

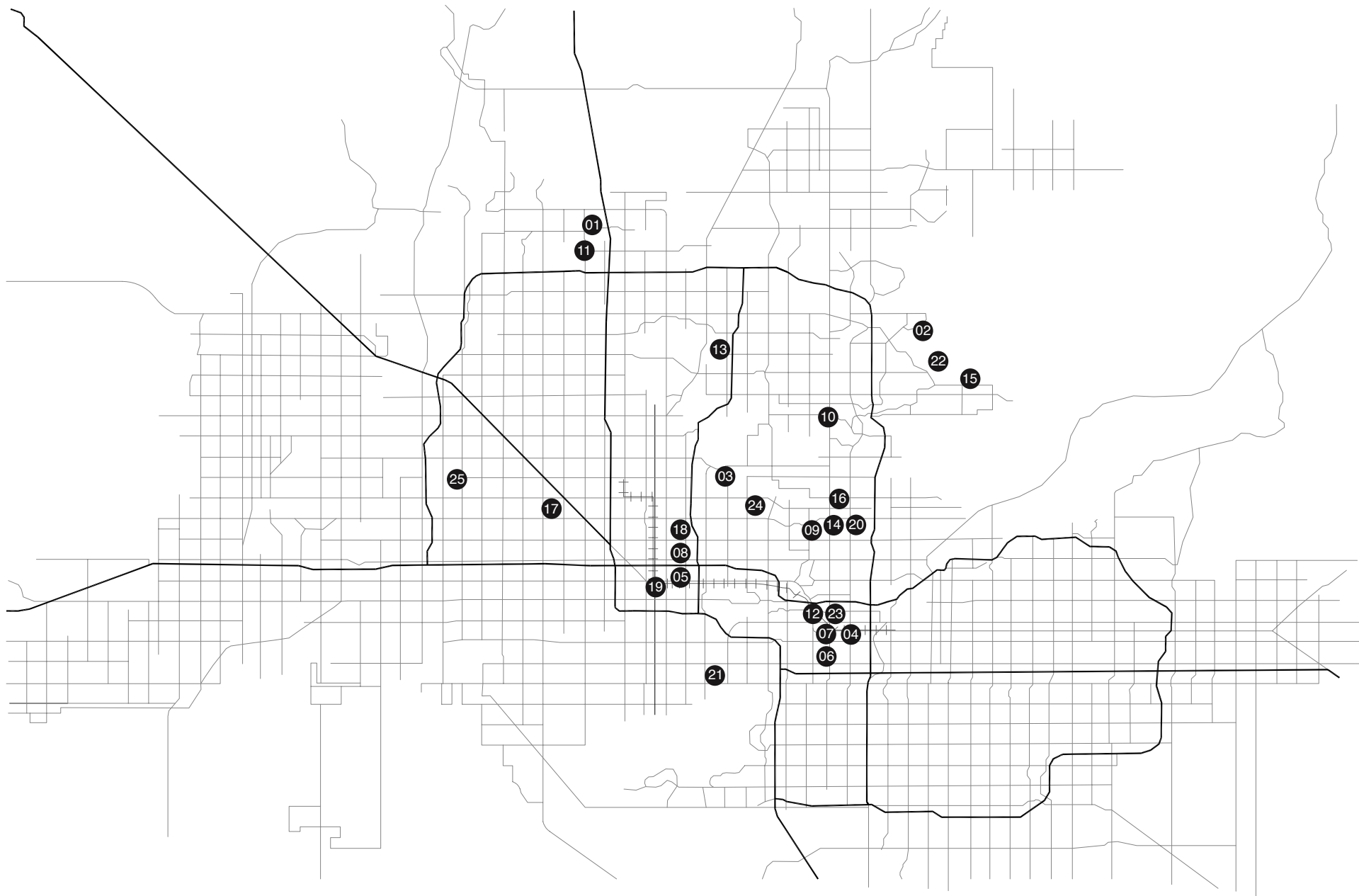
# phoenix25

**Notable Valley Architecture 2009**

American Institute of Architects | Phoenix Metro

**Phoenix Metro Guide to 25 notable and public buildings**





**Agave Branch Library** 2009

23550 N 36th Avenue, Phoenix, AZ 85310

will Bruder + partners

The 25,405 sf branch library unites excellence and affordability with sustainable design. Impacted by the design of its neighboring shopping center, the library draws from, and re-presents, the materials and tectonics of these retail neighbors.

