needs student); if New York were to provide the same per pupil increase in funding for its high-need districts which educate 1,571,320 students, it would allocate $33.3 billion each year just for the high-need districts, $22.2 billion of which would go to New York City.

for some other high need districts in the state. This substantial funding gap was clearly a major cause of the overcrowding and other constitutional violations identified in the 2003 Court of Appeals order in *CFE v. State*. Moreover, New York City, as well as other urban district and small cities are unable to take full advantage of building aid because of constitutional debt limitations and other factors such as high construction costs.

The Court of Appeals' decision in *CFE v. State of New York* also made it clear that adequate facilities are an integral aspect of the opportunity for a sound basic education, and that extensive facilities deficiencies in New York City constitute a major constitutional violation that requires prompt corrective action. Specifically, the court held that all students in the state are entitled to "minimally adequate physical facilities and classrooms which provide enough light, space, heat and air to permit children to learn,"[8] and that the constitutional rights of students in New York City are presently being violated by overcrowding, excessive class sizes, and the encroachment of ordinary classroom space into what otherwise would be specialized spaces such as libraries, laboratories, and auditoriums.[9]

Therefore, in response to the court order, we propose revisions of the state's current system for providing building aid[10] and call for the immediate establishment of a new "Building Requires Immediate Capital for Kids" (BRICKS) construction fund for New York City. This new fund will compensate for past state funding inequities and, over a five-year period, remedy the specific constitutional violations identified by the Court of Appeals in regard to New York City (i.e., extensive overcrowding, unacceptably large class sizes, and the lack of sufficient laboratories, libraries, auditoriums, and computers). This BRICKS program would give students in New York City access to reasonable class sizes and essential spaces like

[8] *CFE I*, 86 N.Y. 2d at 317; CFE II, 100 N. Y.2d at 907.

[9] *CFE II*, 100 N.Y. 2d at 907-913.

[10]In other states where court orders have required facilities financing improvements, reforms have included conducting a statewide evaluation of the condition of all schools and determining a funding level necessary to bring all current buildings up to adequacy standards and to construct a additional buildings or additions as necessary. CFE is not, at this point, recommending such extensive statewide reforms. The present proposal takes an approach that is both more modest and more immediate: it recommends maintaining, but improving New York's existing building aid formula, while also remedying the immediate constitutional violations that were specifically identified by the Court of Appeals.

science labs and libraries comparable with their counterparts across the state. Based on our extensive analysis of New York City's capital plan and its facilities needs, we believe this BRICKS program for New York City would cost approximately $8.91 billion.

The record in the trial did not include information regarding the inadequacies of facilities in other districts throughout the state. However, this proposal is based on the premise that the constitutional right to the opportunity for a sound basic education applies statewide, and, therefore, urgent capital funding requirements in other high-need districts must also be met. Accordingly, to the extent that similar urgent needs exist in other school districts around the state, they also should be met through immediate BRICKS funding. We propose that the State Education Department (SED) establish a BRICKS application process for high-need districts. Although we did not assess the precise costs for high-need districts outside New York City, we estimate that the total costs of eligible projects in these districts would be approximately $1 billion. This figure reflects our analysis of data from the Building Conditions Assessment Surveys and numerous meetings with stakeholders statewide including staff at SED.

REFORMING NEW YORK STATE'S BUILDING AID FORMULAS

Building Aid: A Descriptive Overview

Most districts in the state of New York pass bonds to pay for the construction and renovation of school facilities. Requiring the approval of local voters, these bonds enable districts to borrow money to provide a basic educational infrastructure for their students. In the Big Five districts (Buffalo, New York City, Rochester, Syracuse, and Yonkers), the school systems have no independent ability to pass bonds. The school districts are "dependent" on the city government and compete with other municipal needs – fire, police, transportation – for city funding. These districts, and all other urban districts, also have state-mandated debt limits that prevent them from borrowing more than a certain amount of money (10 percent of the value of total property wealth in New York City, 9 percent in the other "Big 4," and 5 percent in small city districts). As in most states, most districts in New York, regardless of their

location, are unable to pay for 100 percent of their school facility needs; as a result, funding for school facilities, though primarily a local burden, involves a partnership with the state.

New York State provides financial support to school districts for capital construction through its building aid reimbursement program, managed by SED. This program, which has been in effect since the 1960s, has provided consistent capital funding for all school districts and is a significant item in the state budget. Three years ago, total building aid statewide amounted to $1.6 billion. In recent years, that amount has been reduced. For the current year, building aid is budgeted at $1.17 billion and, for 2004-2005, the governor has proposed a building aid budget of $1.36 billion. The state's level of reimbursement under building aid is determined by the type of project, eligible project costs, and a district's building aid ratio (BAR). BARs are structured to provide greater funding to districts with lower property values.

To be eligible for building aid, a project must fit into one of the eligible categories and be approved by SED. Before granting approval, SED evaluates the need for a project and particularly scrutinizes the district's current use of space, its enrollment projections, the proposed curriculum, the resulting program needs for space, and floor plans. SED then calculates the amount of building aid that a specific project in a district could receive based on a project's eligibility, costs, state-rated capacity for the building (i.e., building aid units), the construction and regional cost indices in effect when the construction contracts are signed, and the district's building aid ratio.

Projects eligible for building aid include (1) construction of a new school or building addition; (2) acquisition of property for instructional use; (3) major health and safety repairs that are not maintenance work; (4) alterations to an existing building required by an addition or by conversion of the building to another educational use, such as turning an administrative building into a school; (5) capital improvement projects or general reconstruction of individual major elements of an existing building; and (6) emergency work that meets the criteria for a capital improvement project. Administrative buildings do not qualify for building aid, but school bus garages are eligible.

The project costs that SED will consider for building aid include (1) construction costs on a construction contract that exceeds $10,000; (2) site purchase; (3) site improvements, such as grading; (4) professional fees, such as fees for design work by architects and engineers; (5) initial costs for furniture, fixtures, and equipment; (6) interest on eligible costs; (7) insurance during construction; and (8) general administrative costs.

Building aid is calculated by taking the maximum cost allowance for the project and multiplying it by the district's BAR. The maximum cost allowance (MCA) is the lesser of (1) the project's actual costs, or (2) the number of building aid units (BAUs) for the project *multiplied* by the construction cost index (CCI) that is in effect the month that the construction contract is signed *multiplied* by the regional cost index (RCI).

There are basically three methods the state uses for assigning building aid units (BAUs) to a project. All are aimed at determining the capacity of a building. For elementary schools, the calculation is based on SED-established space standards. For example, SED assigns 27 BAUs to each 770 square-foot classroom used for grades 1 through 6. BAUs for the various spaces that will be created by the project are then totaled, though no BAUs are assigned for ancillary spaces. For secondary schools, a pupil station or teacher station method is used that essentially assigns predetermined square foot caps and pupil/teacher ratios for classrooms and includes some ancillary space. A third method for calculating BAUs is based on a predetermined statewide square foot allowance per pupil for different kinds of buildings. For example, a K-6 building allows 85 square feet per pupil, whereas 100 square feet per pupil is allowed in a K-9, 7-9 or K-12 building, and 125 square feet per pupil for a 7-12 or 10-12 building. Although these calculations are the most transparent and include the entire square footage of a school building including auditoriums, gymnasiums, and other common spaces, the square footage standards are so low that one of the other approaches is almost always more advantageous to a district.

The construction cost index (CCI) attempts to provide a per pupil base cost for construction. The CCI, established by statute many decades ago, created a base cost of $6,375 per building aid unit, which is then adjusted based on when the construction contract was executed. For example, the index in September 2003 was 128.7, bringing the adjusted base

cost to $8,205. Adding the 20 percent allowance for incidentals (e.g., design), $1,641 for construction contracts executed during September 2003, brings the base construction cost for an elementary school to $9,846. This number would then be multiplied by the BAUs for the school. The construction cost allowances are higher for secondary schools and special education students.

The regional cost index was developed in the late 1990s to attempt to account for differences in construction costs in different parts of the state. It adjusts for the difference in construction labor costs between the heavily developed urban/suburban areas of the state and the more rural counties. The most recent regional cost index for New York City is 1.8753, for Nassau and Suffolk Counties 1.6779, and for Westchester County 1.5712. These counties have the highest indices in the state. This index is multiplied by the maximum cost allowance, and the result is a "regionally adjusted maximum cost allowance." A number of counties have indices lower than 1.0. In these instances the state treats the index as a 1.0.

The building aid ratio (BAR) is specific to each district and attempts to capture a district's ability to pay. The BAR is calculated annually based on a full property valuation divided by the resident weighted average daily attendance. Calculated in relation to the state average, this wealth-equalizing feature of the formula results in the state's share of expenses increasing as a district's property wealth decreases.[11] For a district of average property wealth per pupil, the state's share is 49 percent. Building aid ratios range from 10 percent for the most property-wealthy districts to 95 percent for those that are the most property poor. Again, the state uses the BAR as the percentage of the maximum cost allowance/actual project costs (whichever is less) for which it reimburses districts.

