

# CAPITAL PLANNING PROCESS

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June 2008



**Davis School District**

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**PREPARED BY**  
District Planning Department  
District Facilities Administration Department

# Acknowledgments

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## Patrons of Davis School District

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## **INTRODUCTION**

Under the direction of the Davis School District Board of Education, the Davis School District oversees 9.5 million square feet of facilities. Through careful planning and oversight, these “world class” facilities provide outstanding working conditions for teachers and staff and an excellent learning environment for students. The District enjoys excellent test scores and the highest graduation rate in the country - among the 100 largest public school districts. Our researched-based design of new schools and ongoing renovations greatly add to the learning success of our students. The District carefully plans and carries out ongoing maintenance, renovations, additions, and new construction through a comprehensive capital planning process. The purpose of this “Capital Plan” is to outline and describe our planning process.

In partnership with parents and communities, we will foster educational excellence in a safe and nurturing environment where all students can acquire the skills, knowledge, values, and commitment to lifelong learning necessary to contribute and adapt to our diverse and changing world.

**Davis School District Mission Statement**

## **DAVIS SCHOOL DISTRICT**

The Davis School District was established in 1911 and shares common boundaries with Davis County. Davis County is located east of the Great Salt Lake and north of Salt Lake County / Salt Lake City. Davis County comprises an area of 268 square miles, with just under 300,000 residents. The growth in population has been almost 30% for the past 10 years. With that growth, the county has moved from its traditional agricultural dependency, to an interlocking network of suburban communities within close proximity to downtown Salt Lake City (to the South) and Ogden City (to the North). As a suburban area, Davis County does not have a large commercial / industrial tax base to support new school construction.

Even though Davis County is Utah's smallest county in land area, the District's enrollment is the third largest in the state with 64,553 students (October 2007). To serve these students, the District operates 56 elementary schools, 15 junior high schools, 8 high schools, and 3 alternative schools.

### **CAPITAL PLANNING PROCESS OVERVIEW**

An integrated and comprehensive planning process is required to anticipate and provide for new schools, replace aging schools, provide additions and/or renovations at existing schools, and to insure the maintenance of existing schools. The Capital Planning Group integrates the staff functions of planning, finance, construction, maintenance, and technology, with additional input and participation provided by School Directors, Transportation, Nutritional Services, Custodial Services, and Community Relations departments. The Administrator of Facilities Administration chairs the Capital Planning Group. The Superintendency provides oversight of this process.

The process has three main components: 1) obtaining, managing, and accounting for the capital funds, 2) identification and prioritization of capital facility needs, and 3) project design, bid, and completion of facilities.

A detailed discussion of the Capital Planning Group and the process used may be found beginning on page 10.

## **FINANCING PROCESS**

The method of obtaining capital funding for a school district in Utah is complicated. While the vast majority of capital funding comes through bonding, there are other sources of capital which are additive to bonding. Additional costs associated with opening and operating a school must also be considered.

### **Sources of Capital**

Financing for school district capital projects currently comes from three sources:

- The Capital Outlay Property Tax Rate
- The State's Capital Equalization Fund
- General Obligation School Building Bonds

The district generally uses proceeds from the Capital Outlay Property tax rate and Capital Equalization funds for maintenance of buildings and small capital projects. The School Building Bonds are used for major building projects such as new schools, additions to current buildings, major renovations, or maintenance of existing facilities.

The current capital outlay tax rate is not large enough to generate sufficient funding to pay for new construction projects on a “pay as you go” basis. The Davis School Board could choose to raise the tax rate, but this would create a substantial tax increase for taxpayers in Davis County. Much like a home mortgage, General Obligation School Building Bonds allow the District to borrow money incrementally and pay back both the principal and interest over an extended period of time. These payments are funded through a General Obligation Debt tax rate. The tax rate required to pay debt service on General Obligation Bonds is lower than “pay as you go” financing because debt payments are spread out over 15 to 20 years. This method does, however, increase the District's total cost of capital projects because of interest expense that would not be incurred using the “pay as you go” basis.

### **Bonding Process**

The first step in forecasting debt capacity is to predict the total assessed taxable value in the county for each year during the authorization time frame. Davis County has been in “growth” mode since World War II and this growth is expected to continue for the foreseeable future. The only question is how much growth in total taxable value will occur during each year of the authorization time frame. With the assistance of professional financial advisors, the District makes conservative estimates of projected growth in assessed valuation based on historical data from the county.

Next, the District examines its current debt service structure compared to the assessed value estimates. This figure determines the tax rate necessary to generate sufficient funding to pay the current debt over its life. The difference between this calculated rate and the current General Obligation rate represents additional debt-incurring capacity available within the current tax rate structure. The Utah State Constitution also imposes a legal debt limit on taxing entities of 4% of the fair market value of all taxable property within the county. This ceiling represents the maximum debt-incurring capacity of the District.



Finally, the District must take the prioritized list of construction needs and compare it with its capacity for incurring additional debt. If there is enough capacity within the current tax rate, the District would seek additional bonding authorization from the voters, with no tax rate increase. If the dollar amount of construction needs cannot be financed within the current tax rate structure, the District would then ask voters to approve a new bonding authorization, which would include a tax rate increase.

As the District contemplates a new bond authorization, it must balance the needs for classroom space and materials for students with the tax burden placed upon taxpayers by incurring debt.

**Voter Authorization** To sell bonds and incur debt, the District must have the authorization of a simple majority of Davis County registered voters. These elections must be held in conjunction with a primary or general election in the County. A recent authorization of the District passed on June 20, 2006 (\$230 million) with 79.2% of the voters in favor. The patrons of Davis County have generously supported every bond election to date.

**Time-Phased Sale of Bonds** After a bond authorization is approved by voters, the District is then allowed 10 years to issue (sell on the financial market) the bonds up to the limit approved in the authorization. Bonds can be issued for any amount and as often as needed for support of construction timelines. How much and how often the District issues bonds is once again a balance of the construction needs of the District and the tax burden placed on taxpayers. As an example, the 2006 authorization is scheduled to be issued as follows:

September 2006	\$47 million
August 2007	\$55 million
June 2008	\$64 million
June 2009	\$64 million

## **School Operating Costs**

Each new school has operating costs which do not come out of capital funding but are additions to the District's annual operating budget. When a new school is constructed, the District anticipates increased operating costs including office administration, custodial, maintenance, insurance, and utilities. These costs are recalculated each year and must be incorporated into the operating budget of the fiscal year when the school is opened. Teachers and associated classroom costs follow the students and simply transfer from existing schools.

When additions are made to existing facilities, the changes to the regular operating budgets are not as dramatic but must also be calculated and incorporated into the general fund budget. When renovations are made to existing buildings, system updates often reduce operating costs to a level similar to new facilities, e.g., maintenance and utility expenses.

Further information may be obtained from the District Accounting Department at 801-402-5232.

## CAPITAL REQUIREMENTS

Capital funds are used to purchase land, construct new facilities or additions to existing facilities, replace aging facilities, and renovate and maintain existing facilities. The District currently has 9.5 million square feet of buildings and almost 1,400 acres of land in operation. Continued investment in current infrastructure is critical and requires more than one-third of the available capital funds. These lesser known requirements include:

- Access control (Card identification for security and entry)
- Americans with Disabilities Act (ADA) compliance
- Asphalt for parking, roadways, and playgrounds
- Auditorium upgrades for curtains, sound, seating, and rigging
- Bleacher upgrades, interior and exterior
- Ceiling tile replacement
- Chiller upgrades / replacement
- Closed circuit television for security
- Computer lab construction
- Data line upgrades for latest technology
- Electrical upgrades for new service and energy saving programs
- Fire alarms
- Floor coverings
- Furniture upgrades for cafeteria and miscellaneous settings
- Heating, ventilating, air conditioning control (HVAC), and system upgrades
- Kitchen upgrades
- Lighting upgrades
- Portable classroom construction, updates, and replacements
- Rebuild and renovation projects
- Re-roofing
- Restroom / locker room upgrades
- Site improvements, including elementary big toy surface replacement
- Storage facilities
- Uninterrupted power source (UPS) for schools
- Waterline replacements
- Wireless access for computers



## FACILITY ASSESSMENT

The ability to accurately prioritize projects in existing buildings requires a detailed, accurate, and continually updated assessment of the District's facilities.

The District has developed a unique Facility Assessment Program that provides an up-to-date "snapshot" of every facility in the district. The program is maintained by the Environmental Maintenance Services (EMS) Department. The effort to keep all data updated is extremely time intensive and essential. The Assessment Program generates an assessment document for each facility (Appendix A) and includes:

- Summary Sheet:
  - Building information, site information, portable classroom history, project/renovation historical summary
- Deficiency Sheet: Site, Risk Management, Educational Programs, HVAC/Plumbing, Electrical/Energy Communications/Technology Issues
- ADA Accommodation Plan
- Asphalt Condition Plan
- Building Age Plan (by additions)
- Data Sheet: Site, Architectural, Mechanical, and Electrical Systems
- Emergency Protection Plan
- Exterior Lighting Plan
- Floor Plans
- Site Plan
- Site Surfaces Plan
- Square Footage Plan
- Roof Plan, indicating age of the roof's sections
- Utility Cost Data Sheet
- Utility Plan

These documents serve as powerful information tools for a wide variety of interested parties, including school administrators, contractors, and emergency response personnel. In addition, they serve as valuable planning documents. Deficiency lists and critical data are reviewed as part of the capital project list compilation process.

Further information may be obtained from the Environmental Maintenance Services Department at 801-402-7400.

## ENROLLMENT & PROJECT FORECASTING

Construction of new schools or additions at existing schools makes up approximately two-thirds of the total capital expenditures. Most of these projects are directly related to changing student enrollments. The District Planning Department tracks and forecasts enrollments in order to provide information and recommendations for decisions by the Superintendency and School Board.

Davis County experiences two components of growth in school-age children. The first is migration. When the economy is stronger than surrounding states, the in-migration contributes to growth in student population. Out-migration obviously has the reverse effect. The second and largest contributor is births. The number of births to residents of Davis County in 1995 was 4,112 and increased to 5,336 in 2005. The Utah State Office of Demographic and Economic Analysis projects the birth rate of residents of Davis County will increase to 6,203 in 2015. Those births translate to kindergarten students five years later - with the number adjusted to reflect a small increase or decrease depending on anticipated migration patterns. This increasing kindergarten enrollment will result in total District enrollment increasing to above 75,000 by 2025.

Historical enrollment data is kept for each school (Appendix B), including:

- Enrollment by grade over the past several years
- In- or out-migration patterns
- Anticipated enrollment changes
- Building capacity and number of portable classrooms

Leading indicators can help predict rising enrollment changes. Building permits issued by a city for a development are short range (4-6 month ) indicators. A city's approval of a development provides a longer (1 to 3 years) lead time. A long term constraint on construction is the amount of raw land still available and suitable for residential construction. Davis County projects that the County's raw land will be consumed, or "built out," by 2030-2035.

The District uses a sophisticated computer-based Geographical Information System (GIS) to track housing developments and student residence information. The GIS program uses the land and parcel data from cities and the county, and overlays the District's student information. This data, along with aerial photographs, provides a visual portrayal of current student locations and growth indicators. The GIS program can also show the time phasing of recent growth in an area. This tool is invaluable in the process of establishing new school boundaries, which accompany new school openings.

This same information is used to annually forecast and prioritize projects for ensuing construction cycles. In prioritizing projects, schools and areas are assessed for growth, overcrowding in existing area schools, options for accommodating the growth with portable classrooms, year-round scheduling, or boundary changes. The development indicators (building permits, development approval, and raw land) are updated. The Capital Planning Group reviews the proposal for the next year's project list and beyond.

Further information may be obtained from the Planning Department at 801-402-3556.

## **BOND PROJECT LIST DEVELOPMENT**

The initial assessment of which projects should be considered and prioritized is done by the Bond Group - a subset of the Capital Planning Group. The Bond Group is a small work group involving: Superintendency (Assistant Superintendent for Support Services and Assistant Superintendent / Business Administrator), School Director, Director of Accounting, Budget Officer, Administrator of Technology Services, Administrator of Facilities Management, Director of Architectural and Construction Services, Director of Environmental Maintenance Services, Planner, and Community Relations Director.

Shortly after patrons approve a bond for capital projects, initial planning for the next bond begins. Two years prior to this bond's anticipated election, the process accelerates and, in order to accurately inform the public and garner their support, the bond project list goes through considerable review and refinement.

### **Unconstrained List**

The initial unconstrained list is compiled by those members of the Bond Group who deal with the execution of the projects (Facilities, Construction, Maintenance, Technology, and Planning).

The Planning Department maintains a working document projecting, in 5 year increments, possible major construction projects for the next 20 years. This list includes new schools and additions, as well as rebuilds of aging buildings. The following 5-year increment is updated and becomes the starting point for the major project list. Funding for land purchases is also included. A small contingency fund is added (3% in the last bond) to provide for unforeseen requirements.

Concurrently, the list of recommended improvements at existing facilities begins to emerge. Anticipating the cost for a few new schools is far easier than generating cost data for upgrades and maintenance. The Facilities Assessment Report is the starting point for more than 30 categories of recommended funding. Projects which were recommended, but not funded in the previous bond, are re-evaluated and prioritized against newly identified projects.

The two categories of major projects and upgrades and/or maintenance, are merged into a single work sheet and then cost magnitude begins to emerge. The total price is often twice the amount of the eventual final funding.

### **Constrained List**

The District's Financial Group (Business Administrator, Director of Accounting, and Budget Officer) then begins discussions with an outside bond advisor to assess the District's debt capacity against the anticipated increase in taxable value and tax rates. From this forecasting, funding scenarios are developed which project the available funds, both within and above the current tax rate. Assumptions in the inflation rates of construction are also forecast. Multiple project lists may be developed to match each of the amounts identified in the funding scenarios.