Stacked bond concrete masonry units and glass enclose the simple rectangular volume of a hard-troweled concrete floor with area rugs, green sandblasted CMU walls, exposed gang-nail trusses, glu-lam beams, steel pipe columns, and sparingly used painted gyp-board interior partitions.

With its torquing metal scrim curving along the site's eastern edge, the facade provides scale, presence and distinction. Constructed in the tradition of the old lathe houses of Phoenix's Desert Botanical Garden, which used off-the-shelf galvanized hat channels, the scrim also recalls drive-in movie theaters so popular in post-World War II suburbia.



credit: Bill Timmerman

**Arabian Library** 2008

10215 E Mcdowell Mountain Ranch Rd., Scottsdale, AZ 85255

Richard + Bauer Architects

The desert slot canyons of northern Arizona capture the power of compressive stone walls releasing to the sky. Over millennia, threads of water sculpt the massive walls, carving out sandstone canyons. Harder stone and slow water sharply define vertical slivers, while softer stone gives way to wider crevasses.

Echoing a compelling natural sequence, an earthen stone roof thrusts from the desert floor of the library — taking with it the site's native grasses, shrub and stone texture.

Organized about a central court, the 20,000-square-foot building is entered through a slot canyon of steel and glass. Cladding of weathered steel plate reflects the indigenous terra-cotta walls of stone as they lean overhead and fall away from the entry path, opening to the sky and the library ahead.



credit: Bill Timmerman

**Arizona Biltmore Resort** 1929

2400 E Missouri Avenue, Phoenix, AZ 85016

Albert Chase McArthur with Frank Lloyd Wright, consultant

The 39-acre “Jewel of the Desert” celebrates Wright’s organic architecture and detailing through the work of his student from 1907 to 1909. McArthur’s younger brothers, Charles and Warren, were board members of the hotel.

In response to the adjacent mountains and the desert, workers cast the “Biltmore Blocks” using area sand and water taken from the adjacent Arizona Canal. Variations of the textile block Wright devised for his earlier California homes, the 250,000 blocks incorporate 34 geometric palm-inspired patterns by sculptor Emry Kopta. Horizontal massing, terraces, loggias and other details are also reminiscent of Wright.

The now 738-room full-service resort incorporates a 33,000-pound copper roof, supported by 40-ton copper beams. The main building also contains one of the largest gold leaf ceilings in the world.



credit: Arizona Biltmore

**ASU Biodesign Institute** 2004/05

1001 S McAlister Avenue Tempe, AZ 85287

Gould Evans Phoenix

An architectural expression of science benefiting humanity, the interdisciplinary biotech research campus includes four stylistically linked glass-clad buildings, two completed and two planned.

Design and materials reflect the scientific functions of the 13-acre campus; the research value of collaboration; connections with the desert habitat and campus structures; and ecological goals. Two-story operable aluminum and wood louvers — inspired by a scientific process used inside — control daylighting on the east and north sides. The lab, office and conference spaces converge around an open light-suffused atrium. Terrazzo floors use local materials to celebrate the Salt River, which once flowed here, and brick, inside and out, ties the buildings to neighboring buildings. Outside, a bioswale garden features indigenous plants, irrigated by roofwater.

The high-security facilities are not publicly accessible.



credit: Bill Timmerman

**ASU College of Nursing** 2009  
 550 N Third Street Phoenix, AZ 85004  
 DPR + SmithGroup

The gateway to the ASU Downtown Phoenix campus, the 84,000 sf five-story building combines functions for study, education and healing.

