

5.0 PUBLIC FACILITIES AND SERVICES

Development of the Plan area requires numerous public facilities and services which must be carefully coordinated. The Plan describes all on-site public facilities and services necessary to support the land uses envisioned in the ultimate development of the Plan area. Certain off-site facilities are also described.

This section describes existing facilities, the projected demand for new or expanded facilities resulting from Plan area development, and the nature and location of all proposed facilities, including the following:

- ◆ Water
- ◆ Wastewater
- ◆ Stormwater Drainage
- ◆ Schools
- ◆ Parks and Open Space
- ◆ Fire Protection
- ◆ Police
- ◆ Public Utilities

Separate plans for water, sewer, and storm drainage systems are included. All other public facility locations are illustrated in Figure 3-1, Specific Plan Land Use Map. Streets are addressed separately in Section 4.0, and public parks are described in Section 5.0.

The public facilities described are based on projected demand created by ultimate residential development of the Plan area in accordance with densities described in Figure 3-1, Land Use Diagram, and described in Section 3.2. Adjustments in design, sizing and location can be expected in conjunction with improvement plans as a result of detailed project design.

Policies pertinent to the siting and design and financing of the public facilities are provided in Sections 8.0 and 9.0 of this Plan. Information relative to cost, financing, maintenance, and phasing of public facilities and services is contained in Section 9.0.

5.1 General Public Services and Facility Standards

1. Public facilities, such as fire stations and utility substations, shall be located, designed and oriented in a manner which is harmonious with adjoining residential development and reduce impacts associated with noise, nighttime illumination, and odors. (See Section 8.9 of the Design Guidelines).
2. With the exception of existing high voltage transmission lines, all new electrical and communication facilities shall be installed underground; however, pad-mounted transformers and electrical substations are permitted. This policy shall not apply to 5-acre parcels or larger.

3. To minimize visual impacts, the architectural and site design for all public facilities, including fire station, pump stations, and electrical substations, shall conform with Section 8.9 of the Design Guidelines.
- 4 Public facilities and services shown in this Plan, including parks, roads, and infrastructure, shall be offered for dedication in conjunction with the residential subdivision process. Bass Lake Road, primary local roads, and infrastructure trunklines may be constructed in advance of village development, as needed.

5.2 Water Facilities

5.2.1 Existing Water System

The 12-inch Bass Lake Conduit and the 18-inch Gold Hill Intertie are adjacent to the western and northwestern project boundary. There are 8-inch waterlines in Covello Circle, Castana Drive and Country Club Drive, a 6-inch waterline in Knollwood Drive and a 12-inch waterline adjacent to the eastern property boundary. An 8-inch waterline is also located in Merrychase Drive adjacent to the southeastern boundary.

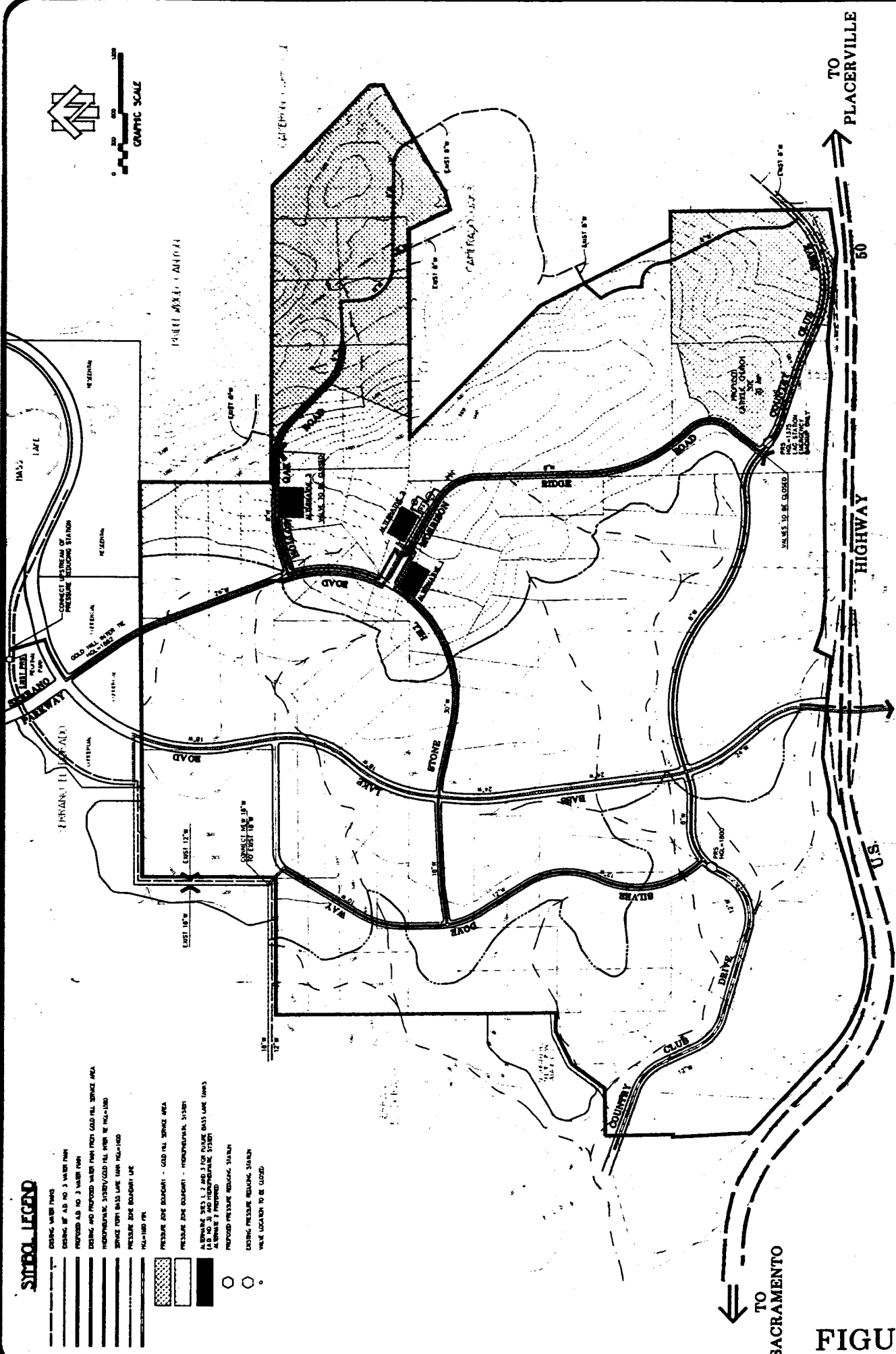
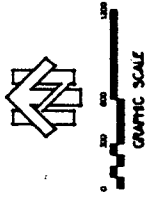
The adequacy of these water facilities is the subject of an ongoing study to determine the remaining capacity in the Cameron Park area and the project(s) required to increase capacity for the proposed project; however, the remaining capacity will be on a first come-first served basis.