To meet the anticipated funding amount, projects on the list are pared down by either being deferred to the next bond, reducing the scope, or eliminating the projects. The smaller project categories may be funded at a greatly reduced level. In many categories, the amount is listed as “block grant” rather than listing specific projects to be funded. Then as many projects as possible are accomplished as funds permit in a year. The projects are prioritized and updated annually by the Environmental Maintenance Department’s personnel. Those projects not completed are rolled into the next bond as a priority in the same category.

The constraints on any year’s capital projects include: 1) funding, 2) the ability of the Construction Department to oversee contracts and construction, and 3) the Environmental Maintenance Department’s capacity for in-house completion of small capital projects. Cash flow is the largest constraint. As with a household budget, each year’s expenditures are constrained by the cash flow from the various sources of capital.

### **Time Phasing By Year**

The projects must be spread out so that funding matches the anticipated revenue from the sale of bonds. Often major projects are listed in the year needed and smaller projects are moved around to balance the year’s total revenue requirement. Five or six schools may be included on this list. Generally, only the location of the school(s) scheduled in the first or second year of the bond are listed. Locations are not specified in the out-years to permit flexibility in responding to emerging growth.

Each of the major projects must be indexed for the rate of inflation compounded to the year the project is anticipated. This was not as critical in previous years, but from 2003 to 2007, construction costs per square foot doubled.

In the process of gathering support for a bond, the projects are shown to the public. Usually no time frame is specified for most projects. Yet, it is difficult for schools and community councils to understand why their specific projects are not started in the first year of the bond.

### **Annual Update**

In March / April of each year, the Bond Group reviews, updates, and finalizes the project list for the following fiscal year. During this process, considerable time is spent verifying and updating project costs. Projects may be moved or reduced to balance costs and funding. The recommended annual project list is briefed to the entire Capital Planning Group for approval or modification. The Board is provided the resulting information in their annual construction update, as they have oversight of the Capital Plan.

The development and execution of the capital project list is centered on the availability of funds.

Further information may be obtained from the Facilities Management Department at 801-402-5275.

## **CAPITAL AUTHORIZATION PROCESS**

In the Capital Planning Group, all projections, requirements, requests, and funding information come together for decisions or recommendations to the Board.

### **Capital Planning Group**

The purpose of the Capital Planning Group is to evaluate capital requirements for authorization, prioritization, and funding, in a responsible and equitable manner. The group is comprised of individuals representing the Superintendent, School Directors, Facilities, Architecture, Maintenance, Planning, Finance, Purchasing, Information Technology, Transportation, Nutrition, Warehousing, Custodial, Utilities, and Community Relations. The group meets twice a month, or as necessary, to support the District's capital needs.

The Capital Planning Group is charged with completion of projects on the capital project list without exceeding the total capital authorization.

For each project, the Capital Planning Group reviews the architect's construction cost estimates against the amount allocated on the capital project list. If the amount exceeds the amount allocated, the Capital Planning Group will either send the project back for scope review or make a decision to try to allocate additional funding. Before a project's funding increase is approved, a comparable reduction must be made in the contingency fund, another project, or account.

The capital project list is a dynamic document having sufficient flexibility to respond to unforeseen requests. Not all projects can be anticipated for inclusion. A school's principal or community council may initiate a request for a project not included on the capital project list. Similarly, a request may come from the Maintenance Department or another member of the Capital Planning Group. All unforeseen requests go through the same prioritization and funding scrutiny. Approval cannot be granted unless a funding source is identified. In a period of construction inflation and with only a small contingency amount, not all requests can be funded. Some requests are either denied or deferred until the next bond project list. Discussions and decisions by the Capital Planning Group are recorded in the minutes and as cell comments in the spreadsheet.

Once the Capital Planning Group approves a project, the Architectural/Construction Services or Environmental Maintenance Services procures the necessary professionals to prepare bidding documents. Proposals from architectural and engineering (A/E) firms, as well as construction contracts, are approved by the Board.

### **Project Information Sheet**

For each project, the Capital Planning Group reviews the architect's construction cost estimates against the amount allocated in the capital project list. If the amount exceeds the amount allocated, the Capital Planning Group will either send the project back for scope review, or make a decision on allocating additional funding. An identified and comparable reduction in the contingency fund, another project, or account is needed prior to a funding increase.



The sample Project Information Sheet (Appendix C) summarizes the costs encountered on a recently completed elementary school. The top section of the sheet contains general information on the project such as the names and addresses of the architect and contractor; the square footage and cost per square foot of the project. It has the bid amount of the project and the total contract amount with change orders. It tracks several important dates, such as Capital Planning Committee approval, Board of Education approval, Bid Opening, Notice to Proceed, and Substantial Completion dates. The column titled “Preliminary Estimate” is the initial estimate generated at the inception of the project. The total of this column will match the amount that was listed on the bond list. After several months of design and after the project has been bid, the column titled “Projected Costs” modifies the “Preliminary Estimate” column. This column is a more refined estimate and in most cases will total less than the “Preliminary Estimate” column. This column's total may be larger than the “Preliminary Estimate” column due to inflation or scope creep. If this is the case, the overage is approved by the Capital Planning Committee.

Finally, the “Amount Paid” column tracks the expenses of the project as they are accrued. Each invoice or pay request that is approved for payment is figured in and the “Percent Complete” column provides a quick indicator of the project’s financial status.

### **Cost Components of a New School**

Besides the costs of brick and mortar construction, additional expenditures are associated with the formation of a new school. Care must be taken when trying to compare building costs, to determine what is being included and what is not. In calculating building costs, which costs are included: site costs, property purchases, design costs, or furniture costs? Regardless of how total costs of a construction project are calculated, most of the following expenses will be incurred:

- Architect/Engineer Fees - Usually a percentage of the construction cost. This is paid to the architect who then will hire a structural, mechanical, and electrical engineer to provide plans and specifications for the building.
- Geotechnical Engineering - This is to test the soil at the building site to design the footings and foundations.
- Survey and Civil Engineering - Locates the property corners and identifies the topography so that rain water and site utilities are handled properly.
- Construction Testing - An independent testing company takes soil, concrete, and masonry tests to ensure that the designed strengths are achieved.
- Direct Purchases - Davis School District contracts directly with a carpet and blind supplier to provide these materials to the building at a significant savings over what a general contractor could provide. Other direct purchase expenses include utility hook-ups, impact/connection fees, and asbestos abatement.
- Furniture, Fixtures, and Equipment - This is what it takes to turn a building into a school. This is everything needed to operate, such as desks, chairs, text books, computers, printers, copiers, telephones, and custodial supplies.



- Contingency - It is inevitable that changes will be made during the course of construction whether by un-foreseen conditions or a change in scope. The Davis School District carries a 3% change order contingency for new construction projects and a 5% contingency for remodel projects.
- Printing Costs for Plans and Specifications
- Utility Connection and Impact Fees

All of these items are needed to open and operate a new school and total between 12 and 15% of the total construction cost. Carrying a 3% to 5% contingency for construction change orders is also essential.

The only other cost associated with the cost of a building would be the price paid for the purchase of the land where it is sited. Davis School District land banks parcels of land years in advance so this cost is not normally tracked as part of the total cost of a building.

### **Donor Projects**

Occasionally a member of one of the District's school communities desires to contribute money or "in kind" volunteer labor and materials to the project. The proposed project may be a priority for that school; however, may not have been included in the District's project list. Such projects have included air conditioning for a Choral Room; Renovation of a baseball diamond, including a press box, dugouts, and restrooms; and artificial turf for a sports field. All "donor project" requests must be submitted to the Capital Planning Group for review. The application (Appendix D) must be completed and have support of the School Director and appropriate Curriculum director.

### **Board Briefings and Approvals**

Once the Capital group has approved a project, it is presented to the Board of Education at the time of A/E or Contractor selection (and then for approval of bids). Twice each year, the Facilities Management and Planning Department presents an update to the Board of Education informing them of project progress, future growth/planning, and budget update information.

Should a project bid substantially over-budget, the Board is apprised of the situation and informed of the funding source and impact on the overall capital project list. Every effort is made to keep projects on budget, but occasionally, scope increase and inflation occur, resulting in bids over-budget. In this case, the Facility Department Group (Administrator of Facilities, Director of Architectural/Construction Services, and Director of Environmental Maintenance), architects and contractors, including subcontractors, meet to conduct a "second" value engineering session, in an attempt to lower costs within budget. Following board approval, notice to proceed is given to the appropriate entity.

Further information may be obtained from the Facilities Management Department at 801-402-5275.

## **NEW CONSTRUCTION PROCESS**

Once a new school or addition has been approved, the scope of the project is determined. In this process, the size, special requirements, and budget of the project are evaluated. If a prototype plan is used (Appendix E), the architect is approved by the Capital Planning Group, as selected by the Professional Services Committee. If the project must be designed from “scratch,” the Professional Services Selection Group begins the architect selection process. The Professional Service Selection Group is also responsible for contractor selection.

### **Professional Services Group**

The Professional Services Selection Group is comprised of three fixed members: chairperson (a non-district employee); Administrator of Facilities Administration; and Director of Architectural/Construction Services. The Group is supplemented with additional members, as a particular project warrants, such as city administrators or planners, principals, purchasing employees, and others.

### **Architect Selection**

Under the direction of the Architectural Services Director, the Purchasing Department advertises a request for proposal. The Professional Services Selection Group convenes and reviews all submittals and rates them using a predetermined questionnaire that is provided as part of the request for proposal. If the project is large, the submitting firms will be asked to make a formal presentation to the Professional Services Selection Group. Scores are entered into a matrix and generally the highest scoring architectural firm is recommended to the Board of Education for approval.

### **Contractor Selection**

Contractor selection process is similar to the architect selection. Requests for proposal are advertised, submittals reviewed, interviews conducted (for large projects) and firms ranked. The Professional Services Selection Group has the prerogative of selecting a firm which may not have the highest score, if their selection is deemed to be in the district’s best interest. During the design phase, the contractor selection process is determined - either “low bid” or “Construction Manager/General Contractor” (CM/GC).

Low bid means that the District may select the lowest bidder, if the bidder is fully qualified for a project of that scope. Construction documents are available to all qualifying bidders that meet certain bonding and insurance qualifications. Bids which are submitted, in complete form by the deadline, are then reviewed.

During the design phase, if the CM/GC method is decided upon, the Professional Services Selection Group begins the selection of a Construction Manager (CM). The CM works as part of the design team and offers expertise for budgets, means, and methods of construction to ensure the project stays on budget and on time. When construction documents are complete, the CM solicits bids. If bidding for work is to be self-performed, their bids must be sealed prior to opening other competing bids. Once the bids have been opened and secured, the CM becomes the General Contractor overseeing the construction of the project.

# Plans Review / Value Engineering

To help ensure that the District is getting the best value for the money, all building plans are thoroughly reviewed. Before any project is placed out to bid, a plan review meeting is held with representatives from several District departments: Maintenance, Custodial, Nutrition Services, Transportation, Risk Management, Information Technology, etc. The goal of this meeting is to review the plans and specifications for completeness and compatibility with existing District systems and standards.

When a new building prototype is created, it undergoes a value engineering process. This process involves hiring an independent set of design consultants, not involved with the design, to review and recommend to the District alternate solutions or options, as well as the costs associated with each choice.

Each building project plan is reviewed by the State Fire Marshal’s Office for compliance to the International Fire and Life Safety codes. Plans are also reviewed by a Certified Plans Examiner for compliance to the International Building Code.

## Life Cycle Cost Considerations

Buildings must be durable, maintainable, economical, and designed and built to last 60 to 75 years. Our buildings are built with quality materials that are relatively inexpensive but are also maintainable. Thousands of children spend countless hours in our buildings, which causes considerable wear and tear to the facilities. The District has been able to construct quality facilities for a cost-per-square-foot well below the national average.

## Overall Time Lines

Many factors affect the length of the construction process, such as cash flow, current work load in the construction industry, and complexity and phasing requirements of a particular project. The following is the recommended time-line for construction projects:

Scoping of Project	1 to 2 months
Architect Selection	up to 2 months
Design Phase	3 to 12 months
Contractor Selection	1 to 2 months
Bidding	1 month
Construction Process:	
Elementary School	12 to 16 months
Junior High School	14 to 16 months
High School	24-30 months
District Move In and Set Up	2 to 4 months

Further information may be obtained from the Architectural/Construction Services Department at 801-402-5190.

## TECHNOLOGY

The world for which we are preparing students has change dramatically over the past decade. Whether in public education, higher education, or the workplace, the need to be able to use technology is increasing. Providing an infrastructure that supports 21st century teaching and learning is just one of the responsibilities of the Technology Services Group.

### Technology

Rapidly changing technology compels us to create teaching and learning spaces that are functional for today and flexible enough to meet future needs. Predicting the future implementation of building automation, educational content presentation, and connectivity to the outside world via the Internet is extremely challenging. The never ending challenge of keeping up with current technology is both expensive and, at times, challenging. As new schools are constructed, especially secondary schools with longer construction times, we are continually striving to create facilities that will support future technologies.

Trying to provide equivalent opportunities for all students, whether they attend one of our older elementary schools or our newest high school, has taught us valuable lessons regarding constructing new schools that support changing technology. Working with visionary architects and electrical engineers, we have designed schools with modular technology infrastructures. Adding additional access to the wide area network or increased speed is no longer the laborious process that we face in older district buildings.

### New Construction and Technology

New schools are designed to provide opportunities for computing throughout the entire building. Along with the need for designated computer labs, we now provide additional access through the use of computers in traditional classrooms in mini-lab configurations. Mini-labs are often designed with 3-10 computers that can be used for both independent and/or group research, as well as to enrich learning as directed by the classroom teacher. New schools are also being configured with wireless “hot spots” where students and faculty members, using their own equipment, can safely access the network to do independent work.

