

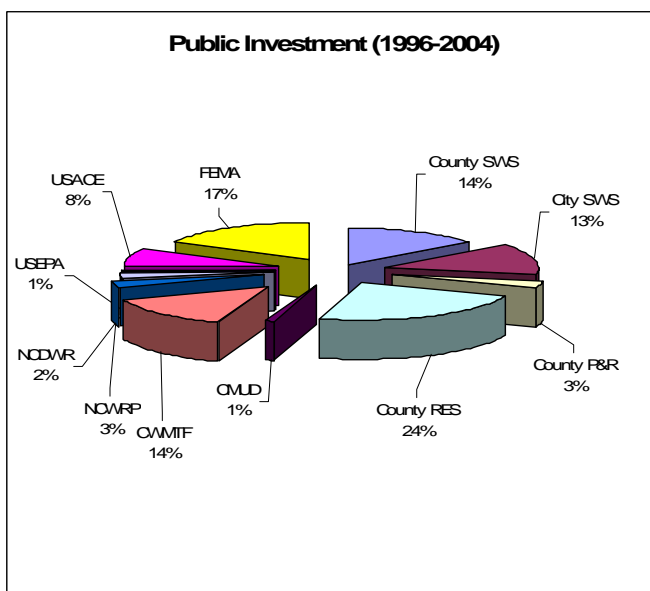
PROGRAM MANAGEMENT / SITE DEVELOPMENT

Little Sugar Creek Environmental Restoration Initiative: conceived the vision and name --- for a watershed-wide restoration effort; this **\$50 million program** was successfully financed by numerous large grants and co-funding agreements that I negotiated and authored.



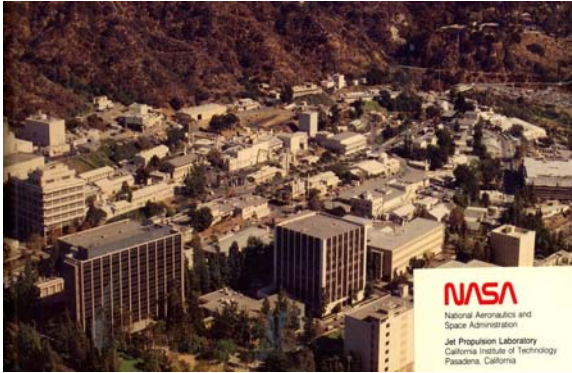
Little Sugar Creek Environmental Restoration Initiative Phase 1 / Hidden Valley Ecological Garden: complete responsibility for project conception, visualization, concept, inter-departmental city-county cost-sharing, grant applications, funding, consultant management, design oversight, budget administration, consultant selection, contractor bidding, landowner & media relations, fee simple acquisition, roadway abandonment, land surveys, permitting in the evolving wetland creation & stream restoration field where criteria were not yet established by USEPA, FEMA, USACE or state for 3,000± feet of stream channel and 13± acres of newly created wetlands. (\$4M)

Little Sugar Creek Environmental Restoration Initiative Phase 2 / Freedom Park & Dam Decommissioning: complete responsibility for project conception, visualization, concept, inter-departmental city-county cost-sharing, funding via NCEEP state sources, consultant management, design oversight, budget administration, consultant selection, contractor bidding, landowner & media relations, creating and permitting newly-developed erosion control concepts for 4,500± feet of stream channel. Included dam removal (sluice gate), streambank liner demolition, Mecklenburg County Park & Recreation Department coordination with on-going events, bedrock blasting, greenway trail design, signage design, public meetings. (\$1½M)



PROJECT	TOTAL
Edwards Branch Watershed Restoration	\$4,400,000
Hidden Valley Ecological Garden	\$3,928,000
Belmont Branch Ecological Garden & Trail	\$3,185,000
Westfield Road Restoration & Greenway Trail	\$9,650,000
Freedom Park Restoration & Greenway Trail	\$1,800,000
Freedom Park Dam Removal	\$40,000
Freedom Park Armor Demolition	\$260,000
State Line / TPL / Regent Land Acquisition	\$2,500,000
Kings Drive Daylighting	\$12,050,000
USACE 1135	\$3,000,000
USACE 206	\$1,800,000
Huntingtowne Farms Park Restoration & Trail	\$1,900,000
Briar Creek Restoration	\$1,700,000
FEMA HMGP Buyout Program	\$2,000,000
Hope Park Branch Restoration	\$800,000
Dairy Branch	\$500,000
Dairy Branch / Magnolia-Kirkwood	\$900,000
TOTAL	\$50,413,000