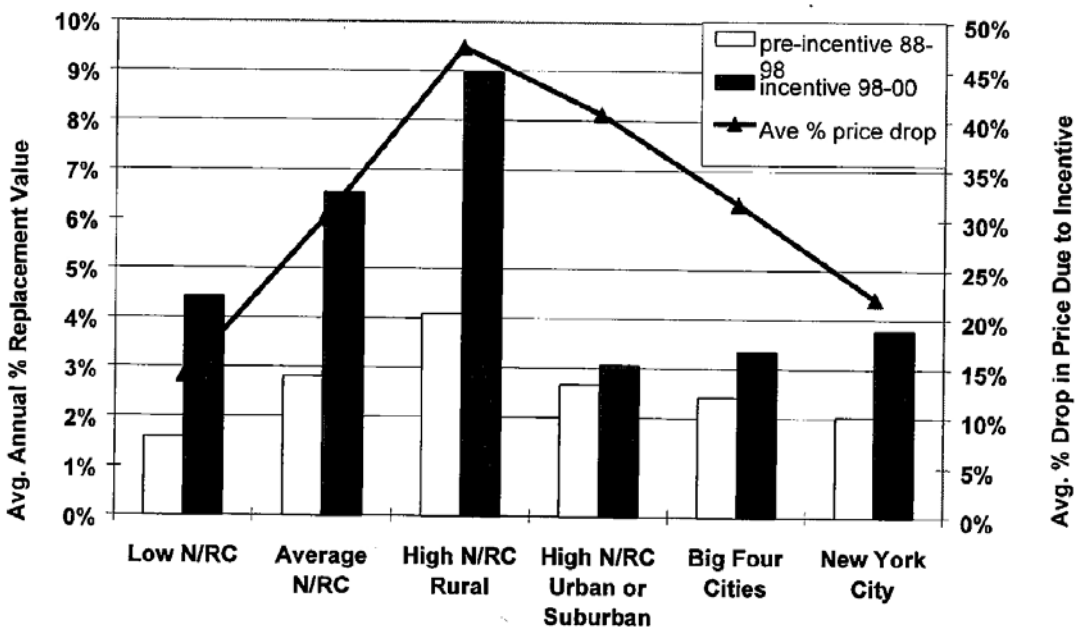
In applying the BAR, the state permits school districts to utilize the highest level of state reimbursement to a district over the past 20 years, even if a district's ability to pay changed substantially since its "select year." Moreover, from 1998 to 2000, the state put into place an incentive in which 10 percentage points were automatically added to the selected

[11] New York State Education Department Research Monograph, *"School District Responses to Building Aid Incentives,"* (April 2002).

BAR for all districts in the state, with a maximum reimbursement cap of 95 percent. The "10 percent incentive" was given to districts in addition to their "selected building aid ratio," which resulted in a building bonanza in many districts around the state. According to SED, during these years, only 57 of the 680 districts in the state used their current year's aid ratio, and, in several cases, the difference between a district's current year ratio and its "select year" was more than 40 percent.[12]

Although the incentive spurred school construction throughout the state, the workings of the formula, combined with constitutional debt ceiling limitations, limited the impact of the program on the urban districts, which have the oldest building stock, and especially on New York City, as illustrated by the following SED chart.[13]

Chart 5: Effect of the Building Aid Incentive
Capital Construction Before and During the Incentive



[12] Ibid., p. 3.

[13] Ibid., p. 12.

SED considers a 3 percent capital replacement rate, which allows buildings to be replaced on average every 33 years, to be appropriate.[14] During the 10-year period prior to the incentive, New York City's average annual replacement rate was 2.04 percent.[15] Notwithstanding this low percentage, New York City has invested $15.6 billion in its school buildings since 1990. Although its rate was above 3 percent during the brief incentive years, the rate for rural schools during that time was 9 percent, triple the target figure, and for average need districts almost 7 percent, more than double the target figure.

New York City and other urban areas were not able to take full advantage of the incentive program and generally have not been able to take full advantage of the building aid program. One reason is that constitutional debt limits, which apply only to city school districts, limit their ability to put up the local share that is necessary to advance a project. New York City is constitutionally limited to a total municipal debt ceiling of 10 percent of the value of its property wealth. Moreover, education projects must compete with all other municipal needs for the bonding capacity permitted by these limits, and state building aid may not be deducted in calculating the debt-limit ceiling. The Big Four cities are limited to 9 percent of full value, while small city school districts are limited to 5 percent.

Due to the rapid increase in project approvals and the significantly increased levels of building aid, the incentive was modified in 2000, the year that declining revenues dramatically changed the state's fiscal situation. Although the 10 percent incentive was not totally eliminated, districts now must choose between their current year aid ratio plus the 10 percent incentive or a select year. This change has negated the advantage of the incentive for many districts.

The state has enacted other restrictions in the past two years to limit its building aid payments. The state will now provide building aid only on an amortization schedule based on a statutorily determined useful life of a project -- 30 years for new schools, 20 years for school additions, generally, and 15 years for a capital improvement project. Prior to 2001, the state

[14] Ibid., p. 8.

[15] Ibid., p. 17.

would reimburse a district in the next year for any cash outlays used to pay for more affordable capital projects. By moving to only providing long-term reimbursements, the state has created a disincentive for districts to take on easily completed capital work with operating funds. That work will now take longer, cost districts more because interest will have to be paid on bonds, and may be jeopardized in districts that cannot get local voter support for school facilities projects. In addition, building aid for long-term leases, especially important in New York City where it provides a means for rapidly adding seats in overcrowded areas, artificially caps actual aidable costs by setting the maximum lease term at 15 years. Aid is also capped by the limits on the level of rental payments the state will fund.

Principles for Reform of Building Aid

Although the state building aid program has provided support for the capital construction of schools in a way that has benefited many districts, the current "spend-to-get" system has prevented urban districts with state-mandated debt limits such as New York City and resource-poor districts from undertaking the capital projects required to meet the needs of their students. Furthermore, the building aid formulas are complex, based on out-of-date indices that reflect school building standards from 40 years ago and incomplete measures of district wealth, and are not structured to meet actual student needs. Although New York City has one of the highest proportion of students from poverty backgrounds in state, it has on average had only 25 percent of the value of its new school projects funded (despite a BAR of approximately 62 percent).[16] This substantial funding gap was clearly a major cause of the overcrowding and other constitutional violations identified in last year's Court of Appeals' order. Overall, New York State's current building aid system is not predictable, transparent, or need-based, and burdens school districts with unnecessary costs and difficulty in undertaking long-range planning.

However, since many school districts around the state have benefited and continue to benefit from the state's building aid reimbursement approach, we do not recommend scrapping the system entirely. However, we believe that the following modifications, combined with the

[16] New York City Department of Education, *"Addressing Inequities in State Building Aid,"* (October 2003).

"catch-up" requirements of the BRICKS program described in the next section, are necessary to make the system more equitable to New York City and other school districts, and to render it more rational and predictable for all districts.

An equitable formula for aid to school buildings statewide is crucial to providing appropriate school facilities and healthy environments in which all students can receive the opportunity for a sound basic education. Therefore, state building aid reimbursement should be

- attuned to student needs and to the actual building costs of the facilities necessary to provide the opportunity for a sound basic education;
- rational, fair, simple, and understandable;
- focused on providing steady and sustainable state support;
- sufficiently flexible to address the needs of all districts; and
- prospective and phased-in gradually to ensure continuity and to avoid harmful consequences to district facilities planning efforts that depend on building aid to ensure the completion of multiyear projects.

Proposals for Reform of Building Aid

We believe these principles can be implemented by revising the existing building aid statutes and regulations in the following ways:

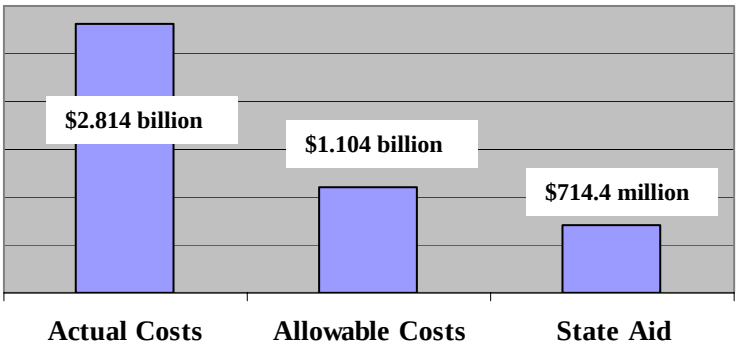
1. Updating and Simplifying the Maximum Cost Allowance

The maximum cost allowance (MCA) for new schools does not reflect the true costs of a project, particularly for new school construction. Based on an SED survey of new schools built around the state (outside of New York City), an average of 22 percent of the costs was not eligible for reimbursement because it exceeded the maximum cost allowance.[17] This means that districts are receiving reimbursements based on approximately 78 percent or less of their

[17] New York State Education Department (December 2003).

actual project costs. The exact reimbursement, once a district's BAR is applied (10 percent to 95 percent), could be anywhere between 8 percent and 74 percent. In New York City, new schools receive total reimbursement from the state of approximately 25 percent of actual costs (**see Figure 2.1**).[18]

Figure 2.1 NEW CONSTRUCTION IN NEW YORK CITY RECEIVED ONLY 25% STATE REIMBURSEMENT FROM JULY 1, 1998 THROUGH JUNE 30, 2003



Moreover, the current SED formula favors renovation over new construction. It is much easier for a renovation project to stay below the cost allowance not only because the costs are lower but also because components of a renovation project can be individually evaluated (i.e., each "project" at a school can be evaluated against the maximum cost allowance). A new school, however, is considered one "project" that is compared against a single application of the maximum cost allowance. This policy exacerbates the overcrowding problem in New York City, since it provides a financial disincentive for school districts to build new schools.

The main problems with the current method for calculating the maximum cost allowance are that its core components, the building aid unit and the construction cost index, are outdated and do not reflect contemporary educational and construction requirements. For example, ancillary spaces in elementary schools do not receive BAUs (and therefore are not eligible for state aid), even though they have had to create additional space for special education, counseling, remedial tutoring, and other support services to meet new educational standards, particularly for students from poverty backgrounds, English language learners, and

[18] New York City Department of Education, *Addressing Inequities in State Building Aid*, (October 2003).

students with disabilities. Clearly, the current building aid unit formulas, which were established 40 years ago, need to be updated to take into account current educational standards, class sizes, and needs for ancillary space.

The construction cost index is similarly problematic. The base cost was developed decades ago for school buildings that do not reflect current standards and design. Although the state attempts to update the base cost using an index factor, the calculation still does not reflect current building needs for new schools statewide. As a result, the costs of most new schools statewide significantly exceed the maximum cost allowance.

A third major component of the maximum cost allowance is the regional cost index, which is tied to average construction costs in a way that minimizes the real range of costs among the counties, particularly in high cost counties in the New York metropolitan area. Furthermore, the index only recognizes the labor component of the construction costs and does not take into account increases in other costs, such as materials, construction methods, and overhead. This index should be expanded to incorporate the full range of items that affect school construction and be fully reflective of cost differences across the state.