A lesson learned from older buildings is the importance of making classrooms easy to reconfigure based on changing curriculum and/or teaching styles. New classrooms have the ability to support a computer for each student in varying configurations. New classrooms are also equipped with interactive whiteboards, projectors, advanced sound systems, and multi-media capability, designed to be more intuitive for teachers. Quality presentation devices, i.e., interactive whiteboards, make it easier for students to see and interact with a presentation. Advanced sound systems make it easier for all children to hear the teacher, no matter where they may be seated. Our new schools are truly constructed to support 21st century learning.

## Technology and Existing Buildings

Providing a state-of-the-art technology infrastructure in older buildings is a significant challenge. Many of our buildings were constructed prior to the advent of the personal computer and, therefore, are significantly deficient of electrical capacity at both the main service and the individual classrooms. Buildings that have upgraded main power service facilities may or may not have sufficient circuits in each classroom to support more than a bare minimum configuration of technology. Adding a 3-8 computer mini-lab, interactive presentation devices, and advanced sound systems, challenges not only the available power, but often creates significant heat loads which cannot be removed by existing heating and air conditioning systems.

By using capital funds, bond proceeds, and E-Rate funds,\* we have been able to work on a multi-point upgrade program which will provide additional access to technology resources for students and faculty. Where needed and within the scope of existing funding sources, we are upgrading head-end power service facilities which will provide sufficient electrical circuits for each classroom. Data infrastructure upgrades are being handled in such a manner that will allow future upgrades to be more modular and less laborious. Occasionally, a school can allocate sufficient space for full computer labs. Where possible, air conditioning is installed to make the labs as comfortable as possible during hot summer months. Older schools are also being configured with wireless “hot spots” where students and faculty members can safely access the network, using wireless network interface cards.

Davis School District is making strides in providing cost effective technology solutions to meet the needs of students who are preparing for a 21st century world.

Further information on technology initiatives can be obtained from the Technology Services Group at 801-402-5750.

\* A federal program which provides substantial discounts to schools for purchase of networking equipment, telecommunication services, internal connections, and Internet access. The fund is partially financed through a tax on telephone bills.





## ENERGY

The District has implemented strategies (using capital funds) to install energy saving equipment in new construction projects, fund initiatives for reducing energy costs and increasing energy efficiency, and improve indoor air quality in existing schools.

### Re-Commissioning Existing Buildings

Re-commissioning is a process for detecting and diagnosing building operation faults in order for system corrections to be made. Re-commissioning is recognized as a cost-effective strategy, typically involving on-going activities for improvement. Benefits from re-commissioning range from low cost upgrades in building operations and control strategies to replacement of failed components and recommendations for future capital improvements and equipment replacements. A few of these strategies are:

- Boiler tune-up or replacement
- Caulking inspection around windows and doors
- Power upgrades
- Lighting upgrades
- Window replacement

Proper maintenance of equipment can lead to energy savings, extended equipment life, increased building comfort, and improved indoor air quality.

### New Construction Projects

Davis School District employs some of the best and most experienced architects and engineers. They take great care in determining relative merits of how building systems work together for maximum energy savings, desired indoor air quality, and ease of maintenance.

As with building construction, which must be designed to meet standards set by the International Code Council (ICC), ICC has established a code to deal with energy. When a new school is planned and designed, every effort goes into providing the building with the highest quality equipment. One criteria is to install “Energy Star\* Qualified Products” wherever possible. Energy Star Products use less energy, save money, and help protect the environment.

Further information on energy initiatives may be obtained from the Utility Services Department at 801-402-5246.

\* ENERGY STAR is a joint program of the U.S. Environmental Protection Agency and the U.S. Department of Energy helping us all save money and protect the environment through energy efficient products and practices. Further information may be found at [www.energystar.gov](http://www.energystar.gov).



## **MAINTENANCE**

The maintenance of school district facilities is managed by the Environmental Maintenance Services (EMS) Department in conjunction with the efforts of Custodial Services.

Even with the rapid growth of the District and increasing number of new facilities, the focus must remain on the preservation of existing facilities. The replacement value of these operational facilities is just under \$1.5 billion dollars.

### **Maintenance of Existing Facilities**

Recognizing the tremendous taxpayer investment that our district's facility inventory represents, processes must be in place to sustain their vitality and usefulness. Many of the maintenance practices currently employed extend the useful life of building systems well beyond industry standards. It is not uncommon for roofs to last 10 - 20 years longer than anticipated or boilers manufactured in the 1940s to still be in operation.

Recent bond initiatives allocated significant funding for projects such as boiler replacements, culinary waterline replacements, re-roofing, fire alarm upgrades, parking/asphalt upgrades, painting, energy systems control upgrades, security access, and window replacement. Many of these projects realize cost savings through energy upgrades or increased levels of safety and security for patrons and staff.

### **Work Orders**

Requests for maintenance work in schools are managed through a computer-aided work order system which is part of the District's comprehensive Encore computer system. The total number of requests approaches 30,000 annually with an upward trend that is fueled by a steady increase of new schools.

Reports generated from the Encore system are utilized by the department to manage the workload to prioritize, forecast, track, job cost, and provide data to enable accurate response to customer inquiries.

### **Small Capital Projects**

EMS staff members complete many small capital projects. These projects are designed in-house and are comprised of minor building remodels, e.g., offices and restrooms, cabinet fabrication, closed circuit television systems, fire protection systems, access control systems, and computer labs.

The department also utilizes contractual resources to perform work during peak seasons whenever these resources are more cost effective, or where specialized expertise is required. The EMS staff routinely supervise contracts for project categories such as concrete work and asphalt.

Further information may be obtained by contacting Environmental Maintenance Services at 801-402-7400.

## PROPERTY PURCHASES

Davis School District has established a Property Group to review and recommend to the Board all matters dealing with acquisition and/or disposal of real estate. The Group reviews property purchases, sales, leases, and rentals. Final decisions regarding property issues are made by the Davis School District Board of Education.

The Property Group meets weekly and is comprised of: Assistant Superintendent for Business Administration (chair), Assistant Superintendent for Support Services, Administrator of Facilities Management and Planning, Legal Issues Specialist (Staff Attorney), Director of Planning, Director of Purchasing, and Capital Assets Accountant.

The District attempts to acquire and hold (land bank) school sites sufficient for the next 20 years. The goal is to obtain large land parcels prior to developers getting into bidding wars over the few suitable sites left. School locations require large enough parcels that are generally flat, of the right shape, on an appropriate road (elementary schools can be on a road inside a development, secondary schools should be on a main road), and have the required infrastructure. Davis County still has areas without sewer systems. Storm drainage, road access, and water pressure for fire flow are some of the many other considerations. The acreage requirements for a school are generally:

High Schools	40 - 50 Acres
Junior Highs	20 - 24 Acres
Elementary	10 - 12 Acres

Close cooperation between the District and cities is mutually beneficial. If both agree on a general site location for a future school, the city can anticipate the presence of a school as they build infrastructure and permit development. Cities have included the requirement of a school for an area in either their master plan or whenever a large development is proposed.

After the potential sites are identified, they are prioritized. The highest priority is given to projects that fit into two categories: 1) sites which are needed soonest, and 2) sites which are hardest to acquire. These hard-to-acquire sites are large, with special site and infrastructure requirements (secondary schools), or are in areas with rapid development where a site may be hard to acquire now and impossible later. Occasionally, a desired parcel becomes available and is purchased sooner than anticipated. Other times, property negotiations have taken as much as eight years before a site purchase is finalized.

Property may be acquired through purchase, or if required, the process of eminent domain. Before a parcel is purchased or sold, an appraisal is required.

The duties are divided in the acquisition process so that one individual cannot unduly influence a property purchase or disposition of surplus property. Often, property acquired for a school site may not be used immediately. The Director of Purchasing is responsible for leasing vacant land or renting homes.

Further information may be obtained from the Planning Department at 801-402-5356.

## SUMMARY

Often patrons of Davis School District see only a portion of the end result of this complicated capital planning process. They may see the construction of a new school, notice a building renovation, or a site upgrade. They may have concerns over a project and wonder why it wasn't completed in the first year of a new bond. They will rarely be aware of a boiler replacement or land purchase.

From future school site identification through the opening of a new school on that site, or replacement of a water line inside a school, the process of allocating capital dollars is comprehensive. Once recommended, projects are reviewed at several steps in the process toward approval and completion:

- Initial (unconstrained project list) and Final Recommended Project List
- Bond List
- Project time phasing to match anticipated funds flow
- Annual Project List Update for following year's projects
- Project Approval
- Architect and Contractor Selection
- Architect's Cost Estimate
- Bid Award
- Change order requests
- Final cost close-out

This process balances the needs for new facilities and the maintenance of existing facilities with the fiscal responsibility to our taxpayers.

The Davis District Board of Education and District staff are committed to providing "world class" educational facilities which enhance student learning and achievement.



## Appendix A - Sample Facilities Assessment

<b>Facility Assessment Summary</b>			<b>Any School</b>		
19 June 2007			0		
			Any Street, Any Town, Utah		


Legend					
<div style="display: flex; justify-content: space-around;"> <div style="width: 30px; height: 15px; background-color: #00FF00; border: 1px solid black;"></div> <div style="width: 30px; height: 15px; background-color: #FFFF00; border: 1px solid black;"></div> <div style="width: 30px; height: 15px; background-color: #FF0000; border: 1px solid black;"></div> </div> <div style="display: flex; justify-content: space-around; font-size: small;"> <span>0-9 Years</span> <span>10-19 Years</span> <span>20-29 Years</span> </div>					

Building Information		
Project	Year	Square Feet
Original Building	1972	138,277
Classroom Addition	1977	53,861
Classroom Addition	1982	48,979
Auxiliary Gym Addition	1996	8,296
<b>Total Gross Square Feet</b>		<b>249,413</b>

Portable Information			
Portable	Year Built	Year Set	Square Feet
#256 was 1002	1982??	1995	896
#22	1979	1995	896
#222	1995	1995	1,008
#272	1999	1999	1,008
#304	2002	2002	1,008
#217	1995	2007	1,008
#82	1990	2006	1,008

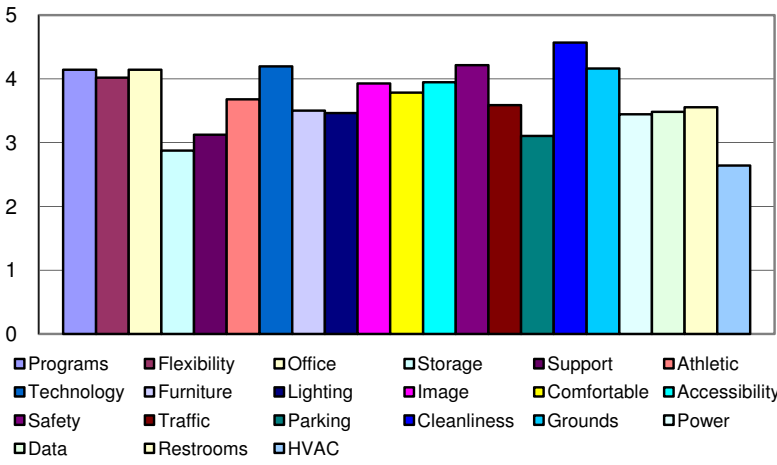

  

Site Information		
Description	Square Feet	Acres
Total Site	1,641,776	37.69
Landscaped Area	1,170,345	26.87
Asphalt Area	471,431	10.82
Total Water Shares		

Portable Information			
Portable	Year Built	Year Set	Square Feet
		<b>Total</b>	<b>6,832</b>

Facility Condition Index																													
	<table border="1" style="width: 100%; border-collapse: collapse;"> <tr> <td style="padding: 5px;">Date of Survey</td> <td style="padding: 5px;">Spring 2005</td> </tr> <tr> <td style="padding: 5px;">Replacement Value</td> <td style="text-align: right; padding: 5px;">\$46,141,405</td> </tr> <tr> <td style="padding: 5px;">Total Deficiencies</td> <td style="text-align: right; padding: 5px;">\$14,846,000</td> </tr> <tr> <td style="padding: 5px;">FCI</td> <td style="text-align: right; padding: 5px;">0.32</td> </tr> <tr> <td style="padding: 5px;">Total Summary Score</td> <td style="text-align: right; padding: 5px;">67.98</td> </tr> <tr> <td style="padding: 5px;">Summary Average</td> <td style="text-align: right; padding: 5px;">3.24</td> </tr> <tr> <td style="padding: 5px;">Base Building Capacity</td> <td style="text-align: right; padding: 5px;">1159</td> </tr> <tr> <td style="padding: 5px;">Capacity w/Portables</td> <td style="text-align: right; padding: 5px;">1449</td> </tr> <tr> <td style="padding: 5px;">Extended Capacity</td> <td style="text-align: right; padding: 5px;">1533</td> </tr> </table> <table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th colspan="2" style="text-align: left; padding: 5px;">Facility Improvement Fund</th> </tr> </thead> <tbody> <tr> <td style="padding: 5px;">Facility Base</td> <td style="text-align: right; padding: 5px;">\$12,563</td> </tr> <tr> <td style="padding: 5px;">Enrollment Base</td> <td style="text-align: right; padding: 5px;">\$16,594</td> </tr> <tr> <td style="padding: 5px;">Enrollment Oct 2007</td> <td style="text-align: right; padding: 5px;">1,341</td> </tr> <tr> <td style="padding: 5px;">Total FIF Allocated 06-07</td> <td style="text-align: right; padding: 5px;">\$17,043</td> </tr> </tbody> </table>	Date of Survey	Spring 2005	Replacement Value	\$46,141,405	Total Deficiencies	\$14,846,000	FCI	0.32	Total Summary Score	67.98	Summary Average	3.24	Base Building Capacity	1159	Capacity w/Portables	1449	Extended Capacity	1533	Facility Improvement Fund		Facility Base	\$12,563	Enrollment Base	\$16,594	Enrollment Oct 2007	1,341	Total FIF Allocated 06-07	\$17,043
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Enrollment Base	\$16,594																												
Enrollment Oct 2007	1,341																												
Total FIF Allocated 06-07	\$17,043																												