UTILITY / MISCELLANEOUS



Utilities Master Plan (NASA / Jet Propulsion Laboratory): research of population studies and existing facilities inventory; projected needs at ultimate "build-out"; location and sizing design of sewer, domestic water, natural gas, oil, cooling tower water, gaseous and liquid nitrogen storage and distribution facilities, electrical, communications and security system layout for compilation into master plan report. (\$80,000 design fee)



16" H.P. Gas Main Relocation in Pacific Coast Highway through Dana Point & Laguna Beach (Southern California Gas Company): utility corridor planning, route selection, vertical and horizontal alignment design, Caltrans permitting, traffic control plans, prepared jacked boring plans, calculations, details, specifications, utility research & relocation investigation for 8± miles of new steel natural gas main. (\$4+M construction value)

PERMITTING

North Lake Mall, Charlotte, NC: forensic review of environmental permitting process for regional mall at request of private client via attorney.

Four Mile Creek Stream Restoration, Charlotte, NC: obtained Mecklenburg County Floodlands Development Permit and variance to the local floodplain ordinance; negotiated satisfactory resolution of CMUD concerns; obtained additional stream length two upstream property owners, including county; construction document review for QA/QC and time/cost savings including contractor contact; coordinate w/ NCEEP staff for time extension, additional length.

FINANCE

For **LENNAR HOMES**, while on assignment with a consulting firm, had complete responsibility and oversight of **letters of credit and performance bonds**: their tracking, reduction, releasing and agreement preparation --- 150 bonds at any given time with such lenders as **NATIONSBANK** and **FIRST UNION BANK** valued in excess of \$15 million. This included client coordination, working closely with client superintendents, agency processing and providing updates/reporting. I developed and implemented a computerized tracking system and clerical procedures. A similar system was designed for tracking permits and processing in excess of \$½ million monthly construction invoices for Lennar.

MOUNTAIN ROAD



Kanan & Kanan Dume Roads (Malibu) from Pacific Coast Highway to Ventura (101) Freeway: vertical and horizontal alignment design, including grading (slide stabilization), crib-wall layout, hydrology, hydraulic calculations, tunnel liner design, tunnel approach geometrics, slope subdrains, landslide clearing (\$2,000,000 construction value)

Liberty Canyon Road (City of Agoura) at Ventura (101) Freeway: design of 150' vertical cut adjacent to freeway, on/off ramp; realignment design, vertical and horizontal roadway design parallel to freeway; drainage design. (\$350,000 construction value)

Big Tujunga Canyon Road at MP 8.94 & MP 4.60: road washout restoration, hydrology, hydraulic, structural and cavitation calculations; plan and profile design and drafting; coordination with USFS, Flood Control District & County Fire Department. (\$350,000 construction value)

STORM WATER / DRAINAGE / EROSION CONTROL



120-inch corrugated structural steel plate pipe and 60-inch CMP design (LACDPW) in the Angeles National Forest on Big Tujunga Canyon Road at MP 8.94: road washout restoration, hydrology, hydraulic, structural and cavitation calculations; plan and profile (45° angle) design and drafting; coordination with USFS, Flood Control District & County Fire Department.

Drainage and Stability Study of Big Tujunga Canyon Wash between Foothill Boulevard and Foothill (210) Freeway (City of Los Angeles): hydrology study, firehosed forensic / historical analysis, channel lining study and cost estimates, scour and deposition analysis, consultations with California State University staff and final recommendations in report format.

Ronda Avenue Drainage Channel Study from McAlpine Creek to Sardis Road (City of Charlotte, NC): as a project manager, prepared a planning report for channel and culvert improvements, retention basins, utility relocations, cost/benefit analysis, residential condemnations (structure demolition), homeowner meetings and public hearings in the Stonehaven subdivision. This project involved modeling the existing drainage basin and developing alternatives to alleviate flooding of homes using HEC-1, HEC-2 and HY-8 software. This drainage basin consisted of approximately 640 acres and unimproved channel in an urban subdivision.