Although updating the BAU formulas and revising the regional cost index will substantially aid most school districts in the state, these revisions will still not fairly meet the needs of New York City, which has unique facilities challenges and high relative costs. New York's construction base costs differ dramatically from those anywhere else in the state because of the significantly higher costs for purchasing land, building vertically often on awkward sites, off-site storage, more frequent deliveries, city congestion, and so on. Getting the current BAU concepts to work for New York City is like trying to fit a square peg in a round hole.

Accordingly, we recommend that a new square foot per pupil option to calculate the maximum cost allowance be developed for New York City. A square foot approach would be based on the premise that schools should have sufficient classrooms to provide at least average class sizes, as well as a reasonable complement of specialized spaces such as libraries, science labs, auditoriums, indoor and outdoor space for physical activity, a cafeteria complex, and

support spaces for students and staff. The State Education Department should provide reasonable guidelines on facilities needs and the size requirements for specific spaces based on actual contemporary needs, which are consistent with the comprehensive sound basic education plans it has approved.[19] Based on these needs and guidelines, SED should develop a square foot per student figure for each grade level.

The second factor in a square foot method is cost per square foot. An average square foot figure for New York City should be determined by realistic and appropriate technical and educational standards for school buildings, the design approach, the furnishings and equipment, site conditions, and current marketplace realities. Establishing a reasonable square foot reimbursement cost factor would, of course, require SED to review building plans for New York City projects, a procedure it now undertakes with all aidable building projects around the state, except for those in New York City.

In addition to costs for construction – the "hard costs" of the project – the approved square foot reimbursement figure will also have to include the "soft cost" components such as land, design, fees for other professional consultants, administration, and financing. Some of these costs are easily verified because they are linked to construction costs, but other items, such as land acquisition and in some cases environmental cleanup of the site, are harder to determine. Estimating land values is particularly difficult in New York City because the city's enormous size results in wide variations in acquisition costs and costs for environmental cleanups, where necessary. Accordingly, land costs that do not exceed fair market value based on appraisals should be accepted as legitimate for these purposes.

In sum, the proposed square foot option would reduce the maximum cost allowance to two components – a reasonable number of square feet per student and a reasonable cost per square foot. This simple formula will eliminate the cumbersome compiling and labeling of building aid units and the separate calculations of construction base costs and the regional cost indices required by the current system. Once an appropriate method is developed for New York City, it should be analyzed for its applicability to other urban areas and perhaps as an

[19] See the detailed proposal for comprehensive educational plans set forth in Part III of this proposal.

option for school districts statewide (for some districts with small enrollments primarily in rural areas, an adjustment for smaller schools would have to be built into the formula).

Updating the method for calculating the maximum cost allowance and developing a square foot reimbursement option for New York City, and possibly other districts, would provide fair and equitable building aid reimbursements. These reforms would also allow New York City and other districts to determine the levels of state aid they could expect to receive for anticipated projects, thus rationalizing and promoting long-range facilities planning.

2. Eliminating Wicks Law Requirements

When most school districts undertake a construction project exceeding $50,000, they must comply with the Wicks Law (a limit set in 1912 and never adjusted under General Municipal Law, section 101). Wicks requires that four or more separate contracts be awarded, instead of one for a general contractor. This mandate increases construction costs by 10 percent to 30 percent,[20] puts school districts in the position of managing school construction – coordinating the work of all the separate contracts, and resolving construction disputes -- and often results in construction delays. Wicks was adopted more than 90 years ago to prevent corruption and protect the rights of subcontractors. Laws passed more recently, including prevailing wage and prompt payment requirements, now provide many of the intended protections of Wicks without requiring the complicated coordination and increased costs associated with having multiple contractors. New York is currently the only state in the nation to impose this type of requirement.

Currently, New York City, Buffalo, and Niagara Falls have received special exemptions from the Wicks Law. The enormous outstanding need statewide for school construction and renovation argues for a statewide exemption for all school districts. To ensure that contractors deal fairly with their subcontractors, we propose that all general

[20] PricewaterhouseCoopers LLP study for the School Construction Authority, "Impact of the Wicks Law on Public Construction in New York City," (March 1999); New York State School Boards Association, "Impact of Wicks Law – Final Report,"(March 1991); State Budget Division, *"Fiscal Implications of the Wicks Law Mandate,"* (May 1987).

contractors be required to state and verify the amounts they will be paying each of their subcontractors.

3. Replacing Select Aid and the 10 Percent Incentive

The selected building aid ratio, which permits districts to choose the most advantageous base year between 1981-82 and 1999-2000 for calculating their building aid ratio (BAR), is a hold harmless variation for which there is no rational justification. Our proposals for reform of other aspects of the building aid formula should provide compensating benefits for many of the districts that currently benefit from this provision.

To provide the support districts need due to changes in wealth in a meaningful, but rational manner, we propose a gradual five-year phasing-out of the selected building aid ratio, to be replaced by a district wealth ratio that averages property valuations over a five-year period. This system would ensure that state support responds to district wealth fluctuations that may last for more than one year (e.g., in the case of a major business closing its factory in a smaller community) but would not arbitrarily spend limited state dollars. The phase-out of "select-aid" should only be applied prospectively and not to projects already in the pipeline.

The 10 percent incentive, which has no relation to actual student needs, was substantially cut back in 2000; it should now be totally eliminated. In order to ensure continuity and stability of funding, all projects currently benefiting from the 10 percent incentive and those projects already in the pipeline should, however, continue to receive the benefit.

4. Creating a New Need-Based Building Aid Ratio

The current building aid ratio, based solely on local property wealth, fails to take into account the ability of a district to raise taxes and the needs of the students it must serve. The current BAR presumes that all students have the same needs and that all districts with similar property wealth have an equal ability to obtain capital funds. In fact, both of these assumptions often prove to be untrue. For example, the Big Five school districts have heavy concentrations of poor students, who require more extensive services (and therefore more extensive facilities),

and yet these districts have no ability to issue bonds; they must cope with highly restrictive debt ceiling limits and they must compete with the needs of other municipal services for capital funding. New York City has a building aid ratio of a moderate wealth district, in spite of a very high concentration of high-need students. Many other districts also have substantial pupil needs, eroding tax bases, and difficulties in gaining local voter support for bonds, especially when there is no assurance for local voters about the precise level of state reimbursement.

Based on the Court of Appeals' directive that funding should be aligned with need, we recommend providing a student need multiplier to allow a general realignment of building aid resources to support student needs. The current formula divides the full-assessed valuation of property by the resident weighted average daily attendance (RWADA). We propose that the current property value index should be adjusted by a measurement of the number of students enrolled in the district weighted to reflect the local level of poverty.[21] This method for determining a district's ability to pay (i.e., property wealth divided by a student enrollment factor adjusted for poverty) is a more appropriate measure and will better ensure that students have the facilities resources they need for the opportunity to a sound basic education.

5. Partially Restore Pay-As-You Go Reimbursement

Until a few years ago, the state would reimburse districts within the next two fiscal years for cash outlays for construction projects. The prompt reimbursements received through this approach provided funds that could be used for additional capital projects if the funds remained earmarked for that purpose. It also meant that some critical projects could be completed more quickly. However, the legislature eliminated this procedure a few years ago as part of the policy of standardizing amortization terms and interest rates for state reimbursement on building aid.

We recommend a partial reinstatement of the pay-as-you-go capital reimbursement program. Instead of amortizing payments of capital expenditures, the state should reimburse districts over a five-year period. Districts statewide would benefit from a more rapid

[21] A standard and appropriate measure is the number of students receiving free and reduced price lunch. For the few districts that do not provide lunch, an alternative census-based poverty figure could be used.

reimbursement of pay-as-you-go funds, which would more appropriately encourage districts to use cash on hand for small or emergency capital projects without the additional financial burdens and time delays that ensue with bonding. All other applicable elements of building aid would remain, such as eligibility of projects, maximum project costs, and aid ratios.

6. Reforming the Lease Aid Program

Long-term leases need to be supported for their full term. The current arbitrary 15-year maximum lease reimbursement term should be eliminated. It makes no financial sense to aid the capital improvements to a leased space for 30 years and to aid the rent payments for only 15 years. New York City's experience has been that leasing is less expensive than new construction, more flexible, and often provides new facilities faster. The lease aid program should sufficiently support New York City and other districts that use leasing. Additionally, administrative processing of lease approvals and payments needs to be automated and streamlined to provide greater service and certainty to districts. SED needs to be given the resources to do this.

7. Modifying Statutory Bonding Restrictions on City School Districts

As discussed earlier, New York City and other urban districts throughout the state are subject to constitutional debt ceiling limitations that impede their ability to advance the necessary local funds for school facility projects. These limitations are exacerbated by the provisions of Local Finance Law section 121.20 that prohibit city school districts from excluding amounts to be received as state building aid from the debt ceiling computations for city school districts. Although we are not at this time proposing any amendments to the constitutional debt ceilings themselves, we believe that the additional statutory restrictions on excluding building aid receipts in debt limit computations should be repealed.

Repeal of these statutory restrictions is of particular importance to small city school districts, where building aid receipts constitute a significant proportion of total debt obligations and removal of the statutory prohibition could leverage a significant increase in capital projects. In the mid-1980s, the legislature took a significant step toward making governance in small city school districts similar to that in non-city districts by requiring school budgets of

small cities to be approved by the voters. In light of that change, continuation of statutory debt ceiling limitations that do not apply to non-city districts is inequitable and unwarranted.

* * * * * * *

Although the number of variables involved in these building aid recommendations precludes a precise estimate of the cost associated with these proposed reforms, we anticipate that the largest increase in state reimbursements that will stem from the proposal will come from our recommended changes to the maximum cost allowance (MCA). We estimate that our proposals for reform of the MCA will annually generate $200 million in additional building aid for New York City and $100 million for districts in the rest of the state. The other proposed reforms, especially those regarding pay-as-you-go funding, lease aid, and Wicks exemptions, are likely to generate additional projects that we estimate will result in another $50 million in building aid increases statewide. For initial discussion purposes, therefore, we assume that the total cost to the state for building aid reforms we propose will be an additional $350 million per year in state building aid reimbursement, to be phased in over a five-year period.