# Facility Assessment Summary

Any School

Utility Costs			
School Year	Total Cost	Cost/SF	Δ%
2000-01	\$237,189	\$0.95	
2001-02	\$230,953	\$0.93	-2.63%
2002-03	\$236,589	\$0.95	2.44%
2003-04	\$256,449	\$1.03	8.39%
2004-05	\$273,169	\$1.10	6.52%
2005-06	\$317,951	\$1.27	16.39%
2006-07	\$281,382	\$1.13	-11.50%
2007-08			

Custodial Cost			
School Year	Total Cost	Cost/SF	Δ%
2000-01	\$ 290,591	\$1.17	0
2001-02	\$ 267,812	\$1.07	-7.84%
2002-03	\$ 294,773	\$1.18	10.07%
2003-04	\$ 322,636	\$1.29	9.45%
2004-05	\$ 330,697	\$1.33	2.50%
2005-06	\$ 300,607	\$1.21	-9.10%
2006-07	\$ 297,551	\$1.19	-1.02%
2007-08			

Other Building Projects and Renovations					
Year	Project		Year	Project	
1995	Building Addition		2004	ADA Ramp	
1996	Re-Roof (66,693 sq. ft.)		2005	Softball Field Renovation - Title IX	
1997	Re-Carpet Corridors		2005	Property Sold to Murcock Chevrolet	
1997	Re-Roof (91,737 sq. ft.)		2006	Team Room Upgrade (lights, benches)	
1998	Fire Alarm Replacement		2006	CCTV Added on Football Field	
1998	Front Landscaping		2006	Drivers Range Re-Worked/Striped	
2000	Counseling Center Remodel		2007	Fume Hood from North Davis Jr.	
2001	Tennis Courts		2007	Athletic Turf on Football Field	
2003	Sawdust Collection Sys. Renovation		2007	Gym Floors Refinished	
2003	Power Upgrade		2007	Greenhouse New Concret Walls/Gravel	
2003	Soffit Replaced Around Auditorium		2007	Data Upgrade	
2003	Principal's Office Renovation		2007	HVAC Renovation	
2003	Track Renovation		2007	Asbestos Abatement w/HVAC Ren.	
2003	Boys Locker Room Floor		2007	Lighting Upgrade	
2003	Re-Roof (53,789 sq. ft.)		2007	Football Field Visitors Bleachers Repl.	
2003	Computer Lab & Shop Re-Roof				



## Data Sheet

## Any School

Site Systems					
No.	Install	Item	Model	Size	Remarks
	1999	Irrigation System	Rainbird Maxicom		
1	1999	Play Equipment K-3	Little Tykes		
1	1999	Play Equipment 3-6	Little Tykes		
	1999	Asphalt - Parking			
	1999	Asphalt - Playground			
	1999	Fencing			
	1999	Landscaping			
Architectural Systems					
No.	Install	Item	Model	Size	Remarks
	1999	Roof	Sarnafil - Single Ply	72,000 sf	
	1999	Exterior Walls	Concrete Block		
	1999	Carpet	Lees Faculty IV	India Ink 4247	
18	1999	Lunchroom Tables	Midwest - Round		
Mechanical Systems					
No.	Install	Item	Model	Size	Remarks
1	1998	Water Boiler - Bryan	AB200WFDG	HP 70.7	Ser. #82894 (U23496), ATC Barber Cole
1	1998	Water Boiler - Bryan	AB200WFDG	HP 70.7	Ser. #82895 (U23495), ATC Barber Cole
Electrical Systems					
No.	Install	Item	Model	Size	Remarks
1	1999	Electrical Service	Siemans	1200 amp	480V 277V
1	1999	Emergency Generator	Onan Genset		
1	1999	Fire Alarm	FCI 7200	V5.007	
1	1999	Bell System	Rauland	MCZ300 2524	
1	1999	Sound System	Rauland	MCZ300	
1	1999	Phone System	Vodavi		
1	1999	Energy System	Barber Colman	Siebe	
1	1999	Security System	CSI	Maxsys	
1	1999	Keying System	CSI	Maxsys	

# Deficiency List

# Any High School

Site Issues					
Deficiencies	Date	Rating	Priority	Anticipated	Estimate
New Parking - Improve Access	7/01	4.5	1		\$250,000
Resurface Parking Lots	2/04				\$500,000
Automate Sprinklers Main Bldg. N. Side & D Bldg.	2/04				\$60,000
Sprinkler Renovation on the Practice Field	2/04				\$100,000
Planting Renovation Along South Side	2/04				\$50,000
Resurface Track	2/04			2007	\$175,000
West Parking North of Auditorium - Reconstruction	7/04				\$83,000
Driver's Ed Range & Parking - Reconstruction	7/04				\$95,180

Risk Management / Health / Safety / Security / ADA Issues					
Deficiencies	Date	Rating	Priority	Anticipated	Estimate
Auditorium Curtains & Riggings (See Master Plan)	11/04			BOND	\$30,000
CCTV Installed (Closed Circuit Television)	2/06		1	BOND	\$30,000

Educational Program Issues					
Deficiencies	Date	Rating	Priority	Anticipated	Estimate
Bleacher Seats Replaced & Bracing Renovated	2/04				\$150,000
Crown FB Field & Replace Visitor Side Bleachers	2/04				\$150,000
Master Plan Including HVAC, Asbestos "C" Bldg. High Priority	2/06		HIGH	BOND	\$6,120,000

HVAC / Plumbing / Electrical / Energy Issues					
Deficiencies	Date	Rating	Priority	Anticipated	Estimate
Upgrade Building Controls	7/01	4.1	3	BOND	\$350,000
Move Marquee to North West Corner if the Property	2/04				\$10,000
Fire Alarm System Renovation (See Rebuild)	2/04			BOND	\$300,000

Architectural / Structural / Aesthetic Issues					
Deficiencies	Date	Rating	Priority	Anticipated	Estimate
Seal Floor in Welding Shop	7/01	5.4	1	2002	\$3,500
Carpet Replaced Throughout	2/04				\$400,000
Auto Shop Renovation	2/04				\$50,000
Locker Room Carpet	2/04				\$25,000
Storage Shed (30 x 60 Expanded)	2/04				\$60,000
Home Economics Remodeled	2/04				\$50,000
Seismic Upgrades	2/04			2028	\$20,000,000
Art Department Remodeled	2/04				\$50,000
Auditorium and Stage Upgrade	2/04				\$300,000

Communications / Technology Issues					
Deficiencies	Date	Rating	Priority	Anticipated	Estimate
Replace Sound System in Both Gyms	2/04				\$14,000
Data Upgrade	2/04				\$350,000

Legend		
Priority 1	Immediate	Currently Critical - Correct cited safety hazard - Stop accelerated deterioration - Return facility to operation
Priority 2	Year 1	Potentially Critical - Intermittent operations - Rapid deterioration - Potential life safety hazard
Priority 3	Years 2-5	Necessary - Not critical - Predictable deterioration - Potential downtime - Damage if deferred further
Priority 4	Years 6-10	Recommended - Sensible improvement - Improve overall usability - Reduce long term maintenance
Priority 5		Does not meet current codes or "Grandfathered" - No action required at this time - Correct in the future

5/16/2007

## Utility Costs

## Any Elementary

School Year 1999-2000								
Month	Electrical	Gas	Water	Irrigation	Sewer	Garbage	Storm	Total
Jul	\$612	\$9	\$24		\$11	(\$11)		\$644
Aug	\$1,172	\$91	\$40		\$11	\$202		\$1,515
Sep	\$402	\$124	\$15		\$17	\$0		\$558
Oct	\$1,314	\$142	\$48		\$41	\$202		\$1,747
Nov	\$1,531	\$725	\$55		\$45	\$202		\$2,558
Dec	\$1,468	\$1,044	\$48		\$43	\$155		\$2,757
Jan	\$1,444	\$1,289	\$47		\$42	\$202		\$3,023
Feb	\$1,461	\$954	\$47		\$41	\$202		\$2,704
Mar	\$1,520	\$876	\$51		\$42	\$205		\$2,694
Apr	\$1,371	\$383	\$45		\$40	\$204		\$2,043
May	\$1,214	\$35	\$39		\$42	\$204		\$1,535
Jun	\$887	\$67	\$116		\$40	\$3		\$1,113
<b>Totals</b>	<b>\$14,397</b>	<b>\$5,738</b>	<b>\$576</b>	<b>\$0</b>	<b>\$414</b>	<b>\$1,767</b>	<b>\$0</b>	<b>\$22,893</b>
School Year 2000-2001								
Month	Electrical	Gas	Water	Irrigation	Sewer	Garbage	Storm	Total
Jul	\$705	\$51	\$199		\$43			\$998
Aug	\$1,162	\$96	\$42		\$42			\$1,342
Sep	\$1,564	\$150	\$55		\$40			\$1,809
Oct	\$1,680	\$398	\$51		\$25			\$2,155
Nov	\$1,514	\$1,206	\$36		\$20			\$2,776
Dec	\$1,730	\$1,385	\$45		\$25			\$3,185
Jan	\$2,257	\$1,787	\$60		\$33			\$4,137
Feb	\$1,936	\$1,867	\$47		\$26			\$3,876
Mar	\$1,988	\$1,307	\$43		\$28			\$3,365
Apr	\$1,770	\$831	\$32		\$25			\$2,658
May	\$1,569	\$266	\$40		\$26			\$1,902
Jun	\$1,232	\$113	\$26		\$27			\$1,398
<b>Totals</b>	<b>\$19,107</b>	<b>\$9,456</b>	<b>\$678</b>	<b>\$0</b>	<b>\$359</b>	<b>\$0</b>	<b>\$0</b>	<b>\$29,600</b>
School Year 2001-2002								
Month	Electrical	Gas	Water	Irrigation	Sewer	Garbage	Storm	Total
Jul	\$699	\$102	\$26		\$34		\$95	\$956
Aug	\$498	\$123	\$26		\$30	\$226	\$80	\$983
Sep	\$481	\$185	\$31		\$26	\$451	\$67	\$1,241
Oct	\$3,832	\$378	\$57		\$35	\$123	\$128	\$4,553
Nov	\$1,605	\$971	\$46		\$24	\$19	\$87	\$2,752
Dec	\$2,126	\$1,758	\$51		\$27		\$97	\$4,059
Jan	\$2,132	\$1,507	\$39		\$25	\$457	\$92	\$4,252
Feb	\$1,572	\$1,127	\$20		\$19	\$184	\$69	\$2,991
Mar	\$960	\$1,123	\$18		\$14	\$184	\$51	\$2,350
Apr	\$1,295	\$601	\$25		\$18	\$184	\$64	\$2,187
May	\$1,564	\$162	\$31		\$24	\$184	\$87	\$2,052
Jun	\$1,212	\$140	\$26		\$26		\$95	\$1,499
<b>Totals</b>	<b>\$17,976</b>	<b>\$8,177</b>	<b>\$396</b>	<b>\$0</b>	<b>\$302</b>	<b>\$2,012</b>	<b>\$1,012</b>	<b>\$29,875</b>

## Utility Costs

## Any Elementary

School Year 2002-2003								
Month	Electrical	Gas	Water	Irrigation	Sewer	Garbage	Storm	Total
Jul	\$937	\$92	\$27	\$0	\$32	\$61	\$100	\$1,249
Aug	\$1,336	\$105	\$30	\$0	\$30	\$127	\$92	\$1,720
Sep	\$1,758	\$199	\$36	\$0	\$29	\$184	\$88	\$2,294
Oct	\$2,018	\$713	\$34	\$0	\$32	\$171	\$96	\$3,064
Nov	\$2,027	\$1,017	\$25	\$0	\$31	\$89	\$90	\$3,279
Dec	\$1,970	\$1,347	\$23	\$0	\$30	\$92	\$85	\$3,547
Jan	\$2,017	\$1,076	\$24	\$0	\$30	\$184	\$87	\$3,418
Feb	\$1,991	\$1,285	\$24	\$0	\$30	\$184	\$87	\$3,601
Mar	\$2,034	\$1,236	\$53	\$0	\$31	\$362	\$92	\$3,808
Apr	\$1,793	\$786	\$85	\$0	\$30	\$184	\$87	\$2,965
May	\$1,899	\$514	\$45	\$0	\$34	\$53	\$100	\$2,645
Jun	\$1,183	\$163	\$31	\$0	\$31	\$31	\$90	\$1,529
<b>Totals</b>	<b>\$20,963</b>	<b>\$8,533</b>	<b>\$437</b>	<b>\$0</b>	<b>\$370</b>	<b>\$1,722</b>	<b>\$1,094</b>	<b>\$33,119</b>

School Year 2003-2004								
Month	Electrical	Gas	Water	Irrigation	Sewer	Garbage	Storm	Total
3-Jul	\$697	\$107	\$25	\$0	\$31	\$207	\$90	\$1,157
3-Aug	\$1,301	\$136	\$41	\$0	\$31	\$197	\$90	\$1,796
3-Sep	\$1,718	\$189	\$58	\$0	\$28	\$197	\$82	\$2,272
3-Oct	\$2,037	\$292	\$35	\$0	\$29	\$197	\$104	\$2,694
3-Nov	\$2,056	\$1,493	\$26	\$0	\$26	\$139	\$94	\$3,834
3-Dec	\$1,915	\$1,589	\$24	\$0	\$24	\$195	\$88	\$3,835
4-Jan	\$1,726	\$1,883	\$21	\$0	\$26	\$197	\$77	\$3,930
4-Feb	\$1,930	\$1,520	\$25	\$0	\$30	\$197	\$90	\$3,792
4-Mar	\$2,323	\$1,406	\$37	\$0	\$32	\$168	\$96	\$4,062
4-Apr	\$1,559	\$848	\$56	\$0	\$24	\$196	\$70	\$2,753
4-May	\$2,516	\$253	\$40	\$0	\$30	\$134	\$126	\$3,099
4-Jun	\$1,448	\$139	\$30	\$0	\$5	\$74	\$85	\$1,781
<b>Totals</b>	<b>\$21,226</b>	<b>\$9,855</b>	<b>\$418</b>	<b>\$0</b>	<b>\$316</b>	<b>\$2,098</b>	<b>\$1,092</b>	<b>\$35,005</b>