5.2.2 Proposed Water System

According to EIR use figures adjusted to reflect a total of 1,458 units, Plan area buildout will result in an average daily demand for 892,000 gallons of water. Water for all Plan area development will be provided by El Dorado Irrigation District (EID) through the Gold Hill Intertie system and/or the proposed Placerville Ridge Conduit via connections to the north of the Plan area.

Figure 5-1, Water Plan, illustrates the approximate locations of water trunklines and reservoirs needed to serve ultimate Plan area development. Major water distribution lines will be located within major street rights-of-way. Service to areas above elevation 1,280 feet will require the use of a hydro-pneumatic booster pump station during high demand periods to sustain adequate pressure. During lower demand periods, this area can be served through a pressure reducing station off of the 18-inch Gold Hill Intertie. Service to the remainder will come from the Gold Hill Intertie in conjunction with a new EID water storage facility.

In order to receive water service, buy-ins to Assessment District #3 (AD#3) or participation in the construction of facilities paid for by the El Dorado Hills supplemental connection fee will be necessary. The cost and potential methods of financing construction of the water system are described in Section 9.4.



SYMBOL LEGEND

- EXISTING WATER MAINS
- EXISTING 18" AND 30" WATER MAINS
- PROPOSED 18" AND 30" WATER MAINS
- EXISTING AND PROPOSED WATER MAIN FROM GOLD HILL SERVICE AREA
- HIGH-PRESSURE SYSTEM/GOLD HILL FROM THE 160-1600
- SERVICE FROM BASS LAKE FROM 160-1600
- PRESSURE ZONE BOUNDARY LINE
- 160-1600 ZONE
- PRESSURE ZONE BOUNDARY - GOLD HILL SERVICE AREA
- PRESSURE ZONE BOUNDARY - HIGH-PRESSURE SYSTEM
- ALTERNATE 30", 42" AND 60" FOR BASS LAKE LINES (AS NO. 30" AND HIGH-PRESSURE SYSTEM AT 160-1600)
- PROPOSED PRESSURE REDUCING STATION
- EXISTING PRESSURE REDUCING STATION
- VALVE LOCATION TO BE CLOSED

**BASS LAKE HILLS SPECIFIC PLAN
MASTER WATER SYSTEM**

FIGURE 5-1

The siting and design of above-ground water reservoirs shall conform to Section 8.0, Design Guidelines, in order to minimize visual impact.

5.2.3 Water Conservation Standards

1. Landscaping, excluding lawn areas in all public parks and street rights-of-way, shall be achieved with low water-using native plants and trees and irrigation systems which utilize the best available technology for water conservation and comply with State and local regulations.
2. Construction of residential projects shall be encouraged to utilize low water-using plants and irrigation and plumbing systems which utilize the best available technology for water conservation and comply with State or local regulations.
3. Established indigenous plants, trees, and shrubs shall be protected as much as possible.
4. Efficient irrigation systems which minimize runoff and evaporation and maximize the water that will reach plant roots shall be utilized; i.e., drip irrigation, soil moisture sensors, and automatic irrigation systems, should be used to the maximum extent possible.

