

PLANT MATRIX
Pico Power Plant Project

Symbol	Botanical Name	Common Name	Specimen Planted		Survival at 5 years?	Survival at 10 years?	Survival at 20 years?	Mature Height	Mature Width	Growth Rate				
			5' 24" Box	5' 24" Box										
⊕	All trees to be 24" box unless noted otherwise.													
⊕	Species: Symptlocos 'Las Albor'	Coast Redwood	5	5	Yes	Yes	35'	50-55'	80'	15'	100'	20'	Fast	
⊕	All shrubs to be 5-gallon unless noted otherwise.													
⊕	Protea Fragrant	Protea (Red Foliage)	3-4'	23	Yes	6-8'	8-10'	12'	15'	15'	15'	15'	Fast	
⊕	Medium Oleander	Oleander (White Flowers)	3-4'	9	Yes	6-8'	8-10'	15'	15'	15'	15'	15'	Med-Fast	
⊕	European Plectranthus	Deer Daisy (Yellow Flowers)	2-3'	21	Yes	3-4'	4'	4-5'	5'	5'	5'	5'	Moderate	
⊕	Indian Hawthorn	Indian Hawthorn (Pink Flowers)	2-3'	15	Yes	3-4'	4'	4-5'	5'	5'	5'	5'	Moderate	
⊕	Ground Covers	10 to be planted from cuttings unless noted otherwise.												
⊕	Carolinian Grasses	Carroll Carpet (Blue Flowers) Plant from 1-gallon size at 5 feet on center.											Fast	
⊕	Hydrangea	Star Jasmine (Blue & White Flowers) Plant from cuttings @ 3 feet on center.											Med-Fast	
⊕	Trachelium													
⊕	Jasminoides													

Notes:
 1. The spread of the tree canopies, at 20 years growth, is only approximate, as shown on the Conceptual Plan due to the large scale of this plan. However, the exact spread of trees, at 5 yrs & 20 year's growth, is identified on the matrix and is shown in true scale, on the visual simulations.
 2. Existing trees (Acacia/Silk Trees) growing along Lafayette Street, within the right-of-way to be removed.

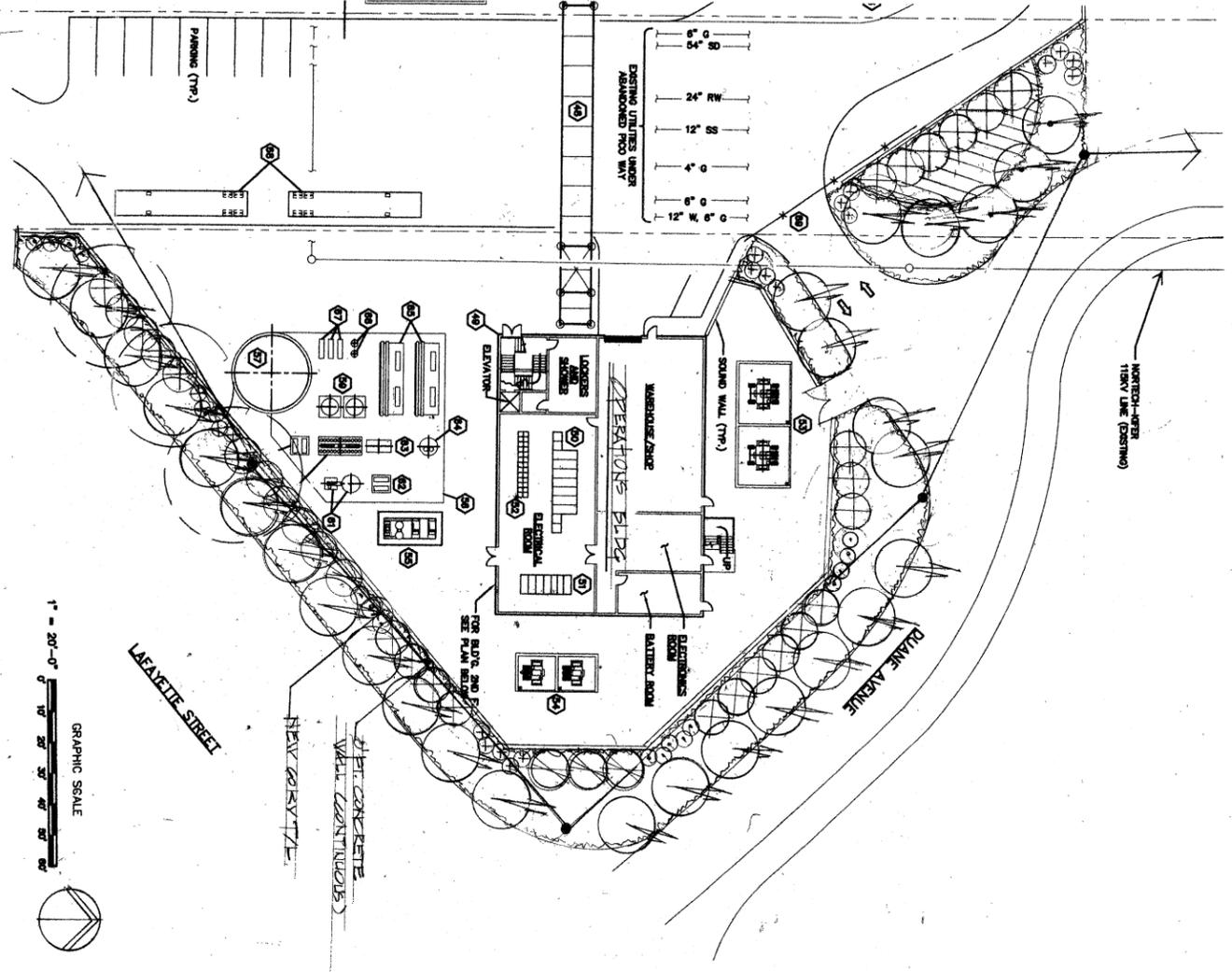
GENERAL NOTES:

Goals:

