



Overview of the Educational Specifications for the Replacement of a GISD Elementary School – beginning with Desert View Elementary School Sunland Park, N.M.

Executive Summary

PSFA ranked Desert View ES below 60 in 2012, so the school qualified for a PSCOC funding number. This allowed the District to begin the design process in January 2013 by hiring Architectural Research Consultants, Inc. (ARC) to develop Educational Specifications. The Public School Facilities Authority (PSFA) published a total project cost estimate for expansion / renovation or replacement of this school of \$17.6 million. The allocated maximum gross square footage (GSF) set by PSFA is 68,750 GSF or about 23,400 GSF larger than the current permanent facility. The task of the Educational Specifications is to identify the needs of the school, to decide if expansion / renovation or replacement is best, and to produce a description of the future school buildable in the budget and acceptable to the committee, PSFA and the School Board. ARC distributed kick-off information and conducted three on-site workshops, teleconferencing PSFA into the meetings. The committee included representatives of the staff, Ralph Gallegos (district) and Earl Franks (PSFA Field Representative).

The committee worked well together. They asked questions and defended key unique elements of the proposed list of spaces (see Needs section following). They understood the issues of space size, organization of the school, and what current facility constraints to avoid in the new school. The school, built in 1987, has severe program space issues. It's spaces are small, have dirt infiltration which stresses asthmatics, are hard to lock down, have poor HVAC (especially in May, August and September), have noisy HVAC that is so loud teachers often turn it off to talk, have insufficient storage so classrooms are cluttered, have no sinks, and have limited outlets. The site has major conflicts between traffic and students and a general institutional image.

ARC prepared two estimates: to expand / renovate the existing school and to replace the school. ARC discussed these estimates with PSFA in an interim meeting before workshop #3. The estimate to expand / renovate the existing facility amounted to about 83% of the cost of the replacement school. This level of investment triggers a replacement of the school if the new school estimate meets the proposed budget. The committee worked to ensure that their list of spaces remained less than PSFA's set maximum size of 68,750 GSF. The EdSpec programming-level-of-estimate for a new facility (that can be built without moving the students and staff) is \$17.35 million. Therefore, this Educational Specification (EdSpec) is for a new replacement school.

Process

ARC sent a kick-off information packet on January 4th, 2013 as a read-ahead and conducted three on-site workshops on Wednesdays (January 16th, January 30th, and February 13th) from 2:30 to 5:00 p.m. with the school Leadership Team. Then ARC spent one day interviewing staff, conducted an evening meeting for parents, and met with Mr. Jorge Araujo to clarify discrepancies.

The committee will receive a full EdSpec draft report by March 1 for comments on room details described. Changes are not expected to the cost or GSF size of the new school.

Facts

Desert View ES was built in 1987 as one of three nearly identical schools and had a layout designed for 3rd and 4th graders. It has 44,820 GSF and is in fair to poor condition when all building systems are considered. The school, although built in the middle of a 25-acre site, still has sufficient space for building a new school despite the slopes from south to north (high to low with a drainage problem area in the northeast corner of the site). Currently, only about 35% of the site is developed. There is conflict between service vehicles and students crossing the service road in multiple locations. Even with a compact attendance boundary that comprises one large neighborhood, more than 75 cars pick up students at the end of the school day. Busing is not a factor in the site layout, since only two small buses serve the school.

Target enrollment per PSFA is 550. Enrollment projections note the student count could reach 574 by 2021.

There are many negative issues with the facility. Classroom problems, in order of most severe first, are:

- Cold in winter, hot in summer
- Dusty
- Noisy
- Too small, with a lack of personal space because of crowding
- Lack of storage
- Need for a sink
- Visually cluttered
- Restroom experience is poor
- ADA compliance issues
- Poor security due to easy access points
- Furniture old, chalkboards are original, walls do not hold taped work

Additional facility problems are:

- Water deposits restrict galvanized water pipe flow
- Water from the water utility has elevated levels of arsenic
- The facility uses 1.77% more energy than the newest GISD ES
- Waste pipes are cast iron and corroded due to soil pH

- Roof drains and area drains are clogged
- HVAC systems are high maintenance, especially roof evaporative coolers for classrooms, which are ineffective
- The facility has few structural cracks but some settlement
- Corridors are 7'-8" wide (allowed by code), but good practice would have main corridors at 9'-0' wide
- Restrooms are claustrophobic and lack privacy
- Code analysis notes there are enough restroom fixtures, but good practices would increase the female toilet count and have better distribution

Instructional spaces have size needs that are impossible in this building without removal of exterior walls and roof to push rooms out about 6'. The general classroom is about 130 SF too small, as shown in the next chart.