5.3 Wastewater System

5.3.1 Existing Wastewater System

A 6-inch force main is in Country Club Drive adjacent to the southeastern corner of the project boundary. An 8-inch sewer main is at the end of Covello Circle which abuts the Plan area. There is a 12-inch sewer main in Thornhill Drive adjacent to the northeastern property boundary and an 18-inch sewer main crosses the eastern portion of the property.

The EID Deer Creek and El Dorado Hills wastewater treatment facilities are presently at capacity.

5.3.2 Proposed Wastewater System

According to EIR use figures adjusted to reflect a total of 1,458 dwelling units, Plan area buildout will generate approximately 1,749,600 gallons of sewage per day on a peak demand basis. Sewer service will be provided by EID as part of a larger system which serves surrounding development.

As shown in Figure 5-2, Sewer Plan, the Plan area is within two sewer service areas. The majority of the western portion is within the El Dorado Hills service area. The eastern portion of the Plan area is within the Deer Creek service area. Sewage collected within the Plan area will be transported beyond the Plan area using existing, off-site trunklines which will be extended to the east and west, to either the El Dorado Hills treatment plant located south of U.S. Highway 50 off Fee Road, or the Deer Creek treatment plant.

Most sewer lines will be located in the right-of-way of primary local roads; although in limited instances, sewer lines may be installed within public utility easements located in open space areas or on residential parcels. As shown in the sewer plan, sewage from development on the east side of Bass Lake Road (within the El Dorado Hills service area) will be conveyed by gravity in 8 inch lines. Sewage collected from the El Dorado Hills Service area portion of the Plan will be conveyed to the proposed AD#3 sewer facility as shown on Figure 5-2.

In order to receive sewer service from the El Dorado Hills sewer system, a buy-in to AD#3 will be necessary. The cost and potential methods of financing construction of the sewage disposal system are described in Section 9.0.

5.3.3 Wastewater Standards

To the extent possible, reclaimed water shall be made available for use in irrigation within the Plan area or at off-site locations, such as the El Dorado Hills Golf Course.

5.4 Stormwater Drainage

The Plan area contains a number of naturally occurring intermittent streams and drainage courses. Approximately 90 percent of the Plan area drains westerly into Carson Creek. The remainder drains easterly into Deer Creek. (See Figure 1-5, Wetlands and Hydrology Map, which illustrates these features)

To the maximum extent practicable, the development proposal will plan to convey stormwater drainage via the existing drainage courses. Plan policies provide for the use of natural channels for the collection and conveyance of stormwater runoff and do not propose substantial alteration of existing drainage catchments. The Plan will comply with the provisions in the appropriate sections of the County of El Dorado Drainage Manual.

Intermittent streams within the Plan area will be preserved in essentially a natural state. These areas will be utilized as receiving areas for compensation tree planting, open space, wildlife habitat, and recreation facilities (trails and bike paths).

Closed conduit storm drainage will be limited to locations primarily at street crossings and where surface conveyance is not feasible due to mass pad grading and high density development. Design of all storm drainage facilities and conveyance systems will comply with the provisions in the appropriate sections of the County of El Dorado Drainage Manual.

Figure 5-3, Storm Drainage Plan, identifies the major drainage patterns and catchment boundaries within the Plan area. Preliminary estimates of future flow rates from each catchment and the size and location of proposed culvert crossings of major roadways are provided.

Each tentative map application within the Plan area shall include a storm drainage plan consistent with Figure 5-3 and provisions of the County of El Dorado Drainage Manual. The planning and design of drainage systems will take into consideration any potential downstream impacts, including those to existing drainage facilities, property, flow regimes, water quality, or riparian and wetlands areas. A drainage study which identifies and analyzes drainage-related impacts as a result of development of the map area will be submitted. Provisions mitigating potential impacts shall be included as a part of the drainage analysis. Submittal and approval of the drainage analysis will be required prior to recordation of any final map.

Increases in stormwater runoff resulting from development is discouraged in El Dorado County. Improvements which propose to increase stormwater runoff will be evaluated to determine if downstream conveyance facilities can accept and convey the runoff increases. When downstream facilities are unable to adequately accommodate increases in stormwater runoff, detention basins may be utilized for the reduction of increases in peak runoff. If utilized, these facilities will be incorporated into public parks and open space whenever possible. Detention facilities may be constructed as necessary within each individual village; however, a coordinated effort between villages within a common watershed toward the development of a regional detention facility is an acceptable alternative and encouraged. Regional facilities are encouraged because these types of facilities could potentially lead to a more efficient storm drainage system and provide reductions in construction and maintenance costs. The County of El Dorado may require reservation of capacity of these facilities as necessary for the mitigation of regional flooding problems. Design of these facilities will comply with the provisions in the appropriate sections of the County of El Dorado Drainage Manual.