School Year 2004-2005								
Month	Electrical	Gas	Water	Irrigation	Sewer	Garbage	Storm	Total
Jul 04	\$1,109	\$107	\$30	\$130	\$2	\$180	\$98	\$1,656
Aug 04	\$1,755	\$166	\$37	\$130	\$2	\$216	\$90	\$2,396
Sept 04	\$2,012	\$84	\$43	\$126	\$26	\$217	\$58	\$2,566
Oct 04	\$2,062	\$563	\$34	\$130	\$68	\$189	\$27	\$3,073
Nov 04	\$1,803	\$1,863	\$23	\$126	\$0	\$216	\$77	\$4,108
Dec 04	\$2,353	\$1,189	\$29	\$130	\$0	\$217	\$97	\$4,015
Jan 05	\$2,773	\$1,851	\$28	\$141	\$5	\$217	\$93	\$5,108
Feb 05	\$2,347	\$1,733	\$27	\$132	\$5	\$216	\$91	\$4,551
Mar 05	\$2,381	\$1,762	\$61	\$274	\$5	\$187	\$94	\$4,764
Apr 05	\$2,100	\$1,283	\$143	\$9	\$5	\$216	\$84	\$3,840
May 05	\$2,339	\$512	\$96	\$0	\$5	\$136	\$102	\$3,190
Jun 05	\$1,646	\$124	\$33	\$0	\$5	\$69	\$89	\$1,966
<b>Totals</b>	<b>\$24,680</b>	<b>\$11,237</b>	<b>\$584</b>	<b>\$1,328</b>	<b>\$128</b>	<b>\$2,276</b>	<b>\$1,000</b>	<b>\$41,233</b>

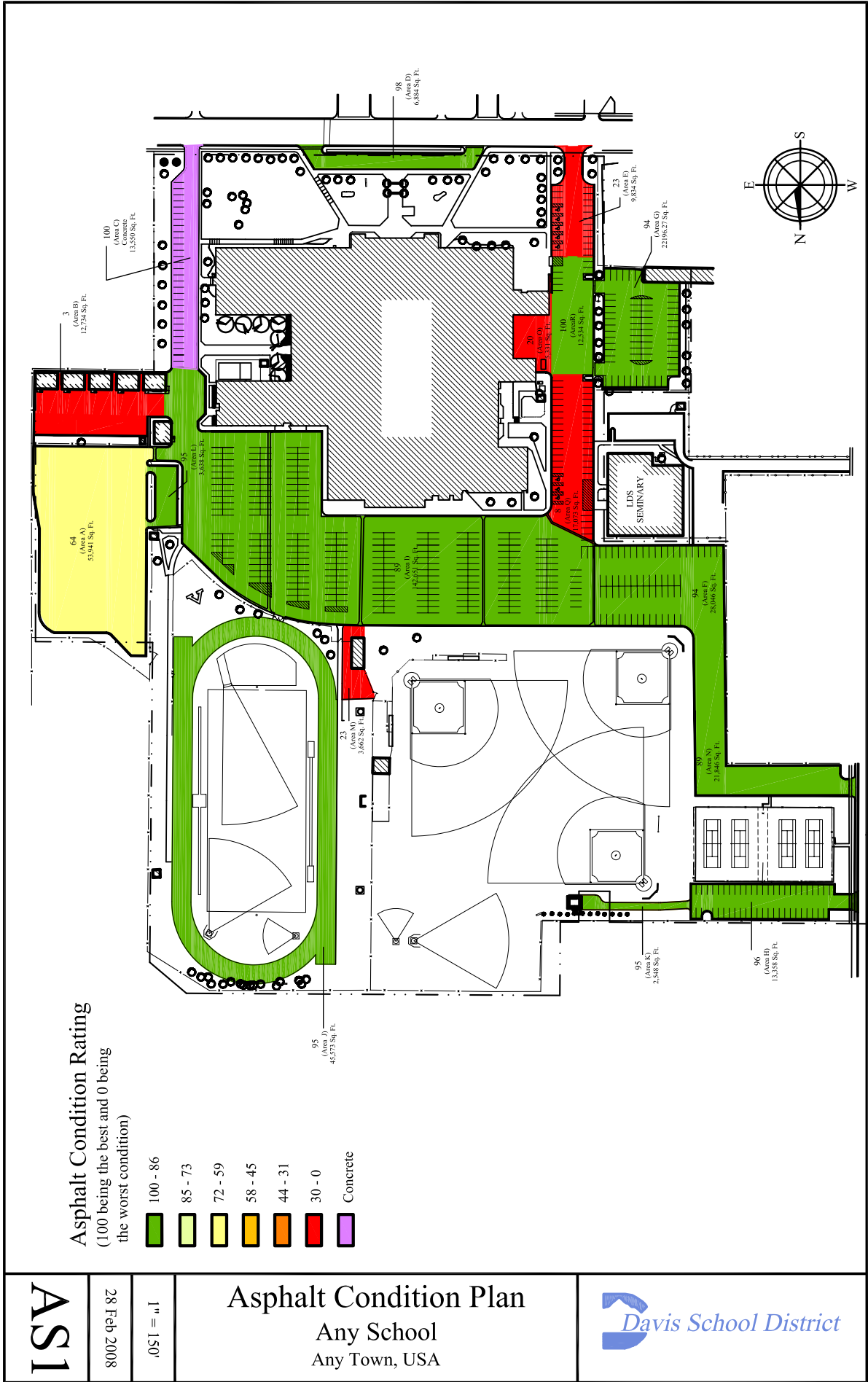
## Utility Costs

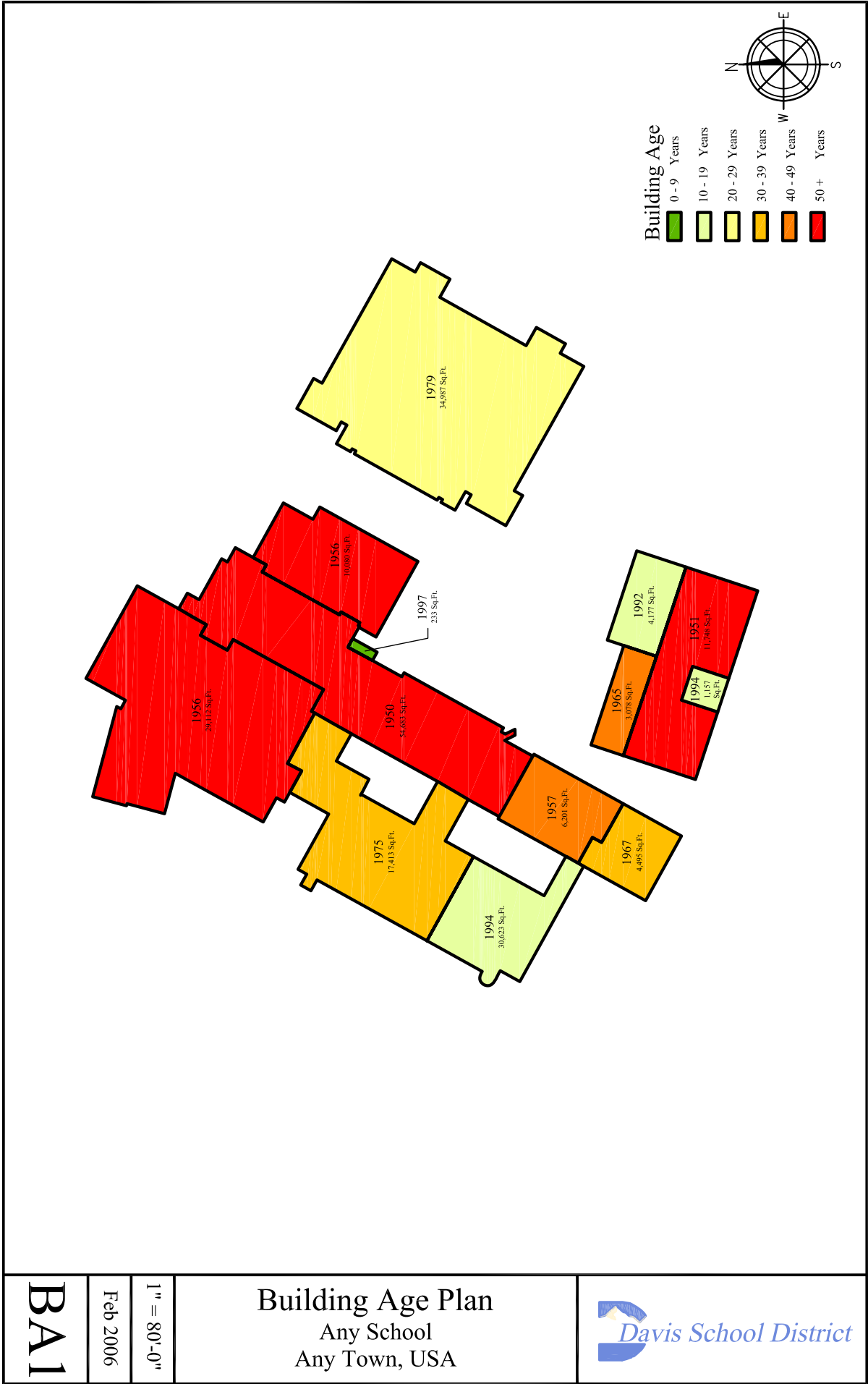
## Any Elementary

School Year 2005-2006								
Month	Electrical	Gas	Water	Irrigation	Sewer	Garbage	Storm	Total
5-Jul	\$1,242	\$97	\$26	\$0	\$5	\$182	\$85	\$1,637
5-Aug	\$1,970	\$135	\$28	\$0	\$5	\$113	\$93	\$2,344
5-Sep	\$2,107	\$163	\$27	\$0	\$5	\$107	\$90	\$2,499
5-Oct	\$2,152	\$267	\$35	\$0	\$5	\$321	\$108	\$2,888
5-Nov	\$2,098	\$2,794	\$27	\$0	\$5	\$114	\$89	\$5,127
5-Dec	\$2,227	\$2,801	\$29	\$0	\$100	\$214	\$96	\$5,467
6-Jan	\$2,003	\$3,491	\$26	\$0	\$34	\$117	\$57	\$5,728
6-Feb	\$1,919	\$2,782	\$23	\$0	\$67	\$103	\$13	\$4,907
6-Mar	\$2,234	\$2,750	\$30	\$0	\$5	\$183	\$99	\$5,301
6-Apr	\$2,176	\$1,495	\$29	\$0	\$32	\$216	\$71	\$4,019
6-May	\$1,989	\$447	\$28	\$0	\$70	\$140	\$27	\$2,701
6-Jun	\$1,590	\$74	\$28	\$0	\$5	\$77	\$92	\$1,866
Totals	\$23,707	\$17,296	\$336	\$0	\$338	\$1,887	\$920	\$44,484





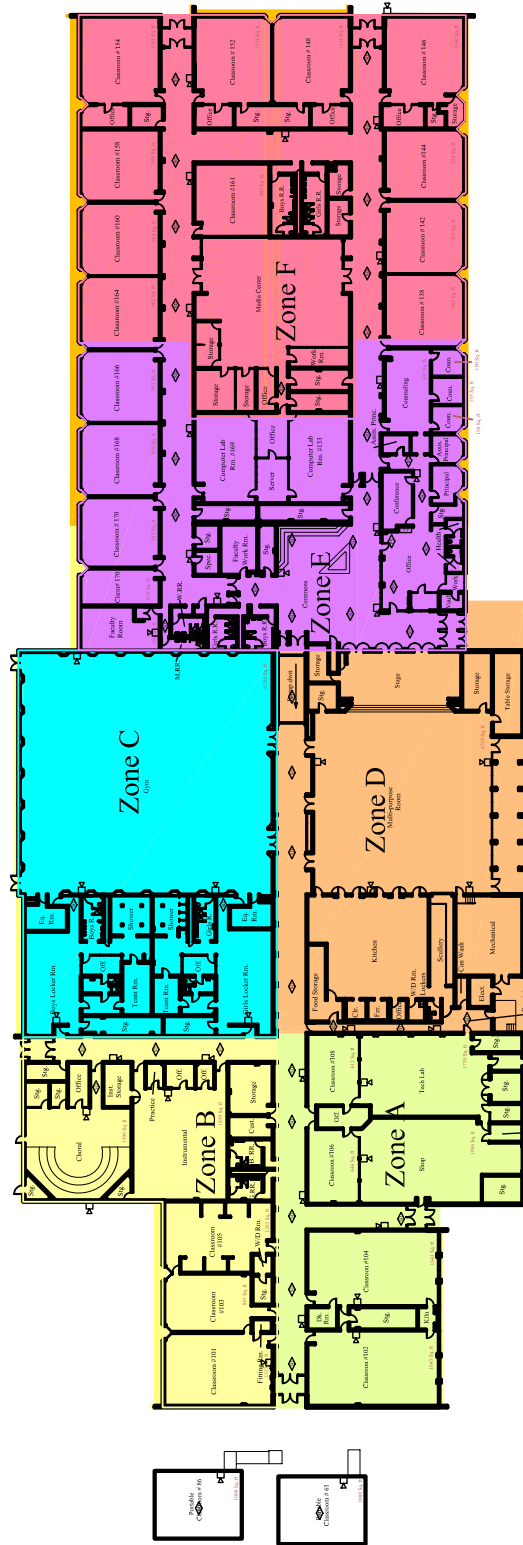






# Emergency Protection Plan

Any School  
Anytown, USA



## Legend

- Fire Alarm Control Panel
- Fire Alarm Annunciator
- ◇ Fire Alarm Horn
- ◇ Fire Alarm Strobe
- ◇ Fire Alarm Pull Station
- ◇ Fire Alarm Smoke Detector
- ◇ Fire Alarm Duct Detector
- ◇ Fire Alarm Heat Detector
- ◇ Fire Alarm Portable Fire Extinguisher
- ◇ Fire Alarm Water Shutoff
- ◇ Fire Alarm Electric Shutoff
- ◇ Fire Alarm Natural Gas Shutoff
- ◇ Fire Alarm Roof Access
- ◇ Fire Alarm Fire Alarm Control Panel
- ◇ Fire Alarm Fire Alarm Annunciator

