

FLOOD INSURANCE STUDY

FEDERAL EMERGENCY MANAGEMENT AGENCY

VOLUME 7 OF 9



LOS ANGELES COUNTY, CALIFORNIA AND INCORPORATED AREAS

COMMUNITY NAME	NUMBER	COMMUNITY NAME	NUMBER
AGOURA HILLS, CITY OF	065072	COMMERCE, CITY OF	060110
ALHAMBRA, CITY OF*	060095	COMPTON, CITY OF	060111
ARCADIA, CITY OF*	065014	COVINA, CITY OF*	065024
ARTESIA, CITY OF*	060097	CUDAHY, CITY OF	060657
AVALON, CITY OF	060098	CULVER CITY, CITY OF	060114
AZUSA, CITY OF	065015	DIAMOND BAR, CITY OF	060741
BALDWIN PARK, CITY OF*	060100	DOWNEY, CITY OF	060645
BELL, CITY OF*	060101	DUARTE, CITY OF*	065026
BELL GARDENS, CITY OF	060656	EL MONTE, CITY OF*	060658
BELLFLOWER, CITY OF	060102	EL SEGUNDO, CITY OF	060118
BEVERLY HILLS, CITY OF*	060655	GARDENA, CITY OF	060119
BRADBURY, CITY OF*	065017	GLENDALE, CITY OF	065030
BURBANK, CITY OF	065018	GLENDORA, CITY OF*	065031
CALABASAS, CITY OF	060749	HAWAIIAN GARDENS, CITY OF*	065032
CARSON, CITY OF	060107	HAWTHORNE, CITY OF*	060123
CERRITOS, CITY OF	060108	HERMOSA BEACH, CITY OF	060124
CLAREMONT, CITY OF*	060109	HIDDEN HILLS, CITY OF	060125

*No Special Flood Hazard Areas Identified

REVISED: June 2, 2021

FLOOD INSURANCE STUDY NUMBER

06037CV007F

Version Number 2.3.3.2



FEMA

COMMUNITY NAME	NUMBER	COMMUNITY NAME	NUMBER
HUNTINGTON PARK, CITY OF*	060126	PICO RIVERA, CITY OF	060148
INDUSTRY, CITY OF*	065035	POMONA, CITY OF*	060149
INGLEWOOD, CITY OF*	065036	RANCHO PALOS VERDES, CITY OF	060464
IRWINDALE, CITY OF*	060129	REDONDO BEACH, CITY OF	060150
LA CANADA FLINTRIDGE, CITY OF*	060669	ROLLING HILLS, CITY OF*	060151
LA HABRA HEIGHTS, CITY OF*	060701	ROLLING HILLS ESTATES, CITY OF*	065054
LA MIRADA, CITY OF	060131	ROSEMEAD, CITY OF*	060153
LA PUENTE*, CITY OF	065039	SAN DIMAS, CITY OF	060154
LA VERNE, CITY OF	060133	SAN FERNANDO, CITY OF	060628
LAKEWOOD, CITY OF	060130	SAN GABRIEL, CITY OF*	065055
LANCASTER, CITY OF	060672	SAN MARINO, CITY OF*	065057
LAWNDALE, CITY OF*	060134	SANTA CLARITA, CITY OF	060729
LOMITA, CITY OF*	060135	SANTA FE SPRINGS, CITY OF	060158
LONG BEACH, CITY OF	060136	SANTA MONICA, CITY OF	060159
LOS ANGELES, CITY OF	060137	SIERRA MADRE, CITY OF*	065059
LOS ANGELES COUNTY UNINCORPORATED AREAS	065043	SIGNAL HILL, CITY OF*	060161
LYNWOOD, CITY OF	060635	SOUTH EL MONTE, CITY OF*	060162
MALIBU, CITY OF	060745	SOUTH GATE, CITY OF	060163
MANHATTAN BEACH, CITY OF	060138	SOUTH PASADENA, CITY OF*	065061
MAYWOOD, CITY OF*	060651	TEMPLE CITY, CITY OF*	060653
MONROVIA, CITY OF*	065046	TORRANCE, CITY OF	060165
MONTEBELLO, CITY OF	060141	VERNON, CITY OF*	060166
MONTEREY PARK, CITY OF*	065047	WALNUT, CITY OF*	065069
NORWALK, CITY OF	060652	WEST COVINA, CITY OF	060666
PALMDALE, CITY OF	060144	WEST HOLLYWOOD, CITY OF*	060720
PALOS VERDES ESTATES, CITY OF	060145	WESTLAKE VILLAGE, CITY OF	060744
PARAMOUNT, CITY OF	065049	WHITTIER, CITY OF	060169
PASADENA, CITY OF*	065050		

*No Special Flood Hazard Areas Identified

REVISED: June 2, 2021



FEMA

FLOOD INSURANCE STUDY NUMBER

06037CV007F

Version Number 2.3.3.2

TABLE OF CONTENTS

Volume 1

	<u>Page</u>
SECTION 1.0 – INTRODUCTION	1
1.1 The National Flood Insurance Program	1
1.2 Purpose of this Flood Insurance Study Report	2
1.3 Jurisdictions Included in the Flood Insurance Study Project	2
1.4 Considerations for using this Flood Insurance Study Report	18
SECTION 2.0 – FLOODPLAIN MANAGEMENT APPLICATIONS	59
2.1 Floodplain Boundaries	59
2.2 Floodways	60
2.3 Base Flood Elevations	61
2.4 Non-Encroachment Zones	61
2.5 Coastal Flood Hazard Areas	62
2.5.1 Water Elevations and the Effects of Waves	62
2.5.2 Floodplain Boundaries and BFEs for Coastal Areas	63
2.5.3 Coastal High Hazard Areas	64
2.5.4 Limit of Moderate Wave Action	66
SECTION 3.0 – INSURANCE APPLICATIONS	66
3.1 National Flood Insurance Program Insurance Zones	66
3.2 Coastal Barrier Resources System	69
SECTION 4.0 – AREA STUDIED	70
4.1 Basin Description	70
4.2 Principal Flood Problems	72
4.3 Non-Levee Flood Protection Measures	75
4.4 Levees	76

Figures

Figure 1: FIRM Panel Index	20
Figure 2: FIRM Notes to Users	25
Figure 3: Map Legend for FIRM	28
Figure 4: Floodway Schematic	60
Figure 5: Wave Runup Transect Schematic	63
Figure 6: Coastal Transect Schematic	65

Tables

Table 1: Listing of NFIP Jurisdictions	2
Table 2: Flooding Sources Included in this FIS Report	31
Table 3: Flood Zone Designations by Community	67
Table 4: Coastal Barrier Resources System Information	70
Table 5: Basin Characteristics	71
Table 6: Principal Flood Problems	72

	<u>Page</u>
Table 7: Historic Flooding Elevations	75
Table 8: Non-Levee Flood Protection Measures	76
Table 9: Levees	78

Volume 2

SECTION 5.0 – ENGINEERING METHODS	80
5.1 Hydrologic Analyses	80
5.2 Hydraulic Analyses	115
5.3 Coastal Analyses	161
5.3.1 Total Stillwater Elevations	161
5.3.2 Waves	161
5.3.3 Coastal Erosion	162
5.4 Alluvial Fan Analyses	187
 SECTION 6.0 – MAPPING METHODS	 188
6.1 Vertical and Horizontal Control	188
6.2 Base Map	190

Figures

Figure 7: Frequency Discharge-Drainage Area Curves	110
Figure 8: 1% Annual Chance Total Stillwater Elevations for Coastal Areas	162
Figure 9: Transect Location Map	179

Tables

Table 10: Summary of Discharges	81
Table 11: Summary of Non-Coastal Stillwater Elevations	111
Table 12: Stream Gage Information used to Determine Discharges	114
Table 13: Summary of Hydrologic and Hydraulic Analyses	117
Table 14: Roughness Coefficients	157
Table 15: Summary of Coastal Analyses	161
Table 16: Tide Gage Analysis Specifics	163
Table 17: Coastal Transect Parameters	165
Table 18: Summary of Alluvial Fan Analyses	187
Table 19: Results of Alluvial Fan Analyses	188
Table 20: Countywide Vertical Datum Conversion	190
Table 21: Stream-Based Vertical Datum Conversion	191

Volume 3

SECTION 6.0 – MAPPING METHODS	188
6.3 Floodplain and Floodway Delineation	191
6.4 Coastal Flood Hazard Mapping	229
6.5 FIRM Revisions	235
6.5.1 Letters of Map Amendment	235
6.5.2 Letters of Map Revision Based on Fill	236
6.5.3 Letters of Map Revision	236
6.5.4 Physical Map Revisions	237
6.5.5 Contracted Restudies	237
6.5.6 Community Map History	238

SECTION 7.0 – CONTRACTED STUDIES AND COMMUNITY COORDINATION	243
7.1 Contracted Studies	243
7.2 Community Meetings	265

SECTION 8.0 – ADDITIONAL INFORMATION	277
---	------------

SECTION 9.0 – BIBLIOGRAPHY AND REFERENCES	283
--	------------

Tables

Table 22: Base Map Sources	191
Table 23: Summary of Topographic Elevation Data used in Mapping	193
Table 24: Floodway Data	194
Table 25: Flood Hazard and Non-Encroachment Data for Selected Streams	229
Table 26: Summary of Coastal Transect Mapping Considerations	230
Table 27: Incorporated Letters of Map Change	236
Table 28: Community Map History	239
Table 29: Summary of Contracted Studies Included in this FIS Report	243
Table 30: Community Meetings	266
Table 31: Map Repositories	277
Table 32: Additional Information	283

Volume 4

Tables

Table 33: Bibliography and References	284
---------------------------------------	-----

Volume 5

Exhibits

Flood Profiles	<u>Panel</u>
Acton Canyon	001P - 004P
Agua Dulce Canyon Creek	005P - 013P

Agua Dulce Canyon Creek Lateral	014P
Aliso Canyon Creek	015P - 017P
Amargosa Creek	018P - 020P
Anaverde Creek	021P - 023P
Avalon Canyon	024P - 027P
Big Rock Wash	028P - 029P
Bouquet Canyon Creek	030P - 052P
Castaic Creek	053P - 057P
Cheseboro Creek	058P - 060P
Cold Creek	061P - 066P
Dark Canyon	067P - 068P
Dry Canyon	069P - 078P
Elsmere Canyon Creek	079P - 081P
Escondido Canyon	082P - 085P
Flow Along Empire Avenue	086P
Flowline No. 1	087P
Garapito Creek	088P- 090P
Hacienda Creek	091P

Volume 6
Exhibits

Flood Profiles	<u>Panel</u>
Haskell Canyon	092P- 095P
Hasley Canyon Creek	096P- 101P
Hasley Canyon Creek Split	102P
Iron Canyon	103P- 107P
Kagel Canyon	108P -119P
Kentucky Springs Canyon Creek	120P -122P
La Mirada Creek	123P -127P
Las Flores Canyon	128P -131P
Las Virgenes Creek	132P -141P
Liberty Canyon	142P -143P
Lindero Canyon (Above Confluence with Medea Creek)	144P -145P
Lindero Canyon (Above Lake Lindero)	146P -151P
Lindero Canyon Spillway at Lake Lindero	152P
Lion Canyon	153P-155P
Little Rock Wash–Profile A	156P -159P
Little Rock Wash–Profile B	160P
Little Rock Wash–Profile C	161P
Lobo Canyon	162P -165P
Lockheed Drain Channel	166P -169P
Long Canyon	170P -172P

Lopez Canyon Channel	173P -174P
Los Angeles River Left Overbank Path 2	175P -178P
Los Angeles River Right Overbank Path 1	179P -181P

Volume 7
Exhibits

Flood Profiles	<u>Panel</u>
Los Angeles River Right Overbank Path 2	182P
Malibu Creek	183P -185P
Madea Creek	186P -197P
Madea Creek (Above Ventura Freeway)	198P -199P
Mill Creek	200P -204P
Mint Canyon Creek	205P -217P
Mint Canyon Creek Overflow	218P -219P
Newhall Creek	220P -226P
Newhall Creek Left Overbank 2	227P
Newhall Creek Left Overbank 3	228P -229P
Newhall Creek Right Overbank 1	230P
North Overflow (A)	231P
North Overflow (B)	232P
Oak Springs Canyon	233P -235P
Oak Springs Canyon Overflow	236P
Old Topanga Canyon	237P - 242P
Overflow Area of Lockheed Drain Channel	243P
Overflow Area of Lockheed Storm Drain	244P
Palo Comando Creek	245P -250P
Pico Canyon	251P -253P
Placerita Creek	254P -258P
Placerita Creek Overflow	259P -260P
Plum Canyon	261P
Potrero Canyon	262P -265P
Potrero Canyon Overflow	266P
Quigley Canyon Creek	267P -268P
Railroad Canyon Left Overbank	269P
Railroad Canyon	270P

Volume 8
Exhibits

Flood Profiles	<u>Panel</u>
Ramirez Canyon	271P - 276P

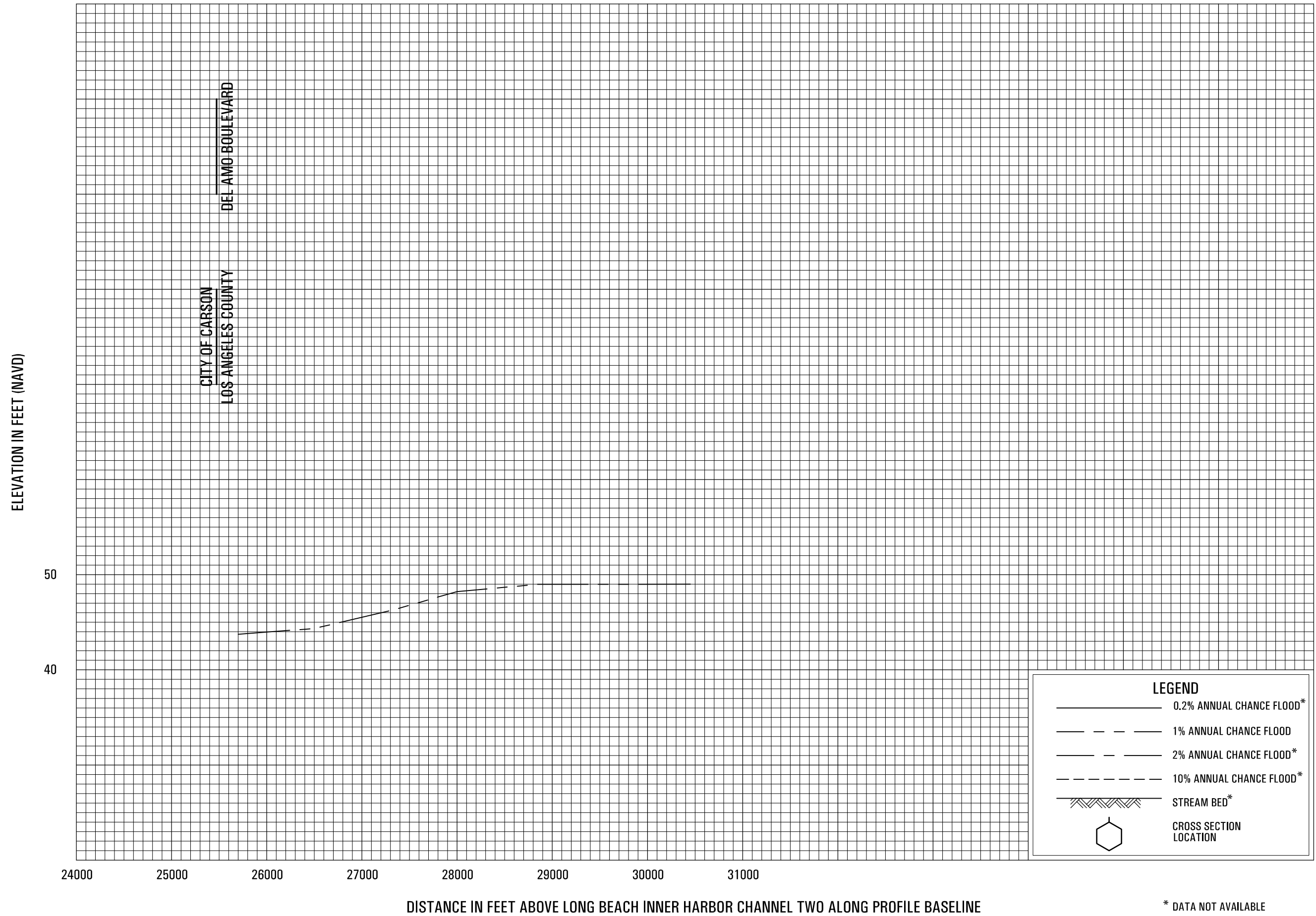
Rio Hondo River Left Overbank Path 3	277P
Rio Hondo River Left Overbank Path 5	278P - 279P
Rio Hondo River Left Overbank Path 6	280P
Rustic Canyon	281P - 284P
San Francisquito Canyon Creek	285P - 292P
San Martinez Chiquito Canyon	293P - 297P
San Martinez Grande Canyon Creek	298P - 300P
Sand Canyon Creek	301P - 308P
Santa Clara River	309P - 339P
Santa Clara River Overflow	340P
Santa Maria Canyon	341P
Soledad Canyon	342P - 346P
South Fork Santa Clara River	347P - 350P
South Fork Santa Clara River Tributary	351P
Spade Spring Canyon Creek	352P - 357P
Stokes Canyon	358P - 361P
Texas Canyon Creek	362P

Volume 9
Exhibits

Flood Profiles	<u>Panel</u>
Tick Canyon	363P - 365P
Topanga Canyon	366P - 390P
Towsley Canyon Creek	391P
Trancas Creek	392P
Triunfo Creek	393P - 397P
Unnamed Canyon (Serra Retreat Area)	398P - 399P
Unnamed Stream Main Reach	400P - 405P
Unnamed Stream Tributary 1	406P - 407P
Unnamed Stream Tributary 2	408P - 410P
Upper Los Angeles River Left Overbank	411P
Vasquez Canyon	412P - 413P
Weldon Canyon	414P - 415P
Whitney Canyon Creek	416P - 417P
Zuma Canyon	418P - 425P