5.4.1 General Stormwater Facility Policies

1. Storm drainage detention basins shall be designed and constructed to comply with the provisions in the County of El Dorado Drainage Manual.
2. Storm drainage detention basins may be located in open space areas and parks and may be accessible to the public in order to serve a dual impact mitigation/recreation function. Detention basins shall be designed to ensure public safety, to be visually unobtrusive, and to provide wildlife habitat. Landscaping around the perimeter of the basin shall be encouraged. (See Section 8.3 of the Design Guidelines)
3. To protect water quality, catch basins which incorporate oil, grease, and sediment traps will be installed along urban streets in order to intercept storm runoff prior to release into intermittent streams. A conceptual illustration of a silt/grease trap is provided in Figure 5-4. Other suitable best management practices may be employed to reduce point sources of pollutants. Maintenance of these facilities shall be provided through a County Service Area, Zone of Benefit (CSA, ZOB).

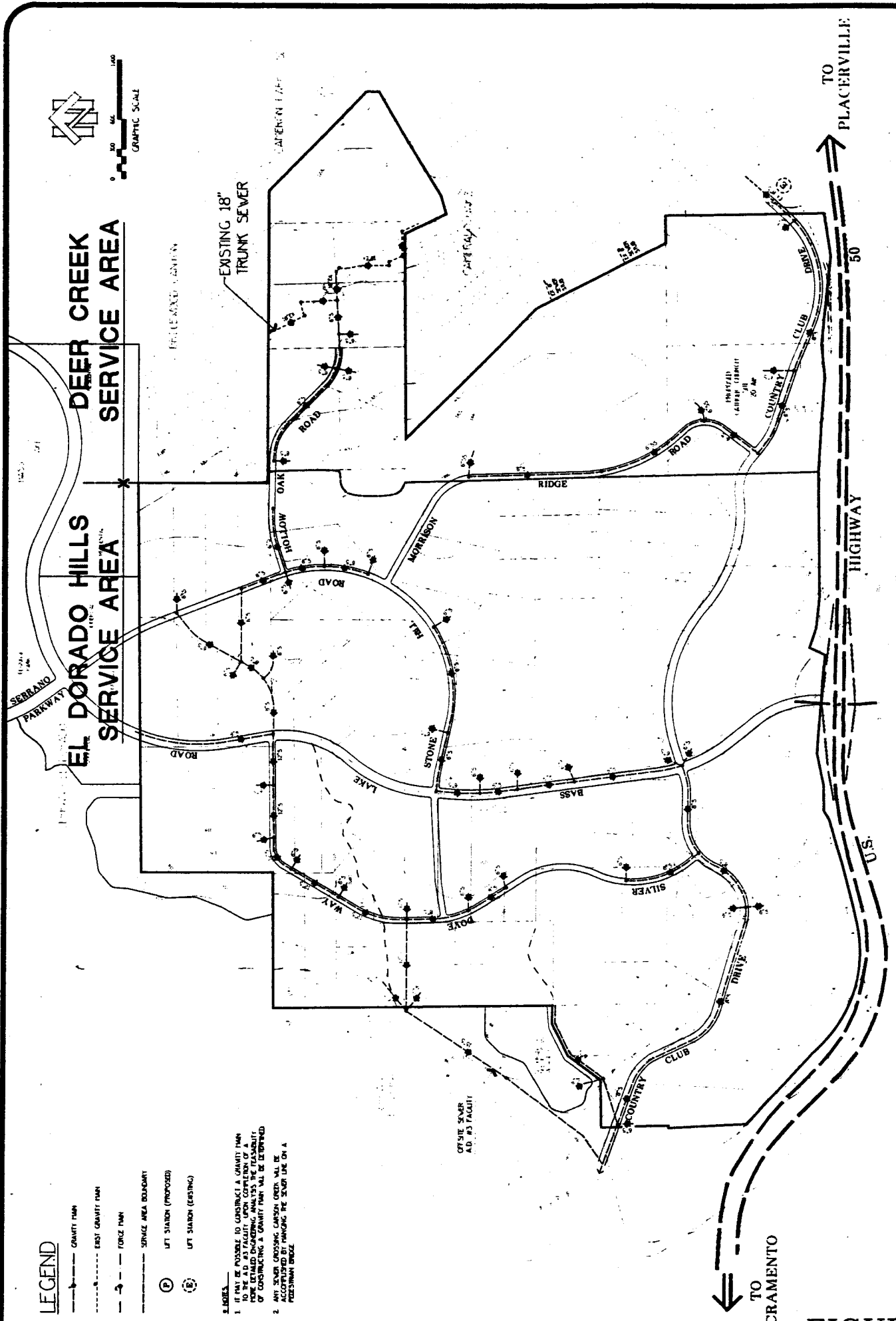
LEGEND

- GRAVITY MAIN
- - - EAST GRAVITY MAIN
- - - FORCE MAIN
- SERVICE AREA BOUNDARY
- ⊕ UFT STATION (PROPOSED)
- ⊙ UFT STATION (EXISTING)

NOTES

1. IF IT IS POSSIBLE TO CONSTRUCT A GRAVITY MAIN TO THE A.D. #3 FACILITY, UPON COMPLETION OF A FURTHER DETAILED ENGINEERING ANALYSIS THE FEASIBILITY OF CONSTRUCTING A GRAVITY MAIN WILL BE DETERMINED.
2. ANY SEWER CROSSING CAMDEN CREEK WILL BE ACCOMPANIED BY FURNISHING THE SEWER LINE ON A PERMANENT BRIDGE.