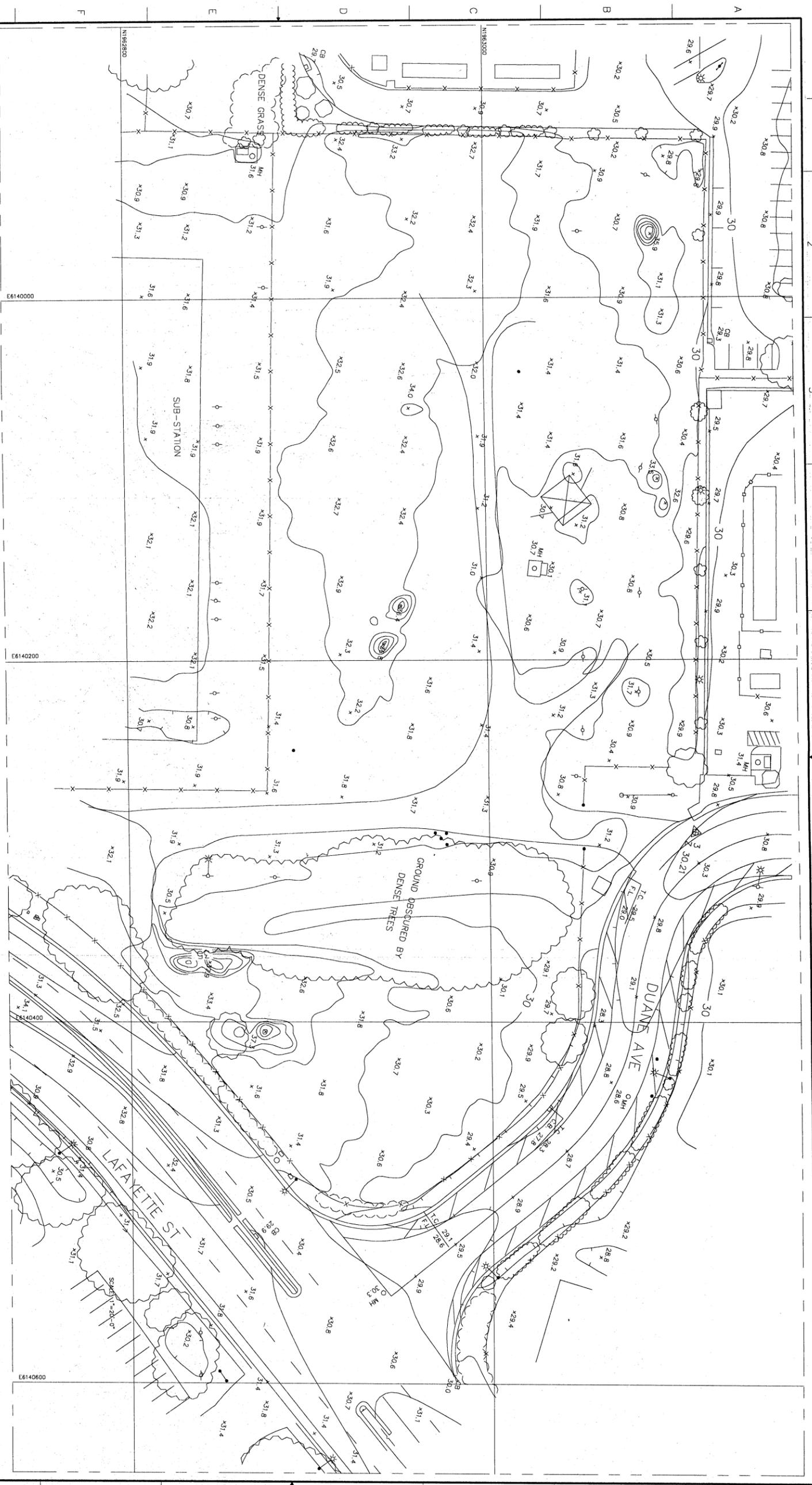
- To develop a planting scheme that will partially screen and visually soften the appearance of the power plant, along the East Side, from Key Observation Points (KOPS).
- To develop an energy efficient, low maintenance landscape concept through planting trees, shrubs and ground covers hardy to coastal conditions & acclimated to this area and use recycled water ("gray water"), as a source for irrigation of plants.

Design Concept

- To minimize landscape maintenance and insure survival of plant species over time by mainly planting drought tolerant, wind tolerant plant species that survive well in this climate zone (zone 17).
- To create an attractive and interesting landscape appearance by creating a landscape scheme that reflects that simplicity and visual continuity by planting tall pyramidal trees as shrub trees and planting only species of shrubs in small bands, having contrasting forms, colors and textures, in alternating groups along perimeter walls around the northeast and eastern side of the power plant.
- To propose large, fast growing, evergreen pyramidal trees along the northeast and east side of the power plant to soften the visual appearance of the major power plant structures.
- To create an established appearance, in a short time, through planting all the trees at a large size (24" box), and all shrubs at a 5-gallon size.
- To install a conventional, permanent irrigation system with low precipitation heads and an automatic irrigation controller which will provide uniform irrigation coverage with minimum water usage.



