

Trains, Windmills and Sand:

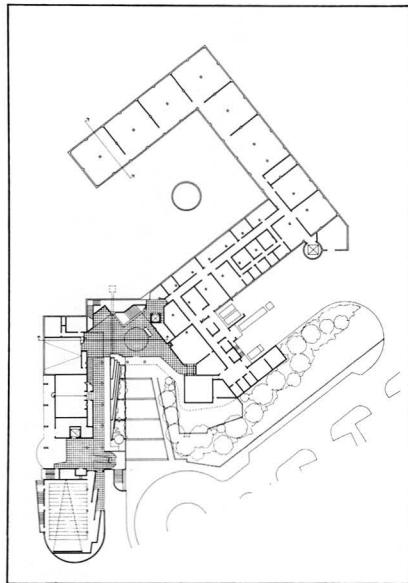
An entry to the Arizona Historical Society Museum Competition

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In 1985, the Arizona Historical Society sponsored a competition for the design of a museum to be constructed on a site in Tempe adjacent to Phoenix's Papago Park. This facility is intended to house the Society's collections documenting and illustrating the Hispanic and Anglo/Hispanic periods in Arizona history. The program required approximately 76,000 square feet of building in which 60% was accounted for by galleries and other public spaces. The remainder was devoted to administrative and service functions. A limited amount of controlled outdoor exhibition space was suggested to be used in conjunction with the galleries. Parking for 160 cars and three buses was required. A service court to accommodate material flows to and from the building was also needed.

The 10.5-acre site is a natural desert environment. Unlike much of the land in the surrounding Salt River Valley basin, it has broken and undulating topography. A ridge runs diagonally through the site. A wash fed by discharge from an adjacent water treatment plant crosses its southwest corner. Native vegetation consisting of Saguaro Cactus, Creosote Bush, Palo Verde and Brittlebush is dominant on the site.

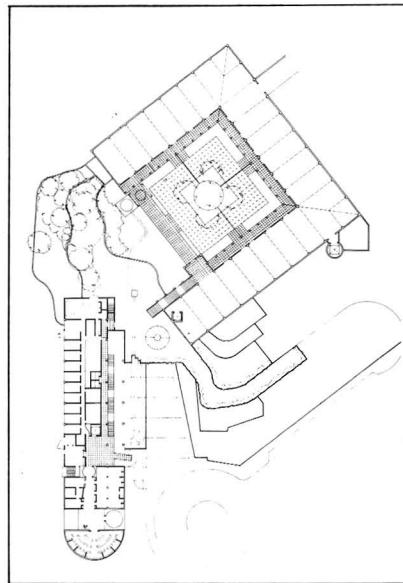
Our response to this situation was guided by intentions to fit the building carefully to the site, be responsive to the climate, make a functionally efficient plan, provide a series of spaces appropriate to the educational purpose of a museum, and reflect the



Entry floor plan.

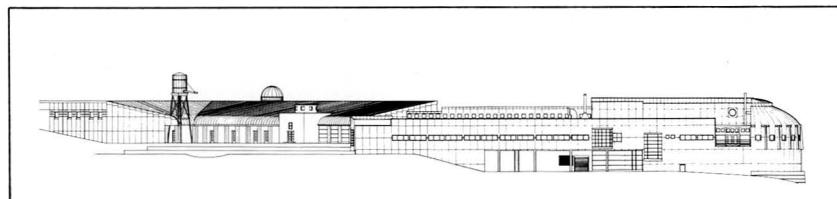
history of the state in the images or qualities of the design.

Our design consists of two building elements: an elongated rectangle and a simple "U" or open court form. Both contain two floors of occupied space. They are linked on the lower floor by the public entry. The elongated rectangle houses administrative offices and the library on the upper floor and educational spaces on the lower floor. The court block contains the galleries on the upper floor and storage/service functions



Main floor plan.

on the lower floor. A small appendage to the court block flanking the entry accommodates the restaurant and gift shop as well as loading docks and related spaces. This arrangement provides easy access from the entry lobby to all the public spaces (restaurant, gift shop, auditorium and education spaces) which do not have controlled access. Controlled-access public spaces (galleries and the library) and private spaces are either on the second floor or not accessible from the entry by the public.