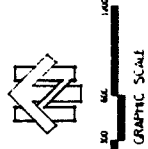
OFFICE SEWER A.D. #3 FACILITY

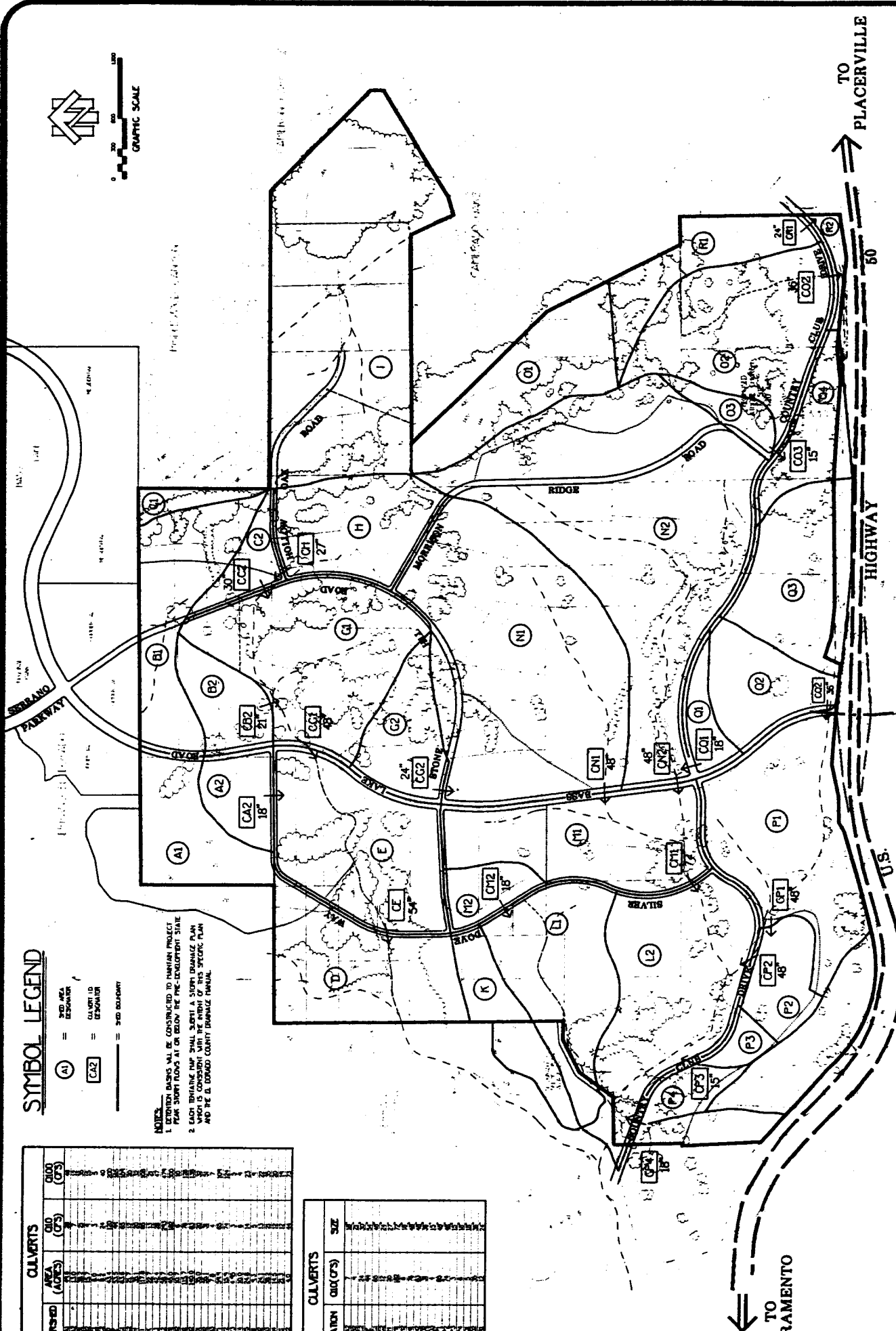
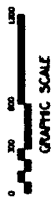


EL DORADO HILLS SERVICE AREA
DEER CREEK SERVICE AREA

BASS LAKE HILLS SPECIFIC PLAN
SEWER PLAN

FIGURE 5-2





SYMBOL LEGEND

- (A) = 3RD AREA BASIN
- CA1 = CULVERT IDENTIFICATION
- = 3RD DRAINAGE

NOTES:
 1. EXTENSION BASINS MAY BE CONSTRUCTED TO MAINTAIN PROJECT PEAK STORM FLOWS AT OR BELOW THE PRE-DEVELOPMENT STATE.
 2. EACH IDIARINK MAP SHALL SHOW A STORM DRAINAGE PLAN WHICH IS CONSISTENT WITH THE INTENT OF THIS SPECIFIC PLAN AND THE B. DODD COUNTY DRAINAGE MANUAL.