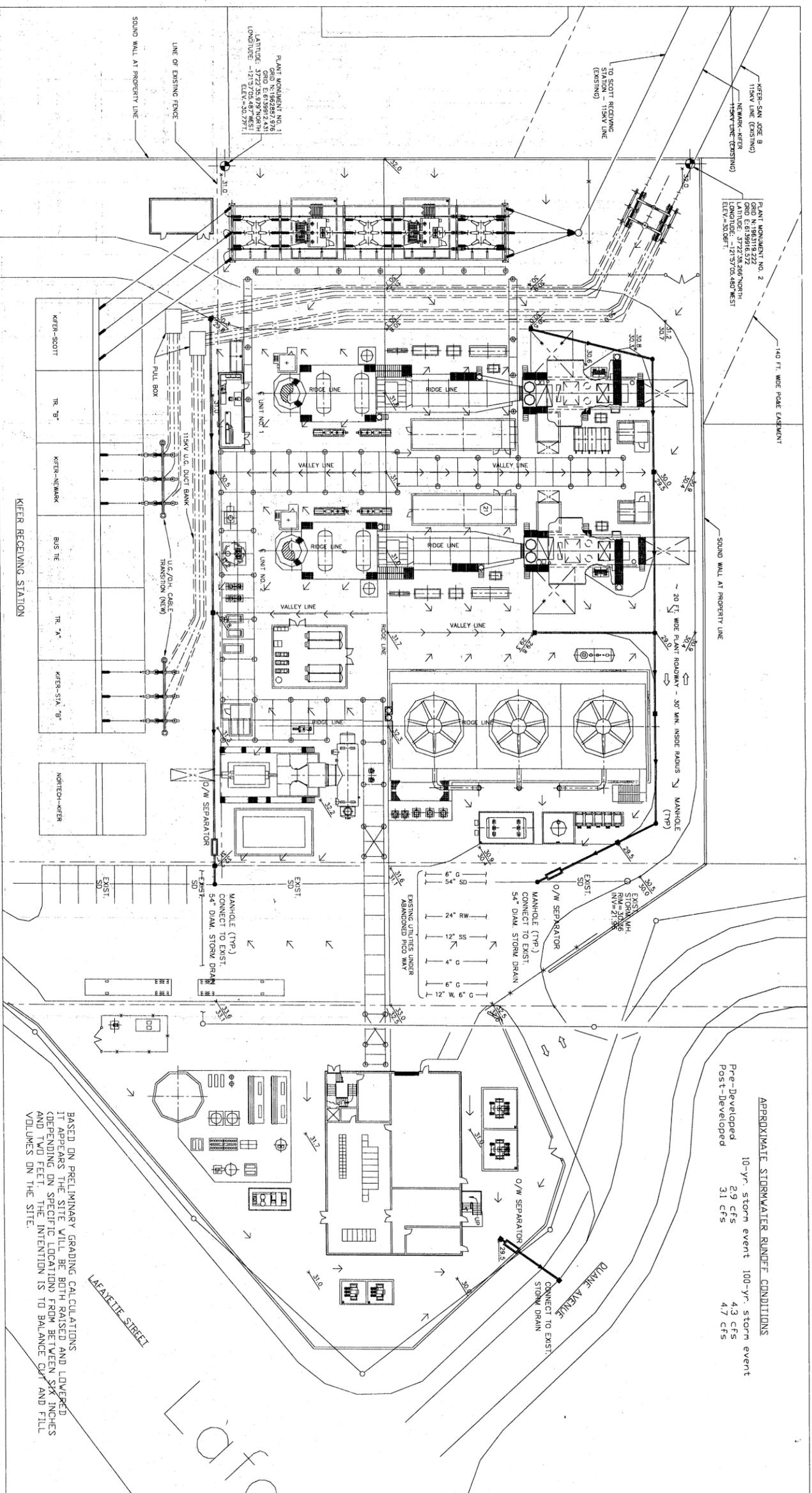
CONCEPTUAL LANDSCAPE PLAN



EXISTING TOPO BASELINE PLAN
SCALE: 1" = 20'-0"



PB Power, Inc. A Parsons Brinckerhoff Company 233 SECOND STREET, SUITE 200 NORTH, SAN FRANCISCO, CALIFORNIA 94102	
SILICON VALLEY POWER CITY OF SANTA CLARA, CA PICO POWER PLANT EXISTING TOPO BASELINE PLAN	
SHEET NO. RDR RDR JB	DRAWING NO. C2 A



APPROXIMATE STORMWATER RUNOFF CONDITIONS

10-yr. storm event	100-yr. storm event
Pre-Developed 2.9 cfs	4.3 cfs
Post-Developed 31 cfs	47 cfs

BASED ON PRELIMINARY GRADING CALCULATIONS IT APPEARS THE SITE WILL BE BOTH RAISED AND LOWERED (DEPENDING ON SPECIFIC LOCATION) FROM BETWEEN SIX INCHES AND TWO FEET. THE INTENTION IS TO BALANCE CUT AND FILL VOLUMES ON THE SITE.

GRADING & DRAINAGE PLAN
SCALE: 1"=20'-0"



NO.	DATE	BY	CHK.	DESCRIPTION
A	7/19/02	ISSUED FOR REVIEW		

DESIGNED BY	MG
CHECKED BY	MG
IN CHARGE BY	MA

DATE	BY	CHK.	DESCRIPTION

DRIVING NO.	C1
REV.	A

SILICON VALLEY POWER
CITY OF SANTA CLARA, CA
PICO POWER PLANT
PRELIMINARY GRADING & DRAINAGE PLAN

PB Power, Inc.
A Parsons Brinckerhoff Company
300 SECOND STREET, SUITE 200 NORTH, SAN FRANCISCO, CALIFORNIA 94107