Defining the campus entrance, the copper-skinned steel-frame building includes a high-performance glass curtain wall on the north and a lantern feature, wrapping an exterior stair. The copper skin utilizes three different profiles in a randomly repeating pattern to create texture and a play of light and shadow. These same panels are perforated, providing air movement and shading at the exterior stairs and balconies. The first floor combines ground face masonry units to conceal utilitarian spaces, while glazing showcases educational programs.

The building, seeking LEED certification, incorporates many sustainable features including urban infill siting, xeriscaping, generous daylighting, louvers and a comprehensive recycling and waste-management program.



credit: SmithGroup rendering

**ASU H.B. Farmer Education Building** 1961  
 1050 S Forest Mall, Tempe, AZ 85281  
 Edward L. Varney & Associates

Honoring the first head master at the Territorial Normal School, forerunner of ASU, the 95,587 sf building combines classrooms and offices.

The cast-in-place-concrete four-story encloses an atrium from the ground level to the reinforced concrete roof. Concrete seats, area screening, a water fountain and landscaping create a cool, serene atmosphere. Precast concrete panels on the north and south walls articulate floors, while floating concrete stairwells on the east and west walls reaffirm openness and lightness. Street level campus passageways introduce breezes to the courtyard.

On the exterior, precast concrete curtain walls, anchored to the structure, capture vertical window grilles in a shifting pattern. At the ground level, brick relates the building to other campus structures, while cantilevered concrete canopies at entries offer additional shading.



credit: Wes James + Greg Kilroy

**ASU Nelson Fine Art Center 1989**

51 E Tenth Street, Tempe, AZ 85281

Antoine Predock FAIA

The result of a competition honoring the centennial of Arizona State University, the 130,785-square-foot campus honors its former president, J. Russell Nelson. The three-level center includes the university's art collection in five subterranean and upper galleries, four open-air sculpture courts, two theaters and administrative and studio space.

Inspired by Native-American pueblo structures and desert forms, the massing responds to a tight urban space and the need to conserve money and energy. Cast-in-place concrete rises to steel-reinforced pinnacles and carries lavender-colored stucco — a response to rocks found on nearby Tempe (Hayden) Butte.

Both oasis — an aqueduct, fountains, pools and shading trellises — and labyrinthine space, the center invites guests for a dramatic physical and aesthetic procession to enjoy the mystery and majesty of its art and arts.



credit: Arizona State University Art Museum

**Burton Barr Phoenix Central Library 1995**

1221 N Central Avenue, Phoenix, AZ 85004

bruderDWLarchitects

The five-story gateway to the downtown arts district includes the largest reading room in North America — the 43,000 sf fifth floor, with a tension-roof ceiling suspended by cables. Uniquely sited, the 280,000-square-foot library is in a park above a highway tunnel.

Diversely inspired by the Bibliothèque Nationale de France in Paris and Monument Valley, the mesa-shaped building incorporates shade-sails on the north and sun-tracking operable louvers on the south. An early green building, the library also features extensive daylighting and low-energy tasklighting.

A central open core — the “crystal canyon” — provides vertical organization with three high-speed elevators and a five-level staircase as well as convenient horizontal accessibility. The atrium is topped by 22 skylights, through which, on noon of the summer solstice, the candlestick columns are lit.



credit: Bill Timmerman

**Christian Science Church** 1962

6427 E Indian School Road, Scottsdale, AZ 85251

T.S. Montgomery

Appropriate siting, scale and materials conjoin in this 350-seat church on approximately 1.5-acres across from the Arizona Canal. The one-story modernist design includes the sanctuary/auditorium, a Sunday school comprising 10 classrooms, a nursery and other rooms as well as an enclosed garden patio, offering dappling shade and floral color. A multipurpose room — a circular segment not viewable from the street — was added later.

Hand-made burnt adobe bricks form the support walls; the ceiling is precast concrete, molded to radiate out above the sanctuary. On the north side, grill-like precast concrete blocks protect the glass walls from the desert sun as well as add ornamentation.