Little Sugar Creek Environmental Restoration Initiative Phase 3 / Westfield Road / Myers Park Manor: shared responsibility for project conception, visualization, concept, inter-departmental city-county cost-sharing, grant applications, funding, consultant selection, creating and permitting newly-developed erosion control concepts for 5,000' of stream channel. Included Mecklenburg County Park & Recreation Department coordination, greenway trail design, signage design, public meetings. (\$3M)

Little Sugar Creek Environmental Restoration Initiative Phase 4 / Belmont Avenue Ecological Garden: complete responsibility for project conception, visualization, concept, inter-departmental city-county cost-sharing, grant applications, funding, pre-permitting in the newly-evolving wetland creation field where criteria and rules were not yet established by USEPA, FEMA, USACE or state for 4,000' of stream channel and 5± acres of newly created wetlands. (\$2½M)

SPECIAL ASSIGNMENTS / FLOOD HAZARD MITIGATION

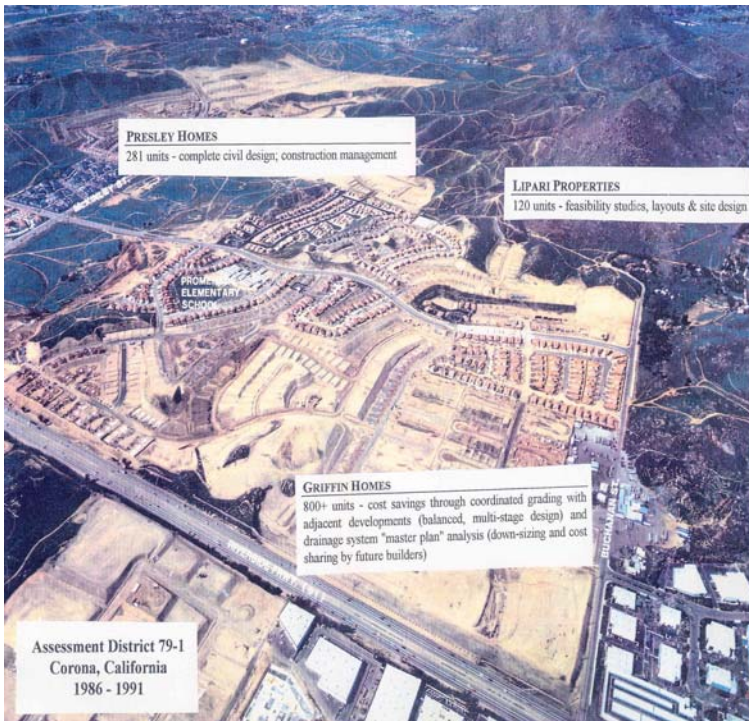
While employed by Mecklenburg County Storm Water Services, I was given wide latitude to create and implement various programs including:



- created a joint city-county inter-departmental training program whereby structures slated for demolition were utilized for training purposes prior to being razed by the following: Charlotte Fire Department (live burn training); Charlotte-Mecklenburg Arson Task Force (arson investigator & K-9 training); Charlotte-Mecklenburg Police Department (bomb squad training); Charlotte-Mecklenburg Police Department (SWAT training); Charlotte-Mecklenburg Police Department (drug-fugitive-weapons K-9 unit training)
- successful grant writing program (\$7± in 5 years) including contract negotiations, primarily CWMTF & NCEEP