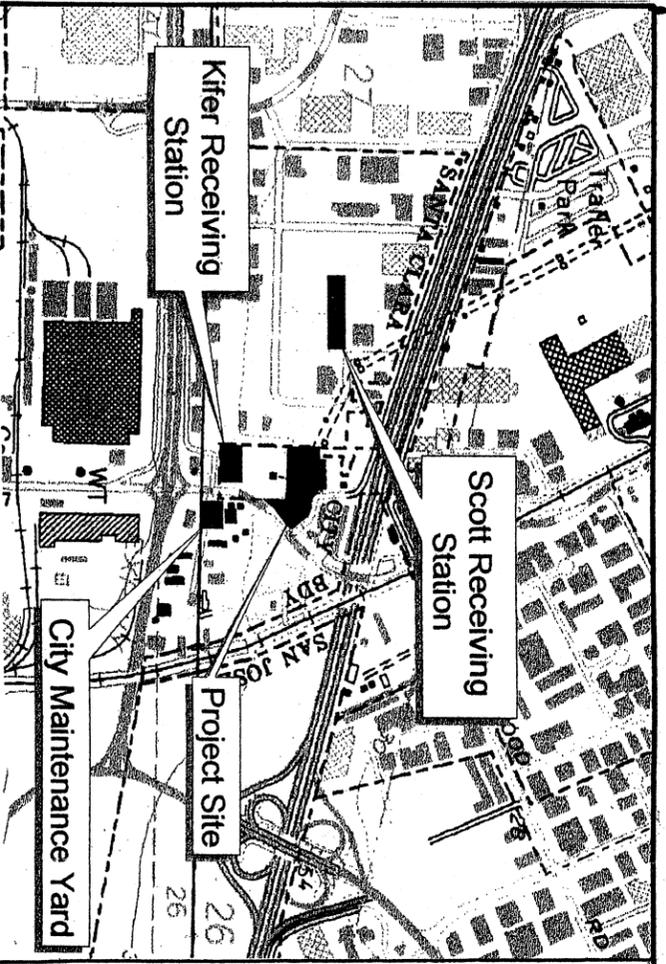
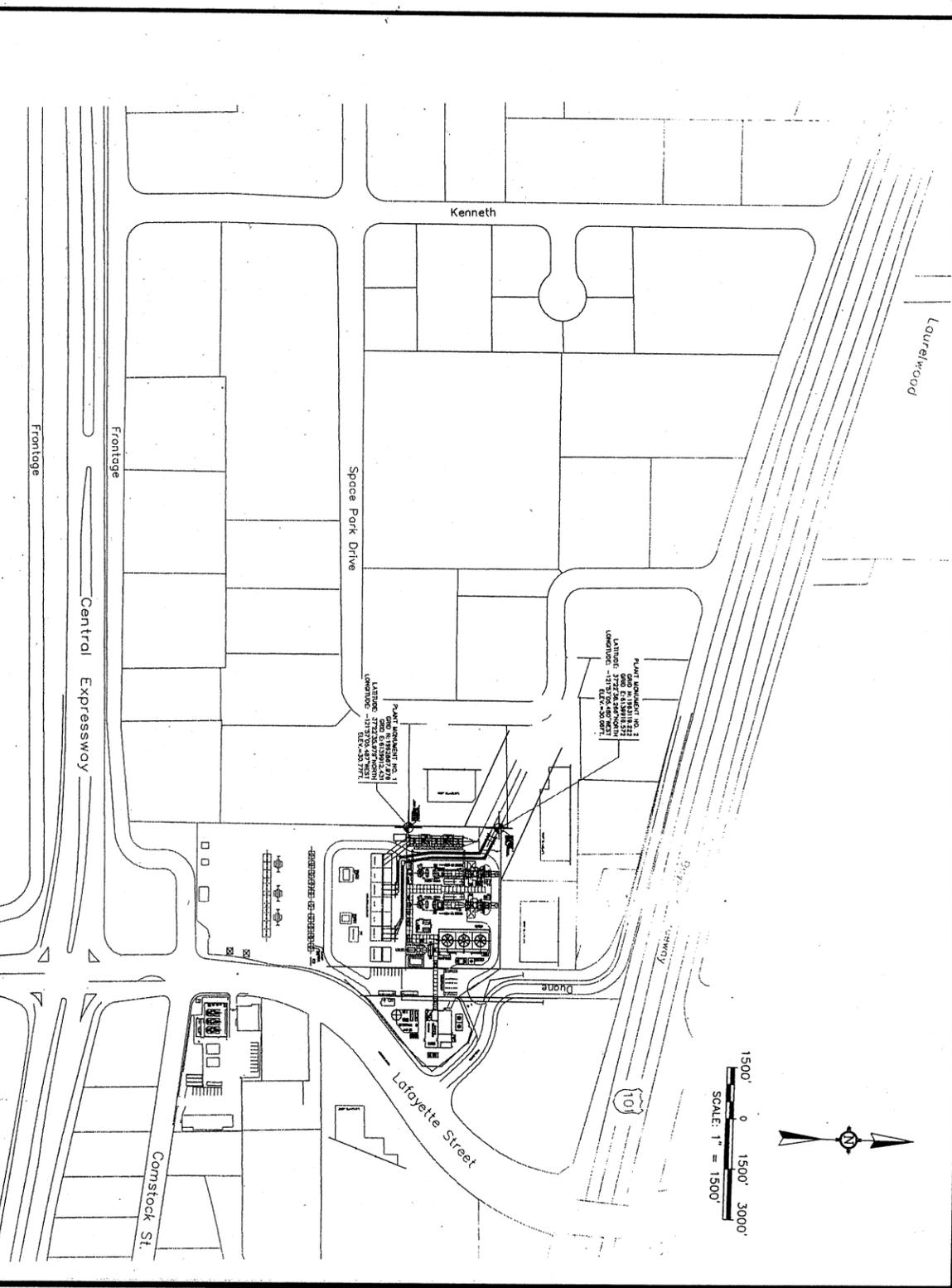
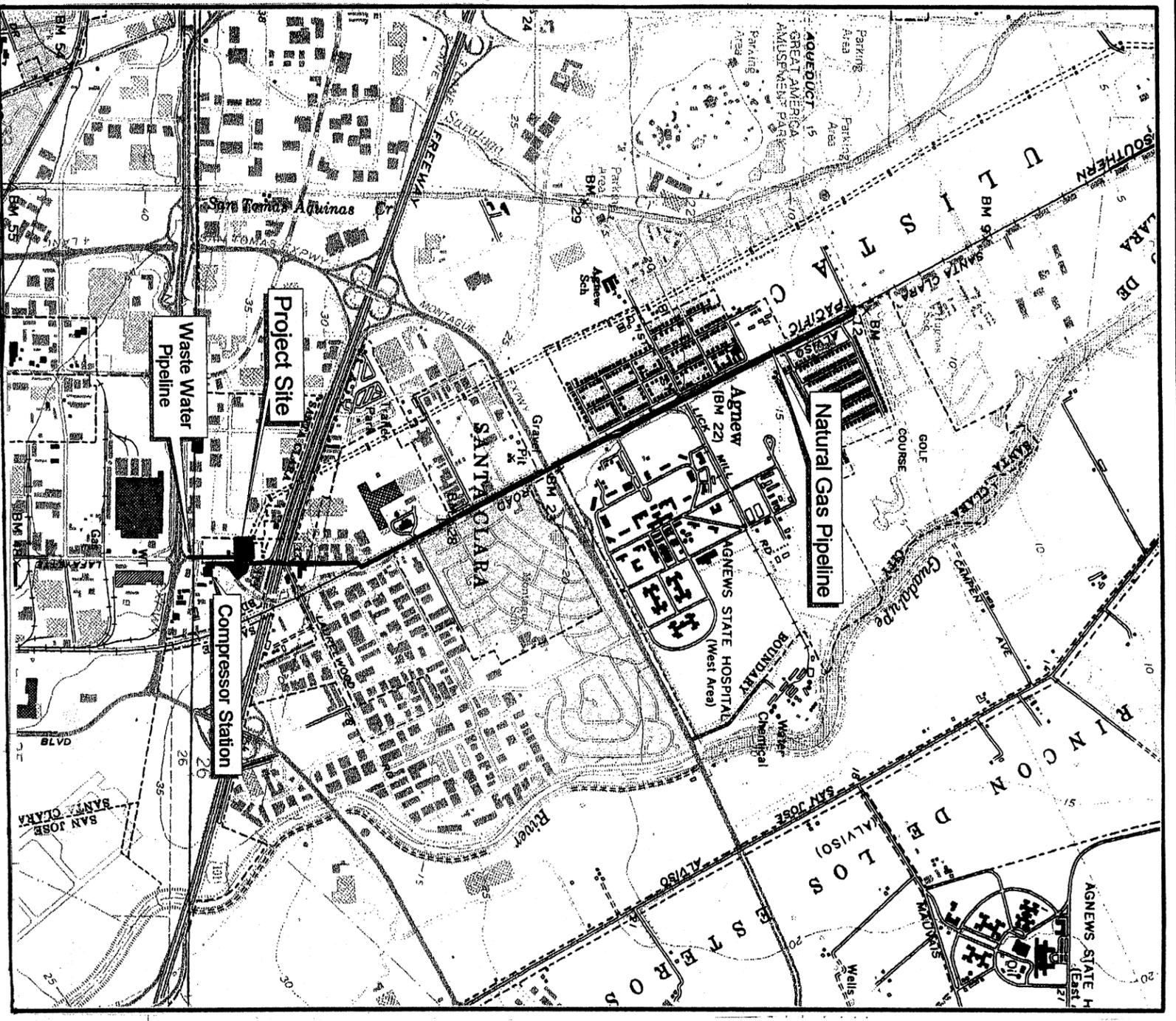