Copper fascia bands the exterior as well as the sanctuary interior, offering contrast while recalling the metal's importance in state history.



credit: Wes James + Greg Kilroy

**Cosanti** 1955-70

6433 E Doubletree Ranch Road, Scottsdale, AZ 85253

Paolo Soleri

The 5-acre Cosanti Foundation shelters the architectural and craft studios as well as the home of the Italian-born architect, known for his urban “arcologies” - large-scale urban projects, such as Arcosanti, which unite the built and natural worlds. The neologism - Cosanti - denotes “before” or “against” “things,” suggesting his philosophy of anti-materialism.

Many of the curvilinear apses, workshops, apprentice residences and courtyards were built in the 1960s by students of art and architecture from colleges and universities worldwide, as coordinated through Arizona State University programs called “Silt Piles.”

The architect pioneered innovative construction experiments with the simple hands-on technique of casting thin-shell concrete directly on the desert surface. These earth forms were carved or painted to accommodate reinforcing and integrated decoration, then excavated after the concrete cured.



credit: Cosanti

**Deer Valley Rock Art Center** 1994

3711 W Deer Valley Road, Phoenix, AZ 85308

william p. bruder architect ltd.

Precast concrete and weathering steel is sculpted in this 7,000 sf desert facility providing spaces for exhibits, research and preservation, classrooms and other curatorial functions related to petroglyphology.

Sited at the juncture of the two-mile-long earthen Adobe Mountain flood control dam and Hedgpeth Hills, the building spans the structure's concrete outlet works. Boomerang, funnel-like geometry transports visitors from the clutter and cacophony of suburban Phoenix to the sanctuary of protected mountainside desert. An easy quarter-mile-long trail leads from the center to more than 1,500 petroglyphs from A.D. 900–1100.

To complement and blend into the site, the precast panels incorporate a coarse dark black/purple copper slag that adheres to the exterior. Concrete interior walls are exposed with a sandblasted surface that appears like fine plaster.



credit: Bill Timmerman

**Farmer Studios** 2004

464 S Farmer Avenue, Tempe, AZ 85281

Architekton

Flexibly configured for retail or office/residential studios, the 13,000 sf building offers transition between the vibrant university downtown and the Sunset/Riverside residential area to the west. Shade canopies, trees, street parking and protruding windows reinforce the pedestrian-friendly design.

A sustainable building, most materials are locally produced or recycled, parking for the one-acre site is a “gravel pave” system to reduce the heat island effect and retention requirements and increase aeration for the adjacent bosque, and rainwater is captured in a sunken courtyard.

Steel and CMU construction articulates the building's five modular bays. A custom shade device protects the upper-level glazing from direct sunlight; counterbalanced internally, it allows for insulated translucent panels to be slid onto the exterior. A fixed cantilevered translucent panel shades the lower-level glazing.



credit: Bill Timmerman

**First Assembly Prayer Pavilion of Light** 2007

13613 North Cave Creek Road, Phoenix, Arizona  
debartolo architects ltd.

A sustainable glass pavilion in the desert, the 250-seat prayer chapel rests at the base of Stoney Mountain. A pinwheel of four site-cast black concrete walls supports a four-sided Vierendeel truss. Multi-slide glass walls open on three sides to courtyards.

Outside, a 50-foot-high steel cross and fire rise from a pool, and indigenous trees and concrete benches offer shade and serenity. Support spaces are located in a concrete building flanking the west side. Above 8 feet, a double-skinned wall comprises layers of translucent fritted glass and triple-insulated translucent glass. This creates a perimeter convection chimney, reducing interior temperatures and generating diffused daylighting.

At night, energy-efficient LEDs between the glass skins glow on the interior and exterior in multiple colors that rotate slowly throughout the night.



credit: Bill Timmerman

**Laloma 5** 2004

3707 N Marshall Way, Scottsdale, AZ 85251  
will Bruder + partners

A sophisticated celebration of the traditional and modern roots of its Old Town Scottsdale context, the five-unit complex includes an entry courtyard for street-level work spaces along its south side. On the north, a landscaped auto court is veiled behind a perforated metal gate and ocotillo fence.

To define views of landmark Camelback Mountain just north, the architecture folds angularly and symmetrically for the three-story units, while private cantilevered balconies project behind aluminum plate railings and detailed window walls are screened from the sun behind perforated aluminum scrims.