WATERBED	AREA (ACRES)	Q10 (CFS)	Q100 (CFS)

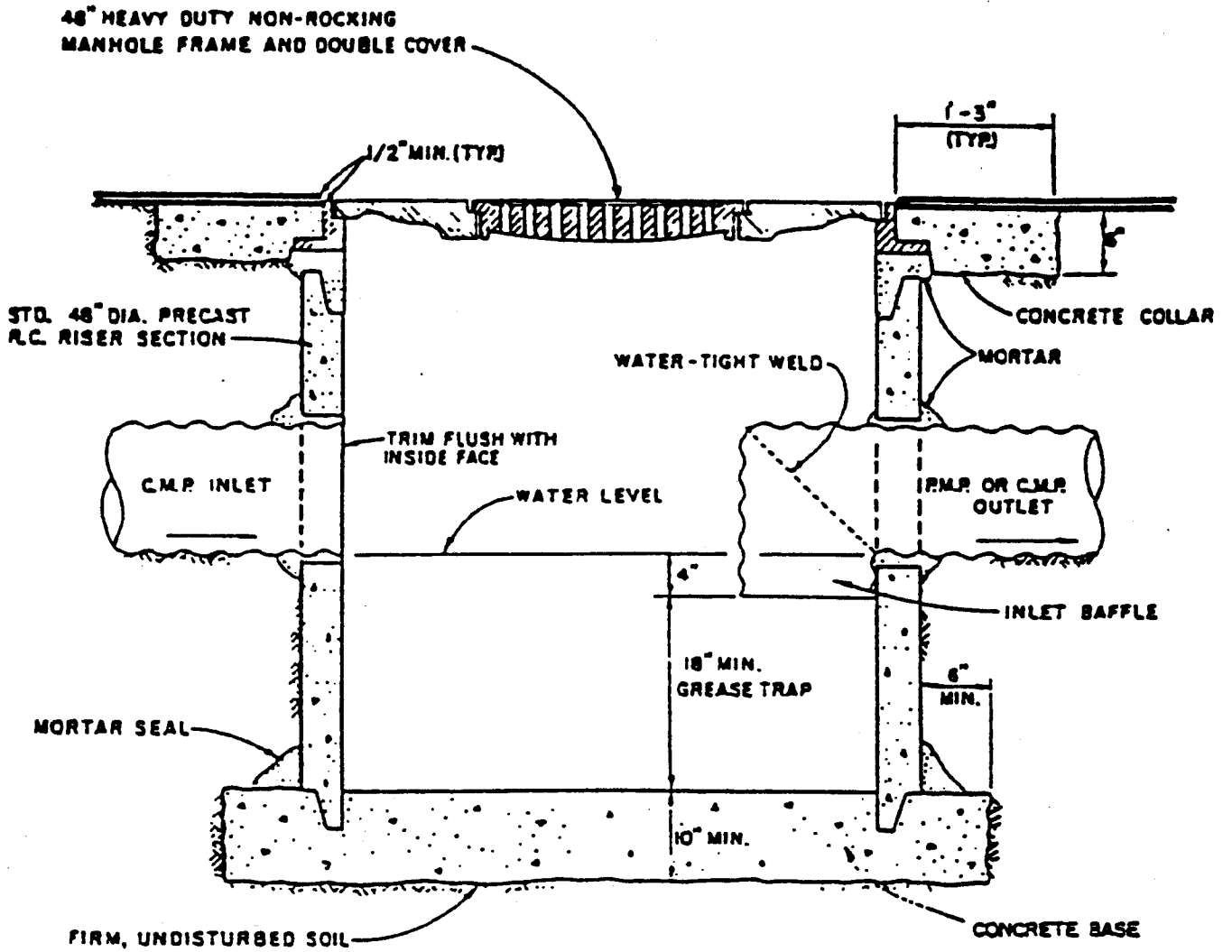
CULVERTS		
LOCATION	Q10 (CFS)	SIZE

BASS LAKE HILLS SPECIFIC PLAN STORM DRAINAGE PLAN

FIGURE 5-3

Figure 5-4

Silt/Grease Trap



ELEVATION
no scale

5.5 Schools

Property within the Plan area is located within the Buckeye Union School District, Rescue School District, and the El Dorado Unified High School District. According to the EIR figures, ultimate Plan area development is expected to generate 580 elementary school students, 178 middle school students, and 342 high school students, for a total of 1,100 students.

As shown in Figure 3-1, Specific Plan Land Use Map, the Plan has designated a site reservation for an elementary school in accordance with the needs identified in the EIR. Final school site selection is the responsibility of the school districts. School site selection and design shall be encouraged to adhere to policies set forth in Section 9.1.7 and Section 8.9.

5.6 Parks and Recreation Facilities

Through the provision of parks and open space, the Plan provides for a variety of active and passive recreation needs. This section describes parks and open space amenities in the Plan area. Open space areas are depicted in Figure 5-5, Parks and Open Space Plan.