FIGURE 1
LOCATION PLAN
 CLIENT
SILICON VALLEY POWER, PICO POWER PROJECT
 FOSTER WHEELER ENVIRONMENTAL CORPORATION

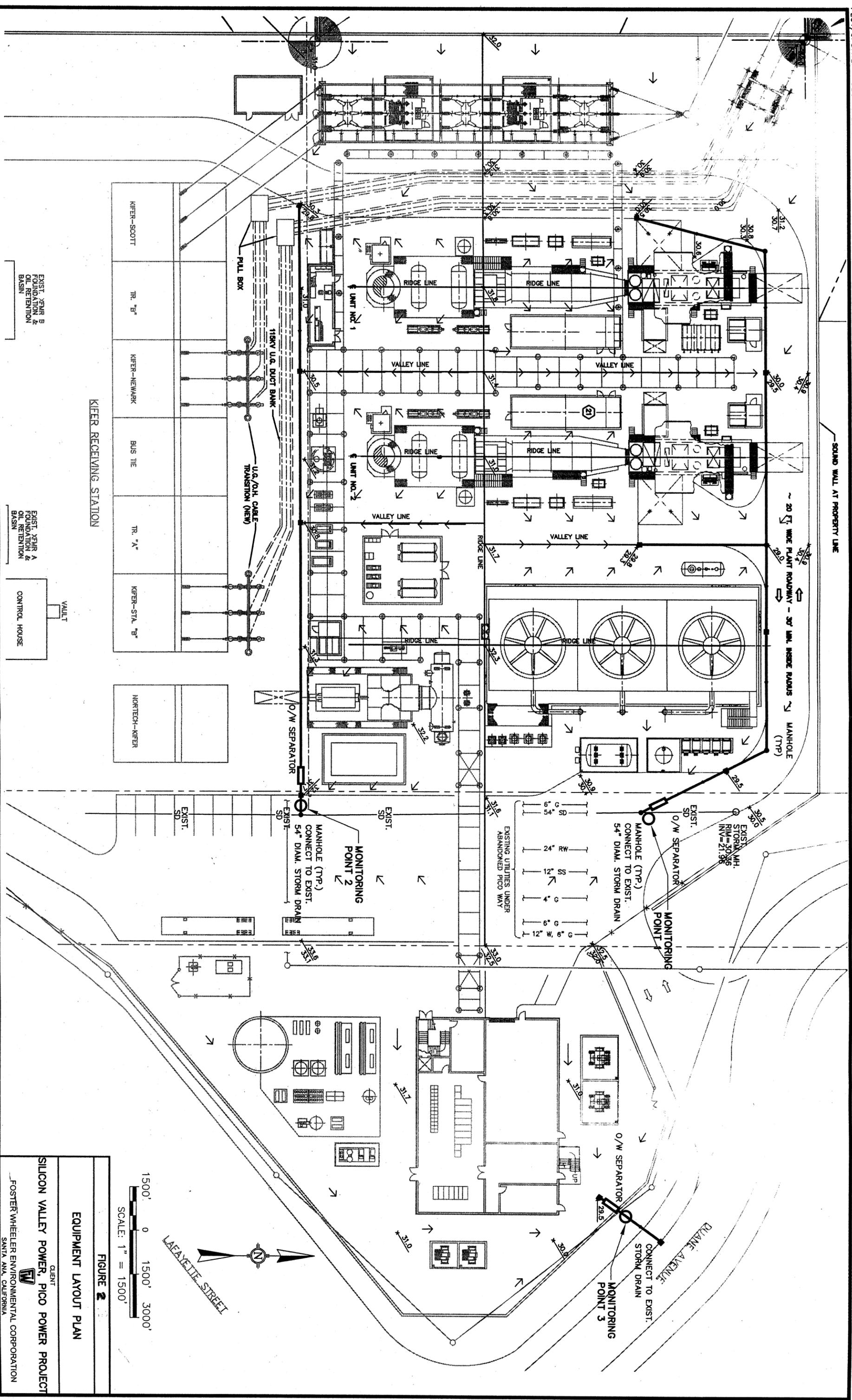


FIGURE 2
EQUIPMENT LAYOUT PLAN

SILICON VALLEY POWER, PICO POWER PROJECT
 CLIENT
FOSTER WHEELER ENVIRONMENTAL CORPORATION
 SANTA ANA, CALIFORNIA

PLANT MATRIX
Pico Power Plant Project

Symbol	Botanical Name	Common Name	Size When Planted		No. of Plants	Ever green?	Height at 5 years	Height at 10 years	Height at 20 years	Spread at 5 years	Spread at 10 years	Spread at 20 years	Ultimate Spread	Max. Growth Rate
			at 24" Box	at 24" Box										
⊕	Adiantum	Maui Fern	8-10"	8-10"	28	Yes	35'	50-55'	60'	15'	100'	20'	Fast	
⊕	Sparganium angustifolium	Coast Bulrush	-	-	-	Yes	35'	50-55'	60'	15'	100'	20'	Fast	
Notes: All entries to be 5 gallon unless noted otherwise.														
⊕	Protea repens	Protea (Red Protea)	3-4'	-	23	Yes	6-8'	8-10'	12'	12'	15'	15'	Fast	
⊕	Hebe stricta	Hebe (White Flower)	3-4'	-	9	Yes	6-8'	8-10'	15'	15'	18'	18'	Med-Fast	
⊕	Empodium	Desert Daisy (Yellow Flower)	2-3'	-	21	Yes	3-4'	4-5'	4-5'	5'	5'	5'	Moderate	
⊕	Rapanea indica	Indian Hawthorn (Pink Flower)	2-3'	-	18	Yes	3-4'	4-5'	4-5'	5-6'	5'	5'	Moderate	
Ground Covers: To be planted from college unless noted otherwise.														
⊕	Chenopodium	Camel Creeper (Blue Flower)	Plant from 1 gallon size at 5 feet on center.											
⊕	Psychotrias	Star Jasmine (Blue & White Flower)	Plant from college @ 3 feet on center.											

Notes:
1. The spread of the tree canopies at 20 years growth, is only approximate, as shown on the Conceptual Plan due to the large scale of this plan. However, the exact spread of trees, at 5 yrs & 20 year's growth, is identified on the matrix and is shown in true scale, on the visual simulations.

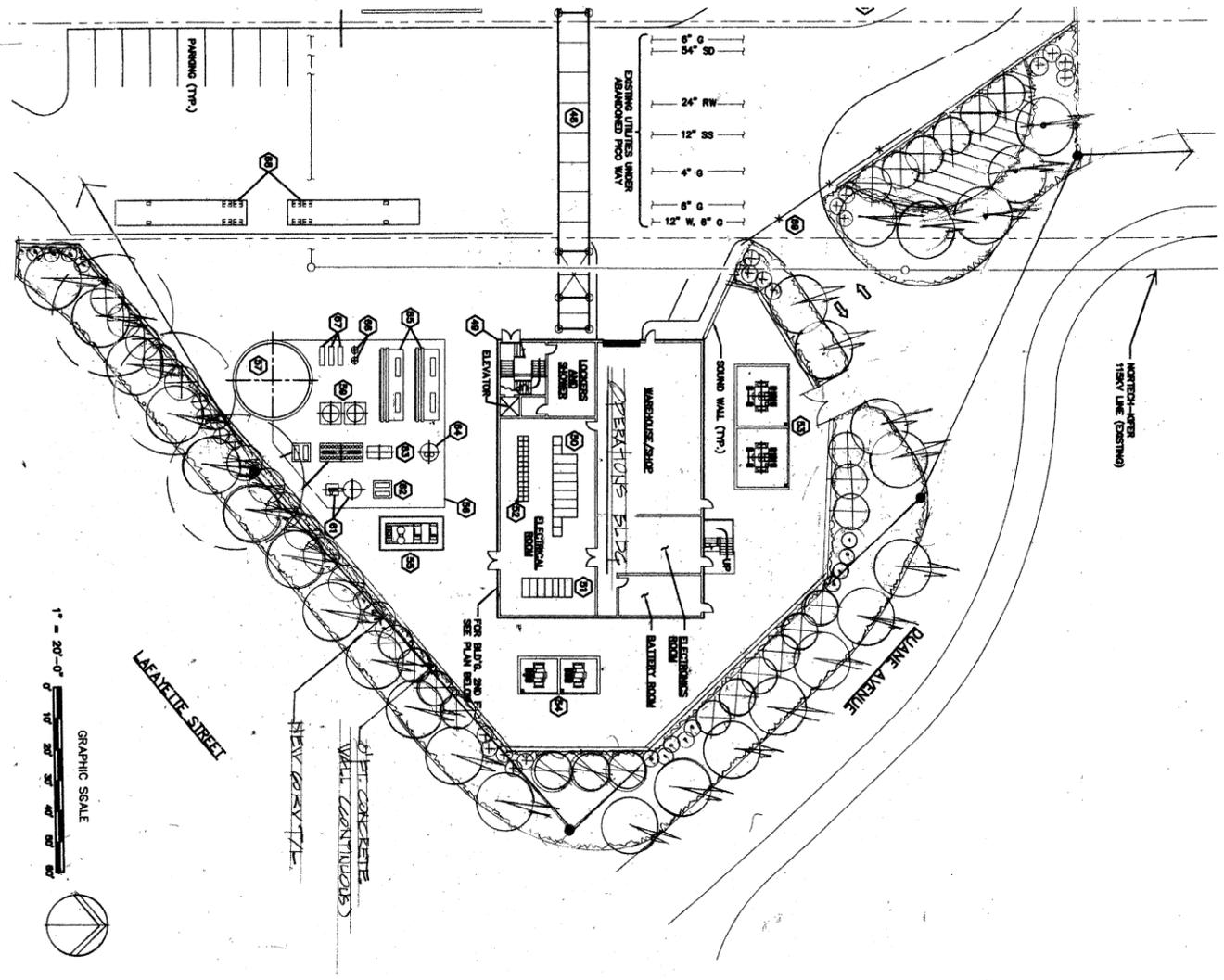
2. Existing trees (Acacia/Silk Trees) growing along Lafayette Street, within the right-of-way to be removed.