In scale, proportion, finely articulated details, massing and its materials, the project draws carefully from its local context and history — representing an architectural rightness for an evolving downtown Scottsdale and its aspirations for design quality and uniqueness.



credit: Bill Timmerman

**Lost Dog Wash Trailhead** 2006  
12601 N 124th Street, Phoenix, AZ  
Weddle Gilmore Architects

Southern gateway to the 36,400-acre preserve, the seven-acre site includes a 4,000 sf Trailhead Gateway Structure — both visitors center and starting point for hiking, biking and horseback riding trails; a Desert Amphitheater for education and entertainment; and an Equestrian Staging area.

Reflecting desert forms, colors, textures and seasons, the cantilevered center recalls the ridge to one side and the arroyo on the other. Its rough concrete walls and recycled patinaing roof and structural steel incorporate earth and flora tones. The building is even sited to reveal the sunrise of the solstices and equinoxes.

Sustainable design complements desert siting. Rooftop photovoltaics provide the trailhead's energy; rainwater is harvested and graywater collected to a 4,000-gallon underground cistern; and composting below the restrooms saves 200,000 gallons of water annually.



credit: Bill Timmerman

**Optima Camelview Village** 2005  
7171 East Rancho Vista Drive, Scottsdale, AZ  
David Hovey FAIA / Optima

This 700-unit mixed-use condominium development comprised of 11 terraced, bridge linked buildings responds to the harsh desert climate by creating a pedestrian-friendly shaded environment of interconnected landscaped courtyards. Through the extensive use of green-roof technology, 23-acres of landscaping were constructed on the 13-acre site, providing every living unit with landscaped exterior space.

The composition employs a site-sensitive vocabulary of layered positive and negative spaces harmoniously juxtaposed to form a rich texture of shades, shadows, colors, and transparencies. Rational geometry, bold cantilevers and sheer vertical faces serve respectfully as the backdrop to dynamic hanging gardens and sheltering courtyards.

The modular exterior wall is an interchangeable system of floor-to-ceiling glass, sandstone panels and sunshades, strategically positioned based on building orientation, site exposure, views, light and privacy.



credit: Bill Timmerman

**Palo Verde Library / Maryvale Community Center 2005**

4402 N 51st Avenue, Phoenix, AZ 85031

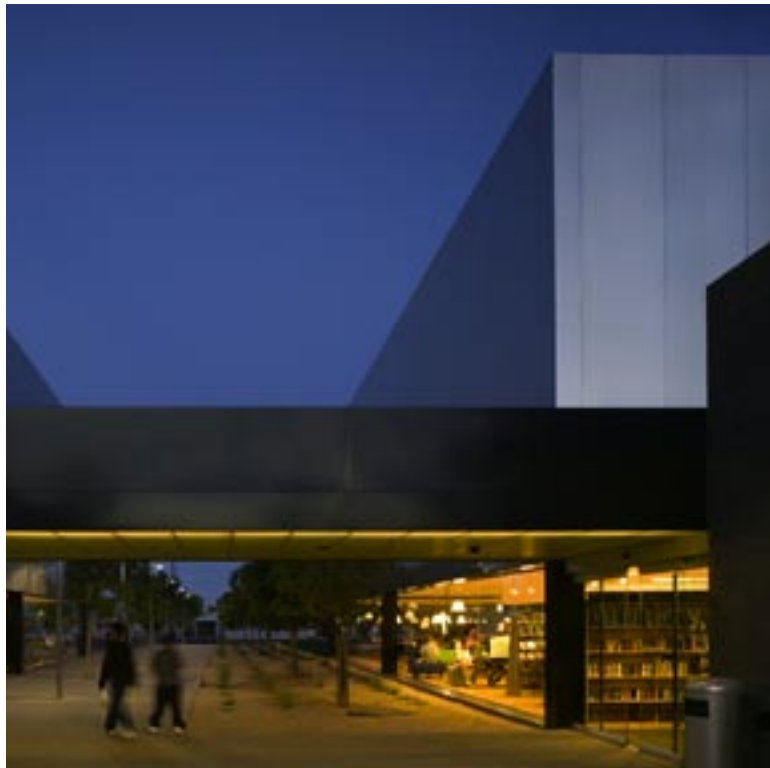
Gould Evans + Wendell Burnette Architects

The 43,000 sf multi-use facility includes the library collection area, a 150-seat auditorium for recital, drama and public lectures, and a community center with basketball courts, running track, gym and pre-existing pool.