THE "BUILDING REQUIRES IMMEDIATE CAPITAL FOR KIDS" (BRICKS) CONSTRUCTION FUND

Historically, New York State's "spend-to-get" building aid formula has impeded the ability of the state's resource-poor and urban districts with state-mandated debt limits from undertaking the capital projects required to meet their students' urgent needs. For example, from 1998-2000, despite its disproportionately high student needs, New York City received only about 25 percent of all state building aid funds.[22] Although the State Education Department recommends a 3 percent annual school building replacement rate, for years New York City's rate barely exceeded 2 percent.[23]

As a result of these long-standing capital funding inequities, as the Court of Appeals specifically found, many schools in New York City are severely overcrowded, and many of them lack laboratories, libraries, auditoriums, and other basic educational facilities. These extensive constitutional violations require prompt remedial action. Once the immediate constitutional violations are addressed, ongoing capital needs of New York City's schools, like those in other districts, can adequately be met through the revised building aid program described in the previous section. But before it can take full advantage of these reforms, New York City requires – and is constitutionally entitled to – an immediate state-funded "catch-up" program that can bring its capital stock up to a minimally acceptable adequacy level.

Accordingly, we propose that New York State meet the capital facilities mandate of the Court of Appeals' order through a special "Building Requires Immediate Capital for Kids" (BRICKS) program. This Marshall Plan approach would establish a substantial, dedicated state fund to finance a rapid capital construction program that will address New York City's most urgent facilities needs. To the extent that other high-needs districts experience the severe

[22] New York State Education Department, see also Zarb Commission, *Final Report*, p. 45.

[23] New York State Education Department Research Monograph, *School District Responses to Building Aid Incentives*, (April 2002).

overcrowding or lack of specialized spaces identified by the Court of Appeals in the *CFE* decision, those urgent needs should also be addressed by the BRICKS program.

New York City's immediate facilities needs are enormous. Although the Court of Appeals' decision made it clear that substantial efforts must be made to meet the identified capital funding needs, the court did not identify with precision how quickly overcrowding must be eliminated, how far class sizes have to be reduced, or how many new libraries, laboratories, and other such facilities must be constructed. Therefore, reasonable people may differ about how extensive the BRICKS program for New York City needs to be in order to meet the constitutional mandate.

The BRICKS program we are proposing takes a conservative approach to the city's funding needs. We have carefully examined the city's current five-year plan proposal, the decisions of the trial court and the Court of Appeals, as well as the voluminous record compiled in *CFE v. State of New York*. Based on that examination we have identified and determined approximate costs for only those high priority items that we believe to be indisputably covered by the Court of Appeals' order. In this constitutional compliance category, we include

1) construction that will add new buildings and new capacity to eliminate current overcrowding;

2) reduction of class sizes to levels consistent with legislative policy and the court's indications that class sizes in New York City should roughly be equivalent to average class sizes in the rest of the state;

3) restoring laboratories, libraries, and auditoriums in buildings that currently lack such facilities;

4) infrastructure improvements to existing buildings that are needed to avoid imminent loss of facilities that would result in additional overcrowding; and

5) providing computers and necessary technology upgrades to ensure access to technology comparable to that in schools in the rest of the state.

Based on our extensive analysis of facilities needs, CFE recommends that the BRICKS program be funded by the state at $8.912 billion for New York City.[24] This amount should be paid out over a five-year period. Pending a similar analysis of needs in other high-need districts, we also roughly estimate that an additional $1 billion will be needed for BRICKS projects in the other high-need districts. All eligible projects would be based on a capital plan approved by SED. Given current amortization rates, the anticipated annual cost to the state for this program would be approximately $647 million.

There is another group of projects that arguably are also required for compliance with the Court of Appeals' order, which we have not included in the BRICKS funding proposal. These projects include further reduction of class sizes to the levels proposed by the educational prototypes described in the *New York Adequacy Study* and a substantial increase in pre-kindergarten programs, which also was recommended by that study.[25] The *New York Adequacy Study* called for K-5 classes of no more than 16 students, full day kindergarten for four-year old students and half-day programs for three year olds. Increased programming of this type – as well as the additional support services, and extended day programs recommended by this and other studies –is necessary for all students to receive the opportunity for a sound basic education.

All of these reforms clearly will require substantial additional capital facilities in New York City and in many other districts throughout the state. Nevertheless, since it has not yet been determined that additional adequacy funding will, in fact, be used for these specific items, we have not included these needs in the immediate BRICKS funding proposal. We would expect that once the extent of these needs is confirmed, the state will approve additional facilities expansions for class size reduction[26] and pre-kindergarten[27] programs in New York City and other districts through a reformed and expanded building aid program.

---

[24] In current 2003 dollars, as are all amounts from the New York City five-year capital plan included in this proposal.

[25] See http://www.cfequity.org/FINALCOSTINGOUT3-30-04.pdf

[26] Based on data provided by SCA, we have analyzed the additional capacity needed - beyond the capital plan - at the elementary, middle and high school levels on a borough basis to achieve the *maximum* elementary class size recommendations of the *New York Adequacy Study* (i.e. class sizes of 16 in grades K-5). Even with declining enrollments, by 2012 all boroughs would need the following additional number of seats beyond what is in the

BRICKS for New York City

1. ELIMINATION OF OVERCROWDING

The New York City Department of Education's (DOE) proposed Five Year Capital Plan sets forth DOE's detailed plans to provide for the facilities needs of New York City's public schools for the period 2004-2009 and beyond. [28] Although the plan covers a broad range of capital needs and is not organized in a manner that specifically responds to the constitutional mandates of the Court of Appeals, it does include proposals for reducing overcrowding and class sizes and providing other spaces and items that are responsive to the court's order. Accordingly, our analysis relies on relevant information in the capital plan but supplements that information, as necessary, to develop a specific BRICKS proposal that is directly responsive to the court order.

In 2003, 38.9 percent of New York City's elementary schools, 35.9 percent of its middle schools and 59.7 percent of high schools were overcrowded.[29] As a result, nearly 40 percent of elementary and middle school students and an astonishing 73.8 percent of high

---

capital plan to reduce class size to 16 in kindergarten through grade 5: the Bronx (17,225 seats), Brooklyn (20,630 seats), Manhattan (794 seats), Queens (22,033 seats), and Staten Island (6,224 seats). It is worth noting that due to expected decreases in enrollment, the 2012 need for 66,906 seats is less than the 2007 need for 84,908 seats, and even less than the 2003 need for 114,428 seats. Using the 2012 estimated need of 66,906 seats, it would cost an additional $4.172 billion ($62,356 per seat in 2003 dollars) beyond what is in the capital plan to achieve class sizes of 16 in grades K-5.

[27] Assuming that a full-day program would attract more students, and that DOE would house half of the 60,000 students eligible to enroll based on recent birth rates, we project an increase of 17,000 seats (beyond the 13,000 that already exist) is needed for the pre-kindergarten program for four year olds. The cost to build these additional 17,000 seats is $992.59 million ($58,387 per seat in 2003 dollars). Based on the experience of the half-day program for four year olds when it began with an initial enrollment of 10,000 in the late 1990s, and assuming that a program for three year olds would grow more slowly, at perhaps 1,000 students annually, we project that the short-term need for seats for a half-day program for three year olds would not exceed 10,000. Although greater analysis is needed to determine parental reaction to this initiative and the potential role of outside providers, the cost to build 10,000 seats for a pre-kindergarten program for three year olds is $584.462 million ($58,446 per seat in 2003 dollars).

[28] References in the text are to the plan as revised in February 2004, after public review. The School Construction Authority (SCA), a New York State public benefit corporation, is the agency that manages public school construction in New York City. While DOE is required by statute to prepare five-year capital plans, SCA performs all of the planning functions to create the capital plan and implements the projects approved in the plan.

[29] New York City Office of the Mayor, *Mayor's Management Report, Fiscal 2004 Preliminary*,(January 2004), p. 20 http://www.nyc.gov/html/ops/downloads/pdf/2004_mmr/0104_mmr.pdf

school students were attending an overcrowded school. The results of this overcrowding are double sessions in some high schools, unacceptably large class sizes, and a lack of specialized spaces – gyms, libraries, auditoriums, computer rooms –in many school buildings.

The proposed capital plan aims to end overcrowding, reduce class sizes to 20 in grades K-3, and eliminate many undesirable temporary learning spaces such as portable trailers by creating 66,000 seats in 90 new schools. DOE estimates $3.81 billion will be needed to create these seats through a combination of new construction (70 percent of the new seats) and leasing (30 percent of the new seats). The 90 new buildings and leases contained in the project include 13 small elementary schools, grades K-3 or K-8, totaling 5,636 seats; 54 primary/intermediate schools, many of which will be grades K-8, totaling 33,568 seats; and 23 intermediate/high schools, many of which will be grades 6-12, totaling 26,400 seats.

Our analysis has confirmed the validity of this basic approach to eliminating overcrowding. DOE's analysis was based on two fundamental considerations: enrollment projections and measures of current capacity. Although the capacity analysis shows that the majority of students in the system are currently attending unacceptably overcrowded facilities, a projected long-term trend of enrollment declines, which was fully taken into account, minimized the amount of new construction that is required and has kept facility cost estimates within a reasonable range that can be accomplished over the coming five-year period. (Of course, if the enrollments do not decline as projected, the goals that DOE has set will not be fully met.)

DOE's enrollment projections are based on reports from demographic consultants.[30] They show a long-term trend of declining enrollment. The official enrollment count for New

[30] Eunice and George Grier study for the New York City Department of Education, "Enrollment Projections 2003 to 2012 New York City Public Schools," (July 2003). These projections are based upon the "cohort survival methodology," used by many school districts to project enrollments. DOE and SCA state that the projections have been within 1 percent accurate historically citywide over the last 15 years. The "cohort survival is a simulation model that reproduces the way in which pupils enter, leave, and move through the school system – grade by grade and year by year – using recent data on enrollments and births." The model is built upon almost all the factors that can affect enrollments, including migration within the city, in-migration from outside the city, movement out of the city, births, transfers, long-term absences, and dropouts. New housing data (including number and size of units as well as economics of the units – subsidized, middle income, and luxury units) is also incorporated into the data.