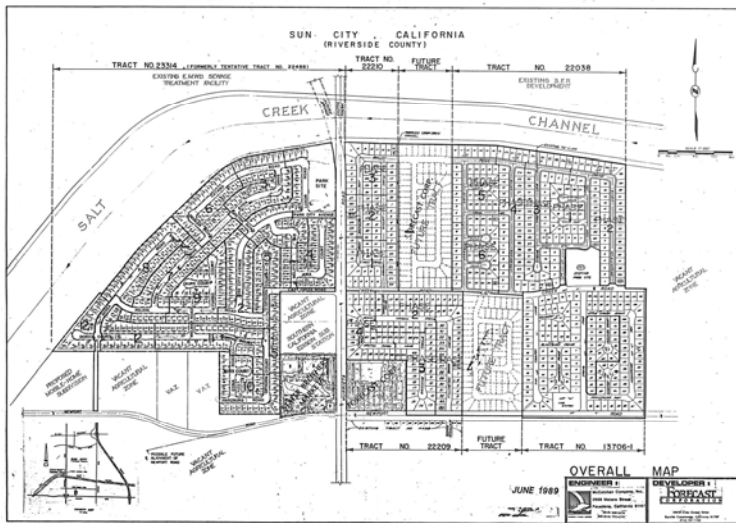
- created a summer-long field trip program to showcase our pre-eminent Mecklenburg County environmental restoration program for professionals & elected officials who visited from throughout the southeastern USA (stream, wetland, buffer, habitat, native vegetation)
- created & executed tri-party agreements between city of Charlotte, Mecklenburg County and state of North Carolina for co-funding of projects: memorandum of understanding (MOU), project cooperative agreement (PCA), permanent conservation easement (PCE)

LAND DEVELOPMENT & GRADING



I am especially skilled in site development and grading to achieve a workable design at an economical cost at the tentative stage of planning. My talents also include "flatland", subdivision, institutional, commercial and multi-family design for both architects and builders. My understanding of grading ordinances and their interpretation yield a workable design that meets building codes. I have performed grading design/review or assisted in the development of the grading, retaining wall & drainage plans for numerous projects. Also construction administration, all aspects of land surveying, title company coordination, contract revisions, feasibility studies (cost & cash-flow analyses), permitting, sub-contractor negotiation, zone change requests, FEMA flood plain revisions and design of all infrastructure systems including pump stations, power and backup power systems.

DOMESTIC WATER



Sun City "Regional" Water System Model & Design for Tracts 22038, 22209, 22210 and 23314 (Eastern Municipal Water District): performed water system model dynamic calculations, system design and sizing including 6" to 21" ACP for approximately 5 miles of new and existing water main. (\$12,000 design fee)

Aufdenkamp Transmission Main Relocation at Santa Maria Avenue (Laguna Beach County Water District): plan and profile design for relocation of 500' of 36" diameter main feeder for Laguna Beach and Dana Point to accommodate new major street;

horizontal and vertical design; cathodic protection design; structural calculations; grading and drainage design. (\$400,000 construction value)

Aufdenkamp Transmission Main System-wide Study of Impacts from On-going Projects (Laguna Beach County Water District): project report and study of impacts from 12 separate projects; acting as agent for District, contacted all developers, engineers and contractors. (\$20,000 design fee)

Hasley Canyon Waterline (Castaic): 1700' of 6" waterline for group of 9 private homeowners; Los Angeles County processing; homeowner meetings, presentations and coordination; vertical and horizontal alignment design; survey; right-of-way analysis; water system calculations to nearest reservoir 2 miles away. (\$50,000 construction value)

Cabazon Indian Reservation Tract 0001, Indian Sands Development, Coachella Valley, CA: domestic water system calculations, report and system layout for Riverside County approvals for over 1000 single family homes.

SANITARY SEWER / LIFT STATION



Salt Creek Channel Interceptor Sewer and Sewage Lift Station, Sun City, Riverside County (Eastern Municipal Water District): responsible for system-wide study of 1000+ acres; flow generation; trunk sewer routing alternates; reviewed final vertical and horizontal design of 1 mile of dual 15" VCP, 1000' of 21" VCP, 1000' of 48" Spirolite beneath Salt Creek Channel and 8200' of horizontal and vertical design for 42" Spirolite; complete design of non-standard 3 MGD sewage lift station and all appurtenant facilities including coordination with pump supplier and electro-mechanical engineer. (\$750,000 construction value)

Numerous subdivision projects in Riverside County and Corona that included plan & profile design, hydraulic calculations, project report, alternate material analysis, tributary drainage area studies, lift station design, agency negotiations, cost estimates, contractor coordination, construction modifications, special detail design and bedding calculations (\$4,000,000 TOTAL construction value)