Published Separately

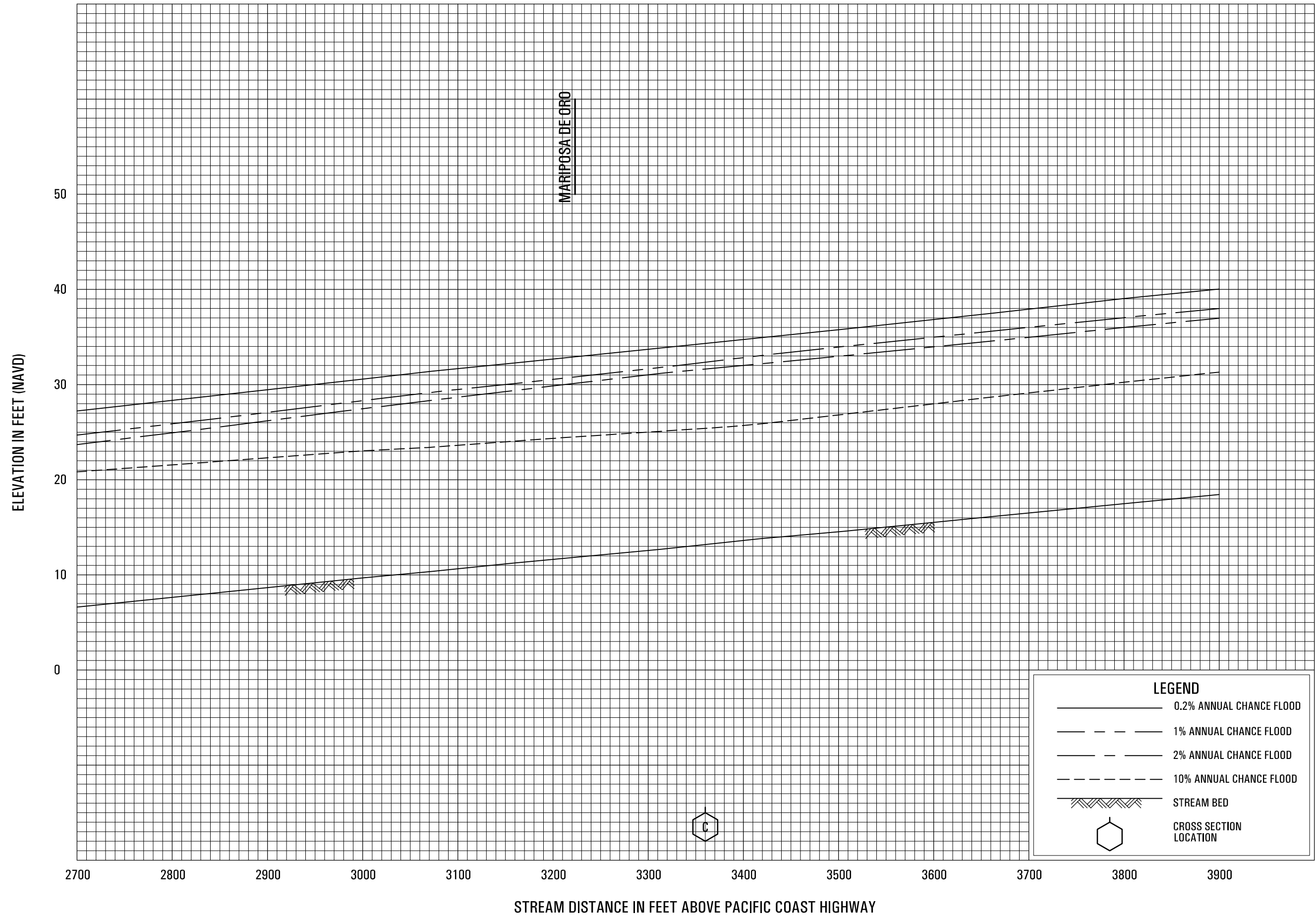
Flood Insurance Rate Map (FIRM)



* DATA NOT AVAILABLE

FEDERAL EMERGENCY MANAGEMENT AGENCY
 LOS ANGELES COUNTY, CA
 AND INCORPORATED AREAS

FLOOD PROFILES
 LOS ANGELES RIVER RIGHT OVERBANK PATH 2



FLOOD PROFILES

MALIBU CREEK

**FEDERAL EMERGENCY MANAGEMENT AGENCY
LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS**



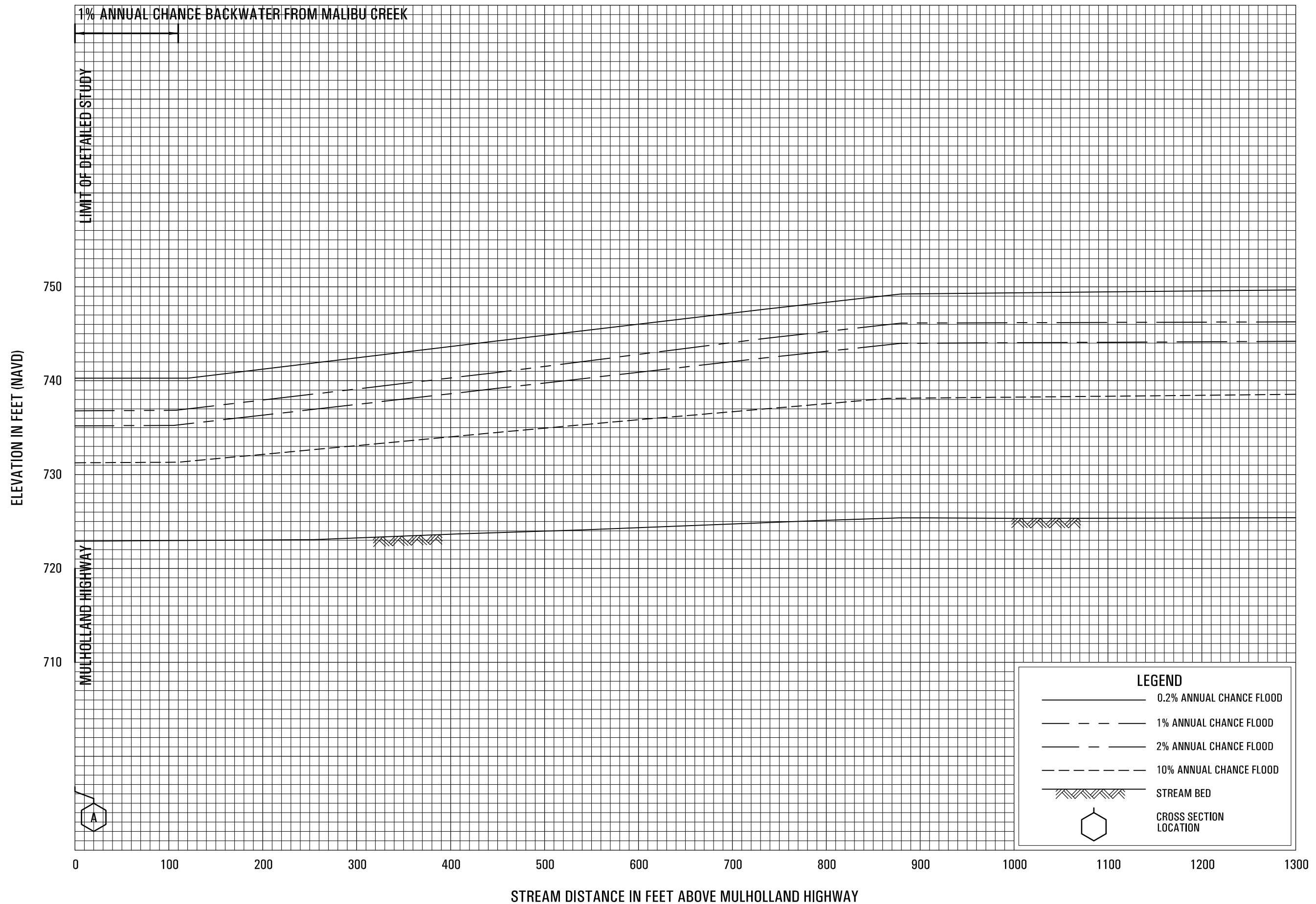
FLOOD PROFILES

MALIBU CREEK

FEDERAL EMERGENCY MANAGEMENT AGENCY

LOS ANGELES COUNTY, CA

AND INCORPORATED AREAS

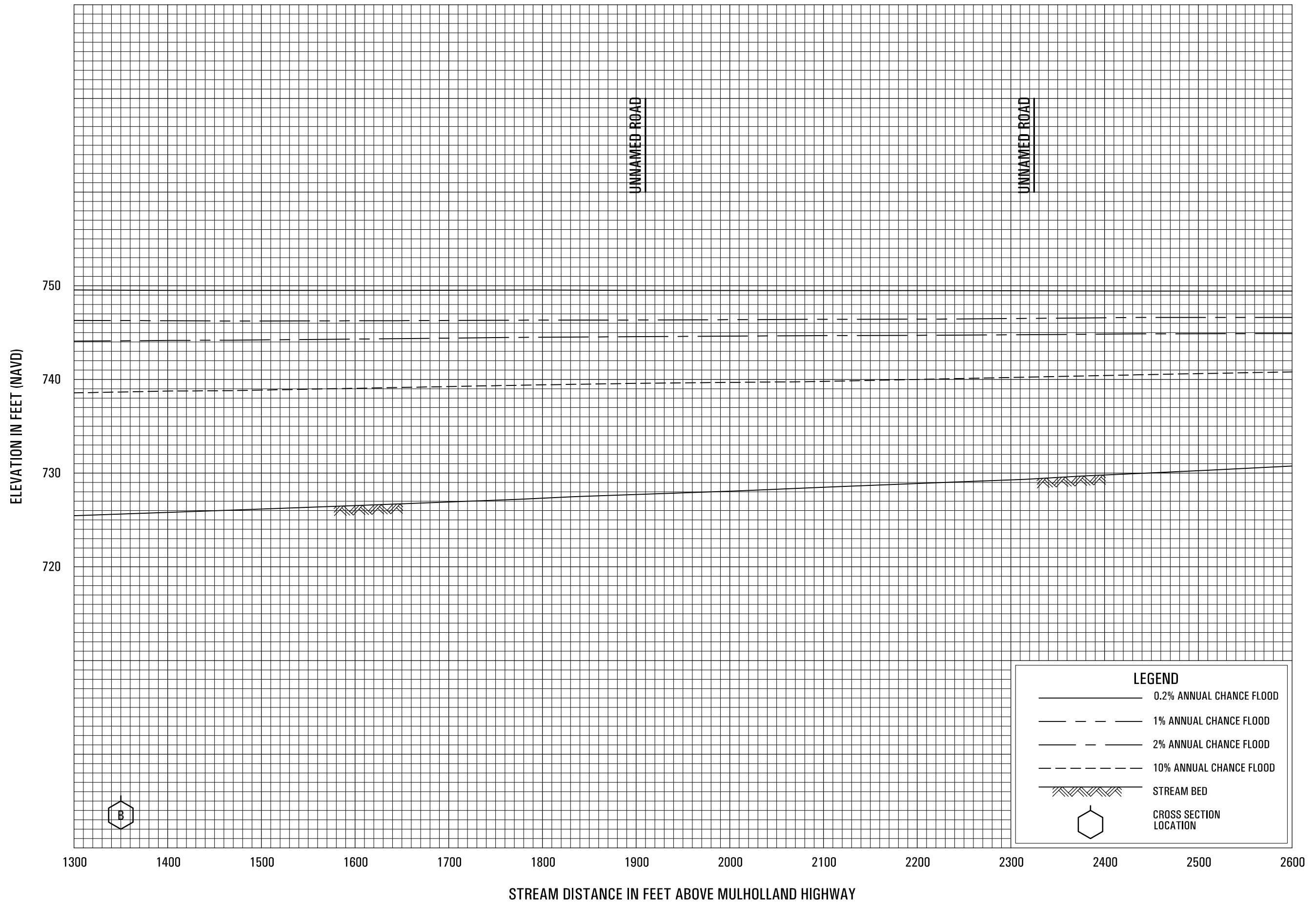


FLOOD PROFILES

MEDEA CREEK

FEDERAL EMERGENCY MANAGEMENT AGENCY

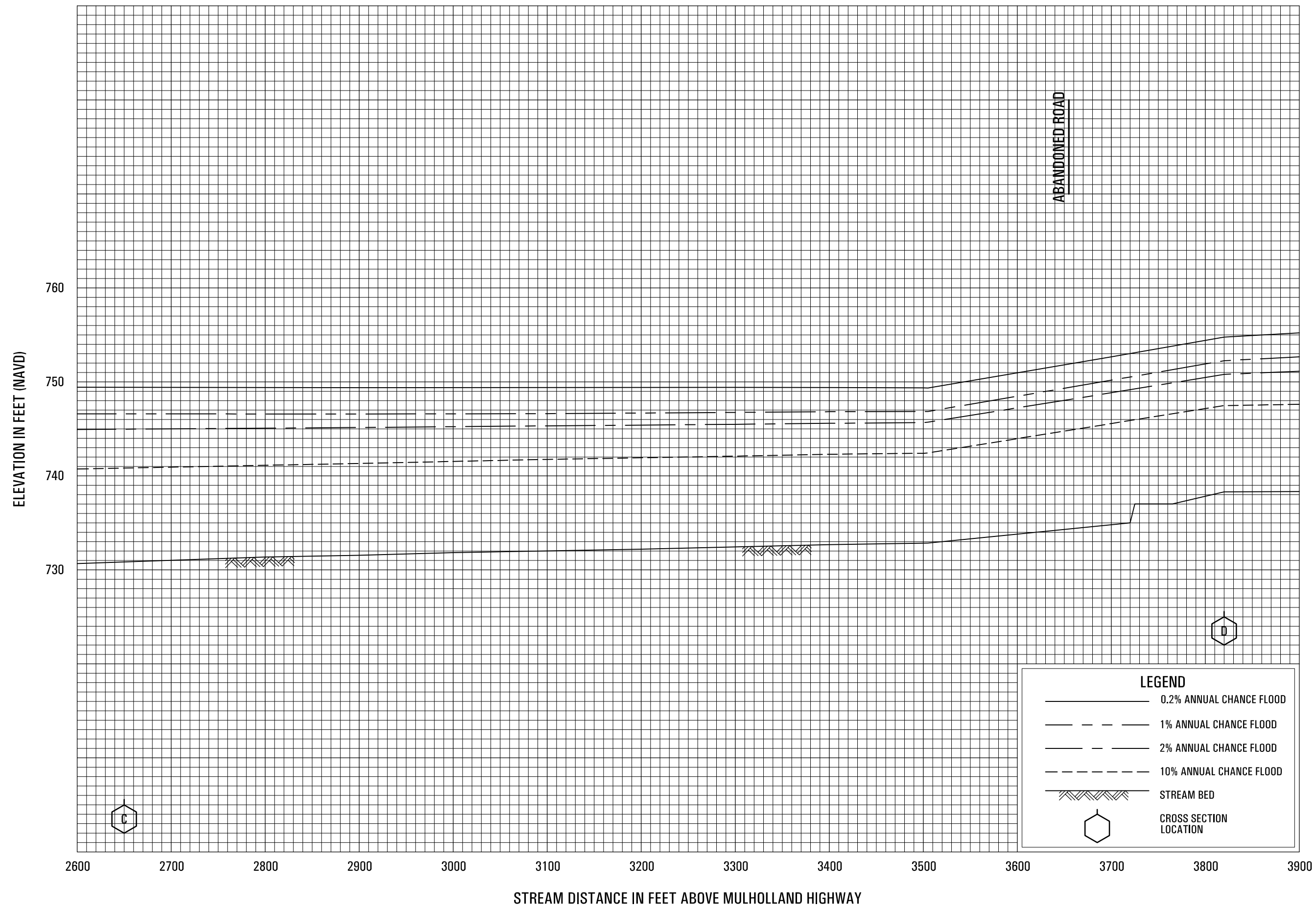
LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS



FLOOD PROFILES

MEDEA CREEK

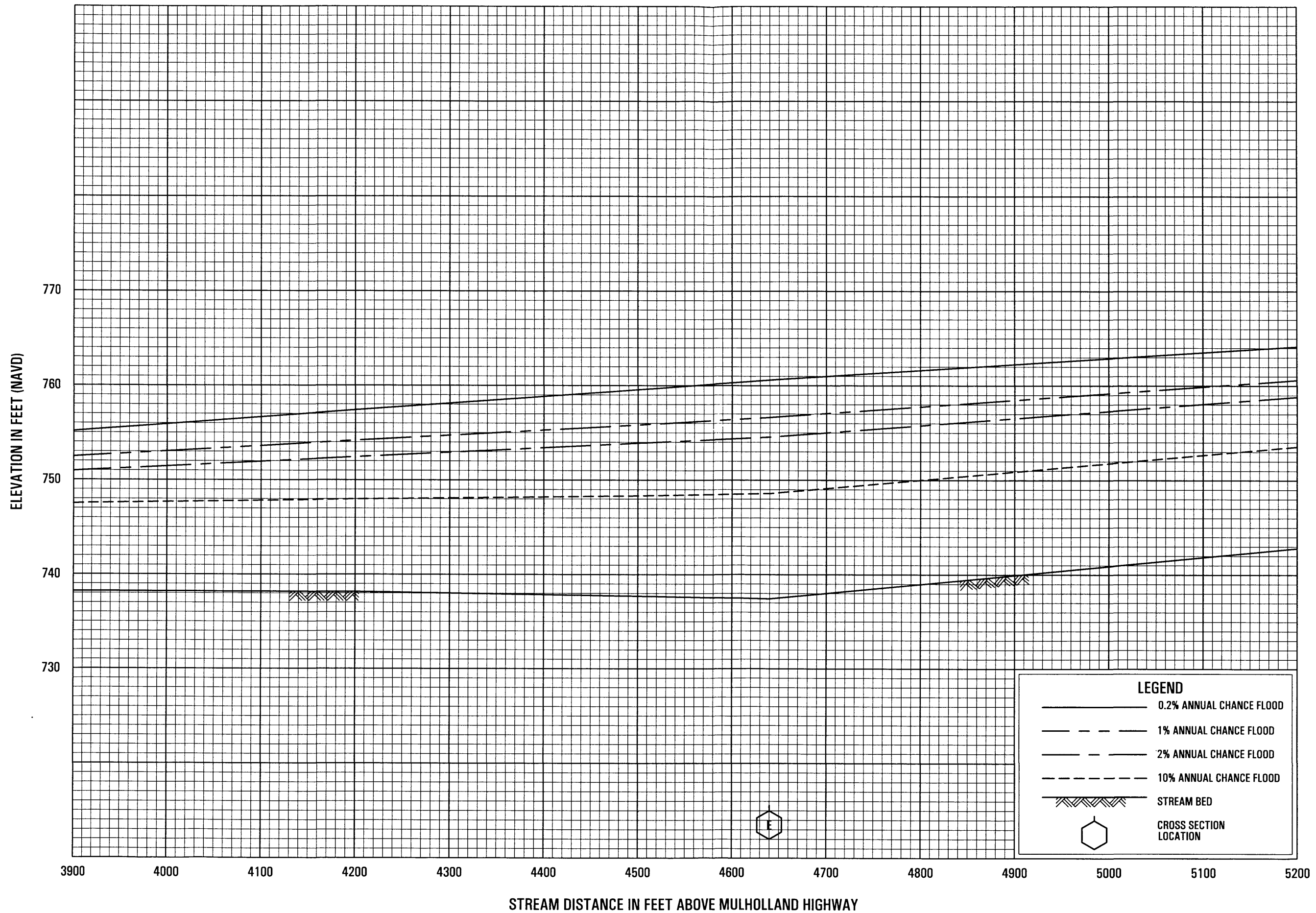
**FEDERAL EMERGENCY MANAGEMENT AGENCY
LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS**