Despite the moderate age of the facility, the spaces would require major improvements and expansion to meet N.M. Adequacy Standards, which is a stronger argument for replacing the school.

Most CR 704 - 711 SF

6 tables 30 by 60"	75	entry / exit clear	32
students seat area	150	file cabinets	14
teacher area	25	group area	120
Backpack hangers	24	phantom corridor between	120
Loose storage units	12	area to write in front CB	32
IT smartboard	20	kidney table	13
Computers	38	perimeter aisle for teacher	120
No built in cabinets/sink	48		
	392		451
		Teaching Methodology size needs	843
			711 Typical size CR
			-132 over/under need

Goals

The district addressed the following Goals for time and cost.

Time goals for this project are as follows:

- EdSpec completed in March 2013
- A/E hired in April 2013
- Bid building in about April 2014
- Occupy the building in August 2015

Cost goals — develop two options:

- Estimate the renovation of the whole existing building, including adding about 23,400 GSF to meet Adequacy Standards, and including relocation of students during construction
- Develop EdSpec for a new school on same site
- The solution is not to exceed \$17.6 million total project costs (TPC)

The committee identified the following Goals to influence the design of the school: form, site, health/safety, organizational, sustainability, and space goals.

Form Goals:

- This EdSpec solution can be unique. It should be one story.
- Create a facility image to be less institutional and should be spacious, bright, welcoming, safe, pleasant, and durable
- Prefer to place the new school set back on the south area of the site, providing more space to solve traffic issues and take advantage of the views

Site Goals:

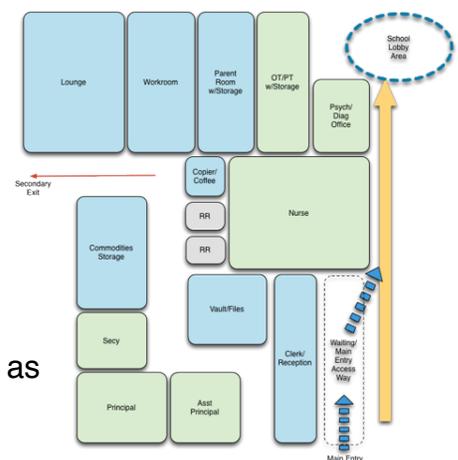
- Provide neighborhood access for “walking Wednesday” and to use the parent office and library in the school especially after school
- Separate student areas from all traffic areas
- Reroute kitchen delivery trucks off of walkways
- Remove parent cars from street for pick-up and drop-off, and provide more parking
- Eliminate the high chain link barrier along public sidewalks, and create lock-down security for all school areas
- Make security fencing less institutional
- Control wind and drainage erosion (high in the south and west to low in the NE corner) and prevent burying of the grass field by blowing sand
- Provide an area for four double portables to allow easy installation. Integrate the area with the building so that it is part of the school experience.
 - Install one existing double for use by AVANCE county program
- Move all active school programs currently in portables into the building

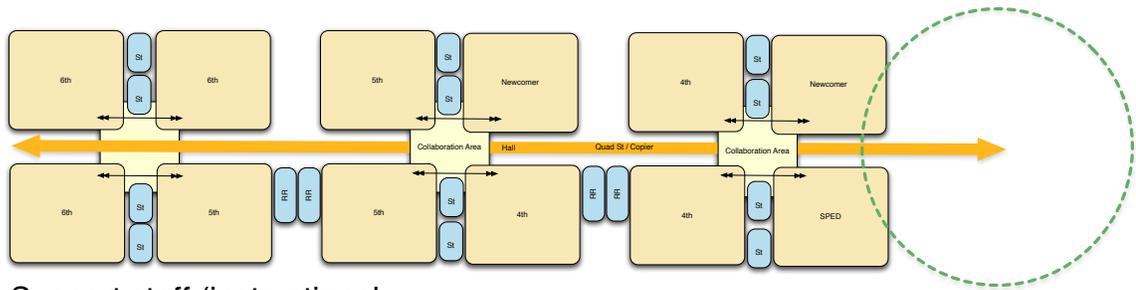
Health / Safety Goals:

- Provide a safe building as well as safe play areas with shade
- Provide access to safe drinking water
- Security: all rooms are to be easily secured for lock-downs

Organizational goals

- Organize school in K-1, 2-3, 4-6 areas, provide restroom(s) in K and 1st grade classrooms
- Special education and program spaces are to be distributed
- Separate noisy space functions from classroom areas
- Provide a prominent main entry that leads visitors directly to the administration
- Reduce visitor penetration of the school by providing main visitor destination spaces near each other, such as admin, gym, cafeteria, library, nurse, IEP space





- Support staff (instructional coach, counselor, and social worker) are to be integrated into classroom areas
- The food service process will remain with the continuous serving approach from 11 AM to 1 P

Sustainability Goals

- Create a solution that reduces utility costs to the levels at Gadsden ES
- Provide monitoring elements to teach about sustainability

Space Goals

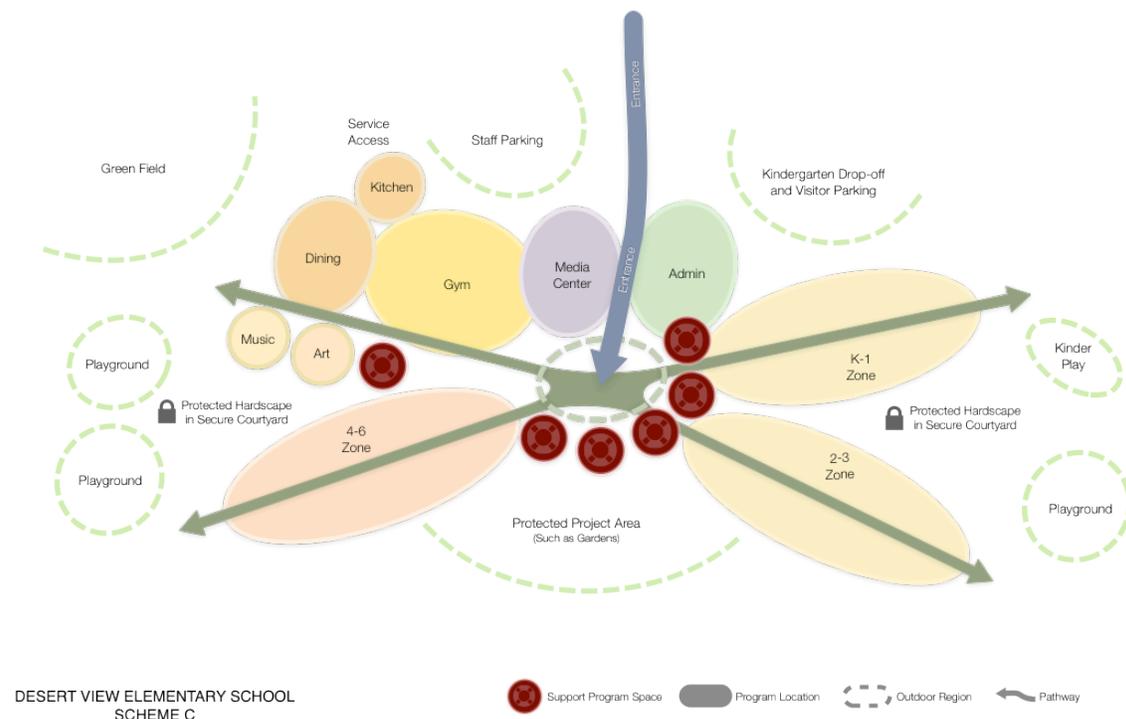
- Create a safe, clean, comfortable and quiet environment
- Design a classroom shape and size to allow for flexibility
- Provide classrooms with sinks, sufficient locking storage, controllable natural light, and useable floor area for reading rug, and maximize display wall area. Add color to CRs.
- Provide furniture that maximizes storage
- The library needs space for 5 more double bookcases, up to 12 computers, proper storage, and secure access for parents who check books out after school
- Option: provide second computer space due to testing, and learning programs used daily
- Create direct access from the gym to the field and play areas. The gym needs adequate storage. Provide a larger and easily assembled portable stage with storage.
- D-level suite is to have easy access to the bus, an outdoor court, and HVAC without drafts or stratification
- Restrooms will be better distributed for supervision and upgraded to ADA.