GENERAL NOTES:

- Goals:**
- To develop a planting scheme that will partially screen and visually soften the appearance of the power plant, along the East Side, from Key Observation Points (KOPS).
 - To develop an energy efficient, low maintenance landscape concept through planting trees, shrubs and ground covers hardy to coastal conditions & acclimated to this area and use recycled water ("grey water"), as a source for irrigation of plants.

Design Concept

- To minimize landscape maintenance and insure survival of plant species, over time, by mainly planting drought tolerant, wind tolerant plant species that survive well in this climate zone (zone 17).
- To create an attractive and interesting landscape appearance by creating a landscape scheme that reflects that simplicity and visual continuity by planting tall pyramidal trees as shrub trees and planting only species of shrubs in small bands, having contrasting forms, colors and textures, in alternating groups along perimeter walls around the northeast and eastern side of the power plant.
- To propose large, fast growing, evergreen pyramidal trees along the northeast and east side of the power plant to soften the visual appearance of the major power plant structures.
- To create an established appearance, in a short time, through planting all the trees at a large size (24" box); and all shrubs at a 5-gallon size.
- To install a conventional, permanent irrigation system with low precipitation heads and an automatic irrigation controller which will provide uniform irrigation coverage with minimum water usage.



CONCEPTUAL LANDSCAPE PLAN



FOSTER WHEELER ENVIRONMENTAL CORPORATION

PICO POWER PLANT

DATE: 2/1/02	SCALE: 1/8" = 1'-0"	DRAWN: JZ
SHEET: 1	OF 1	SHOWN: 1

REVISIONS:	NO.	DATE	DESCRIPTION

PLANT MATRIX
Pico Power Plant Project

Symbol	Botanical Name	Common Name	Size when Planted	No. of Plants	Evergreen?	Height at 5 years	Height at 10 years	Height at 20 years	Ultimate Height	Max. Spread	Grow Rate
⊕	At tree to be 24" box unless noted otherwise.		5 gal	24" Box	5 gal	24" Box					
⊕	Sequoia Sempervirens	Coast Redwood	8-10'	28	Yes	35'	50-55'	80'	100'	20'	Fast
Note: All standards to be 5 gallon unless noted otherwise.											
⊕	Podocarpus nelsonii	Podocarpus (Red Foliage)	3-4'	23	Yes	6-8'	8-10'	12'	15'	15'	Fast
⊕	Western Ceanothus	Ceanothus (White Flowers)	3-4'	9	Yes	6-8'	8-10'	15'	18'	18'	Mod-Fast
⊕	Leucophaea mitchellii	Leucophaea (Yellow Flowers)	2-3'	21	Yes	3-4'	4'	4.5'	5'	5'	Moderate
⊕	Leucophaea mitchellii	Leucophaea (Pink Flowers)	2-3'	18	Yes	3-4'	4'	4.5'	5'	5'	Moderate
Ground Covers: To be planted from cuttings unless noted otherwise.											
▨	Chamaenerion	Scarlet Pimpernel	1 gallon	1	Yes	1' tall	1' tall	1' tall	1' tall	1' tall	Fast
▨	Trichostema	Blue Pimpernel	1 gallon	1	Yes	1' tall	1' tall	1' tall	1' tall	1' tall	Fast
▨	Leucophaea	Leucophaea (Blue & White Flowers)	Plant from cuttings @ 3' tall or smaller.	1	Yes	3' tall	3' tall	3' tall	3' tall	3' tall	Mod-Fast

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Existing trees (Acacia/Silk Trees) growing along Lafayette Street, within the right-of-way to be removed.