FLOOD PROFILES

MEDEA CREEK

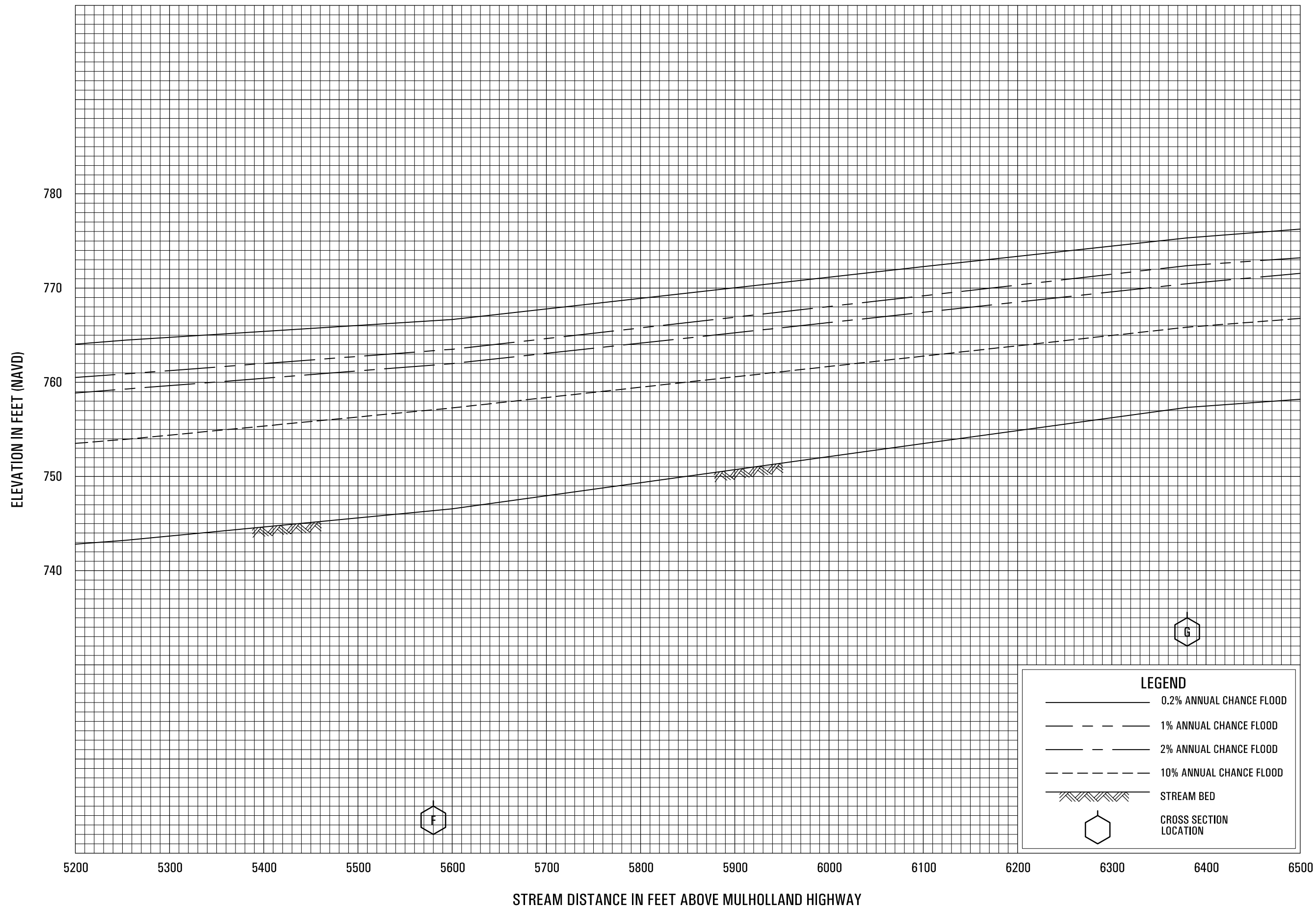
FEDERAL EMERGENCY MANAGEMENT AGENCY
 LOS ANGELES COUNTY, CA
 AND INCORPORATED AREAS