# Roofing Schedule

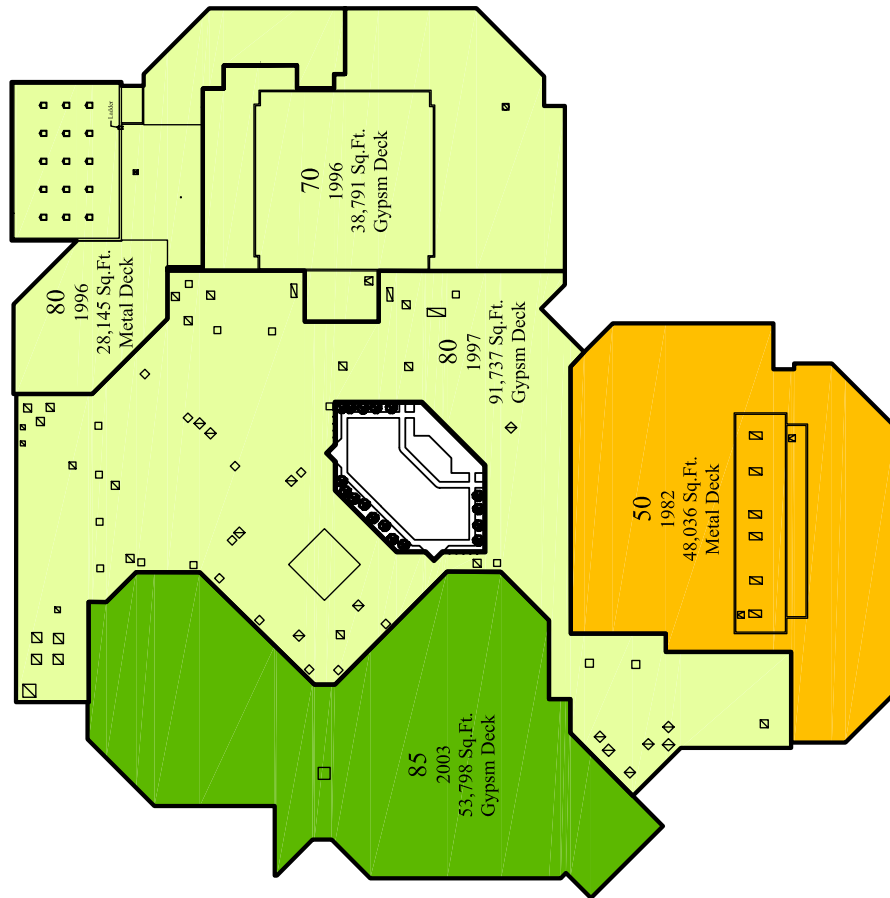
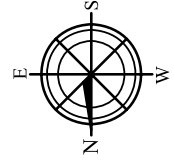
85 - 100	Rating
70 - 84	Rating
55 - 69	Rating
40 - 54	Rating
20 - 39	Rating
0 - 19	Rating

## Roof Types

Built-up
Shingle
Metal
Built-up with slag
PVC
Single Ply Hypalon
Single Ply EPDM
Single Ply Sarnafil

## Roofing Legend

Exhaust Fan
Swamp Cooler
Skylight
Roof Access
Mechanical Unit
Hood



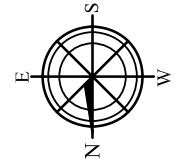
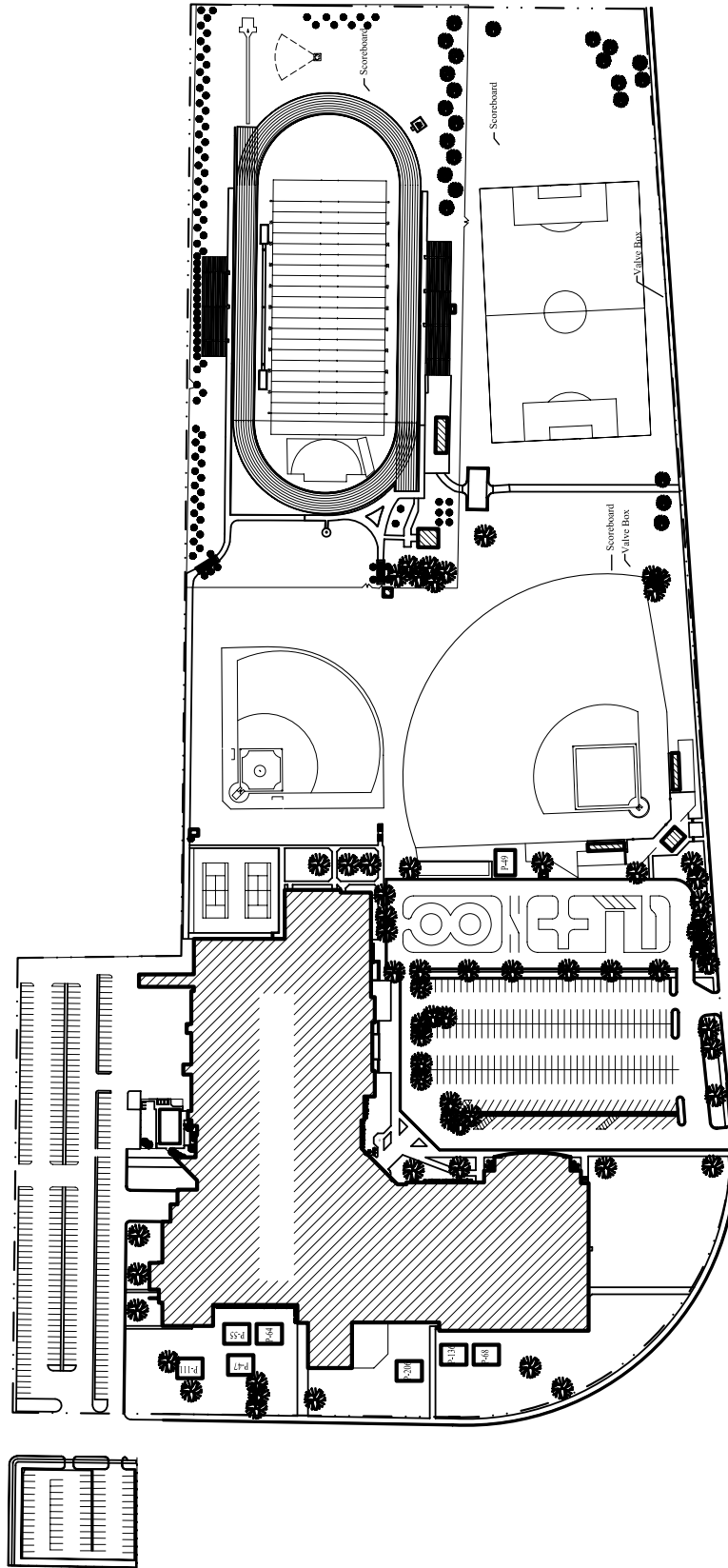
R1

June 2005

1" = 80'-0"

Roof Plan  
Any School  
Any Town, USA





S1

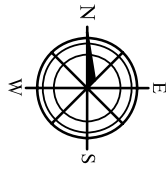
Dec 2005

1" = 160'

# Site Plan Any School Any Town, USA







Portable Classroom

Portable Classroom 3rd Grade

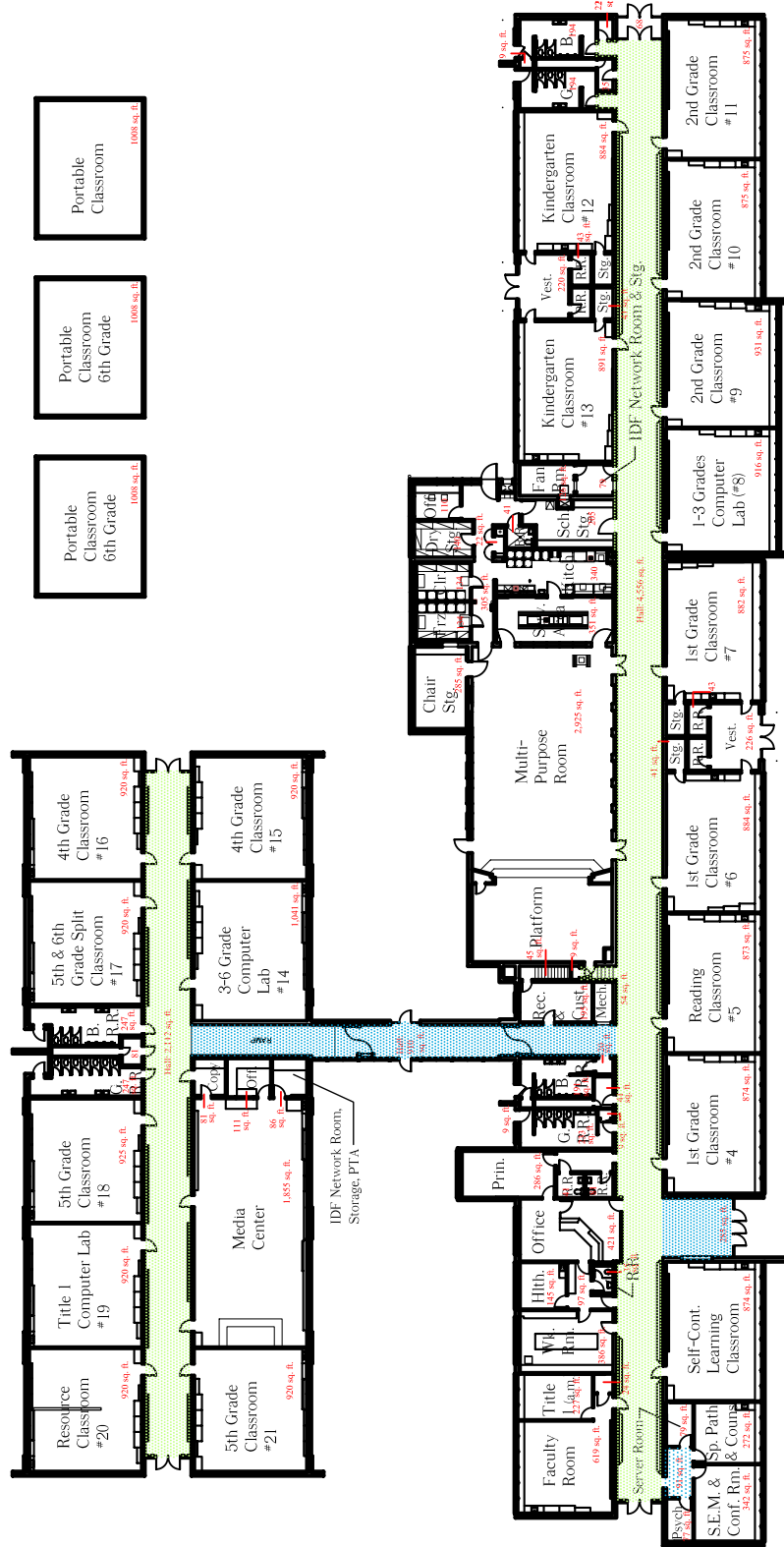
Portable Classroom 3rd Grade

Portable Classroom 3rd & 4th Grade Split

Portable Classroom

Portable Classroom 6th Grade

Portable Classroom 6th Grade



SF1

21Feb 2008

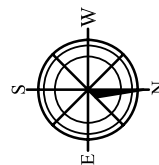
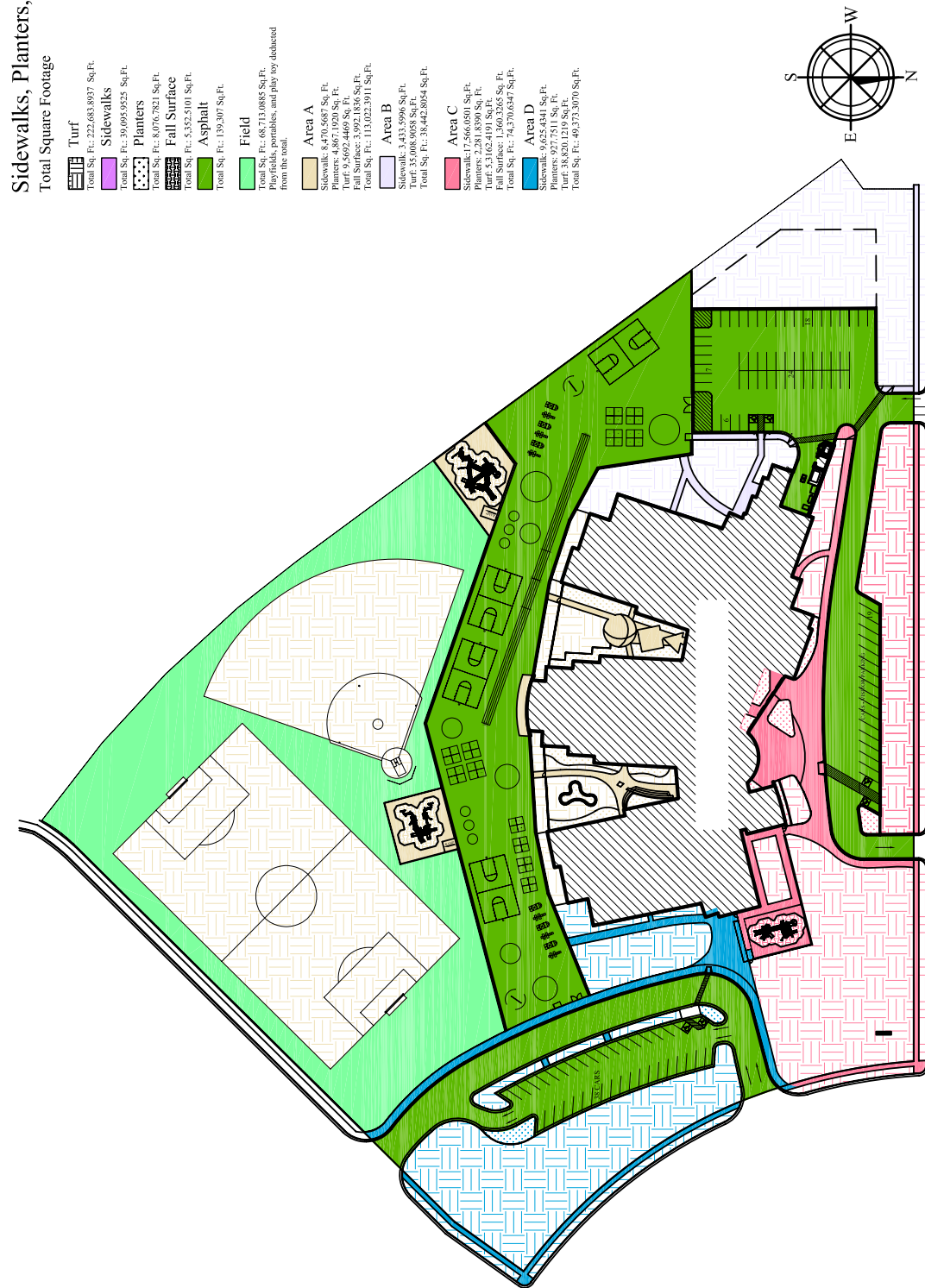
1" = 30'-0"