York City schools for the 2002-03 school year was 1,091,717 students. The number of enrolled students peaked in 2000 at 1,105,030, after increasing annually for 12 years, and has now been declining slightly in each of the last two years.[31] The report notes that, "total enrollments – including elementary, middle and high schools as well as citywide special education – are now projected to continue downward until at least 2012 – when they will fall below the one million mark for the first time since 1992."[32] Staten Island is the only borough not expected to have declining elementary school enrollment. The Bronx and Staten Island are the only two boroughs that will have high school enrollment increases between 2002 and 2007, and only Staten Island will have more enrolled high school students by 2012.

The plan's capacity analysis is based on DOE annual surveys of its school buildings to determine "the size, function, and use of each room in every school building."[33] This information allows a capacity to be calculated for each building, which is then compared with the number of students enrolled in that building. If the number of students enrolled in the building exceeds the capacity of the building, the utilization of the building exceeds 100 percent and the building is deemed "overcrowded."

In many seriously overcrowded buildings, educators may use art and music rooms, science labs, and other specialized spaces as general classrooms. The utilization analysis used in the proposed capital plan restores these specialized spaces to their intended purpose to determine the overcrowding of a particular school. Although this may make some buildings look more crowded than they currently seem, DOE's intention is to create enough new space to restore the specialized spaces to their original purpose, an approach that is fully consistent with the Court of Appeals' order.

---

[31] Not all of these students attend DOE owned or leased facilities; a significant number of students are in other facilities, such as community organization buildings and hospitals. The totals also include GED and home school students.

[32] *Grier Report*, p. 2.

[33] A building-by-building analysis of the number of students enrolled and the capacity is contained in the annual report issued by the NYC Department of Education/School Construction Authority, "Enrollment–Capacity–Utilization, 2002-2003 School Year," (September 2003).

In 2002, six community school districts (CSDs) had overall utilization rates exceeding 100 percent for elementary and middle school spaces: CSDs 6, 10, 11, 20, 24, and 29. Even though all of these districts have received a number of new schools since 1991, they still remain chronically overcrowded. Another six CSDs have utilization rates district-wide between 95 percent and 100 percent: CSDs 9, 22, 26, 27, 30, and 31. Even though overall enrollments are projected to decline citywide, a number of these districts are expected to remain overcrowded. At the high school level, all five boroughs are currently overcrowded, with the worst overcrowding in the Bronx and Queens. High school overcrowding has become more severe as the large cohort of students that peaked in 2000 in the elementary schools moves through the system.

In a number of districts, even those that are overcrowded, there may be vacant seats in individual buildings. However, for a number of reasons using open seats within a district may not always be possible. For example, it is not feasible for a first grade student in overcrowded eastern Queens to occupy an available seat in a section of the northern Bronx that is more than an hour away. Even within a single district, available seats are generally spread throughout the school in individual classes and not in specific blocks. As a result, there are often not enough vacant seats in one building to be able to add a new school or new grade or to consolidate classes to create empty classrooms. There may also be other obstacles that prevent the transfer or re-zoning of students between schools within a district, such as geographic barriers like major roadways.

DOE/SCA used the enrollment projections and capacity analyses to calculate the number of new seats that it included in its capital plan. Determining the need for new seats at the elementary and middle school levels was accomplished by examining school capacities in each geographic region of each school district to identify overcrowding. The analysis was done for 2003, 2007, and 2012 and included the following goals: (1) building seats in all districts that are currently overcrowded or have overall utilization rates over 95 percent;[34] (2)

[34] This includes many of the districts that have enrollment growth over the next 10 years. CSDs 2 and 21 are not now overcrowded or above 95 percent utilization but their enrollments are projected to grow sufficiently to warrant additional new seats. However, CSD 2 continues to have significant middle school capacity that offers opportunities for new organizations and middle school class size reduction.

reducing class size to 20 in kindergarten through third grade; and (3) removing some of the temporary learning spaces. The need for additional pre-kindergarten space, in accordance with current enrollment trends, was also included in the calculations for elementary schools undertaken by DOE/SCA.[35]

For high schools a similar analysis was done on a borough and community school district level. Although many students travel outside their CSD to attend high school, the analysis shows some areas of significant overcrowding. As a result, DOE is proposing to build new high schools in some of the neighborhoods that are traditionally overcrowded, even though there may be some available seats in underutilized buildings elsewhere in the borough. DOE also made some adjustments for capacity that it expects to lose through restructuring to create multiple school organizations in some large high school buildings.[36]

The capital plan proposes to eliminate a number of temporary learning spaces, including all transportables (two classroom trailer-type units) and temporary mini-buildings (often built in school play yards) that are older than 20 years. This is an important initiative to provide permanent space for students, especially since the temporary spaces cut students off from main school buildings and occupy valuable open space. Also, the costs to maintain these temporary structures beyond their useful life are high. Most of the mini-buildings date from the early 1970s. The transportables date back only to 1995, but they are makeshift trailer structures that should be eliminated as soon as possible.

A total of 7,430 students are housed in the 38 mini-buildings over 20 years old, and the transportables located at 120 schools across the city house an additional 20,975 students. However, there are 24 other mini-buildings that are less than 20 years old that DOE is not proposing to replace with permanent capacity, even though 12 of these structures are over 15

[35] As a result of leveling off of pre-kindergarten enrollment in the last few years, DOE projections were modified on a district basis to reflect recent district trends. These analyses do not include capital needs that would result from the *New York Adequacy Study*'s proposal for expanded pre-kindergarten services, which have been endorsed by New York City Mayor Bloomberg, "No time like the present to invest in our future," address at PENCIL's Principle for A Day Town Hall Meeting (March 31, 2004).

[36] DOE/SCA reduced the available capacity in 2007 by 2,000 seats in both Manhattan and the Bronx and 2,250 seats in Brooklyn. No adjustments were made for Queens and Staten Island.

years old. CFE believes that these 12 mini-buildings (with a total of 2,195 seats) should also be eliminated and provisions made for creating an additional 2,200 seats necessary to house their students.[37] The cost to replace these 2,200 seats, all at the elementary level, is estimated at $125.88 million ($57,219 per seat).

In sum, for purposes of this analysis, CFE accepts DOE's premise that the 66,000 new seats proposed in the capital plan need to be created and in place no later than 2012.[38] For BRICKS purposes, we would also include an additional 2,200 seats to eliminate 12 additional mini buildings at a cost of $125.88 million.

2. CLASS SIZE REDUCTION

New York City continues to have unacceptably large class sizes at all levels, significantly larger than the state average and even other high-need districts. Largely in response to the state's class size reduction initiative, from 1999-00 to 2002-03, average class sizes in kindergarten through third grade in New York City dropped from 25 to under 22.[39] State class size reduction funds paid only for the additional teachers needed to create smaller class sizes, not for the necessary physical space. Accordingly, unacceptably large class sizes in the early grades continue to exist throughout the city, primarily in overcrowded districts. However, large class sizes are not restricted to the early grades. During the 2002-03 school year, 60 percent of middle school students in New York City were in classes of 28 or more and 49 percent were in classes of 30 or more.[40] The same year, despite middle schools being the most underutilized buildings citywide, CSDs 6, 10, 11, 20, 22, 24, 29, and 30 were overcrowded at the middle school level and CSDs 9, 26, 27, and 31 were at 96 percent to 100 percent utilization. To alleviate these large classes in part, New York City provided some

[37] Additional space is needed, especially since most of these seats will be lost in three overcrowded districts – 450 seats in CSD 6, 1,000 in CSD 10, and 750 in CSD 24.

[38] Questions about identifying sufficient sites to create the 90 new schools are outside of the purview of this proposal.

[39] New York City Independent Budget Office, *K-3 Class Size Drops, But 77,500 Children Still in Classes with Over 25 Students* (September 19, 2002).

[40] New York City Independent Budget Office, *Despite Free Space in Some Middle Schools, Many Packed Classrooms* (October 31, 2003).

funding in 2003-04 to hire additional teachers in grades 5-8, though funding for additional space was not provided.

Of the 66,000 new seats in the capital plan, approximately 28,000 are elementary school seats (5,636 in small K-5 schools and 22,378 of 33,568 seats in K-8 schools assuming each grade level has the same number of students). These seats would create class sizes of 20 in kindergarten through third grade. The court decisions in *CFE v. State* repeatedly discussed the need to reduce class sizes in New York City in terms of comparisons with class sizes at each schooling level in the rest of the state. We believe, therefore, that the Court of Appeals' holding that " large class sizes negatively affect student performance in New York City schools"[41] requires that class sizes in the city be reduced, at least to the average class sizes in the rest of the state. These class sizes, according to the latest audited SED figures, are approximately 20 in grades K-5, 23 in grades 6-8, and 24 in grades 9-12.[42]

The capital plan already includes funds to reduce class sizes to 20 in grades K-3. **Table 2.2** shows the number of additional seats needed to reduce class sizes to 20 in fourth and fifth grades as well.

Table 2.2 ADDITIONAL SEATS NEEDED TO REDUCE NYC GRADES 4-5 CLASS SIZES TO 20

Borough	2003	2007	2012
Bronx	11,198	4,801	-
Brooklyn	-	-	-
Manhattan	-	-	-
Queens	21,999	12,891	-
Staten Island	3,985	2,839	1,897
TOTALS	37,182	20,531	1,897

[41] *CFE v. State of New York*, 100 N.Y. 2d at 912

[42] New York State Education Department, *New York: The State of Learning, A Report to the Governor and the Legislature on the Educational Status of the State's Schools, Statewide Profile* (2003), p. 34 and *Statistical Profile,* (2003), p. 3.