FLOOD PROFILES

MEDEA CREEK

FEDERAL EMERGENCY MANAGEMENT AGENCY
 LOS ANGELES COUNTY, CA
 AND INCORPORATED AREAS



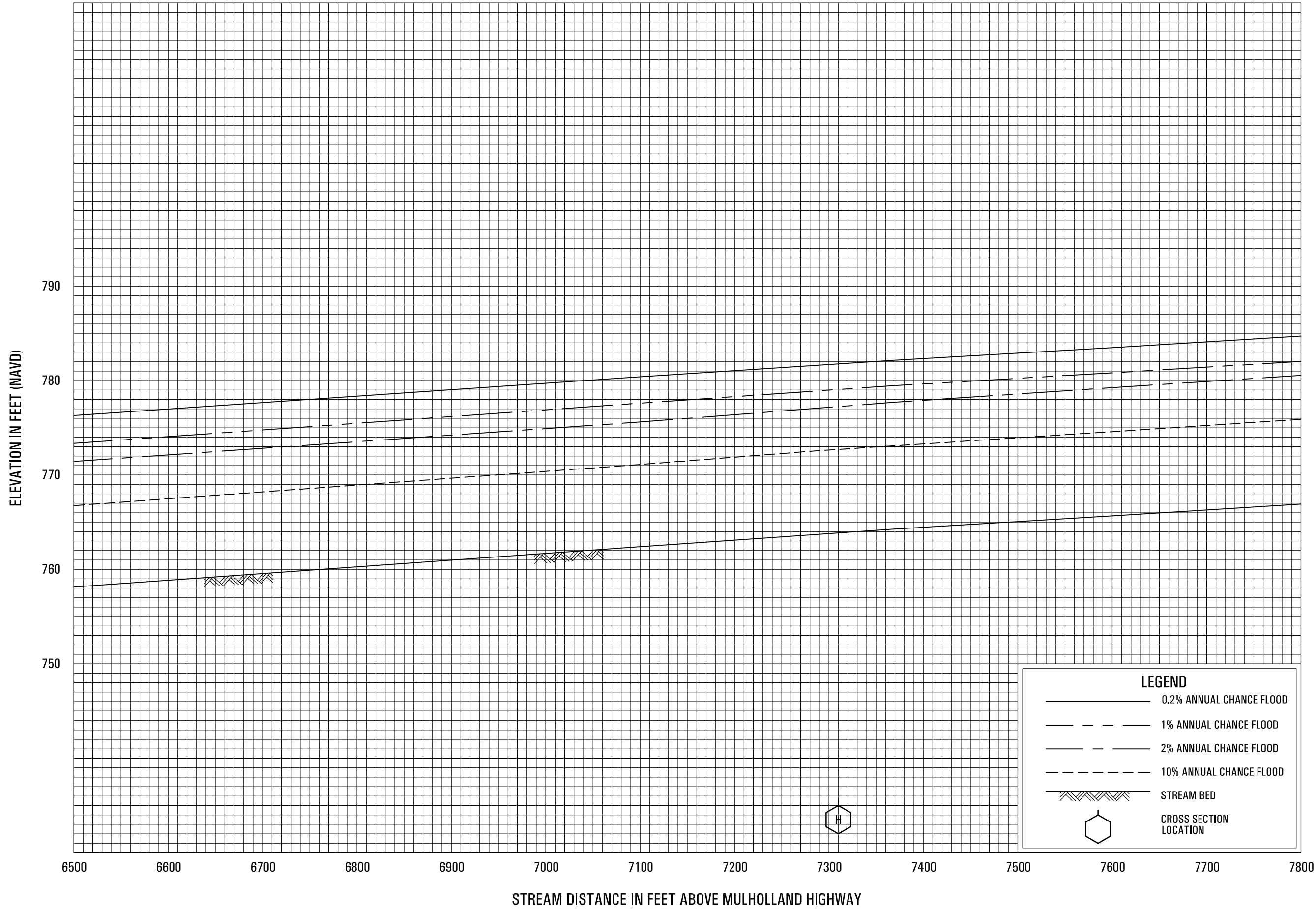
FLOOD PROFILES

MEDEA CREEK

FEDERAL EMERGENCY MANAGEMENT AGENCY

LOS ANGELES COUNTY, CA

AND INCORPORATED AREAS

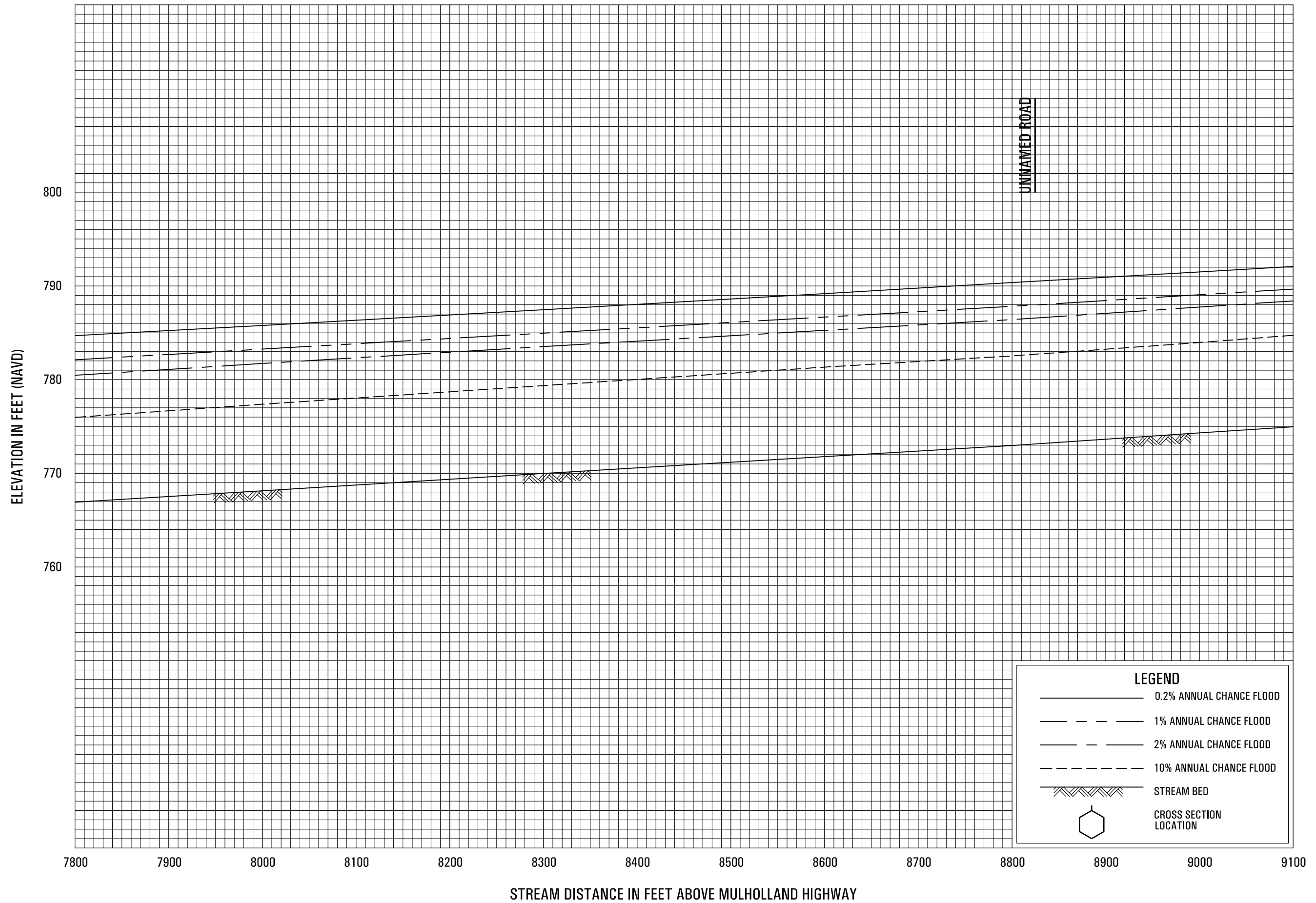


FLOOD PROFILES

MEDEA CREEK

FEDERAL EMERGENCY MANAGEMENT AGENCY

LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS



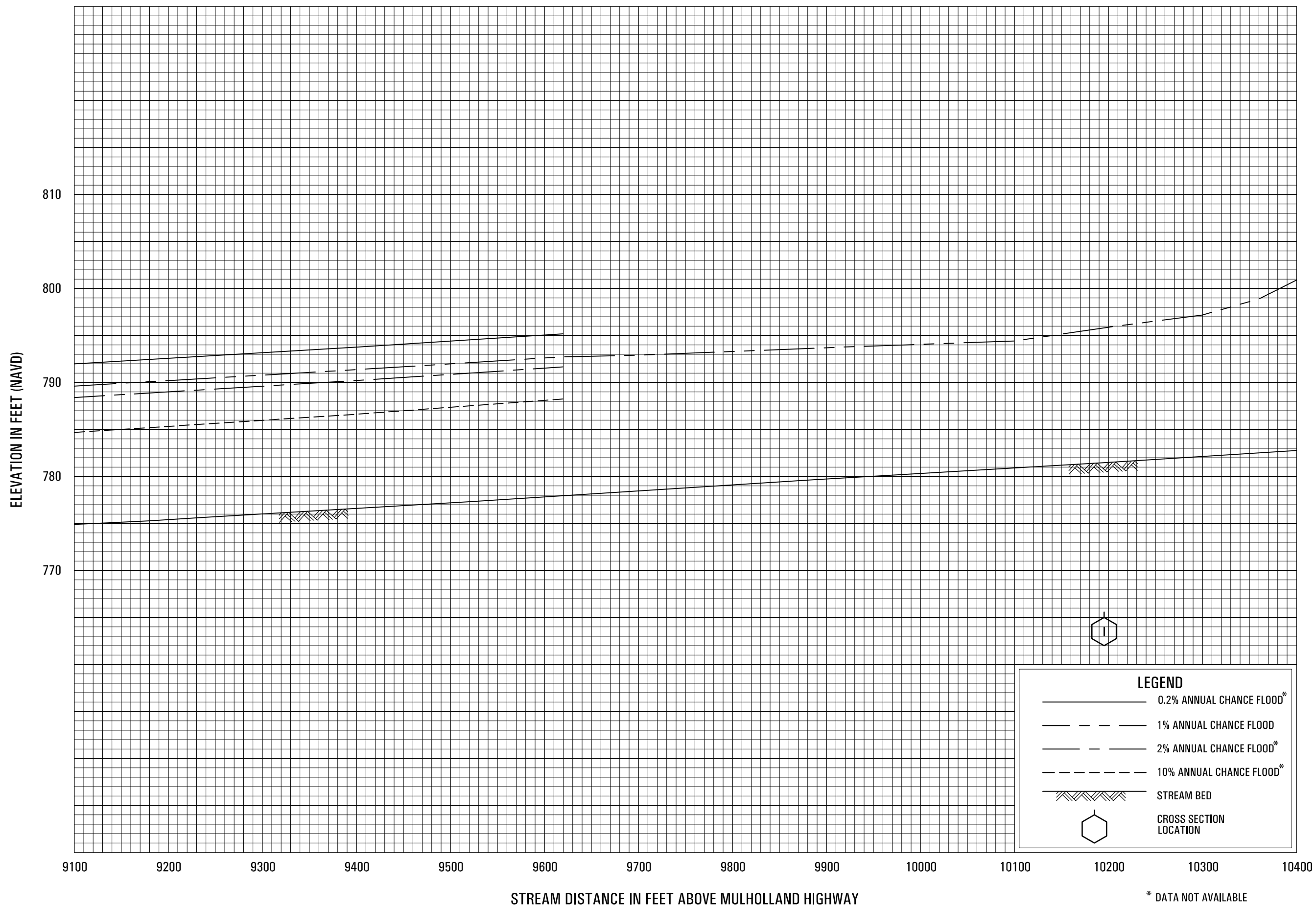
FLOOD PROFILES

MEDEA CREEK

FEDERAL EMERGENCY MANAGEMENT AGENCY

LOS ANGELES COUNTY, CA

AND INCORPORATED AREAS



* DATA NOT AVAILABLE

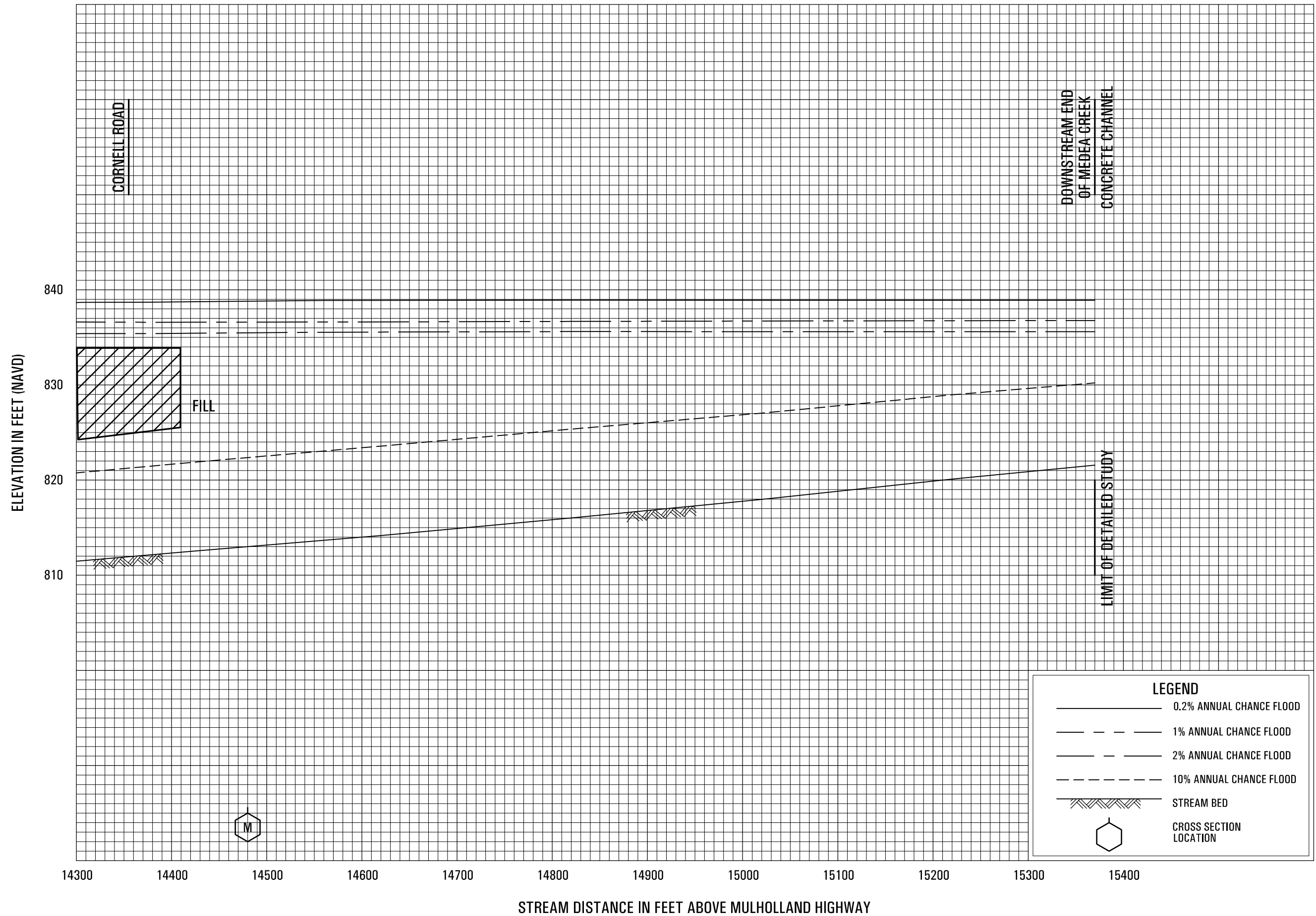
FLOOD PROFILES

MEDEA CREEK

FEDERAL EMERGENCY MANAGEMENT AGENCY

LOS ANGELES COUNTY, CA

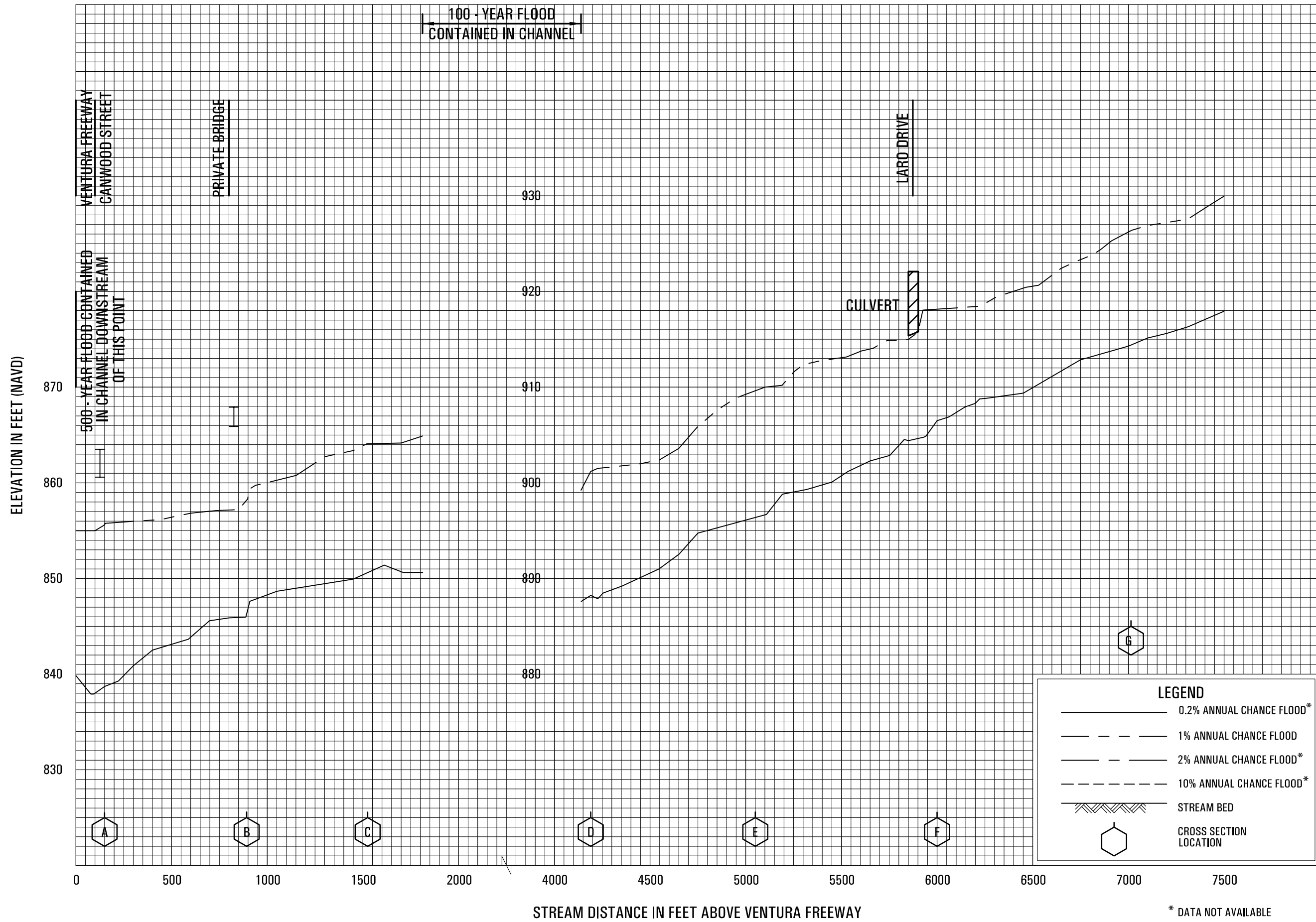
AND INCORPORATED AREAS



FLOOD PROFILES

MEDEA CREEK

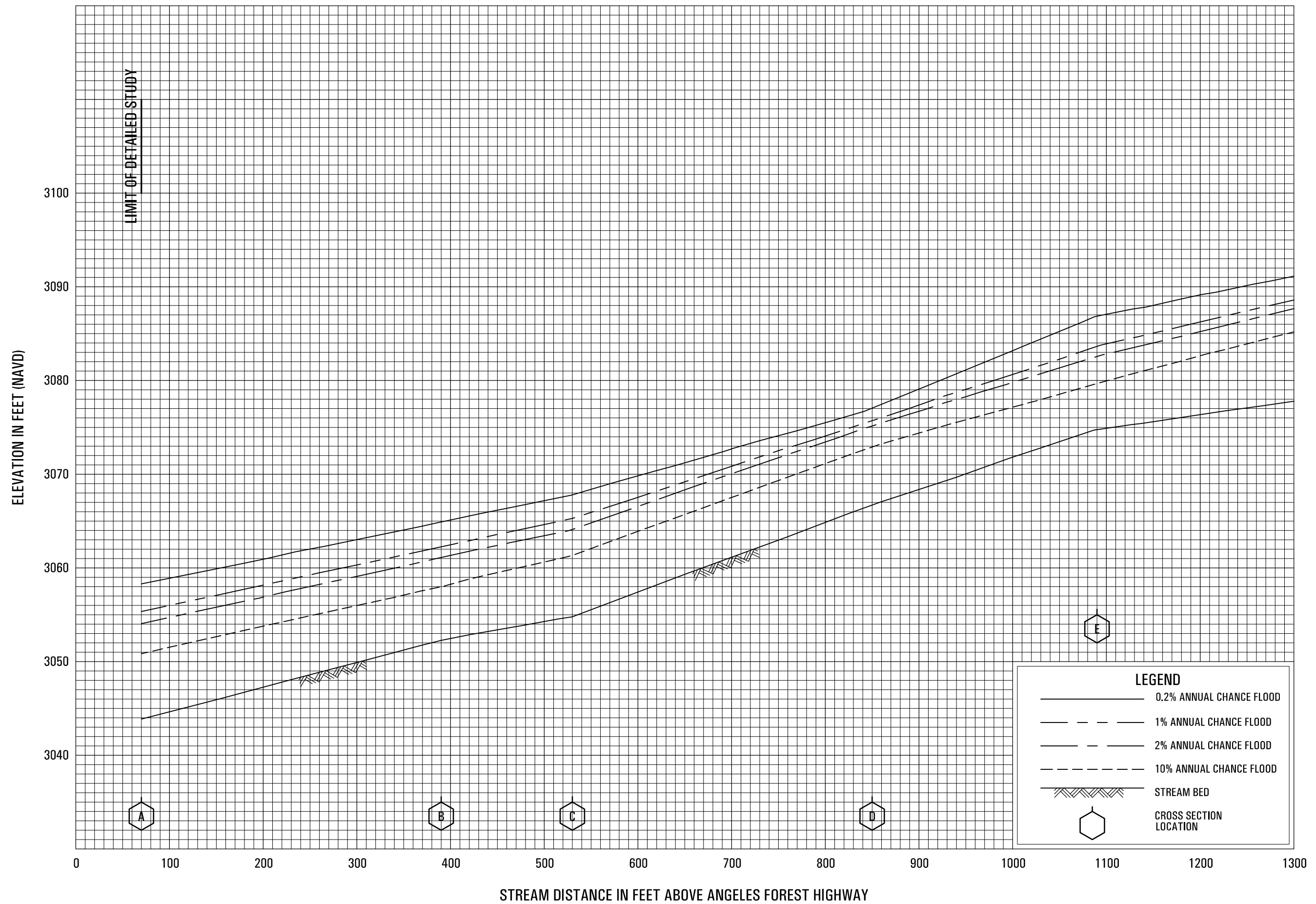
**FEDERAL EMERGENCY MANAGEMENT AGENCY
LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS**



* DATA NOT AVAILABLE

FLOOD PROFILES
MEDEA CREEK (ABOVE VENTURA FREEWAY)

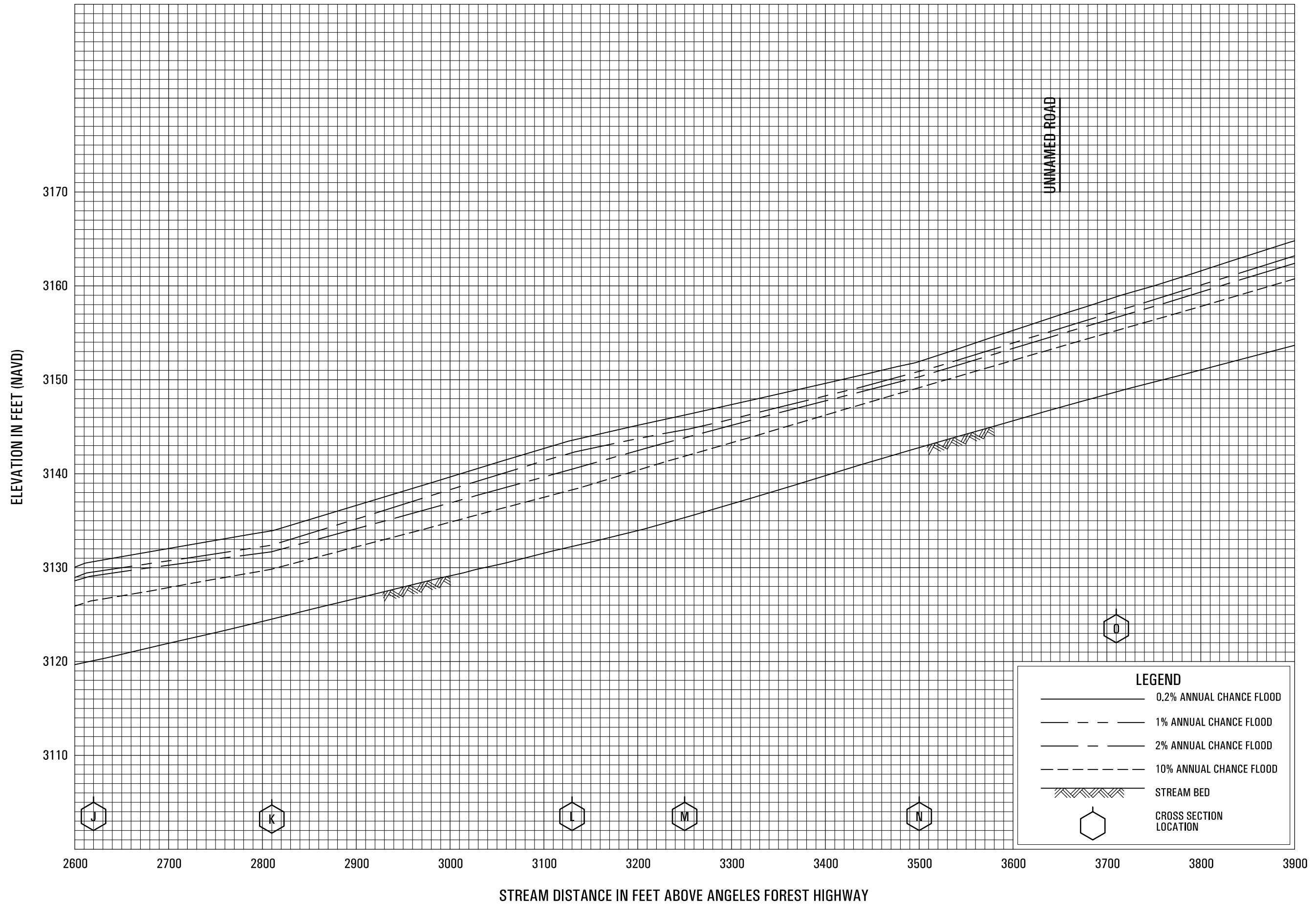
FEDERAL EMERGENCY MANAGEMENT AGENCY
LOS ANGELES COUNTY, CA
 AND INCORPORATED AREAS