5.6.1 Recreation Facilities

The potential Plan area development will generate the need for approximately 24 acres of parkland including both area-wide and neighborhood facilities. In addition, the El Dorado County Hiking and Equestrian Trails Master Plan designates hiking and bicycle routes in the Plan area.

Parks in the Plan area are intended to serve both active and passive recreation needs. Park land and facilities will be provided in accordance with requirements of the EDHCSD Recreation Facilities Master Plan (RFMP). It is anticipated that all park sites will be dedicated to and maintained by the EDHCSD. Ultimate site selection and development is the responsibility of that body. The EDHCSD RFMP requires that one or more park sites be provided in each village that contains 50 or more units. These park site locations will be determined in conjunction with the review of subdivision applications submitted for projects within the Plan area.

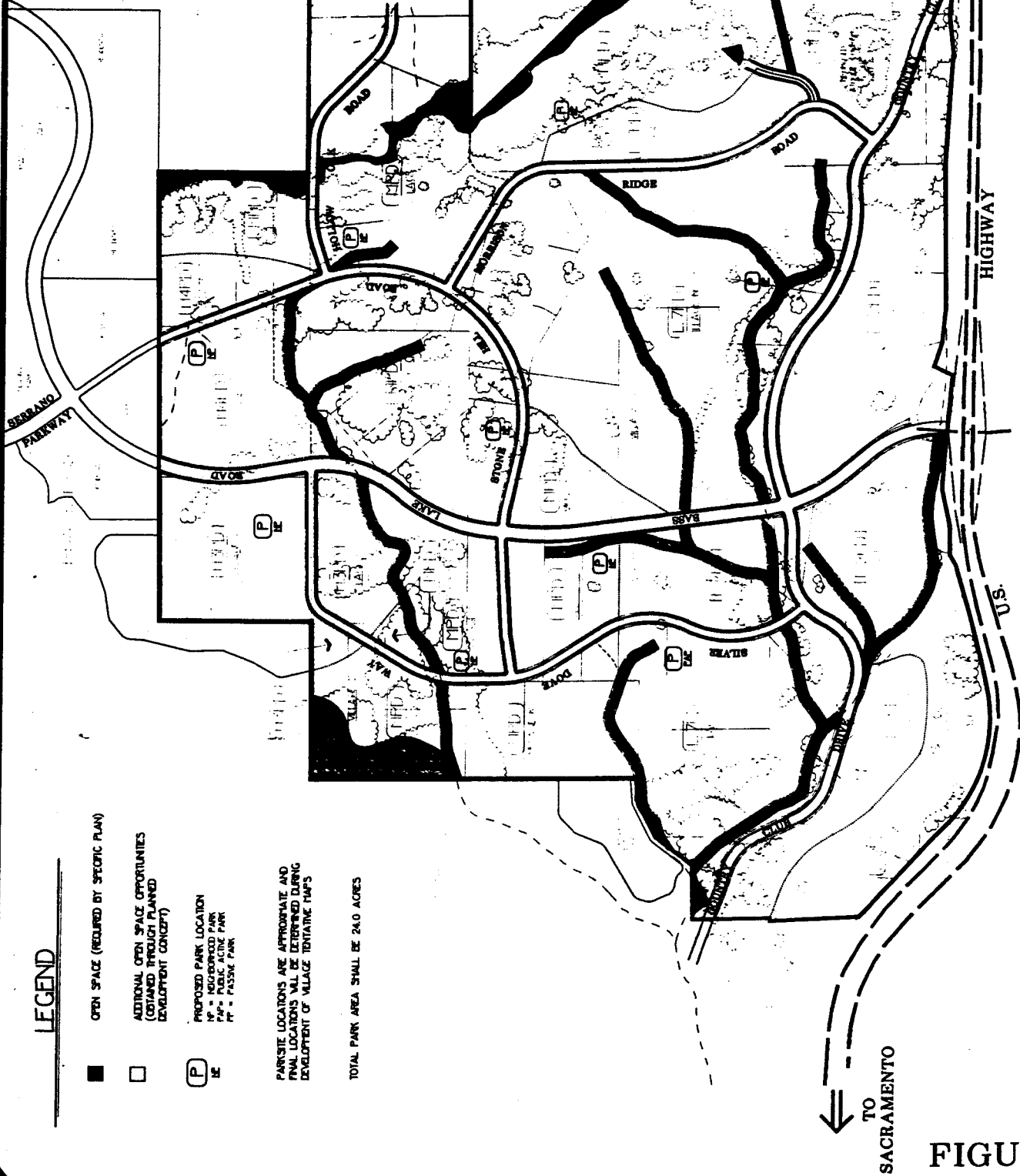
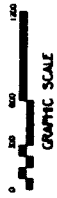
All park site reservations and design shall adhere to the policies set forth in Section 4.2.8 of the El Dorado County Parkland Dedication Ordinance and the requirements of the CSD.