In sum, using a 2012 estimated need of 1,897 seats, it would cost an additional $108.92 million ($57,419 per seat) beyond what is in the capital plan to achieve class sizes of 20 in grades K-5. [43]

Since middle schools are the most underutilized buildings in the city, and middle school enrollments are projected to decrease over the next nine years, our analysis of middle school requirements on a borough-wide basis shows a limited need for additional space. Since the capital plan proposes 11,190 seats at the middle school level, (presumably one-third of the total K-8 seats), we see a need for only 230 additional middle school seats in Staten Island to meet the need for average class sizes of 23.[44] The cost of these seats is $14.862 million ($64,617 per seat).

Reducing class sizes to 24 in high schools will require significant additional capacity beyond what is outlined in the capital plan because of the pervasive overcrowding in New York City high schools. Additional seats are needed in all five boroughs, as shown in **Table 2.3.**

Table 2.3 ADDITIONAL NYC HIGH SCHOOL SEATS NEEDED TO REDUCE CLASS SIZES TO 24

Borough	2003	2007	2012
Bronx	20,226	25,052	10,443
Brooklyn	26,826	26,285	11,045
Manhattan	16,735	17,588	9,305
Queens	31,729	28,445	16,233
Staten Island	5,275	5,315	3,648
TOTALS	100,791	102,685	50,662

[43] This analysis may understate the actual need because it estimates the need for additional elementary school seats on a borough basis only; a district-by-district analysis is needed to determine more precise capacity requirements. Furthermore, if enrollments do not decline as predicted, the need for additional capacity could be greater.

[44] Due to the recently announced middle school restructuring to create K-8 organizations, our analysis has reduced the capacity in each borough by 10 percent for any potential inefficiencies in creating different organizations and the need for more support spaces. Additionally, our analysis was conducted on a borough basis only; there may still be a need for additional seats in a number of overcrowded districts, which this analysis does not identify.

Since high school overcrowding is so severe, especially relative to the city's middle schools, this proposal assumes that all the seats in the capital plan dedicated to new intermediary/high schools (26,400 seats for grades 6-12) will be dedicated to relieving high school overcrowding. Nonetheless, by 2012, 50,662 seats beyond those projected in the capital plan will still be needed to achieve high school classes of 24, at a total cost of $2.6 billion ($51,321 per seat).

In sum, we believe that the class size reductions required by the Court of Appeals' order will cost a total of $2.725 billion to pay for 1,897 elementary seats, 230 middle school seats, and 50, 662 high school seats beyond what is in the capital plan.

3. ACCESS TO SPECIALIZED SPACES

A. Restoring Specialized Spaces

Consistent with the explicit concerns of the Court of Appeals, it is clear that additional capacity is also needed to ensure that specialized spaces, such as gymnasiums and auditoriums that have been conscripted into classrooms to address overcrowding, are restored to their intended use. Aside from denying students adequate facilities for physical education, carving up gymnasiums into classrooms creates substandard learning spaces because the typical partitioning, which does not fully ascend to the double high ceiling height of a typical gymnasium, allows noise to permeate between classes. Although no database identifies the actual number of converted gymnasium spaces in New York City's schools, based on anecdotal evidence, CFE has concluded for the purposes of this analysis, that 1,000 temporary seats must be replaced in 40 classrooms to restore these valuable specialized spaces. [45] The cost to build these 1,000 seats – 60 percent in elementary schools and 40 percent in high schools – is $51.31 million ($51,309 per seat). To then restore the spaces, three auditoriums and seven gymnasiums, to their original purpose would cost an additional $19.04 million. In

[45] We are aware of approximately 10 schools that have lost all or a portion of their auditoriums or gymnasiums to classrooms. Our estimate is based only on those 10 schools, although undoubtedly there are others in the huge New York City school system.

all, $70.35 million is needed to restore these spaces and ensure that new capacity is created to avoid additional overcrowding.

B. Libraries

Given the court's clear findings concerning the inadequacies of libraries in New York City's schools, CFE believes additional allocations must be made to ensure all students have access to an adequate library in their school (i.e., creating a new library at schools that do not presently have one and upgrade inadequate libraries). Although the DOE capital plan does not specifically include libraries, based on SCA data, it appears that 110 elementary schools, eight intermediate schools, and seven high schools currently lack libraries.[46] Presuming that libraries can be created from existing space in buildings that lack them,[47] and based on renovation costs supplied by SCA of $200 per square foot (plus soft costs), the cost of creating a new library at each of the 125 schools is $105.2 million ($1.188 million per school).[48] This approach, however, would also have an impact on capacity, since, based on these projections, 330 elementary classrooms, 32 intermediate classrooms, and 35 high school classrooms would be used for creating libraries. The total cost for necessary capacity to replace the spaces used for a new library initiative is $64.12 million for high school capacity.

The Court of Appeals specifically held that students in New York City are entitled to up-to-date books that are "integrated with the contemporary curricula."[49] However, existing libraries in many New York City schools have deteriorated and lack a sufficient number of current books, reference materials, technology, and furniture. Few schools have received interior upgrades, and the approximately 60 percent of school buildings over 60 years old tend

[46] 31 leased spaces and 83 mini buildings have no libraries, but this analysis does not propose libraries for these structures because we assume that they are connected to a main building that does have a library or will likely be prioritized and serviced under the DOE's classroom libraries initiative.

[47] For this estimate, we assume that three full size classrooms (i.e., 750 square feet each) will need to be converted for an elementary school library, four full size classrooms for an intermediate school library, and five full size classrooms and another 250 square foot room for a high school library.

[48] Estimated costs, provided by SCA, are based on $802,000 for an elementary school library (110 costing $88.22 million), $960,000 for an intermediate school library (eight costing $7.68 million), and $1,330,000 for each high school library (seven costing $9.31 million).

[49] *CFE v. State of New York*, 100 N.Y. 2d at 913

to be in the worst shape. As a result, CFE estimates that approximately 60 percent of school libraries, due to the age of the buildings, need renovation. After removing the 160 schools that have received a library upgrade through one of a number of special programs,[50] and the 125 schools without libraries addressed in the previous paragraph, a total of 350 schools presumably need upgrades. At $300,000 per library – the amount generally provided for architectural upgrades of space, furniture, and technology as part of a library upgrade - plus a budget for the purchase of new books, the total cost for upgrading libraries at 350 schools is $150.5 million ($430,000 per school).

Based on these projections, the total investment needed to ensure that each New York City public school has a functioning library is $255.71 million, and the additional capacity in high schools, which must be provided to support new libraries in existing schools, requires an additional $64.12 million.

C. Science Laboratories

The Court of Appeals also specifically recognized the importance of science laboratories in its decision, stating that the lack of laboratories in many New York City high schools was "particularly poignant."[51] The court specifically found that, as of 1999, 31 New York City high schools lacked science laboratories. Based on a more recent analysis,[52] CFE believes that 64 high schools need new labs or total upgrades to provide all of their students a reasonable opportunity to meet the Regents Learning Standards. The need to replace or create new science labs at the high school level requires additional funding of $168.25 million ($2.63 million per school). Most of this cost is for total upgrades or replacement labs in 54 high school buildings.[53]

[50] Through efforts by the New York City Council and borough presidents, the Robin Hood Foundation library program, and DOE interior modernizations program in the early 1990s.

[51] *CFE v. State of New York*, 100 N.Y. 2d at 911 n. 4.

[52] New York City Department of Education, school facilities analysis (2000).

[53] 54 high school buildings and five leases, at a cost of $2.75 million each, and five miscellaneous spaces at a cost of $1.2 million each.

Because almost no effort has been made to upgrade New York City's middle school science labs since the schools were originally built, virtually all of them need extensive and comprehensive work. We estimate that upgrading 179 of New York City's middle school science labs would require a total of $210.95 million ($1.18 million per school) in additional funding.[54]

Based on this analysis, it would cost $361.2 million to ensure all middle school and high school students in New York City have access to a functioning lab.

D. Auditoriums / Gymnasiums

Currently, there are 363 schools in New York City without auditoriums.[55] Given the scarcity of available land in many parts of the city, it would not be feasible to build auditoriums at most of these schools. Therefore, we focused on those schools that have neither an auditorium nor a gymnasium. There are approximately 38 school buildings that fit in this category, not counting leased facilities, annexes, early childhood centers, or other miscellaneous spaces. Based on SCA's $4.73 million cost estimate for building an auditorium addition at one elementary school, and a 10 percent adjustment for purchasing necessary additional land, the potential cost of creating 38 auditoriums/gymnasiums is estimated at $179.74 million ($4.73 million per school). For the balance of schools that lack auditoriums but appear to have gymnasiums, we recommend the purchase of capital equipment such as a portable stage, seating, and other such items that will enable them to use their existing gyms and/or lunchrooms for dramatic productions, assemblies, and other such events. The cost of purchasing the necessary equipment to enable the 325 other schools to create makeshift auditoriums is $24.375 million ($75,000 per school).

[54] Total upgrades of a two-room science lab are estimated at $1.2 million, for a three-room lab $1.7 million, for large high schools, which need multiple labs $2.5 million. This analysis excludes one middle school that had its science labs renovated previously and does not include those schools that may need only a partial upgrade.

[55] This number, from the 2003 building conditions surveys, does not include leased spaces, which generally do not have auditoriums because of the need for double height spaces. In many major lease sites, the lunchroom doubles as a multipurpose room for assemblies and meetings. There are a few leased sites with a gymnasium that also function as an auditorium.

In sum, the amount of capital funding needed to provide New York City students with constitutionally required access to specialized space is $968.495 million.

4. AVOIDING IMMINENT ADDITIONAL OVERCROWDING

The Court of Appeals has held Article XI of the state constitution entitles all children in the state to "minimally adequate physical facilities and classrooms which provide enough light, space, heat, and air to permit children to learn."[56] Although there has been no finding of constitutional deficiencies in regard to the general state of the city's infrastructure and its impact on students' health and education, based on the evidence at trial, the court determined that, at this time, constitutional violations exist in New York City in regard to overcrowding, class size reduction, and access to specialized spaces. Accordingly, despite the urgent needs involved with these myriad deficiencies, CFE is not including in its BRICKS proposal most of the projects in the city's five-year plan that seek to improve the quality of existing buildings or prevent their deterioration. [57]

In some instances, however, the state of deterioration of certain buildings or parts of buildings is so grave that if repairs or renovations are not undertaken immediately, those facilities are likely to be rendered unusable within the next five years. Were this to occur, New York City's overcrowding problem would be further aggravated, especially in many neighborhoods where every classroom is desperately needed. For this reason, we believe that appropriate allocations should be included in the BRICKS program to cover repairs and renovations in buildings that are needed to avoid additional overcrowding if not attended to immediately.