FLOOD PROFILES

MILL CREEK

**FEDERAL EMERGENCY MANAGEMENT AGENCY
LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS**

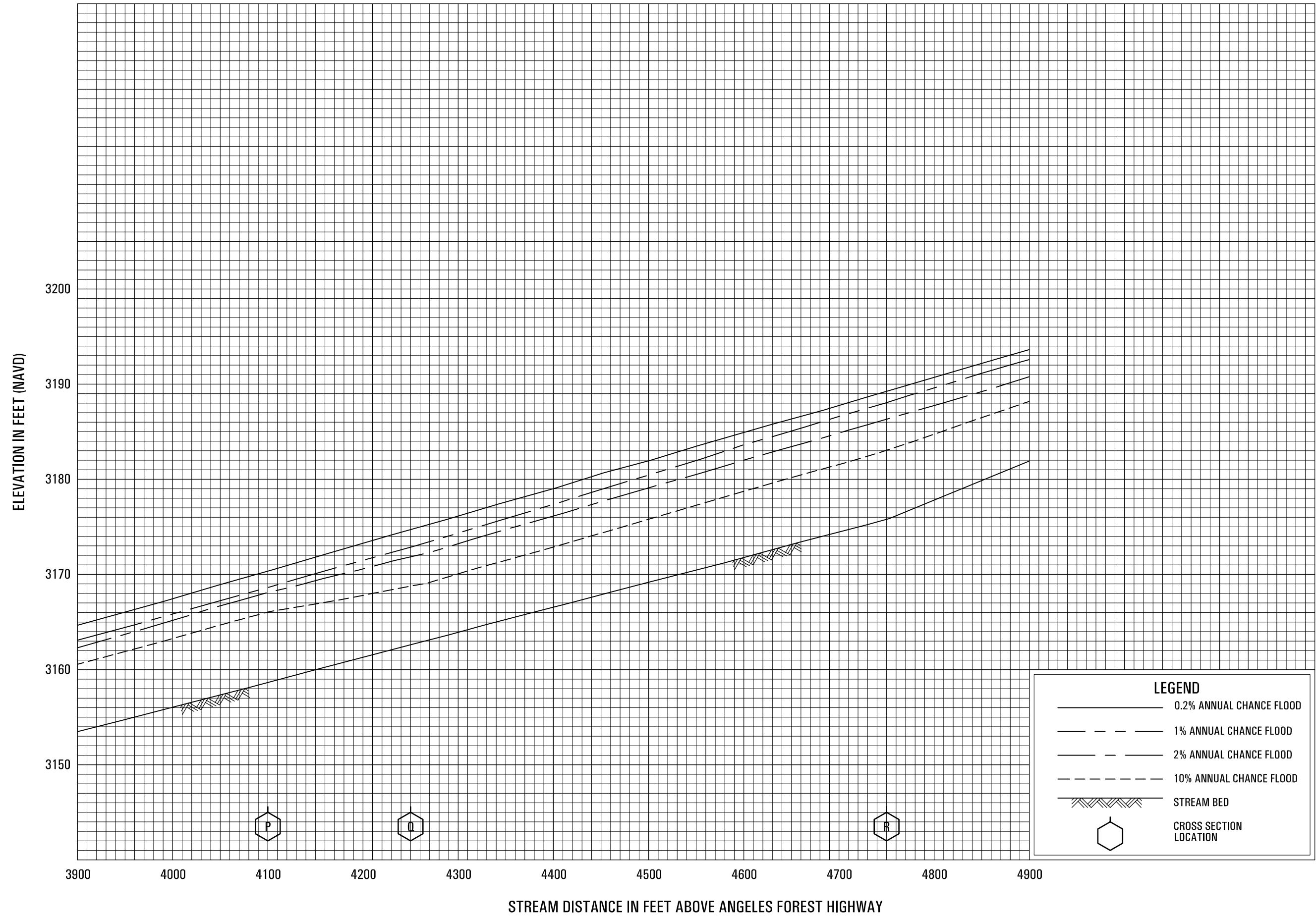


FLOOD PROFILES

MILL CREEK

FEDERAL EMERGENCY MANAGEMENT AGENCY

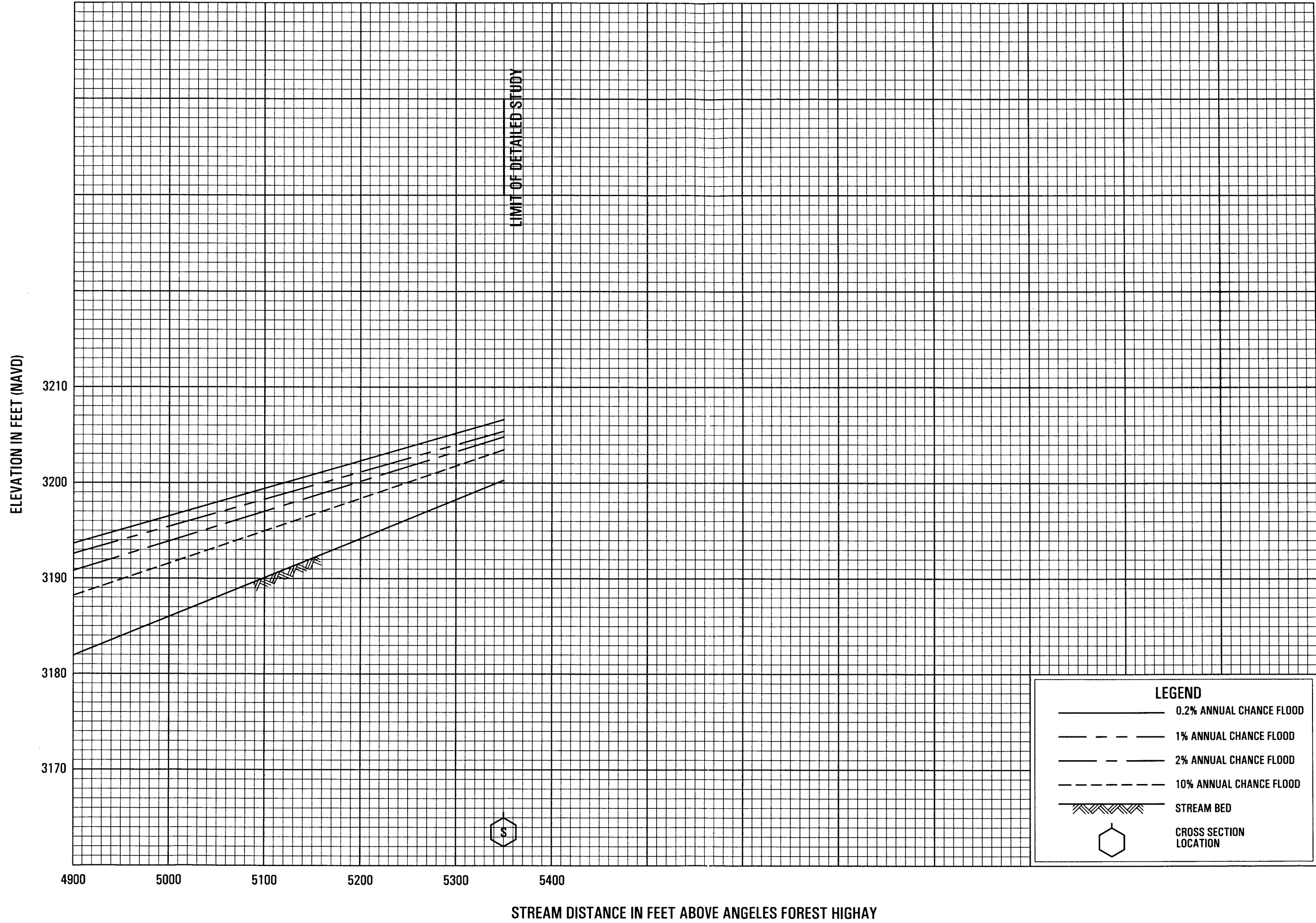
LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS



FLOOD PROFILES

MILL CREEK

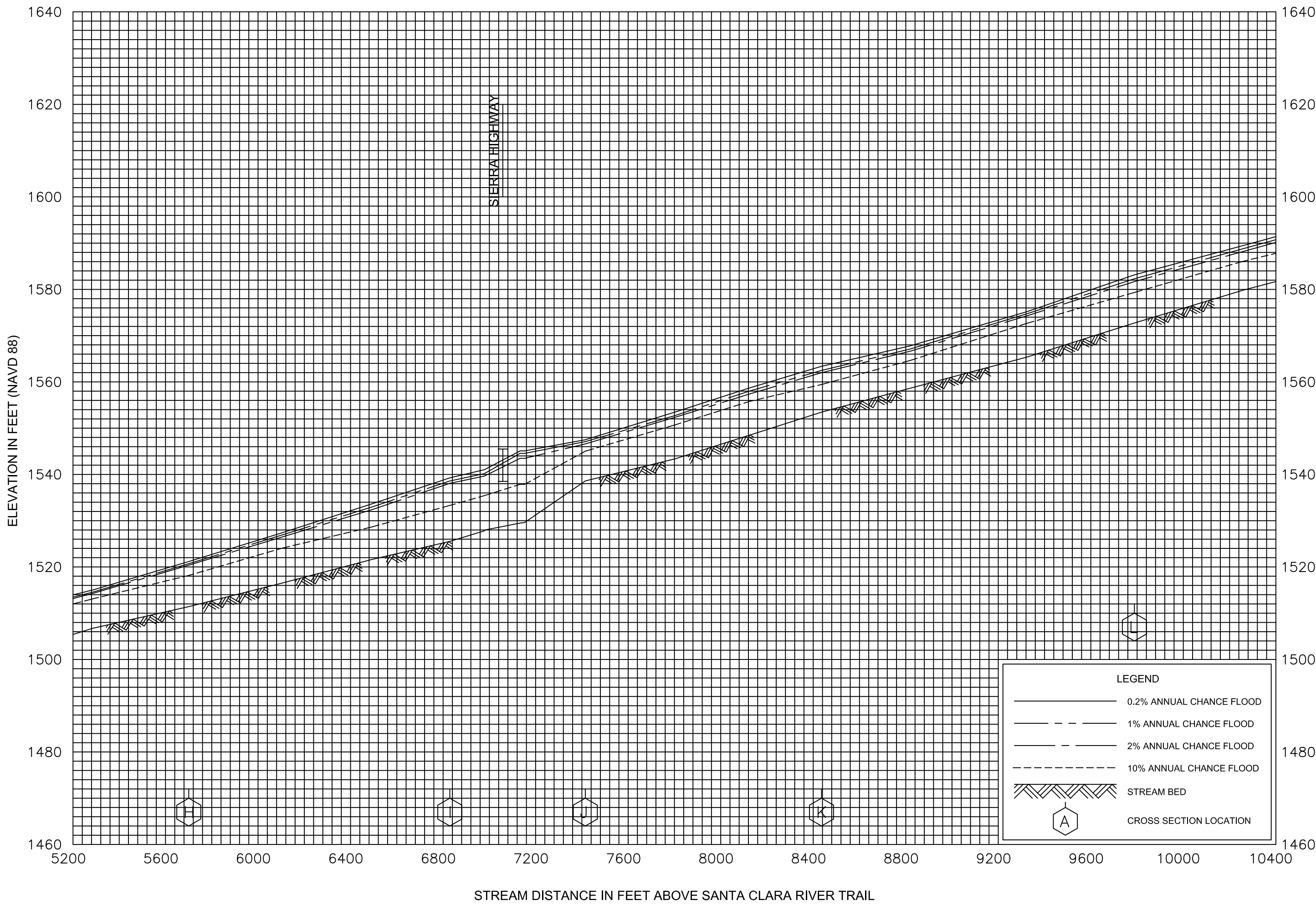
**FEDERAL EMERGENCY MANAGEMENT AGENCY
LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS**



FLOOD PROFILES

MILL CREEK

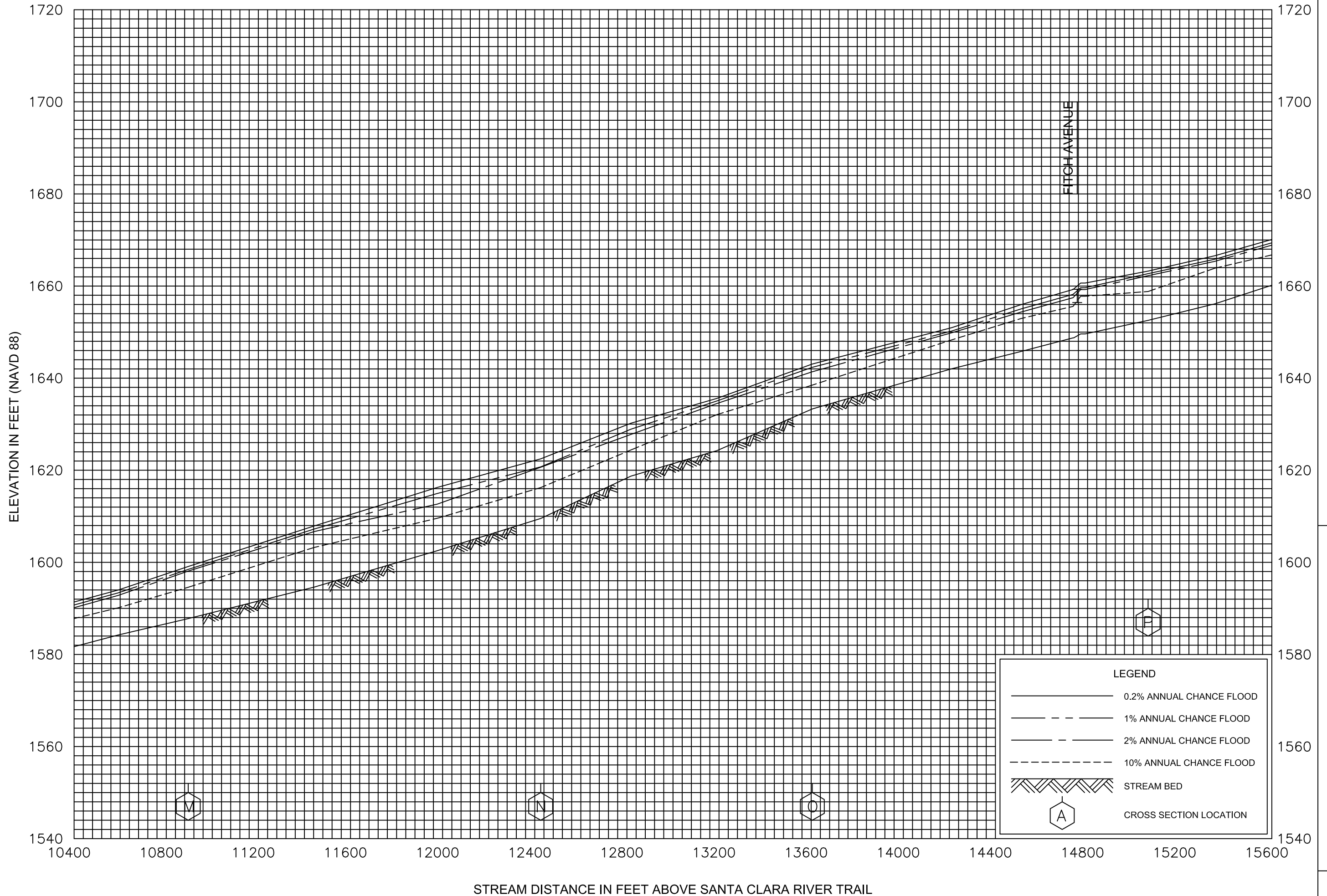
**FEDERAL EMERGENCY MANAGEMENT AGENCY
LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS**



FLOOD PROFILES
MINT CANYON CREEK

FEDERAL EMERGENCY MANAGEMENT AGENCY
LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS

LEGEND	
	0.2% ANNUAL CHANCE FLOOD
	1% ANNUAL CHANCE FLOOD
	2% ANNUAL CHANCE FLOOD
	10% ANNUAL CHANCE FLOOD
	STREAM BED
	CROSS SECTION LOCATION