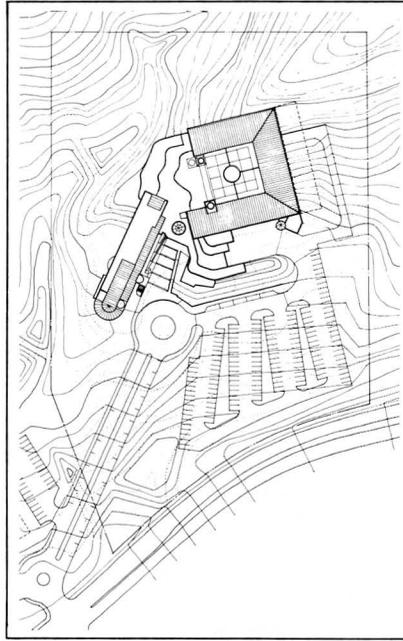
Southwest elevation.

The building is positioned toward the rear of the site. The gallery block is furthest up the ridge permitting the upper level court to be on grade and providing extensive subgrade space on the lower floor appropriate to the storage function. The administration/education block rides down the ridge with most of its space above grade. The court and its garden extension join the two blocks at the second-floor level. They are above grade on all exposed edges permitting them to be easily secured. Most of the irrigated landscaping proposed is confined to the terraced garden. The museum, therefore, exists as a controlled oasis in its desert site just as the Salt River Valley exists in the desert state of Arizona. Each of the museum's blocks is oriented optimally with respect to the sun. Most of the openings have been sized, positioned and protected according to their locations. The shading effect of the building has been exploited to protect important outdoor spaces. The administration/education block, the court/garden and the restaurant are all positioned to benefit from the more dramatic views of the surrounding landscape.

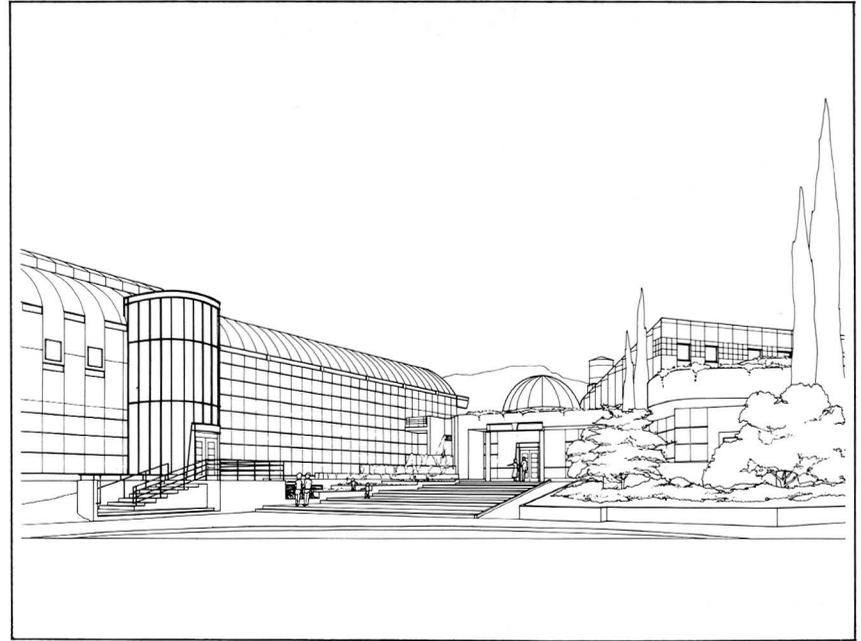
The museum is approached on a causeway which crosses the lowest part of the site and is aligned with the entry. Arriving visitors will see the end of the administration/education block as they enter the museum drive. This end is occupied by the library and the auditorium and is powerfully shaped to permit it to function as an icon for the

museum. The gallery court is in the background viewed through the gap between the educational blocks, the terraced garden spilling through it. As visitors approach the entry on foot they will see the dome over the doorway and the watertower in the court above it. The watertower locates the primary goal within the museum: the gallery and exhibition court. It is also the origin of a water exhibition which depicts the importance and use of water in Arizona. The gallery block is actually a water collector. Water draining from its roof is collected in a cistern under the center of the courtyard. This collection takes place in open channels, the simple technology of the Hispanic settlers. From the cistern it is pumped to the water tank and released into a course in the garden, the more advanced technology of Anglo irrigation. Eventually the flow passes through the lobby of the museum inside a corrugated metal pipe and spills over a terraced concrete structure flanking the entry approach. As the water cascades down the terraces it diminishes until it drips one drop at a time into a corrugated metal tank filled with sand. This is intended to illustrate how Arizonans have used water, as well as to demonstrate the precariousness of their existence due to the extravagance of their water usage. Our fountain dries up and disappears into the sand just as the Salt and other southwestern rivers dry up and disappear.