The city's five-year capital plan indicates that an investment of $10.5 billion (in 2003 dollars) is needed over the next 10 years to repair and replace building systems and undertake exterior modernizations in existing public school buildings. The plan allocates $2.9 billion

[56] *CFE v. State of New York*, 86 N.Y.2d at 317; 100 N.Y. 2d at 911

[57] Given the deteriorating state of school facilities in many parts of New York City and in other districts around the state, it is possible that if these problems are not remedied through a combination of city funds, an expanded building aid program or otherwise, future litigants may bring these issues before the courts and establish violations under the adequate facility aspects of Article XI.

(inflation adjusted) for both over the next five years. Based on the criterion of imminent likelihood of resulting in additional overcrowding, we have included for BRICKS purposes the most critical projects that involve structural issues. These projects, which constitute about 10 percent of the repair and renovation items in the capital plan, have a total cost of approximately $976.9 million. Generally speaking, the projects we have included are those that have received the lowest ratings and certain of those in the next lowest rating category in the Department of Education's most recent building condition surveys.

A. Exterior Modernizations

The first category of repairs necessary to avoid imminent overcrowding is certain exterior modernizations that are needed because acute exterior deterioration, especially those due to water penetration, can rapidly jeopardize continued use of the affected space and, in some cases, the entire building. This has been a significant issue in New York City where in recent years many classrooms and top floors of buildings have been closed because of chronic water infiltration. Severe exterior deterioration can also significantly affect air quality and can contribute directly to other problems such as mold growth.

Although DOE has identified 154 buildings as needing exterior modernization at a cost of $1.675 billion, it has included in the current five-year plan only 50 schools at a cost of $349.2 million. The buildings funded in the five-year plan have the worst conditions, exhibit or threaten water infiltration, and have exterior components—windows, roofs, masonry, and parapets—with the lowest ratings in the building survey.[58] The work at approximately 40 of these schools includes window repair and/or replacement. We believe that an additional eight buildings that require window replacement that DOE would delay until the next five-year plan also meet the imminent danger of overcrowding criterion and should be included in the BRICKS construction fund. We therefore recommend that a total of $414.9 million ($7.153 million per school) be included in the BRICKS funding to cover all 58 buildings whose overall exteriors received the lowest ratings in the building surveys.

[58] An important strategy of DOE's capital program is to repair or replace all of a building's exterior components at one time if there are significant deficiencies in multiple components. If three of a building's four major exterior components – windows, roof, masonry, and parapets – are rated below "fair" condition on the most recent building condition assessment survey, then that building is identified as needing a full exterior modernization that

B. Windows

Working windows are extremely important to creating an adequate learning environment and providing light and needed ventilation in the warmer months. Too many school buildings in New York City still need extensive repairs or replacements because the windows are either inoperable, nailed shut because they would otherwise be dangerous to students and staff, or are so drafty that they can not keep out the rain and cold. The capital plan proposes to include window improvements at 104 schools. However, since some essential window projects were not included in the current five-year plan, we recommend an additional 75 replacement projects in which the windows received the lowest ratings in the building survey. Accordingly, the total funding for window work recommended here is $367.8 million ($2.055 million per school).

C. Roofs

A roof in good condition is critical to the integrity of a building. The capital plan proposes funding to replace roofs at 64 schools. However, the only difference between a roof that was included in the capital plan (i.e. rated 4.5 and above) and a roof excluded from the plan (i.e. rated between 4 and 4.5) is the extent of existing leaks. We believe that all roofs that have serious leaks create an imminent risk of causing additional overcrowding and therefore recommend that an additional 55 schools be included in this program. The total cost of roof repairs that we recommend is $115.70 million ($0.972 million per school).

D. Masonry

Deteriorated exterior masonry is another building component that can allow significant water penetration. We therefore recommend that 19 schools with the worst masonry conditions be included in the BRICKS program at a total cost of $34.9 million ($1.837 million per school).

---

would repair or replace all exterior items – not just the four identified above – but all other exterior components such as doors and window guards.

E. Climate Controls and Heating Plant Upgrades

Since prior capital plans neglected the replacement or upgrading of heat, light, ventilation, air conditioning, and other interior systems, the current five-year plan focuses on these enormous needs. Aiming to improve the interior systems of New York's aging building stock, the plan proposes spending $1.71 billion over a five-year period for interior work. We believe that interior system upgrades with respect to climate controls, at a cost of $59.7 million for work at 175 schools ($0.341 million per school), and heating plant upgrades, at a cost of $47.7 million for work at 43 schools ($1.109 million per school) are necessary to avoid the imminent danger of overcrowding. Therefore, we have included a total of $107.4 million for interior systems in the BRICKS proposal.

In sum, we believe that a total of $976.9 million is needed to undertake capital improvements that protect against the threat of imminent additional overcrowding.

5. PROVIDING COMPUTERS AND NECESSARY TECHNOLOGY UPGRADES

In addition to holding that additional capital facilities are needed to reduce overcrowding and class sizes, the Court of Appeals in its discussion of "instrumentalities of learning," also upheld the trial court's findings that New York City has insufficient numbers of up-to-date computers and that the age and antiquated wiring of New York City's buildings has impeded computer use in the classroom.[59] Currently, although more than 500 schools in New York City have wireless capability and every school building has potential internet access, 20 percent of the city's school buildings lack the technological infrastructure to provide their students access to the internet. The capital plan proposed providing the supporting infrastructure required to ensure that every classroom has internet access at a cost of $176.0 million, which we endorse. These funds will provide cabling to an access point in every classroom for approximately 200 schools; they will also pay for ancillary equipment, such as internal servers for large schools, and minor electrical upgrades needed to support the technology infrastructure.

[59] *CFE v. State of New York*, 100 NY 2d at 913, 187 Misc. 2d at 58-60.

New York City's goal, as stated in the five-year plan, is to provide laptop computers to all of its students and teachers to extend learning beyond the classroom in a wireless environment. An allocation of $417.7 million is provided in the capital plan to begin to meet that objective. We do not believe that the Court of Appeals' order can be read to support this range of extensive laptop purchases. The court ruling does, however, clearly support supplying New York City students with the same ratio of standard computers to students in the rest of the state.[60] For that purpose, we believe that $125.696 million is needed to purchase an additional 72,053 computers.[61]

In sum, New York City has a total need for technology access upgrades and new computers of $301.696 million**.**

6. SUMMARY OF FUNDING RECOMMENDATIONS

Overall, BRICKS funding for New York City schools should include all of the items included in **Table 2.1**.

[60] *CFE v. State of New York*, 100 N.Y. 2d at 913.

[61] According to the most recent *New York State of Learning* (2003) p. 94, the state averages 21.9 computers per 100 students, compared with 15.3 per 100 students in New York City. Given New York City's 2002-03 enrollment of 1,091,717, it should have 239,086 computers instead of its current 167,033 to reach the state average. This is a difference of 72,053.

Table 2.1 BRICKS FUNDING RECOMMENDATIONS FOR NEW YORK CITY

Overcrowding		
New capacity in the New York City capital plan	66,000 seats	$3.81 billion
Eliminating 15-20 year old mini-buildings	2,200 seats	$125.88 million
Class Size Reduction		
K-3 class size reduction to 20	28,014 seats	Included in $3.81 billion for new capacity
4-5 class size reduction to 20	1,897 seats	$108.92 million
6-8 class size reduction to 23	230 seats	$14.86 million
9-12 class size reduction to 24	50,662 seats	$2.60 billion
Access to Specialized Spaces		
Restoring specialized spaces from overcrowding	1,000 seats	$70.35 million
Creating libraries at schools without one	125 schools	$169.33 million
Creating auditoriums at schools without one	363 schools	$204.12 million
Ensuring functional labs in all high schools	64 schools	$168.25 million
Ensuring functional labs in all middle schools	179 schools	$210.95 million
Avoiding Imminent Additional Overcrowding		
Exterior modernizations	58 schools	$351.10 million
Windows	179 schools	$367.80 million
Roofs	119 schools	$115.70 million
Exterior masonry	19 schools	$34.90 million
Climate controls	175 schools	$59.70 million
Heating plant upgrades	43 schools	$47.70 million
Instrumentalities of Learning		
Wiring the final 20% of unwired classrooms		$176.00 million
Purchase of new computers		$125.70 million
Library upgrades	350 schools	$150.50 million
	Total:	**$8.912 billion**

Accountability

To ensure that all schools in New York City have the facilities they need to provide the opportunity for a sound basic education, it is also important that the New York City Department of Education and the School Construction Authority provide strong management, an efficient organization, updated standards and streamlined procedures to ensure that the capital plan for the country's largest school system is accomplished efficiently and

economically. In the past, the DOE and SCA have faced criticism for poor planning, high costs, management deficiencies, and lack of coordination.

In 2002, an outside commission headed by Peter Lehrer, a construction industry expert, issued a report examining why the costs to build New York City's schools were so high. Their report made a number of recommendations, chief among them were: (1) unifying a divided bureaucracy—SCA and the Division of School Facilities (DSF)—into an accountable system with increased mayoral control; (2) revising outmoded and cumbersome design standards; (3) lowering school construction costs from $450 per square foot to $300-$325 per square foot; (4) designing more efficient schools that use 60 percent of the gross space for educational purposes; (5) creating more competition among contractors by priority, a commercially viable business environment, and an attractive climate for all top-qualified contractors and vendors; and (6) reducing SCA overhead, in large part by having a smaller staff manage outside architects and construction managers.