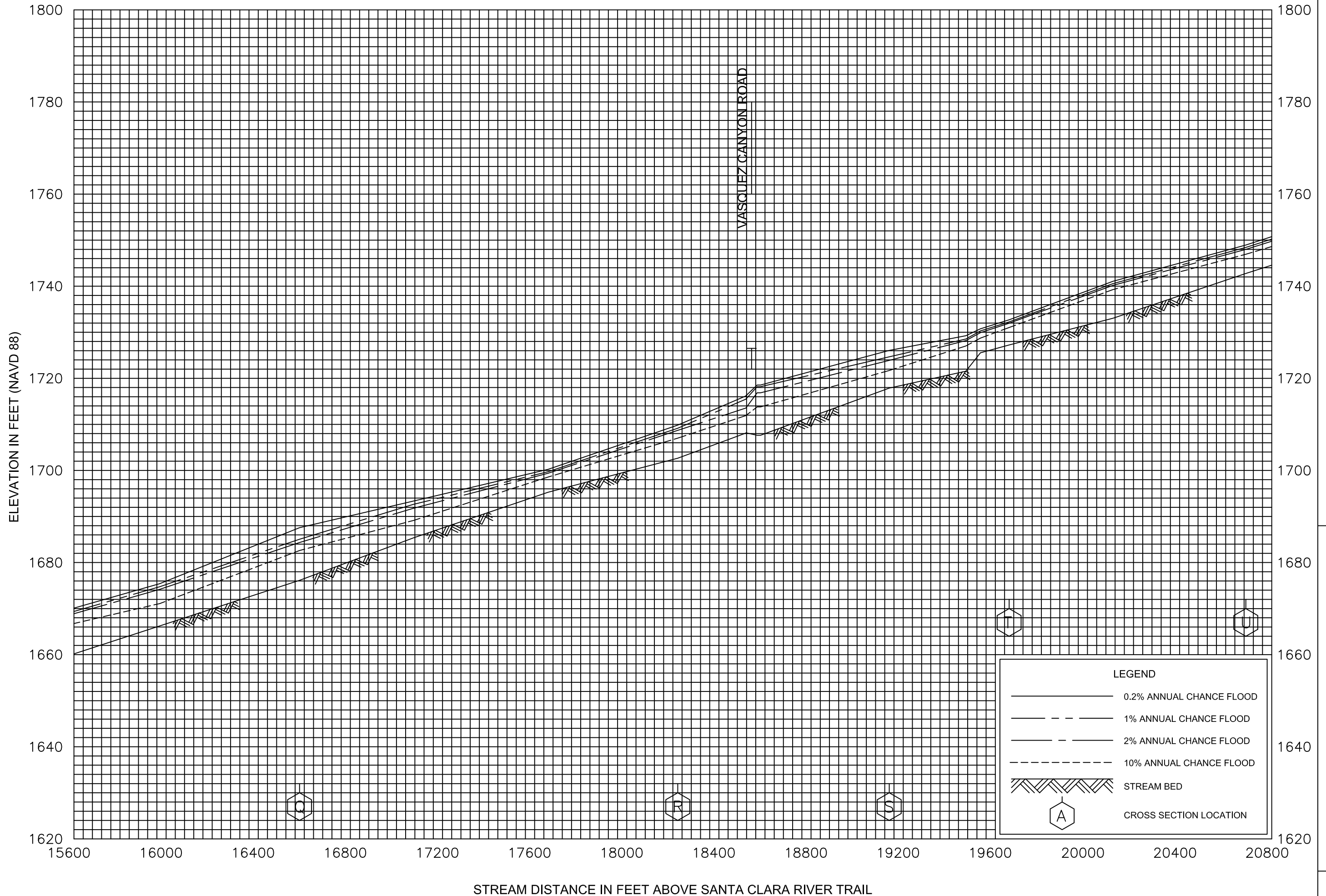
FLOOD PROFILES

MINT CANYON CREEK

FEDERAL EMERGENCY MANAGEMENT AGENCY

LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS

207P

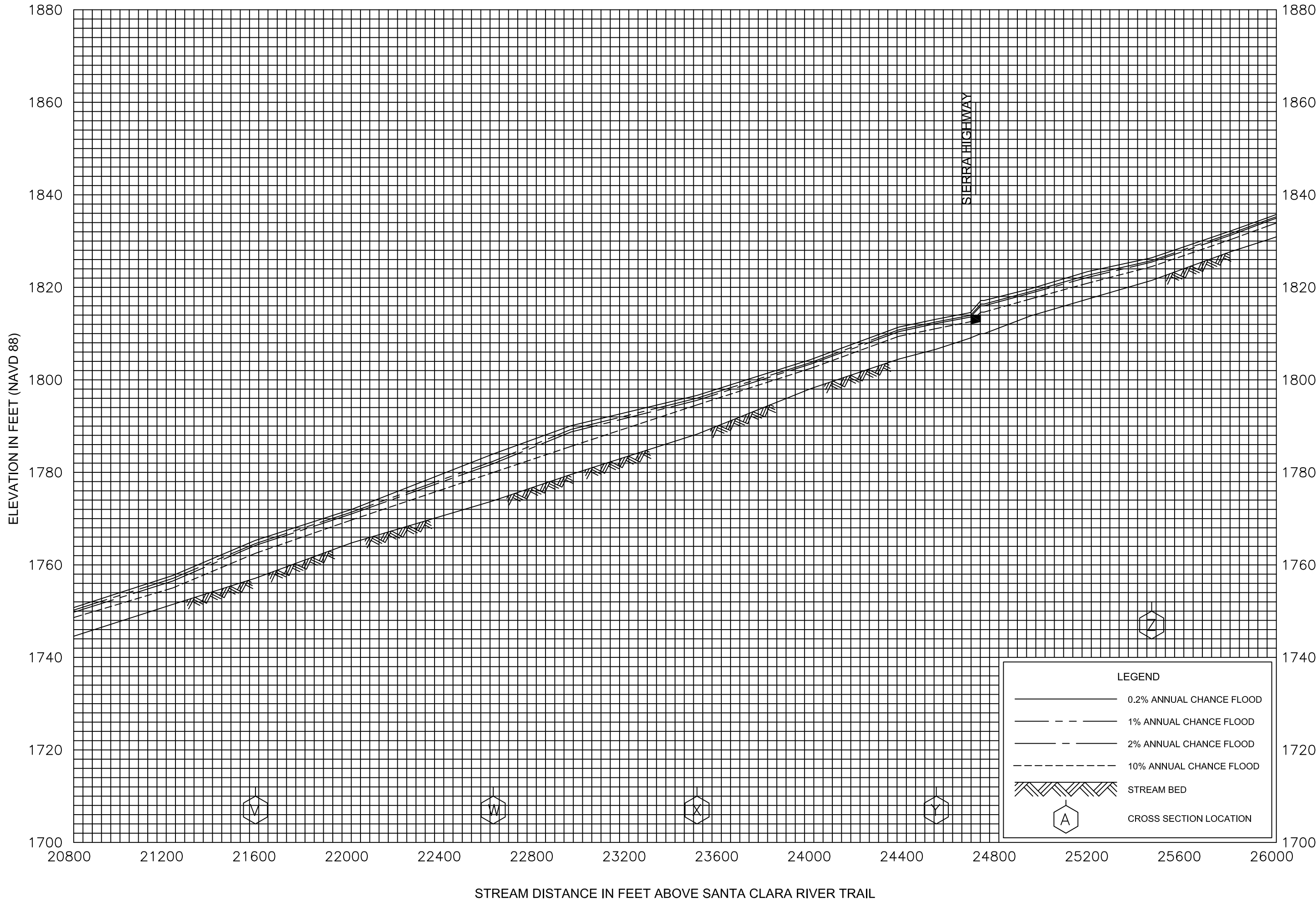


FLOOD PROFILES

MINT CANYON CREEK

FEDERAL EMERGENCY MANAGEMENT AGENCY

LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS



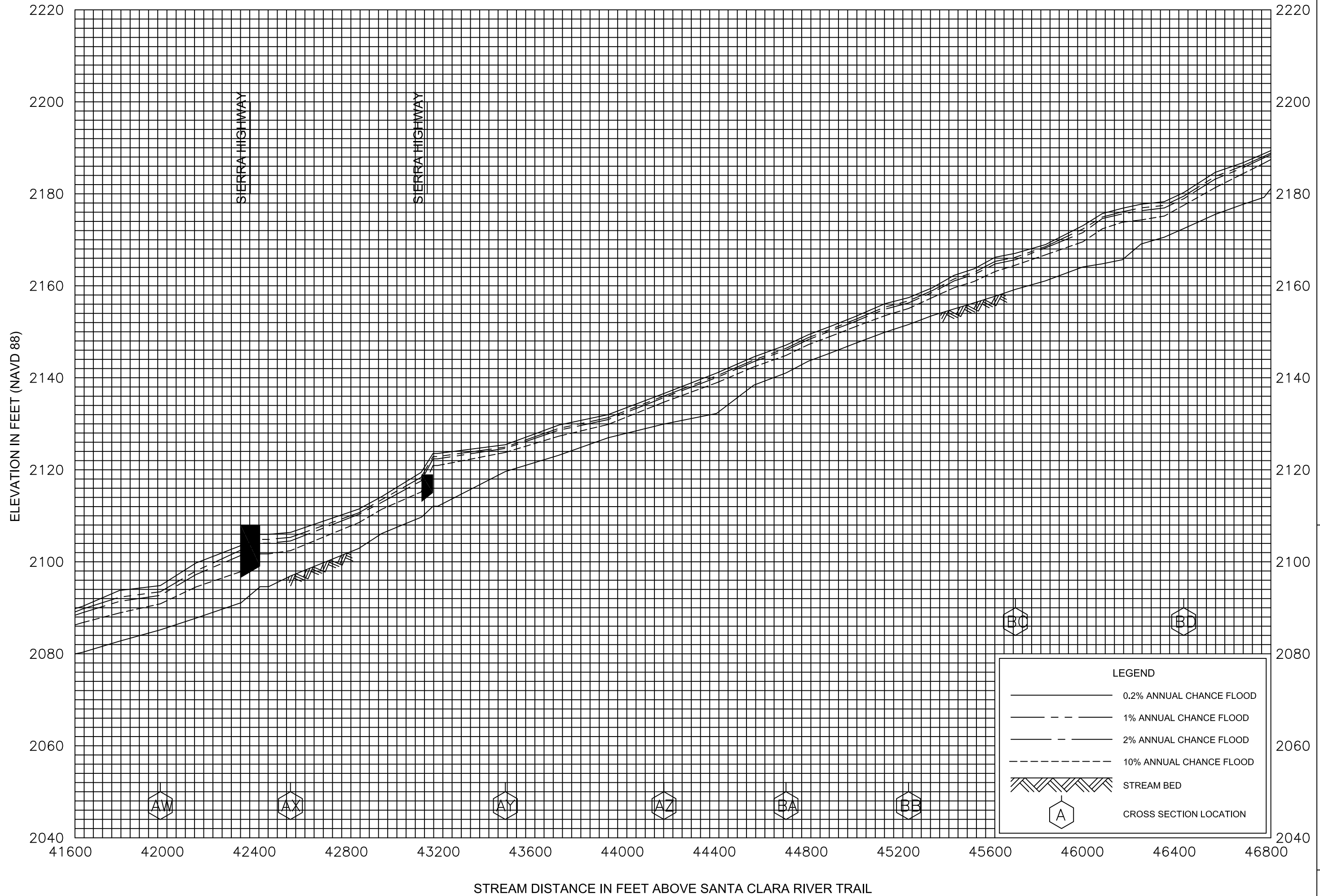
FLOOD PROFILES

MINT CANYON CREEK

FEDERAL EMERGENCY MANAGEMENT AGENCY

LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS

209P



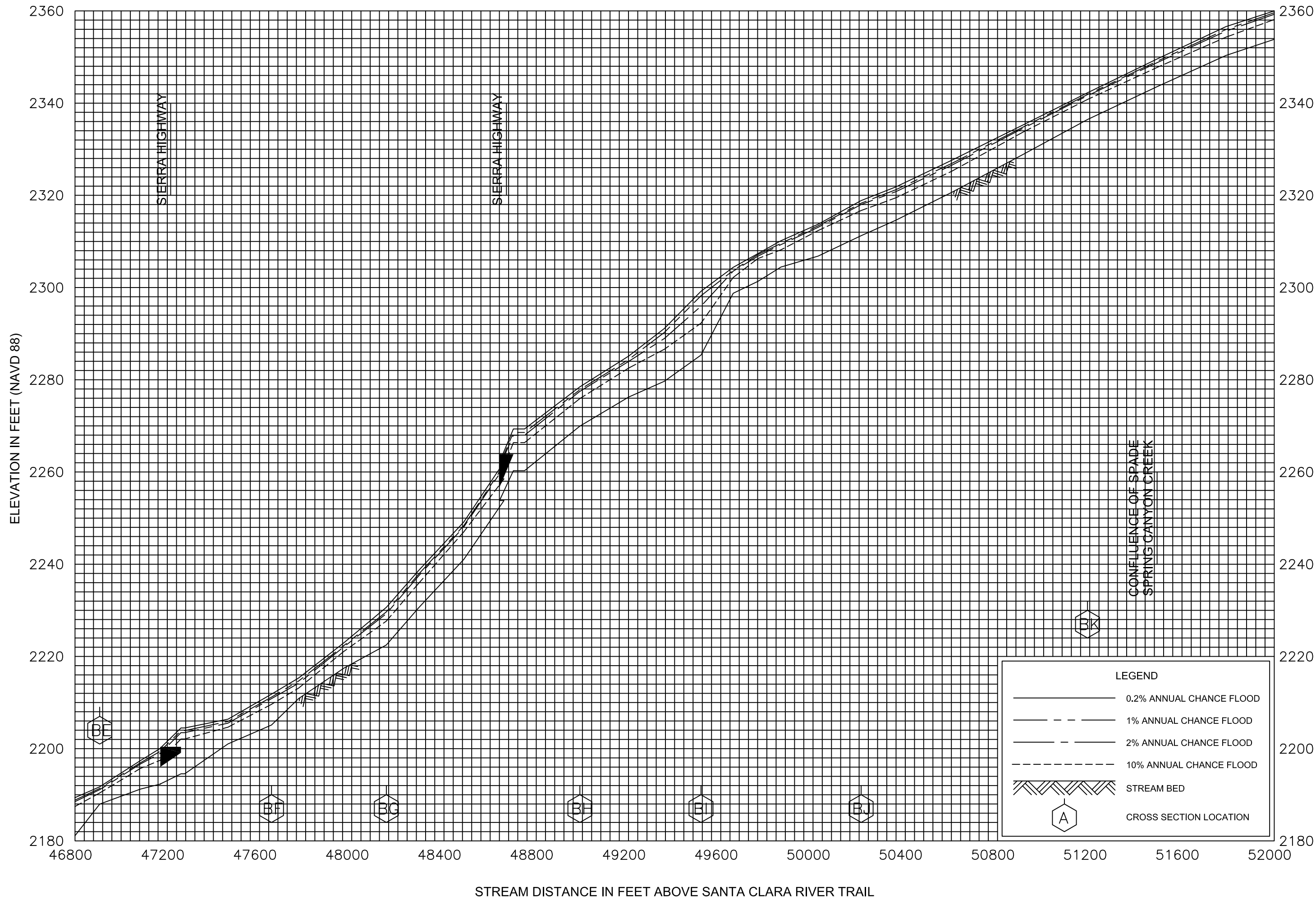
FLOOD PROFILES

MINT CANYON CREEK

FEDERAL EMERGENCY MANAGEMENT AGENCY

LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS

213P



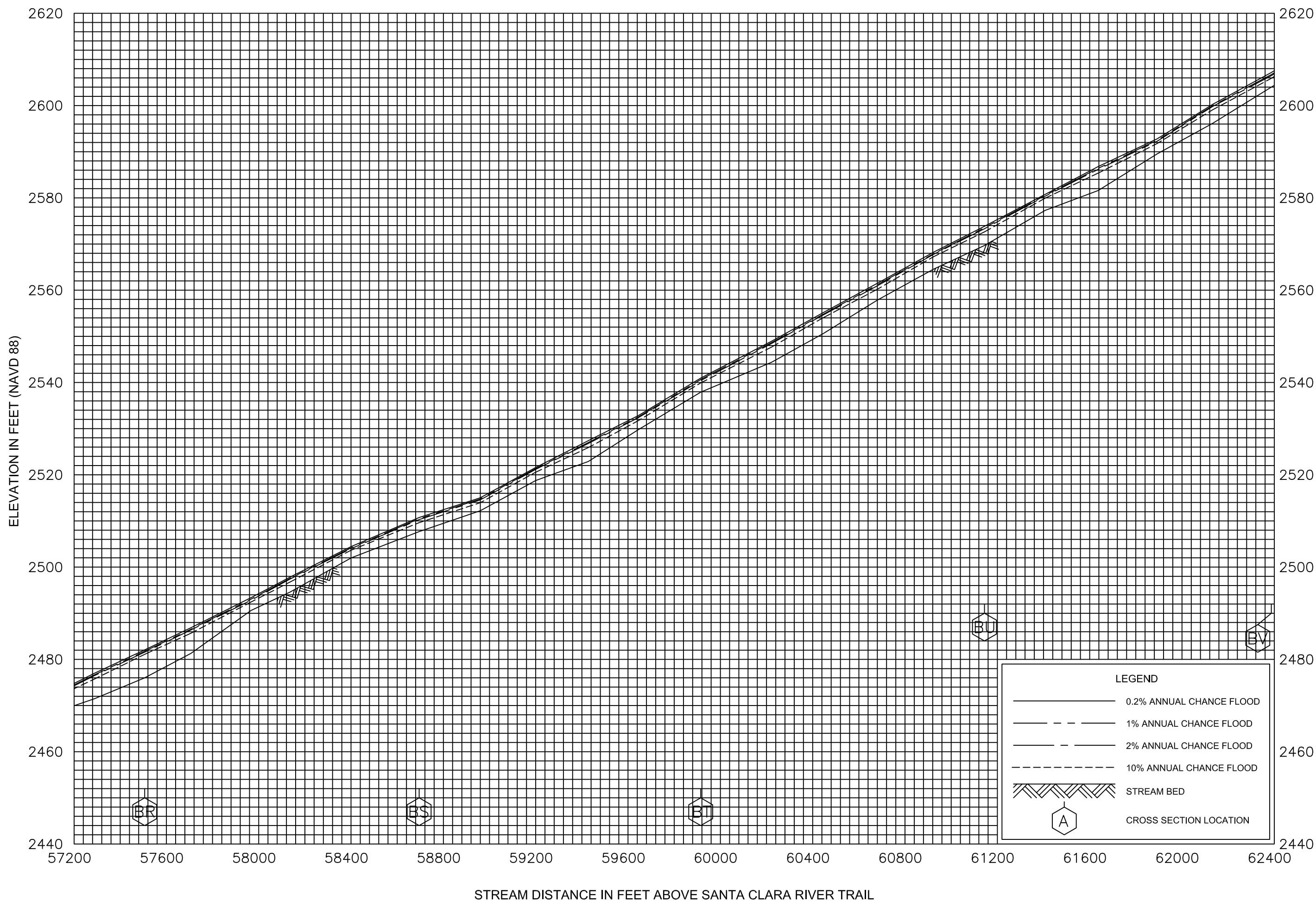
FLOOD PROFILES

MINT CANYON CREEK

FEDERAL EMERGENCY MANAGEMENT AGENCY

LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS

214P