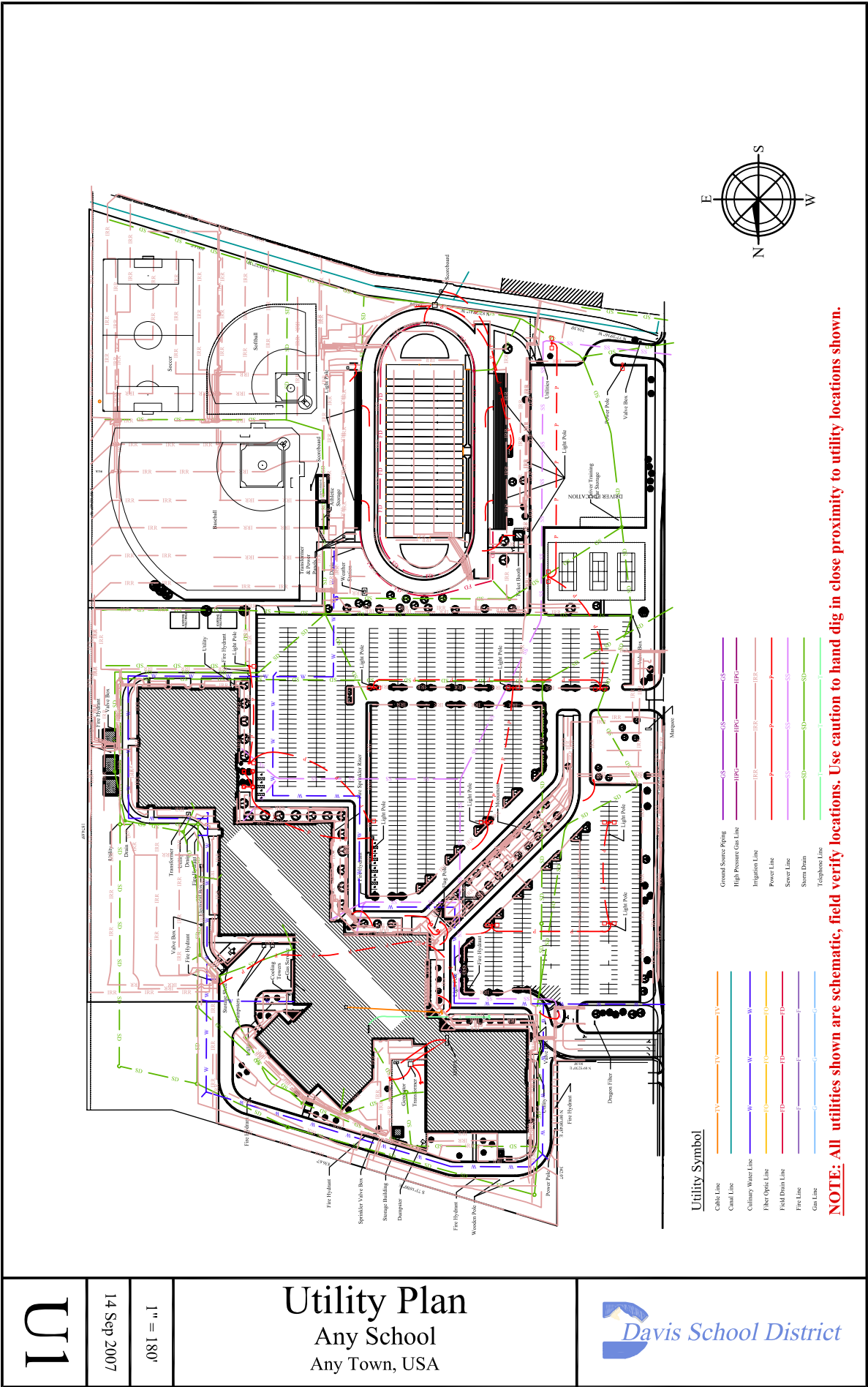
# Square Footage Plan Any Elementary School Anytown, USA



# Surface Site Plan

Any School  
Anytown, USA





**NOTE:** All utilities shown are schematic, field verify locations. Use caution to hand dig in close proximity to utility locations shown.



Appendix B - Sample School Enrollment Data

4/3/08

SAMPLE Elementary

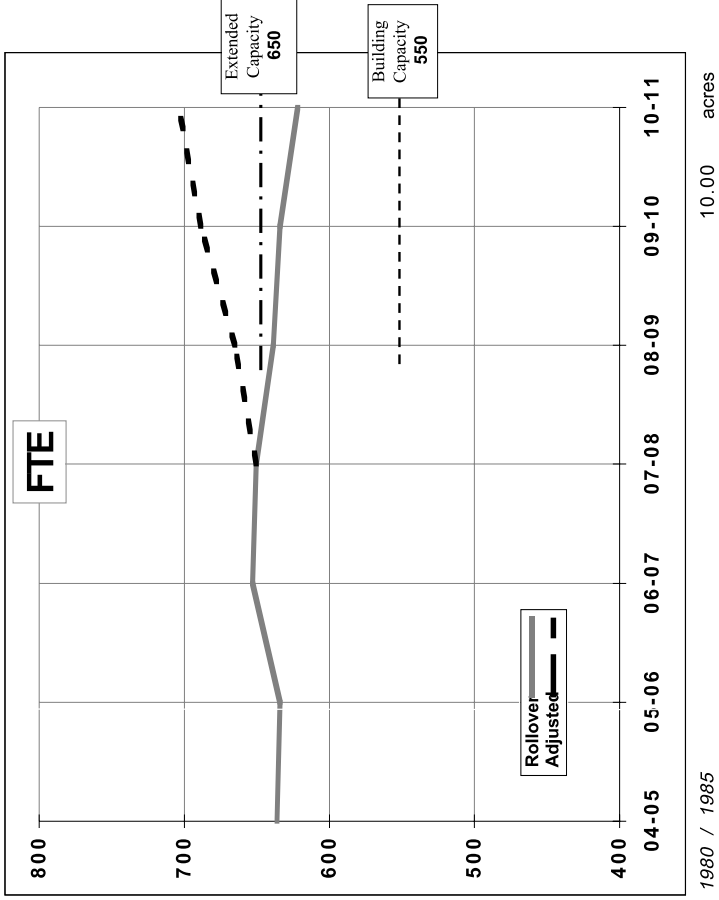
Traditional

1 Oct Count

SY	K	1st	2nd	3rd	4th	5th	6th	HC	FTE	RO Proj	1-6	Appr/Vars	Charter (1-6th)	S ?	%?
04-05	102	101	95	85	92	111	101	687	636	570	585	7	4	12	2.11%
05-06	90	101	108	92	88	92	108	679	634	586	589	0	7	10	1.71%
06-07	92	95	111	103	99	95	104	699	653	571	607	-1	0	37	6.48%
07-08	89	90	98	108	110	99	101	695	651	595	606	-1	0	12	2.02%
08-09	93	89	90	96	108	110	99	685	639						
09-10	100	93	89	88	96	108	110	684	634						
10-11	100	100	93	87	88	96	108	672	622						

Note 1	HC = Sum of K-6
Note 2	FTE = Sum of 1-6 plus one-half of K
Note 3	RO Proj = Sum of PREVIOUS year's K-5 used to project next year's 1-6 population
Note 4	1-6 = Sum of current year 1-6
Note 5	Approved Variances (1st - 6th) - in migration by students living out of bounds or out migration to another school
Note 6	Accounts for out-migration to Charter Schools (1st - 6th only) in current year only
Note 7	= Difference between projected 1-6 population from previous K-5 RO and actual 1-6 population - adjusted for variances
Note 8	% = Percentage change showing either growth or out-migration

Adjusted for growth ^	HC	FTE
08-09	714	665
09-10	743	688
10-11	760	704









**Elementary School**  
**Example Elementary**  
 Address, City, State, Zip

**Project Information Sheet**

Date	Capital Planning Approval
------	---------------------------

Date

<b>Architect</b>	A/E Fee %	4.50%	Program Number	####
Address, City, State, Zip, Phone	Square Footage	72,678	Funding Source	Bond 2006
Date	Board of Education Approval	Price / Square Foot	\$168.68	
<b>Contractor</b>	Bid Amount	\$12,259,430	Bid Opening	Date
Address, City, State, Zip, Phone	Contract Amount	\$12,557,554	Notice to Proceed	Date
Date	Board of Education Approval	Retainage	\$0	Substantial Comp
				Date

Code	Description	Preliminary Estimate	Projected Costs	Amount Paid	Percent Complete
<b>330</b>	<b>Consultant</b>				
330.1	Architect / Engineer Fees	\$517,500	\$551,674	\$549,378	100%
	Fee Adjustments	\$16,301	\$17,378		
330.2	Printing	\$10,000	\$10,000	\$7,325	73%
330.3	Additional Services	\$0	\$0	\$0	100%
330.4	Value Engineering	\$0	\$0	\$0	100%
330.5	Soils Engineering	\$7,500	\$5,000	\$4,400	88%
330.6	Survey / Civil Engineering	\$30,000	\$35,000	\$34,562	99%
330.7	Construction Testing	\$35,000	\$35,000	\$34,233	98%
330.8	Geoeexchange Engineering	\$15,000	\$14,000	\$14,000	100%
	<b>Consultant Total</b>	<b>\$631,301</b>	<b>\$668,052</b>	<b>\$643,898</b>	<b>96%</b>
<b>460</b>	<b>Contractor</b>				
460.1	Estimate / Bid	\$11,500,000	\$12,259,430	\$12,752,349	104%
460.2	Change Orders	\$345,000	\$367,783	\$298,124	81%
460.3	Miscellaneous Contingency	\$17,250	\$18,389	\$720	4%
	<b>Contractor Total</b>	<b>\$11,862,250</b>	<b>\$12,645,602</b>	<b>\$12,753,069</b>	<b>101%</b>
<b>690</b>	<b>Direct Purchases</b>				
690.1	Carpet	\$96,904	\$96,904	\$95,062	98%
690.2	Blinds	\$5,000	\$5,000	\$3,687	74%
690.3	Utilities	\$15,000	\$15,000	\$13,045	87%
690.4	Impact Fees	\$25,000	\$25,000	\$23,000	92%
690.5	Asbestos Abatement	\$0	\$0	\$0	100%
	<b>Direct Purchases Total</b>	<b>\$141,904</b>	<b>\$141,904</b>	<b>\$134,794</b>	<b>95%</b>
<b>733</b>	<b>Furniture Fixtures &amp; Equipment</b>				
733.1	Furnishings	\$375,000	\$375,000	\$348,862	93%
733.2	Custodial Setup	\$45,000	\$45,000	\$36,275	81%
740.0	Computer Equipment	\$400,000	\$400,000	\$359,921	90%
750.0	Text Books and Supplies	\$300,000	\$300,000	\$266,861	89%
	<b>FF&amp;E Total</b>	<b>\$1,120,000</b>	<b>\$1,120,000</b>	<b>\$1,011,919</b>	<b>90%</b>
	<b>GRAND TOTAL</b>	<b>\$13,755,455</b>	<b>\$14,575,558</b>	<b>\$14,543,680</b>	<b>100%</b>

4/18/2008



## Appendix D - Donor Project Form

DAVIS SCHOOL DISTRICT  
Farmington, Utah  
1/29/07

# DONOR FUNDED SCHOOL CONSTRUCTION PROJECT APPLICATION FORM

DATE \_\_\_\_\_

LOCATION OF PROJECT \_\_\_\_\_

BRIEF DESCRIPTION OF PROJECT \_\_\_\_\_

\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

### Contact Persons:

**Donor Representative:** \_\_\_\_\_  
\_\_\_\_\_  
Phone Number: \_\_\_\_\_  
\_\_\_\_\_  
Address: \_\_\_\_\_  
\_\_\_\_\_  
Email Address: \_\_\_\_\_

**School Representative:** \_\_\_\_\_  
\_\_\_\_\_  
Phone Number: \_\_\_\_\_  
\_\_\_\_\_  
Address: \_\_\_\_\_  
\_\_\_\_\_  
Email Address: \_\_\_\_\_

**District Representative:** \_\_\_\_\_  
\_\_\_\_\_  
Phone Number: \_\_\_\_\_  
\_\_\_\_\_  
Address: \_\_\_\_\_  
\_\_\_\_\_  
Email Address: \_\_\_\_\_

**Other Representative:** \_\_\_\_\_  
\_\_\_\_\_  
Phone Number: \_\_\_\_\_  
\_\_\_\_\_  
Address: \_\_\_\_\_  
\_\_\_\_\_  
Email Address: \_\_\_\_\_

\_\_\_\_\_

### Expected Start and Finish Dates:

Start Date: \_\_\_\_\_  
Finish Date: \_\_\_\_\_

## FUNDING

Method of Funding:

Donor Amount:	\$ _____
School Amount:	\$ _____
School District Amount:	\$ _____
Other Funding:	\$ _____
<b>Total Expected Cost:</b>	<b>\$ _____</b>

Labor donation or expectations with brief description of labor needed by entity listed:

Donor: \_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

School: \_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

District: \_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

Other: \_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

**Expected Value of labor for tax purposes**      \$ \_\_\_\_\_

Material / Professional Services donations or expectations with brief description:

Donor: \_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

School: \_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

District: \_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

Other: \_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

**Expected Value of material/professional services for tax purposes**      \$ \_\_\_\_\_

Will Funding flow through the Davis School District Foundation?      Yes \_\_\_\_\_ No \_\_\_\_\_

How will payments be made? Will project be bonded or cash deposit? Are funds available?