Site-specific design and environmental responsibility challenged the design team to re-use the southeast corner of the park while establishing a sustainable community focal point.

Cladding the upper portion of the library and community center, mill-finish stainless steel — requiring 40 percent less energy to fabricate than finished stainless steel — absorbs light and color. As a result, the park both dramatically appears and disappears in its volumes.

Below the panels, energy-efficient glass affords transparency, allowing the space to coalesce with the park while projecting the civic aspirations of the project to the street and neighborhood beyond.



credit: Bill Timmerman

**Phoenix Art Museum 2005**

1625 N Central Avenue, Phoenix, AZ 85004

Tod Williams and Billie Tsien Architects

Horizontal Prairie School lines generated the original concrete structure and courtyards. Four additions and renovations reaffirm the Wrightian inspiration while integrating new drama and intimacy.

The two most recent additions - primarily precast concrete - offer an experience of journey through connected galleries rather than a singular space. A richly landscaped sculpture courtyard creates an urban oasis. Cooling also comes from a gray-green color relating to the indigenous palo verde trees on site and the entry waterfall.

Providing as much space under cover outdoors as it does within its glass-enclosed interior, the new lobby is a beacon for the arts and community gathering. Guests dramatically access the new four-level modern art wing by a concrete mast of elevator or a stairway that rises to a skylit ceiling.



credit: Bill Timmerman

**Sandra Day O'Connor Federal Courthouse 2000**

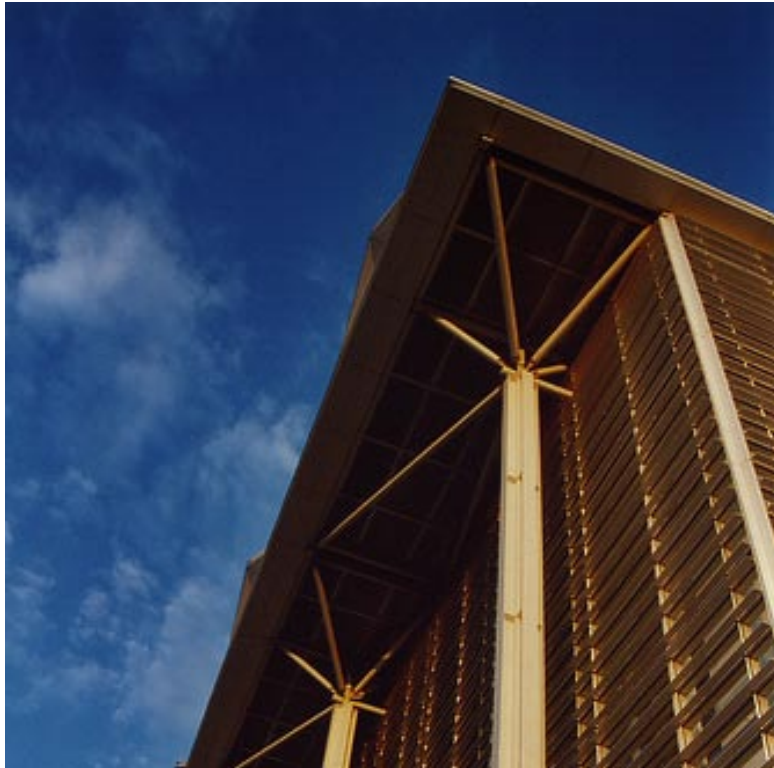
401 W Washington, Phoenix, AZ 85003

Richard Meier & Partners + Langdon Wilson

A light-suffused response to the Southwest, the 571,000 sf six-story federal courthouse features 19 courtrooms and judicial chambers, ceremonial proceedings courtroom, judicial support facilities, a cafeteria and offices.