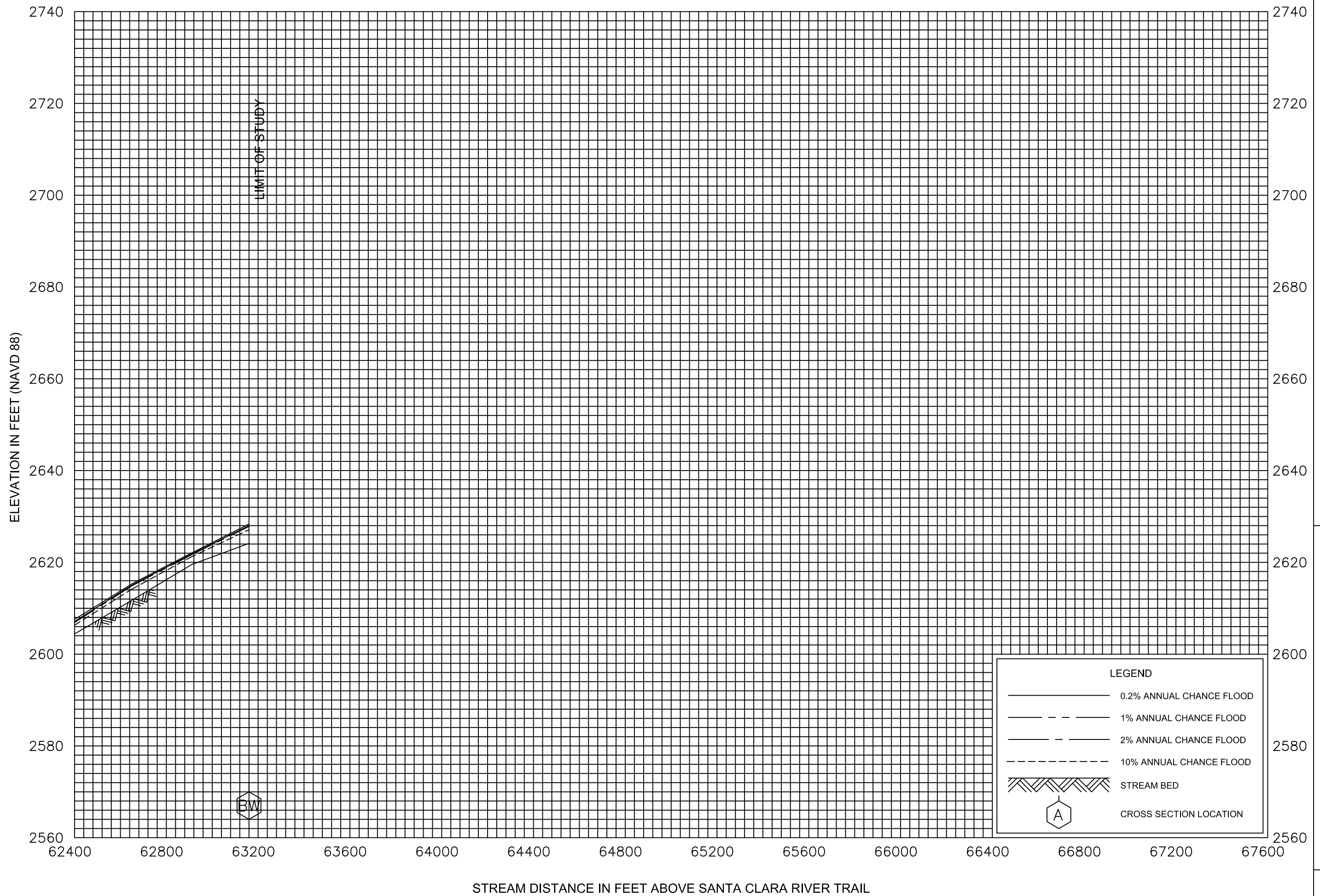
FLOOD PROFILES

MINT CANYON CREEK

FEDERAL EMERGENCY MANAGEMENT AGENCY

LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS

216P

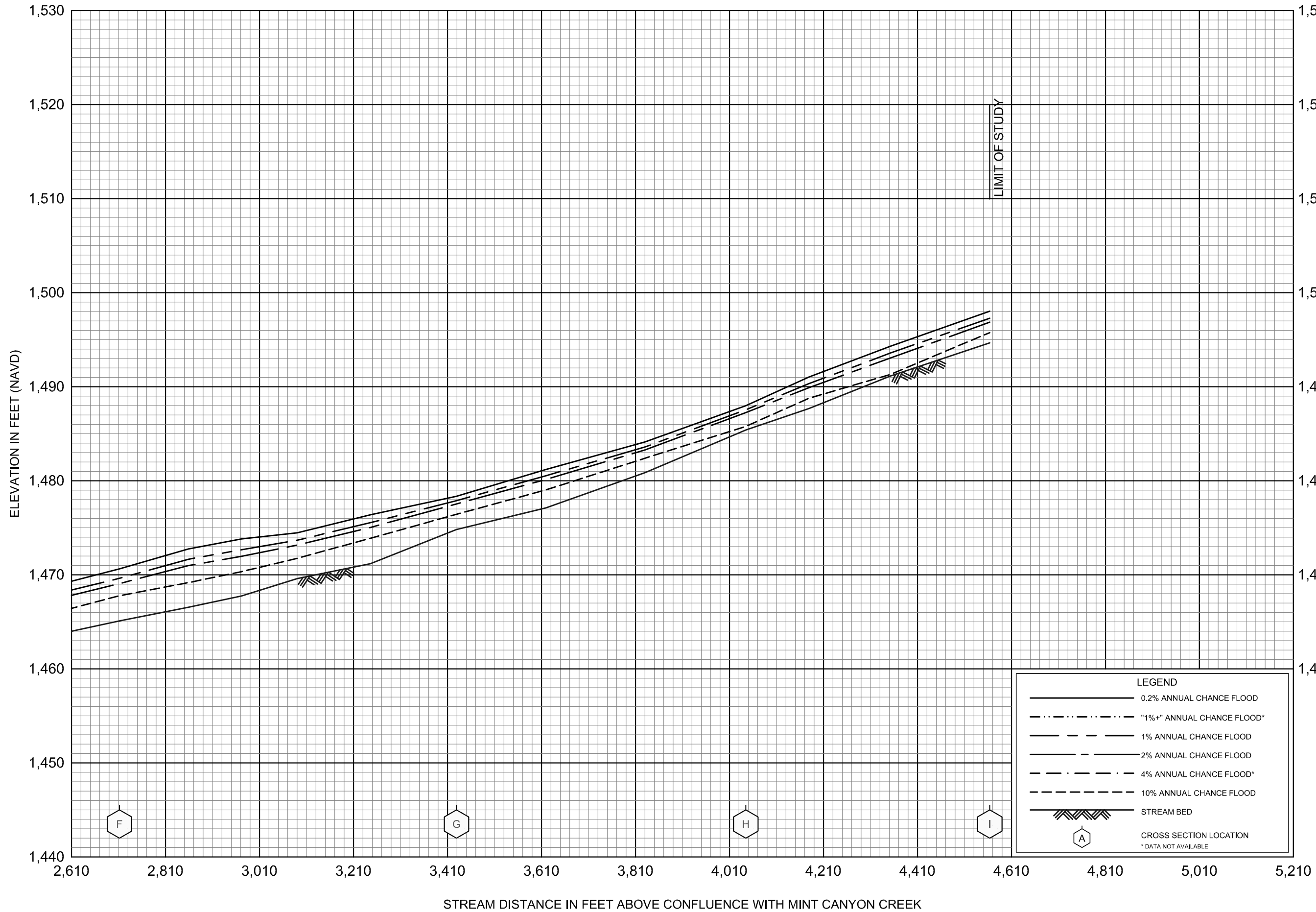


FLOOD PROFILES

MINT CANYON CREEK

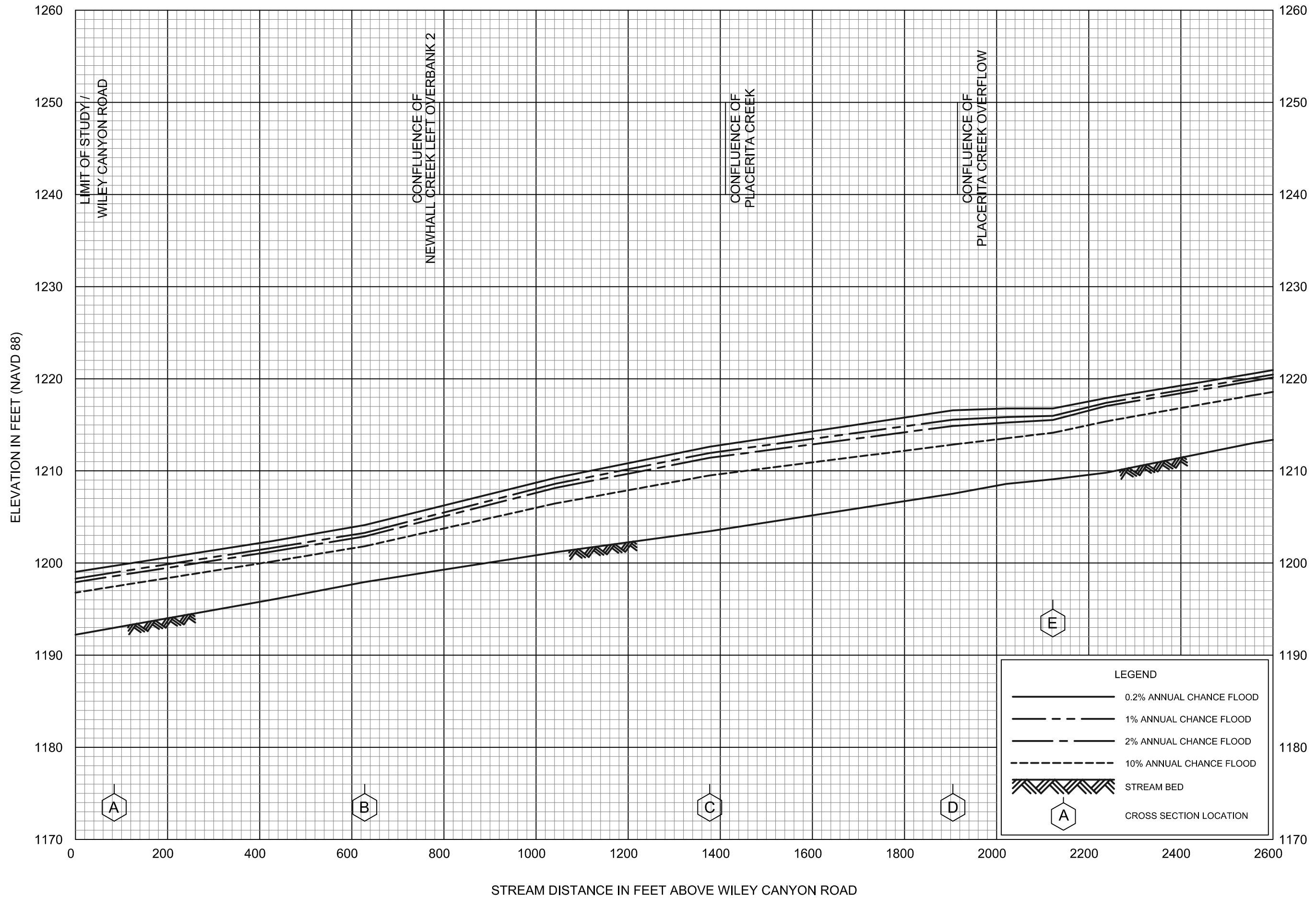
FEDERAL EMERGENCY MANAGEMENT AGENCY

LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS



FLOOD PROFILES
MINT CANYON CREEK OVERFLOW

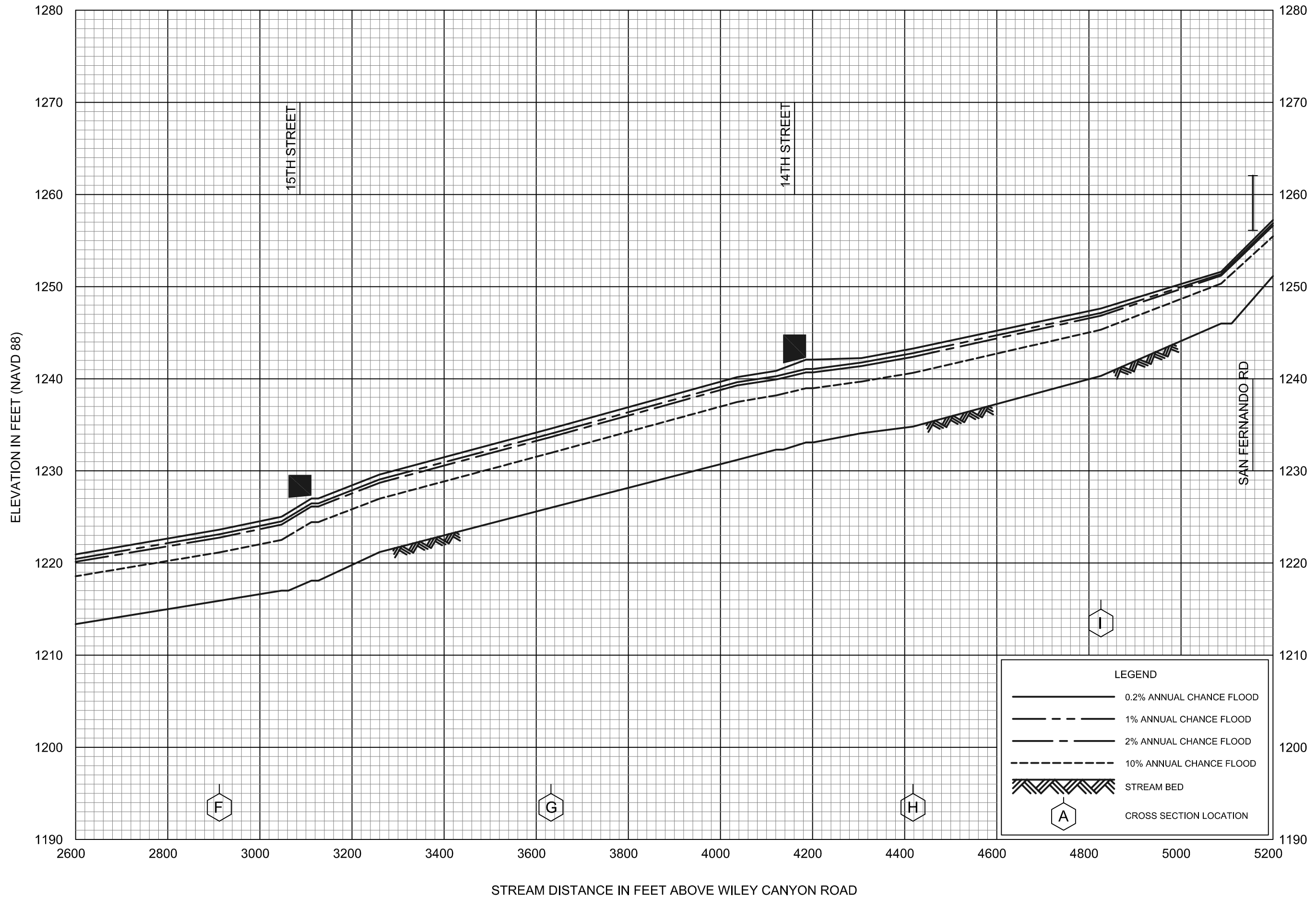
FEDERAL EMERGENCY MANAGEMENT AGENCY
LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS



FLOOD PROFILES
NEWHALL CREEK

FEDERAL EMERGENCY MANAGEMENT AGENCY
LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS

220P

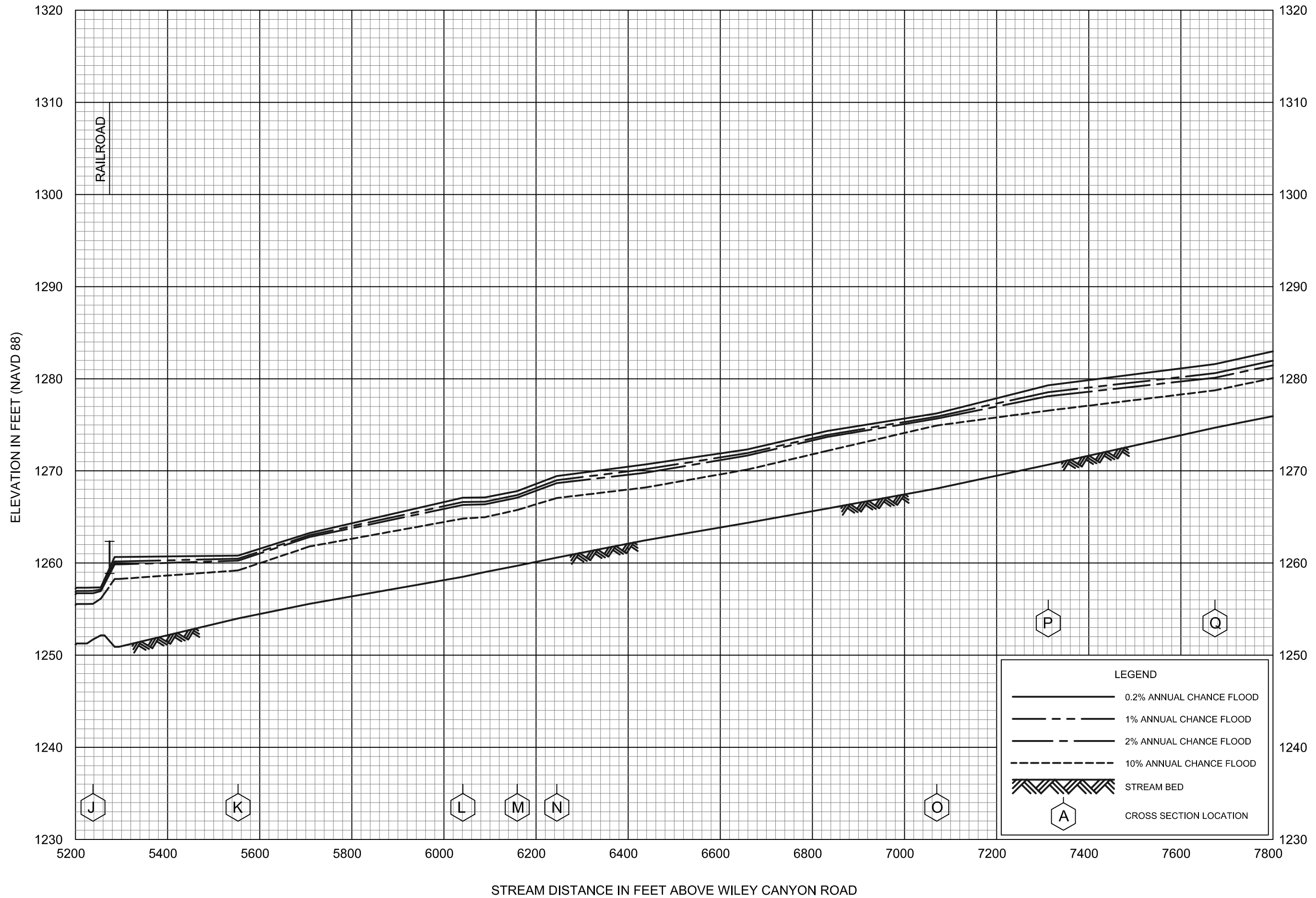


FLOOD PROFILES

NEWHALL CREEK

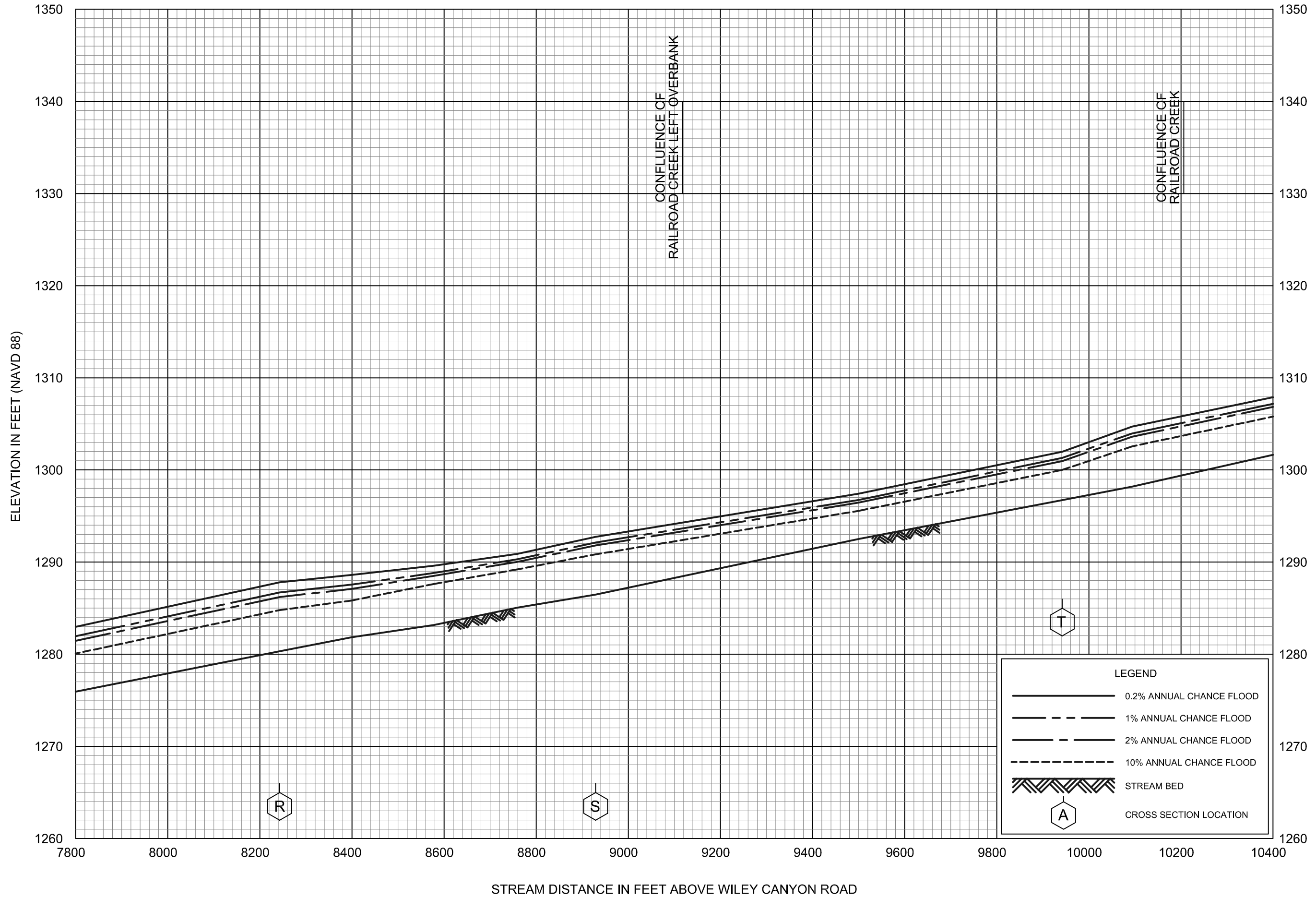
FEDERAL EMERGENCY MANAGEMENT AGENCY
 LOS ANGELES COUNTY, CA
 AND INCORPORATED AREAS