\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

List items anticipated to be bid by Davis School District Purchasing Department:

\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

## PLANS

Are plans available for review by the District's Facility Administration Department? Yes \_\_\_\_\_ No \_\_\_\_\_

If not, when? \_\_\_\_\_  
\_\_\_\_\_

### Send Completed Application Form to:

**Davis School District**  
**Facilities Administration Department**  
**45 E. State Street, PO Box 588**  
**Farmington, Utah 84025-0588**  
**Attention: Gary Payne, AIA, Administrator**

## CHECKLIST

1. Contractor/Sub-Contractor is DSD pre-qualified? Yes \_\_\_\_\_ No \_\_\_\_\_  
Date Verified \_\_\_\_\_
2. Contractor is in good standing and properly licensed with the State of Utah?  
Yes \_\_\_\_\_ No \_\_\_\_\_ Date Verified \_\_\_\_\_
3. Contractor is bondable to 100%? Yes \_\_\_\_\_ No \_\_\_\_\_ Date Verified \_\_\_\_\_
4. Payment bond equal to 100% of project value required? \*  
Yes \_\_\_\_\_ No \_\_\_\_\_ If "no", why? \_\_\_\_\_
5. Performance bond equal to 100% of project value required? \*  
Yes \_\_\_\_\_ No \_\_\_\_\_ If "no", why? \_\_\_\_\_
6. Contractor has liability insurance coverage equal to \$1 million? \*\*  
Yes \_\_\_\_\_ No \_\_\_\_\_ Date Verified \_\_\_\_\_
7. Contractor has workers compensation insurance? \*\*  
Yes \_\_\_\_\_ No \_\_\_\_\_ Date Verified \_\_\_\_\_
8. Other: \_\_\_\_\_  
Yes \_\_\_\_\_ No \_\_\_\_\_ Date Verified \_\_\_\_\_

\* Required if over \$20,000 \*\* Required regardless of value

## APPROVALS

Environmental Maintenance Director	Yes _____ No _____ Date _____
Architectural Services Director	Yes _____ No _____ Date _____
Inspection Coordinator	Yes _____ No _____ Date _____
Purchasing Representative	Yes _____ No _____ Date _____
School Principal	Yes _____ No _____ Date _____
Utility Services	Yes _____ No _____ Date _____
Administrator of Facilities Management and Planning	Yes _____ No _____ Date _____
Accounting Department	Yes _____ No _____ Date _____
Capital Planning Committee Approval	Yes _____ No _____ Date _____





### PROTOTYPE DEVELOPMENT

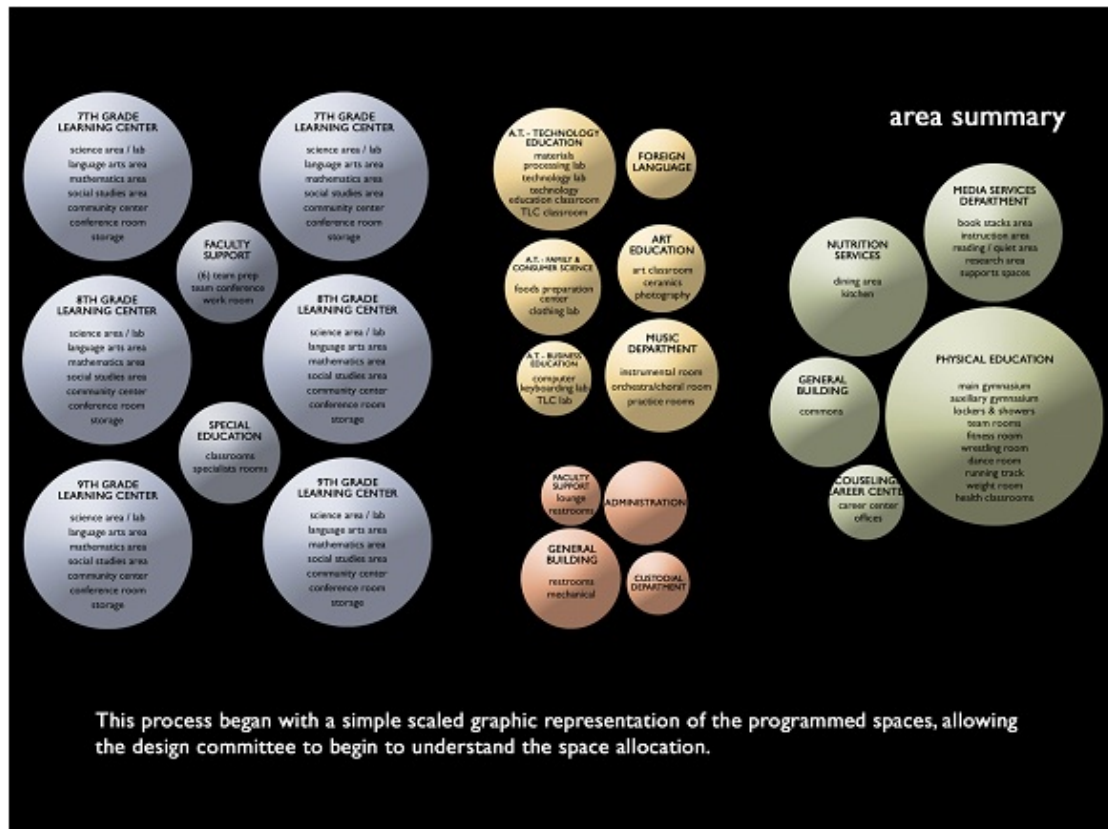
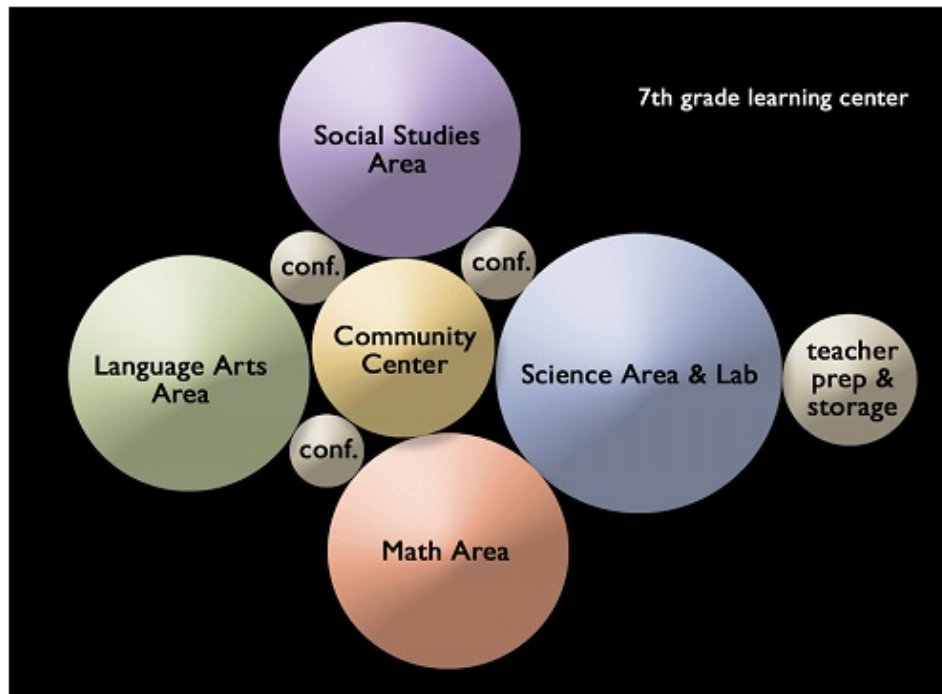
In 1996, the District hosted a design seminar facilitated by Stephen Friedlander of Boston, Massachusetts. The purpose of the seminar was to design a new prototype which would replace aging prototypes in use since the early 1970's. The group consisted of two previously selected architectural firms and their engineers, District curriculum advisors, students, teachers, school administrators, and facility personnel. Pedagogy delivery methods, classroom functionality, aesthetics, circulation, open space, comfort, etc., were all discussed. Following the seminar, the findings were summarized and given to the architects in the form of an architectural program for the development of prototypes for two different large elementary schools, small elementary schools, and a multi-story elementary school. The same information was utilized to develop two new junior high prototypes and a senior high prototype.





## 7th Grade Learning Center

GENERAL REQUIREMENTS	ARCHITECTURAL REQUIREMENTS	ENGINEERING REQUIREMENTS
<b>Room Name:</b> <b>SCIENCE AREA / LAB</b> (1) per learning center	<b>Floors:</b> vinyl composition tile / carpeting  <b>Walls:</b> painted surfaces  <b>Ceilings:</b> acoustical ceiling tile  <b>Ceiling Height:</b> 10'-0" minimum  <b>Doors:</b> 3' 0" x 7' 0" w/ vision panel as required  <b>Windows:</b> Large wall of windows for growing plants blackout capability  <b>Sound Considerations:</b> Isolate acoustically from surrounding spaces  <b>Fixed Equipment:</b> 5' locking glass display case wall hung cabinets - lockable built-in base cabinets - lockable epoxy resin countertops - acid resistant tack board white board sliding support structure for hanging demonstrations projection screen demonstration desk lab tables for 27 students  <b>Mobile Equipment:</b>  <b>Furnishings:</b> tables and chairs  <b>Miscellaneous:</b>	<b>Mechanical:</b> Good ventilation system purge exhaust fan fume hood  <b>Plumbing:</b> (8) sinks at lab tables w/ hot & cold water & gas sink at demonstration table deep laundry sink eyewash & shower station floor drain  <b>Electrical:</b> ample electrical outlets & circuits  <b>Communications:</b> Intercom w/ call-back  <b>Lighting:</b> Indirect lighting w/ multi-level switching Task lighting at work stations  <b>Computer:</b> Data connections for 10 computer stations built in lab tables  <b>TV Equipment:</b> Wall mounted TV & VCR Ceiling mounted projector Cable TV  <b>Security:</b> Lockable door Motion Sensor  <b>Miscellaneous:</b> Master shut-offs for gas & electrical power at demonstration table ceiling mounted projector
<b>Area Requirements:</b> 1,200 SF		
<b>Occupants:</b> 27 students		
<b>Adjacencies:</b> teacher preparation and storage room		
<b>Preparations:</b>		
<b>Miscellaneous:</b>		
<b>Summary:</b>		









This process created a unique opportunity for the District since all new prototypes are consistent in educational philosophy, from elementary through senior high school. Each school is designed around the District preferred teaching arrangement of smaller learning communities. While our schools tend to be on the larger side, 700 students for elementary, 1,100 students for junior high, and up to 2,000 for senior high schools, smaller learning communities can provide safer, smaller environments within the larger context. For example, at the elementary school, with 4 small learning communities, each student feels part of a school within a school of 150-200 students, rather than all 700 students at one time.

At the end of each new school's first year of operation, architectural firms conduct a post-occupancy survey. The purpose of the survey is to evaluate the operation of the layout and functionality of the building. Any concerns can be discussed, with improvements made for future buildings. When a new building is scheduled, users of the prototypes are brought together with the design team to address strengths and weaknesses of the design; changes are made where necessary.

For additional information regarding Facilities, please contact the Facilities Administration Department at 801-402-5275.



Good school design ... award winning schools ... do not have to cost more. In fact, many aesthetically challenged projects (ugly schools) can cost as much or more. Our experience has shown us that with some thought and careful selection of materials, a good design can meet the budget, scope, aesthetic and program needs within the school - and also provide an award winning school.



## Appendix F - BUILDINGS and AWARDS

The district has won numerous awards for school construction, including:

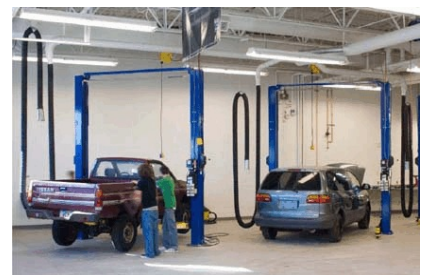
**Syracuse High School** named the 2007 Education Project of the Year by McGraw Hill and Intermountain Contractors.



Circulation



Auditorium



Automotive Class



**North Davis Junior High School** named the 2006 Education Project of the Year by McGraw Hill and Intermountain Contractors.



**Commons**



**Athletics**



**Science**



**Media Center**







**West Point Junior High School** was named the recipient of the 2004 James D. McConnell Award for Educational Facility Project Excellence, the highest honor awarded by the Council of Educational Facility Planners International



**Commons**



**FACS Classroom**



**Concept Plans**



**Collaboration**

# Credits

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Special thanks to our Architectural partners who provided their expertise in school design and photographs included in this packet.

Naylor Wentworth Lund Architects  
Salt Lake City, Utah

VCBO Architecture  
Salt Lake City, Utah

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