The L-shaped building's exterior massing harmonizes with the indigenous rectilinear geometry of its urban context, but the focus is a 115-foot-high atrium clad in transparent and fritted glass. The atrium is passively cooled by adiabatic cooling — through evaporation rather than heat exchange — and a misting system, resulting in significant energy savings. The centerpiece of the atrium is the Special Proceedings Courtroom — a two-story glass cylinder elevated on a podium. A broad staircase serves as a processional to this upper level.

Structural framework provides definition: Steel columns rise the full height of the building, and mullions project in relief.



credit: City of Phoenix

**Scottsdale City Hall 1968**

3939 N Drinkwater Blvd., Scottsdale, AZ 85251

Bennie M. Gonzales & Assoc, Inc.

An architectural affirmation of democracy, the 36,000 sf building invites citizens to participate in government — redefining the paradigm of aloof municipal structures.

A contextual Southwestern style emphasizes light, informality and spaciousness, with an open layout, half walls and deep-set windows. Citizens access most services on the entry level, and stain-glass skylights brighten council chambers.

A harbinger of “green” construction, the building consists of two masonry walls sandwiching a void for ductwork. Cement mortar wash adds to the sense of mass, while battered walls and multi-angles offer sculptural effect. Throughout the 14-acre Civic Center Complex, benches, sculptures, landscaping, bridges and water features connect the building with the main library and arts center — also Gonzales designs but altered significantly since opening.



credit: City of Scottsdale / Diane Gonzales

## South Mountain Comm College Performing Arts Ctr 2003

7050 S 24th St, Phoenix, AZ 85042

Jones Studio, Inc.

The 43,000 sf center comprises a 350-seat theater, 100-seat black box theater, supportive space, offices and classrooms.

Constructed of sandblasted concrete masonry, the building features a steel-framed cap at the elevated lobby façade and wrapping to the adjacent sides: Overlapping shapes peel away to reveal glazing in areas where light locks are not required. The rusted exterior cladding dissipates heat like needles on a saguaro, the indicator species of the Sonoran Desert. So, too, the rugged violin case protects the violin.

The mass transitions from the opaque stage end to the translucent glass lobby, which serves as an arts beacon to the community while transforming patrons into illuminated performers before and after performances. Inside, eucalyptus-veneered soundboards create multi-use acoustical space that performs like a tunable instrument.



credit: Mark Boisclair

## Taliesin West 1937

12621 North Frank Lloyd Wright Scottsdale, AZ 85250

Frank Lloyd Wright

Set on 600 desert acres, this was Wright's dramatic response to the starkness and beauty of the rugged environment. Here, antiquity and modernity coalesce, and time seems to halt.

Built by apprentices living in tents, the campus includes the residence and adjacent studio as well as two additions, the theater (1949) and the music pavilion (1956).

As construction began, Wright noticed tawny-colored stones strewn on the desert and the nearby hill. These were set into wooden forms and concrete poured around them; when a wall cured, the form was moved further along for more construction. Redwood beams held canvas panels mounted onto wooden frames. Other rooms were roofed with board decks, tar, and gravel. The original canvas doors and windows were later replaced with glass.