SCA has made significant progress to achieve the above recommendations. Since the Lehrer report, (1) all capital planning activities have been merged with the design and construction functions at the SCA and restructured with strong mayoral control; (2) with the assistance of a highly experienced construction executive, extensive revisions have been made to SCA design standards to achieve a better balance of durability and cost effectiveness that will help minimize labor and material costs; (3) the most recent bids based on the updated design standards have been at $314, $311, and $300 per square foot, well within the cost recommendations of the Lehrer report; (4) SCA has set a goal of using 65 percent of gross space for educational purposes;[62] (5) to attract more contractors and create a more viable business environment SCA has reduced its pre-qualification application form by two-thirds, ensured payment is made on a timely basis, generally within 30 days or less, and streamlined its change order process; and (6) SCA has reduced its staff by approximately 40 percent in the last 15 months to lower its overhead and soft costs.

[62] SCA has exceeded this goal for one of the three most recent projects, is on target for another, and is just below 65 percent for the third.

To ensure continued progress in meeting these goals and providing accountability, SCA and DOE should ensure specific schedules for projects in the categories identified in this report, make regular reports on progress against proposed schedules and budgets, and provide ongoing analysis of their efforts to reduce overcrowding and class sizes.

We also endorse the recommendation of the New York State Commission on Education Reform that the state should provide New York City and other school districts access to the construction management services of the State Dormitory Authority. We agree that the Dormitory Authority could help New York City and other districts reduce construction costs through assistance with master planning, feasibility studies, cost-benefit analyses, analysis of material selection, and third-party review of construction documents.[63]

All of the state aid that New York City receives for BRICKS funding (and all of its building aid under the reform proposal set out above) should be identified, tracked, and spent exclusively on the capital projects for which it is intended. The city's current practice of incorporating building aid receipts into its general fund should be prohibited.

BRICKS Projects in Other High-Need Districts

1. ELIMINATION OF OVERCROWDING

The extensive court record and New York City's detailed five-year capital plan have provided CFE with substantial information about the specific overcrowding of the New York City school system and the facility needs to relieve the problem. Although comparable information is not available regarding overcrowding in other high-need school districts, numerous conversations with SED and representatives of high-need districts have indicated that severe overcrowding only exists in a few high-need small city and suburban school districts, and is not a systemic problem throughout the state.

[63] New York State Commission on Education Reform, *Final Report* (March 29, 2004), p.47.

2. CLASS SIZE REDUCTION

Unlike New York City, other high-need districts do not appear to have above-average class sizes system wide. Compared with New York City's average elementary school size of over 24 students per class, other high-need districts average between 18 and 20 students per class,[64] below the statewide average. For middle schools and high schools, no comprehensive data are available, but sample class sizes in grades 7-10 peg high-need district class sizes between 19 and 23, compared with New York City's classes of 28 and 29.[65] Although there may be some individual districts with unusually large class sizes, CFE believes that there is no systemic statewide need for funding at this time to lower classes to the statewide averages in high-need districts outside New York City.

3. ACCESS TO SPECIALIZED SPACES

The building conditions assessment surveys (BCAS), which school districts must conduct of all of their buildings, provide information on the status of specialized spaces—such as gyms, libraries, and science labs—around the state. Although the BCAS database is not entirely comprehensive, the surveys do provide information on 3,036 school buildings outside of New York City that serve 1,655,698 students.[66]

Most schools around the state are fully equipped with the specialized spaces needed to provide the opportunity for a sound basic education to their students. However, according to the surveys, a number of schools, especially in high-need districts, lack key specialized spaces identified by the Court of Appeals – science labs, computers, libraries, and auditoriums.

---

[64] New York State Education Department, *New York: The State of Learning, Statistical Profiles,* Table 3, p. 3.

[65] New York State Education Department, *New York: The State of Learning, Statistical Profiles,* Table 3, p. 3 and *New York: The State of Learning, Statewide Profile,* Table 2.9, p. 34.

[66] Information on high-need districts includes 153 school buildings in the "Big Three" districts (i.e., Buffalo, Rochester, Syracuse) that serve 93,067 students, 291 buildings in high-need rural districts that serve 147,087 students, 231 buildings in high-need small city districts that serve 138,786 students, and 126 buildings in high-need suburban districts that serve 650,169 students.

A. Science Labs

According to the BCAS data, 52 high schools in high-needs districts around the state serving 17,056 students lack science labs. This includes 10 high schools in Buffalo, Rochester, and Syracuse, 19 in rural districts, 18 in small city districts, and 4 in suburban districts.

B. Libraries

Outside of New York City, 153 schools in high-need districts serving 34,064 students have no library. This includes 24 schools in Buffalo, Rochester, and Syracuse, 53 in rural districts, 33 in small city districts, and 43 in suburban districts.

C. Auditoriums

Although most schools around the state have not needed to carve their auditoriums into classrooms to relieve overcrowding, 399 schools serving 153,524 students in high-need districts have no auditorium at all. This includes 54 schools in Buffalo, Rochester, and Syracuse, 156 in rural districts, 113 in small city districts, and 76 in suburban districts.

4. COMPUTERS AND TECHNOLOGY UPGRADES

According to the BCAS data, in high-need districts outside New York City there are 236 schools serving 74,571 students without a computer room. This includes 56 schools in Buffalo, Rochester, and Syracuse, 63 in rural districts, 53 in small city districts, and 64 in suburban districts. Although wireless technology may have begun to alleviate the need for a designated computer room in each school, we assume that at least some of these schools need capital funds to provide appropriate wiring and infrastructure for internet access. Outside of New York City, only large city districts average fewer computers per 100 students (21.8) than the state median (21.9), but the gap is practically negligible.[67]

5. FUNDING RECOMMENDATIONS

Although their capital needs do not compare with the extensive deficiencies in New York City, other high-need districts throughout the state do have deficiencies in a number of the specific capital funding categories that the Court of Appeals has identified as warranting

[67] New York State Education Department, *New York: The State of Learning, Statewide Profile,* p. 94-95.

constitutional consideration. As part of the BRICKS program, we therefore recommend that the State Education Department establish a program that will permit high-need districts to apply for BRICKS funding in accordance with eligibility criteria analogous to those set forth for the New York City BRICKS programs described in this proposal.

We estimate for working purposes that projects with a total cost of approximately $1 billion would likely qualify for BRICKS funding. This estimate is based on the general lack of overcrowding and above average class sizes in high-need districts outside of New York City; the past ability of many high-need districts, especially in rural areas, to capitalize on the building aid formulas; and the fact that the number of students in high-needs districts other than New York City is approximately half the city's student population.

APPENDIX A. MEMBERS OF THE SBE TASK FORCE*

FACILITIES TASK FORCE MEMBERS

Stephen Allinger	Executive Director, Office of Intergovernmental Affairs, New York City Department of Education
Larian Angelo	Director, Finance Division, New York City Council
Claire Barnett	Executive Director, Healthy Schools Network
Steve Boese	New York State Director, Healthy Schools Network
Noreen Connell	Executive Director, Educational Priorities Panel
Charles Dawson	Deputy Director of Governmental Relations, New York State School Boards Association
Vito DeCesare	President, New York State Association of Small City School Districts
Bill Duncombe	Professor of Public Administration, Syracuse University
Bruce Feig	Chief Financial Officer, New York City Department of Education
Carol Gerstl	Associate Director, United Federation of Teachers
Richard Kahan	President, Take the Field, Inc.
David Little	Director of Governmental Relations, New York State School Boards Association
Robert Lowry	Associate Executive Director, New York State Council of School Superintendents
Frank Mauro	Executive Director, Fiscal Policy Institute
Daniel Porter	Deputy Executive Director, Rural Schools Association
Trudi Renwick	Senior Economist, Fiscal Policy Institute
B.A. Schoen	President, Reform Educational Financing Equities Today
Paul Seversky	Representative, Midstate Finance Consortium Group
Charles Szuberla	Director, School Operations and Management Services, New York State Education Department
Charles Winters	Consultant, New York State Association of Small City School Districts
John Yagielski	Manager of School Finance and Policy Development, New York State United Teachers
Patricia Zedalis	Educational facilities consultant and former chief executive of the Division of School Facilities at the New York City Board of Education

* The individuals listed as members of the task force served in an advisory capacity. Their participation does not imply individual or organizational endorsement of this proposal.

APPENDIX B. SBE TASK FORCE EXPERT CONSULTANTS

Carol Ascher is a Senior Research Scientist at the Institute for Education and Social Policy at New York University and has written extensively on educational accountability.

Robert Berne is the Senior Vice President for Health and Professor of Public Policy and Financial Management at New York University's Wagner School and a nationally recognized expert in educational policy research.

Charles Coble is vice president for policy studies and projects at the Education Commission of the States. For 13 years, Coble was professor of science education and dean of the nationally award-winning school of education at East Carolina University, Greenville, North Carolina.

Margaret Goertz is a professor of education policy in the Graduate School of Education at the University of Pennsylvania and co-director of the Consortium for Policy Research in Education, where she specializes in the study of state and federal education finance and governance policy.

Janet S. Hansen is vice president and director of Education Studies at the Committee for Economic Development (CED) and a senior fellow at the Education Commission of the States.

Luis Huerta is an assistant professor of education at Teachers College-Columbia University and former research associate and coordinator for K-12 education policy research for Policy Analysis for California Education (PACE).

Frank Mauro is the executive director of the Fiscal Policy Institute and former deputy director of the State University of New York's Nelson A. Rockefeller Institute of Government and secretary of the New York State Assembly's Ways and Means Committee.

Trudi Renwick is a senior economist at the Fiscal Policy Institute.

Ted Sanders is president of the Education Commission of the States. He was previously the chief state school officer in Illinois, Ohio, and Nevada and the Undersecretary and Acting Secretary for the United States Department of Education during the first Bush administration.

Nona Ullman is a managing director with BearingPoint Inc. who specializes in strategic, operational, and information technology consulting projects for educational institutions. Ms. Ullman has assessed K-12 accountability systems for numerous states.

Dennie Palmer Wolf is director of the Opportunity and Accountability Program at the Annenberg Institute for School Reform at Brown University and directs the institute's Rethinking Accountability initiative.