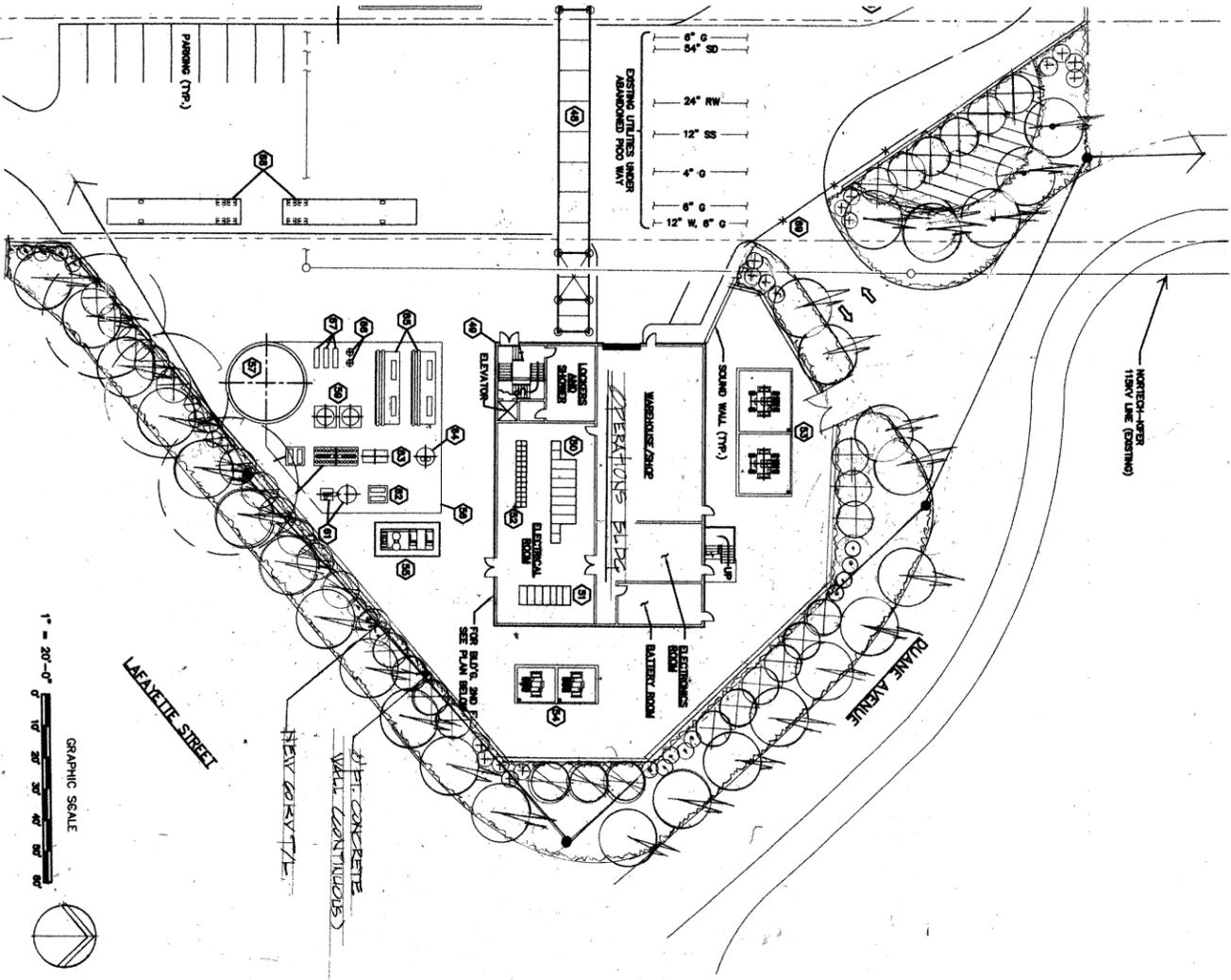
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CONCEPTUAL LANDSCAPE PLAN
SCALE 1/8" = 1'-0"



FOSTER WHEELER ENVIRONMENTAL CORPORATION

PICO POWER PLANT

Drawn	2/1/02
Scale	1/8" = 1'-0"
Drawn	2/1/02
Sheet	1
of 1	Sheet 1

REVISIONS	BY	DATE

PLANT MATRIX
Pico Power Plant Project

Symbol	Botanical Name	Common Name	Size when Planted	No. of Plants	Ever Green?	Height at 10 Years	Height at 20 Years	Spread at 10 Years	Spread at 20 Years	Ultimate Height	Max. Spread	Green Room
⊕	All trees to be 24" box unless noted otherwise.		5 gal	24" box								
⊖	Source: Symphoricarpos	Coast Redwood	9-10'	28	Yes	36'	50-55'	80'	15'	100'	20'	Fair
⊕	All shrubs to be 5 gallon unless noted otherwise.											
⊕	Pinus (Red Pines)		3-4'	23	Yes	6-8'	8-10'	12'	12'	15'	15'	Fair
⊕	Pinus (White Pines)		3-4'	9	Yes	6-8'	8-10'	15'	15'	18'	18'	Mod-Fair
⊕	Quercus (White Flowers)		3-4'	21	Yes	3-4'	4'	4.5'	4.5'	5'	5'	Moderate
⊕	Quercus (Yellow Flowers)		2-3'	16	Yes	3-4'	4'	4.5'	5-6'	5'	6'	Moderate
⊕	Quercus (Pink Flowers)		2-3'	16	Yes	3-4'	4'	4.5'	5-6'	5'	6'	Moderate
⊕	To be planted from cuttings unless noted otherwise.											
⊕	Ceanothus (Blue Flowers)	Plant from 1 gallon size at 5 feet on center.										Fair
⊕	Hordeastrum	Plant from 1 gallon size at 5 feet on center.										Fair
⊕	Trichostema	Plant from 1 gallon size at 5 feet on center.										Fair
⊕	Lamb-ear	Plant from 1 gallon size at 5 feet on center.										Fair

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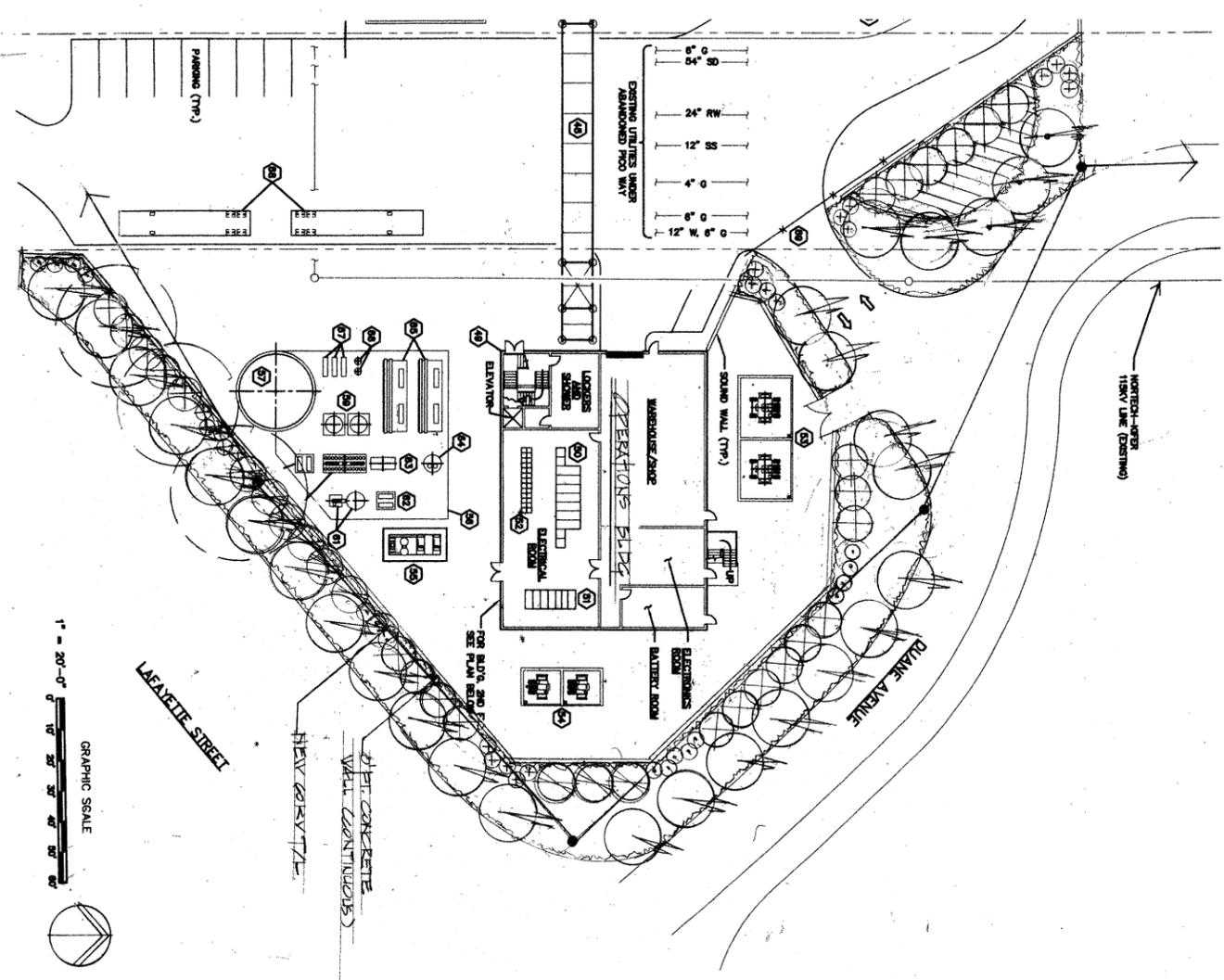
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CONCEPTUAL LANDSCAPE PLAN
Scale: 1" = 20'-0"