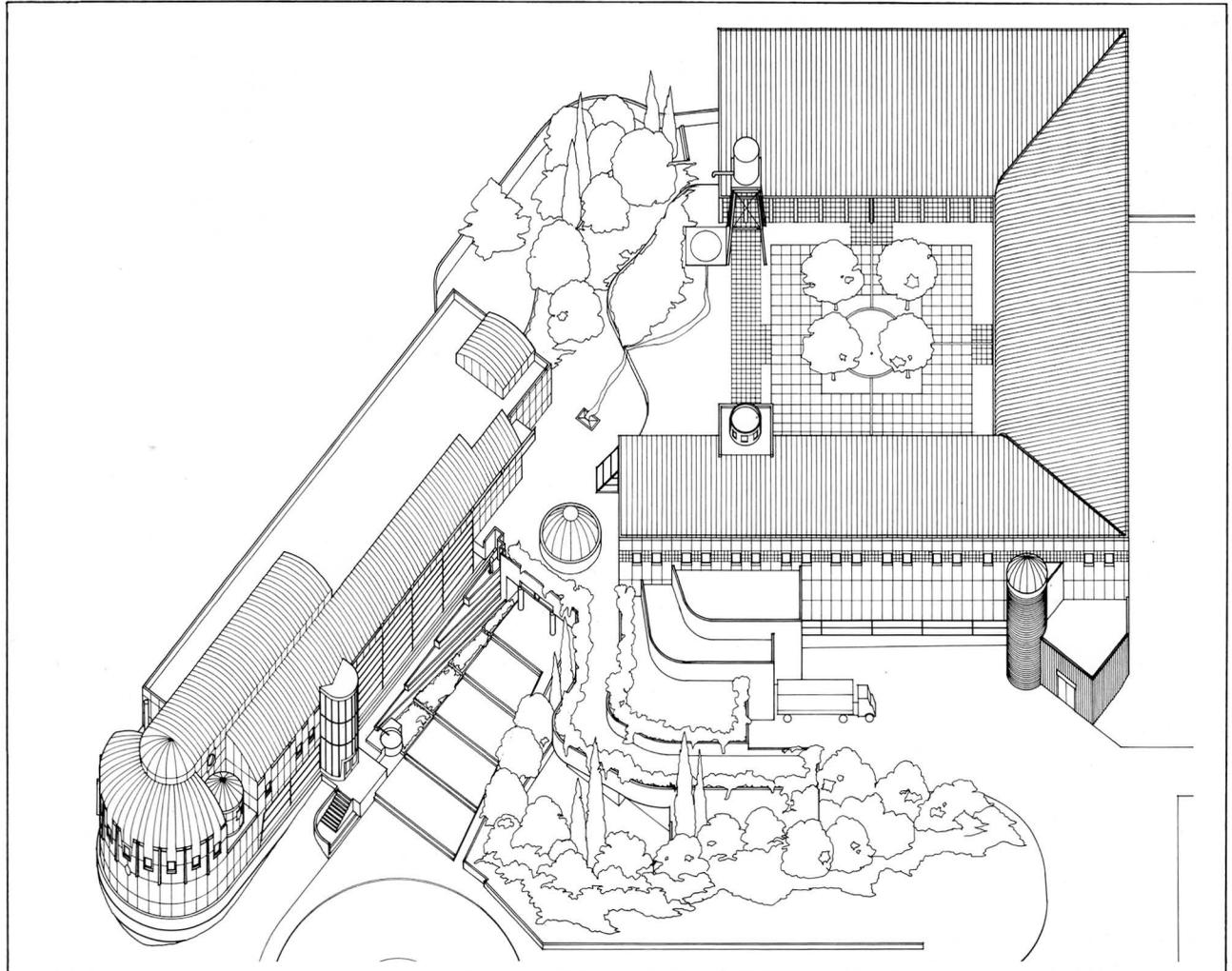
Our two architectural elements refer to the separate Hispanic and Anglo building traditions of Arizona, the court type being characteristic of the former tradition and the simple freestanding block of the latter. We have developed the organization, massing and elements in ways which are reminiscent of institutional and particularly museum design in our culture. Using elements and materials which reflect mining, agriculture and transportation activities that have dominated Arizona's development we have also tried to develop qualities and images which speak to the unique history of Arizona.



Site plan.



View of pedestrian entrance.



Axonometric.