LEGEND

- OPEN SPACE (REQUIRED BY SPECIFIC PLAN)
- ADDITIONAL OPEN SPACE OPPORTUNITIES (OBTAINED THROUGH PLANNED DEVELOPMENT CONCEPT)
- (P) PROPOSED PARK LOCATION
 - RP = RECREATION PARK
 - PP = PUBLIC PLAY PARK
 - PT = PASTURE PARK

PARKSITE LOCATIONS ARE APPROXIMATE AND FINAL LOCATIONS WILL BE DETERMINED DURING DEVELOPMENT OF VILLAGE TENTATIVE PUP'S

TOTAL PARK AREA SHALL BE 24.0 ACRES



**BASS LAKE HILLS SPECIFIC PLAN
PARKS AND OPEN SPACE PLAN**

FIGURE 5-5

5.6.2 Recreation Facility Standards

1. Parks shall be sized and contain the recreation amenities and facilities consistent with the requirements of EDHCSD RFMP to serve the needs of nearby residents.
2. Wherever possible, school sites should be located adjacent to park sites. Joint-use agreements between the EDHCSD and the school districts are encouraged in order to allow the sharing of costs and operational responsibilities. In such instances, recreation amenities, including play equipment, should be coordinated to minimize duplication. Such facilities would be subject to Table 1 of Appendix 1 of the EDHCSD RFMP.
3. Parks shall be landscaped with drought-tolerant and fire resistant plant species, excluding lawn areas, to the maximum extent possible to reduce irrigation and maintenance requirements.
4. Parks shall comply with El Dorado County Water Conserving Landscape Standards (Resolution 69-93).
5. Parks will be subject to oak tree mitigation measures stated herein and will serve as receiving areas for mitigation tree plantings.
6. Parks shall be designed to front along at least two roads to facilitate security surveillance and public access.
7. All parks within the Plan area shall be offered for public dedication in accordance with the EDHCSD RFMP Facility Standards. Parks shall be developed concurrently with residential development.
8. Park locations shall be determined through the approval of PDs and installed at the time of final map approval.
9. Important natural features within park sites, such as oak trees, and stream and drainage corridors, should be preserved and incorporated into the park development.

5.7 Open Space

The Plan provides a variety of options to create open space amenities both for the benefit of Plan residents and as a means of conserving natural features and wildlife habitat. Open space designated in Figure 5-5, Parks and Open Space Plan, totals approximately 144 acres and includes the following types:

- ◆ Open space along intermittent streams
- ◆ Open space as community buffers
- ◆ Open space in tree grove areas and along Carson Creek

Additional open space is provided by the landscape easements and/or rights-of-ways required along Bass Lake Road and all primary local roads. These 15- and 25-foot-wide areas will provide nearly 30 acres of linear open space for pedestrian facilities and landscape amenities. The historic Clarksville Toll Road will create a trail (linear open space) nearly a mile and one-half in length and 25 feet in width through the Plan area, from the Bar J Ranch subdivision on the east to the EDHSP on the west.

The linear open space included in the Parks and Open Space Plan and the Land Use Diagram will serve to provide separation between villages in the Plan area and separate the Plan area from adjacent communities, while providing circulation routes for Plan area residents and wildlife. At the same time, open space areas will preserve remaining biotic and scenic resources and provide receiving areas for compensation trees.

In addition to open space shown on the Land Use Diagram, Plan policies relative to oak tree preservation may result in additional open space; however, such open space would not be available for public access unless dedicated for such use by the property owner and accepted by the CSD.

5.7.1 Open Space Policies

1. Open space areas which remain in private ownership shall be encumbered by a conservation setback not open to public access, except where public access easements have been recorded. (See Section 9.1.7)
2. Except for the limited installation of underground public utilities, water and sewer lines, and construction of maintenance roads and pedestrian paths, grading and construction shall be prohibited within open space areas. Mitigation tree planting is encouraged, as defined in this Plan. Where utilities are installed, grading and vegetation removal shall be the minimum necessary, and shall conform to all policies set forth herein.
3. Construction of all-weather pedestrian paths within public access easements are required within public open space areas where shown.
4. All pedestrian paths and trails shall be designed in accordance with standards contained in the El Dorado County Hiking and Equestrian Trails Master Plan.
5. Public open space areas shall be accessible to fire suppression equipment to the satisfaction of the fire protection district.

5.8 Fire Protection Facilities

Development of the Plan area may require the construction of one fire station within the Plan area. The Plan designates a site approximately 1.5 acres in size to accommodate future construction. Site selection shall commence when the first subdivision map application is filed. Construction shall commence when the first final map west of Morrison Ridge Road is filed.

5.8.1 Fire Protection Policies

Tentative maps may be approved only after the fire department determines that adequate fire protection services will be provided.

5.9 Police

Law enforcement will be provided by the El Dorado County Sheriff's Department. Service will be provided from the Sheriff's Headquarters located in Placerville.

5.10 Public Utilities

According to the service providers, public utilities, including electrical and telephone services, are currently available in the area and will be provided to Plan area development. The closest natural gas services are within the EDHSP, and may also be extended into the area if desired by Plan area developers.

All existing and new electrical and telephone transmission lines will be installed underground in conjunction with development of individual properties. As indicated in Section 8.0, Design Guidelines, particular attention will be given to the siting and design of all above-ground facilities, such as transformers and electrical substations.