PLANT MATRIX
Pico Power Plant Project

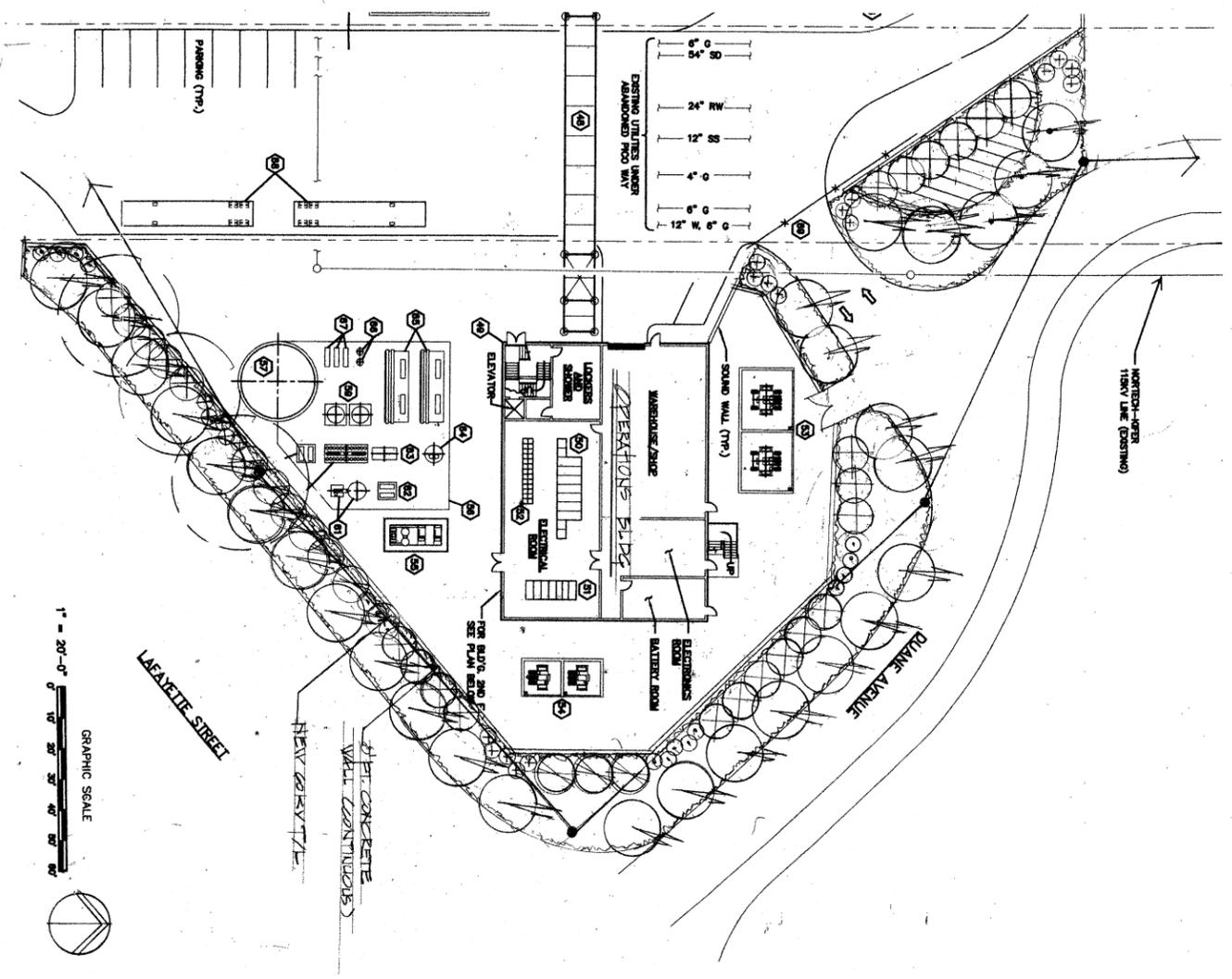
Symbol	Botanical Name	Common Name	Size when Planted		No. of Plants	Ever green?	Height at 10 years	Height at 20 years	Spread at 20 years	Ultimate Height	Max. Spread	Growth Rate
			5' Box	24" Box								
⊕	<i>Quercus agrifolia</i>	Coast Redwood	8-10'	24"	23	Yes	35'	50-55'	80'	15'	100'	20'
⊕	<i>Podocarpus nelsonii</i>	Podocarpus	3-4'	24"	23	Yes	6-8'	8-10'	12'	12'	15'	15'
⊕	<i>Medea Douglasii</i>	Medea Douglasii	3-4'	24"	9	Yes	6-8'	8-10'	15'	15'	18'	18'
⊕	<i>Euonymus alatus</i>	Euonymus	2-3'	24"	21	Yes	3-4'	4'	4.5'	5'	5'	Moderate
⊕	<i>Raphanistrum</i>	Raphanistrum	2-3'	24"	15	Yes	3-4'	4'	4.5'	5.5'	5'	Moderate
Grand Conifers: To be planted from cuttings unless noted otherwise.												
⊕	<i>Quercus Gmelini</i>	Camel Creeper (Blue Flowers)	Plant from 1 gallon size at 5 feet on center.									Fast
⊕	<i>Hydrocotyle</i>	Star Jasmine (Blue & White Flowers)	Plant from cuttings @ 3 feet on center.									Moderate
⊕	<i>Technospermatum</i>	Star Jasmine (Blue & White Flowers)	Plant from cuttings @ 3 feet on center.									Moderate

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FOSTER WHEELER ENVIRONMENTAL CORPORATION

PICO POWER PLANT

DATE	1/17/92
SCALE	1/8" = 1'-0"
DRAWN BY	SM
CHECKED BY	SM
SHEET	1
OF	1

REVISIONS