credit: Jeff Noble

**Tempe City Hall** 1970

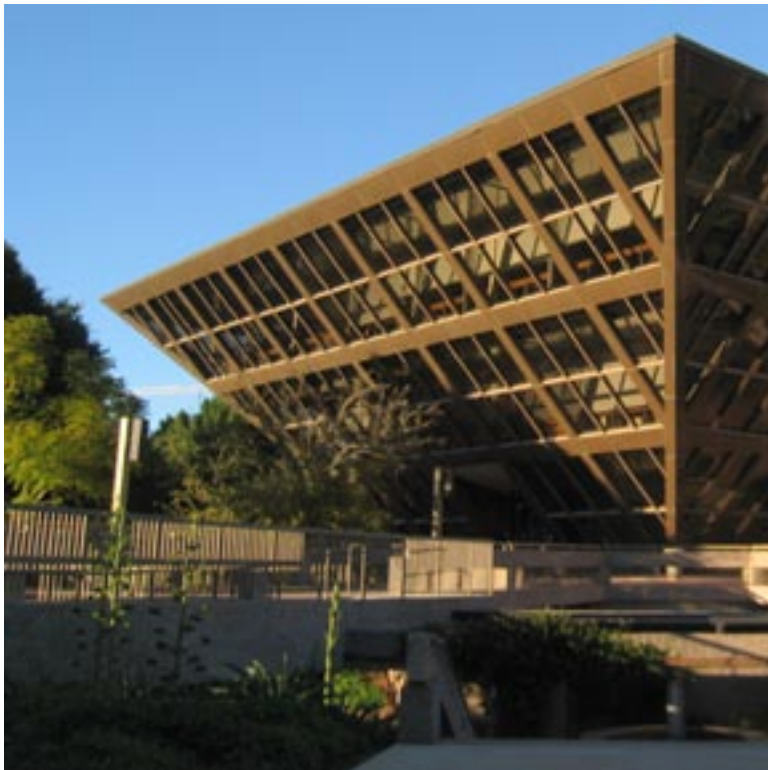
31 East Fifth Street, Tempe, Arizona 85281

Michael and Kemper Goodwin

A tight 300 sf site generated the steel-structured glass-walled inverted pyramid, a three-story municipal office building in which the outward-canted upper stories umbrella the lower floors as well as the richly landscaped sunken courtyard.

The 45-foot-wide bases ascend 45 degrees to roof sides of 120 feet. A stairway in a connecting concrete tower provides emergency exit. Two garden-level additions, in 1986 and 1997, followed the original 55,800 sf building.

Plazas, gardens, pedestrian bridges and promenade decks provide a center-city experience, the shape recalls a timeless structure but uniquely adapted for desert cooling, and the extensive use of glass reaffirms accessibility. A "lantern" for the city, the polyhedral focal point architecturally celebrates progressiveness and openness to citizens' viewpoints as well as invites them to walk in and participate.



credit: City of Tempe

**Three Fountains** 1963

4401 N 40th Street, Phoenix, AZ 85018

Alfred Newman Beadle, AIA

The two-story multi-building community anticipates the nearby Boardwalk. The architect had moved to Phoenix in the 1950s and became an exemplar of the mid-century-modern style, with rectilinear lines and extensive daylighting.

Based on a 16-foot grid, the 59 units, originally designed as two-bedroom, one-and-a-half-bath apartments, were later converted to townhouses. Party walls are CMU, the roof is wood frame and the second levels have wood floors. Most units are oriented north to south, and some are on stilts to maintain level east to west.

The 1,024-square-foot homes include living and dining rooms, kitchens and half-baths on the first floor and two bedrooms and bath on the second. Off each living room is a rear private patio. The garden pathways and two pools reinforce the community spirit.



credit: Wes James + Greg Kilroy

**University of Phoenix Stadium 2007**

One Cardinals Drive, Glendale, AZ 85305

Peter Eisenman + HOK Sport

On 165 acres, the University of Phoenix Stadium encloses 1.7 million flexible square feet, accommodating events such as football, concerts, trade shows and basketball games.

The innovative 63,000-seat stadium, with a form recalling a barrel cactus and coiled snake, debuted the roll-out natural-grass field in the United States and a retractable translucent fabric roof that moves on an arc.

Traveling on a steel rail and driven by cables, the roof doors open at the 50-yard line, creating a 240-by-360-foot expanse to the sky. The roof is supported by two 760-foot-long football-shaped Brunel trusses. The 18.9-million-pound field rolls in and out of the stadium on 13 steel rails embedded in the concrete floor. The curving exterior is clad with painted steel panels and differently-sized glazed slots.



credit: Photo Credit Populous

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Philadelphia, Pennsylvania, native David M. Brown has lived in and loved Arizona for almost 30 years. He writes about what he loves: architecture and construction; food and wine; travel and hospitality; high-performance cars; and the arts.

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