Concepts

The discussions about the relationship of spaces to each other refined the List of Spaces and led to the need to maintain a separate dining room from the gym, add computers to the media center, distribute restrooms so that students and staff do not have to travel more than 90 feet to a restroom, have the admin reception as the control access by all visitors, preserve the grass area, have a single-story school, and have its front door face the neighborhood.

The above diagram shows a general classroom wing with distributed restrooms and pods with same grade classrooms. Similar diagrams were developed for administration, gym, special education and the library.

We developed three overall Conceptual Relationship Diagrams, transitioning from a two-story facility in the front west area of the site to a single-story facility centered along the southern third of the site. The following final Scheme C diagram shows the K-1, 2-3, and 4-6 grade wings like at Gadsden ES, but in a different configuration. The committee pointed out the need for securing the in-between spaces so that outdoor class activities and more communal activities such as gardening are secure from vandalism.



Needs

The List of Spaces houses all current staff, all programs in portables but the AVANCE program in a double portable, and allows for the following spaces unique to Desert View ES. Note the school GSF is within the PSFA allocation.

1. An extra classroom for either science curriculum or use as a surge classroom. It would accommodate a large grade when it enters 4th, 5th or 6th grade. These grades have only three classrooms each, while the kindergarten through 3rd grade levels have four rooms.
2. A large bookroom attached to the half-classroom for the instructional coach
3. A dining room that is separate from the gym
4. A space allowance for future bleachers in the gym area
5. An increase in storage for bulk purchases
6. An art room and music room, which Gadsden ES does not have
7. Restrooms in first grade classrooms

The final List of Spaces totals 68,679 GSF, just below the 68,750 GSF allowed by PSFA. Only the science room at 1,231 GSF is classified as over adequacy.

Costs

The current PSCOC award is for \$17.6 million

- The EdSpec-level estimate for Existing School Renovation / Expansion is \$14.52 million, or about 83.7% of the cost of a New School
 - Since it is over 80% of the cost of a new school, this project is a good candidate for investing in a new replacement school
 - Renovate / Expand option would require about 23,400 GSF be added to the existing 44,820 GSF
- The EdSpec-level estimate for a New School is \$17.35 million so the school is in the budget
 - Within the New School option the value of the 1,231 GSF over adequacy for the science room; sinks in CR, etc. is estimated at about \$595,000
- Other costs related to this new school:
 - PSFA mentioned that demolition funds often are separate allocations.
 - Add to the New School option the need for about \$724,000 for demolition of the existing school

Conclusion

The EdSpec therefore describes a new Desert View ES facility that meets the needs of its educational program, fulfills the school design goals, is below the maximum GSF established by PSFA and can be built for less than the funding level set by PSCOC. The distribution of funds is as follows:

		PSCOC	District
1. Build New School	\$17,350,000		
2. Reduction 100% District	\$595,000		\$595,000
3. Sub-total for match	\$16,755,000	\$14,744,000	\$2,010,600
4. Cost for demolition	\$724,000	\$637,120	\$86,880
5. Totals EdSpec obligation		\$15,381,120	\$2,692,480
6. Matches at \$17,600,000 Award		\$15,488,000	\$2,112,000
7. Difference between Award and EdSpec values of work		(-) \$106,880 Below Award	\$580,480 Above Award

Total budget numbers in line 5 above will be needed in FY 2014 – 2015 less the funds currently being used for design in 2013-2014.

The committee requests approval of the Educational Specification for the Replacement of a GISD Elementary School – beginning with Desert View Elementary School including the need to provide \$580,480 additional funds, above PSCOC Award estimate levels.

The Leadership Team Committee of Desert View ES is to be commended for their time and successful effort.