221P



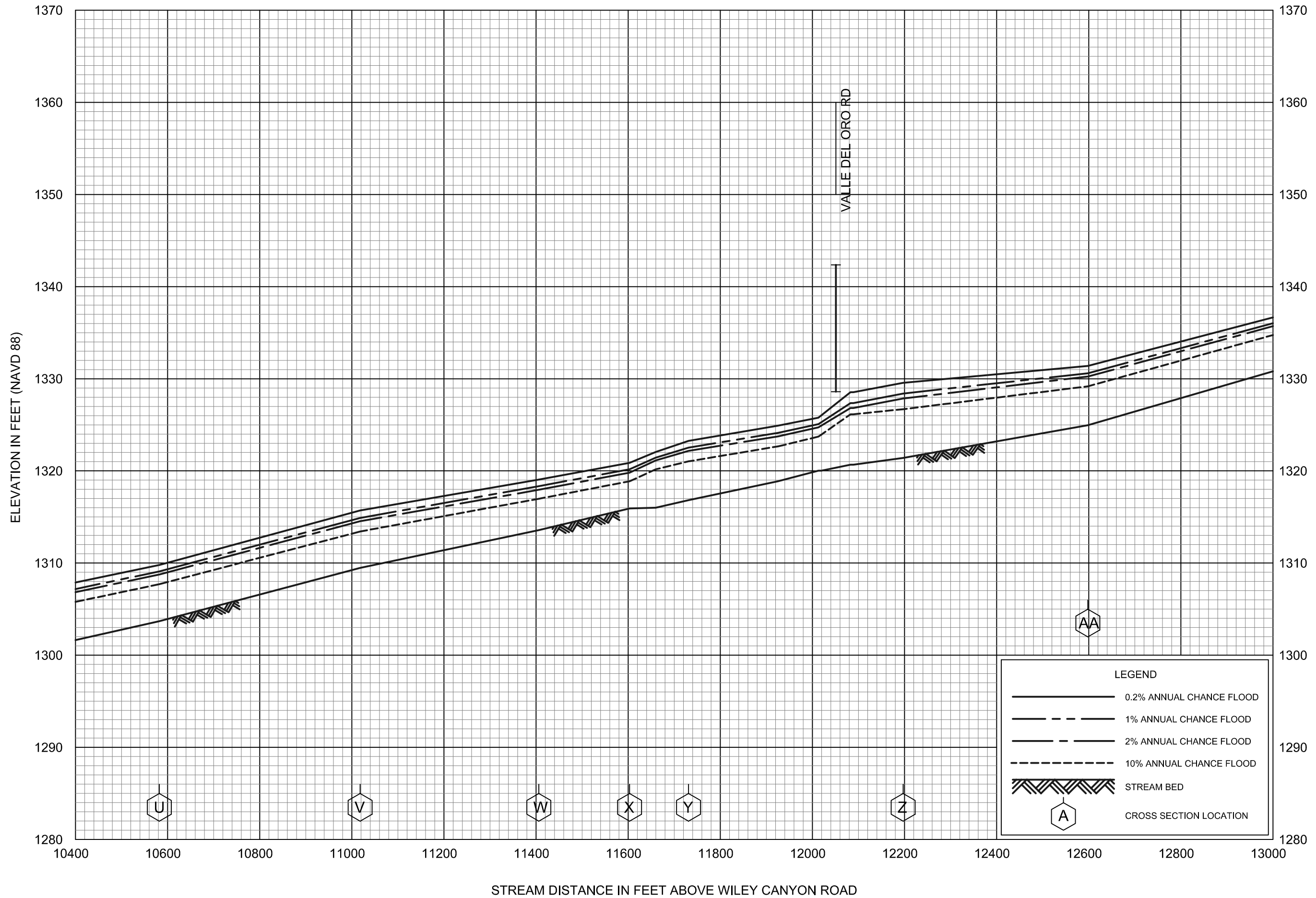
FLOOD PROFILES
NEWHALL CREEK

FEDERAL EMERGENCY MANAGEMENT AGENCY
LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS



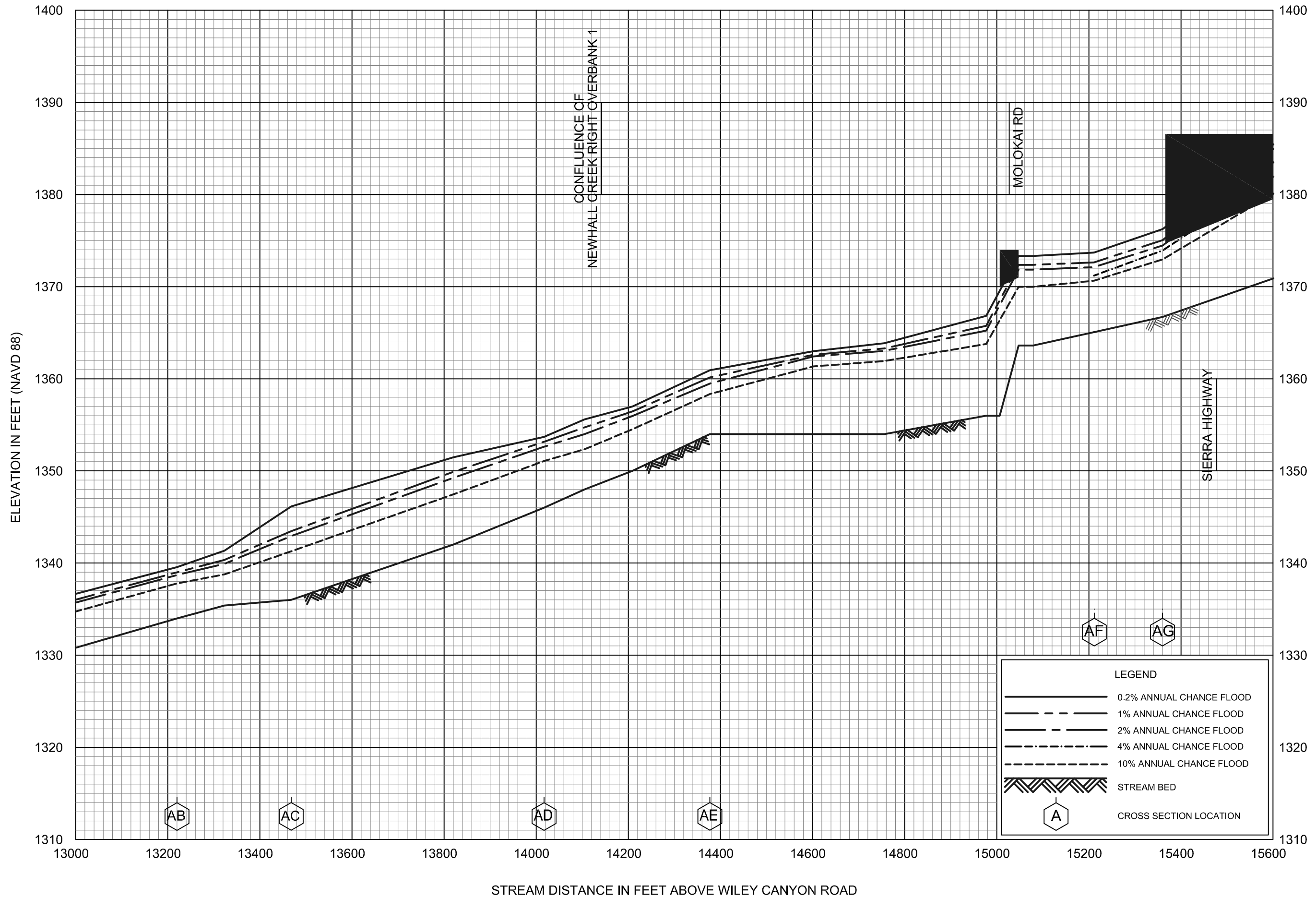
FLOOD PROFILES
NEWHALL CREEK

FEDERAL EMERGENCY MANAGEMENT AGENCY
LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS



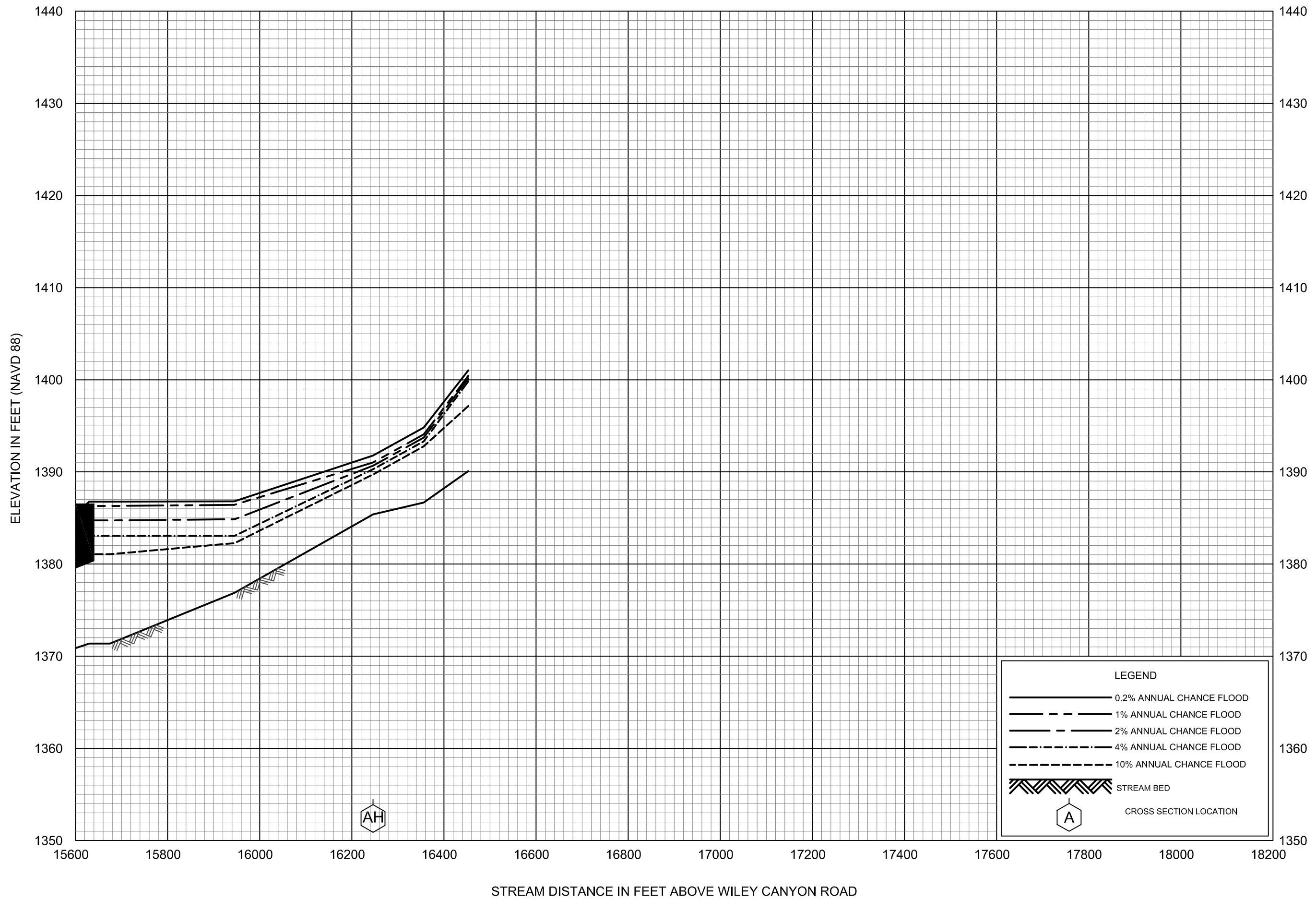
FLOOD PROFILES
NEWHALL CREEK

FEDERAL EMERGENCY MANAGEMENT AGENCY
LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS



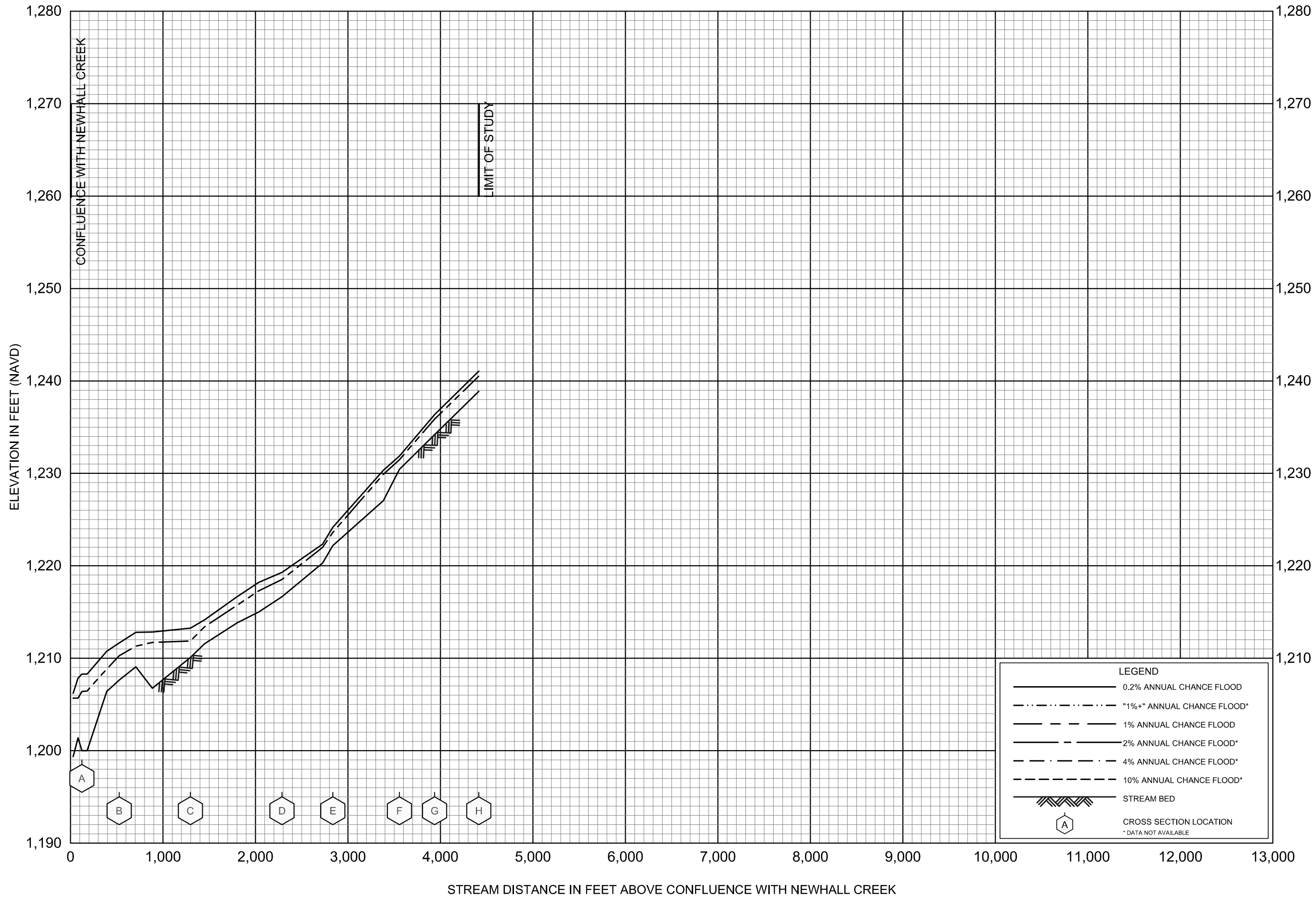
FLOOD PROFILES
NEWHALL CREEK

FEDERAL EMERGENCY MANAGEMENT AGENCY
LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS



FLOOD PROFILES
NEWHALL CREEK

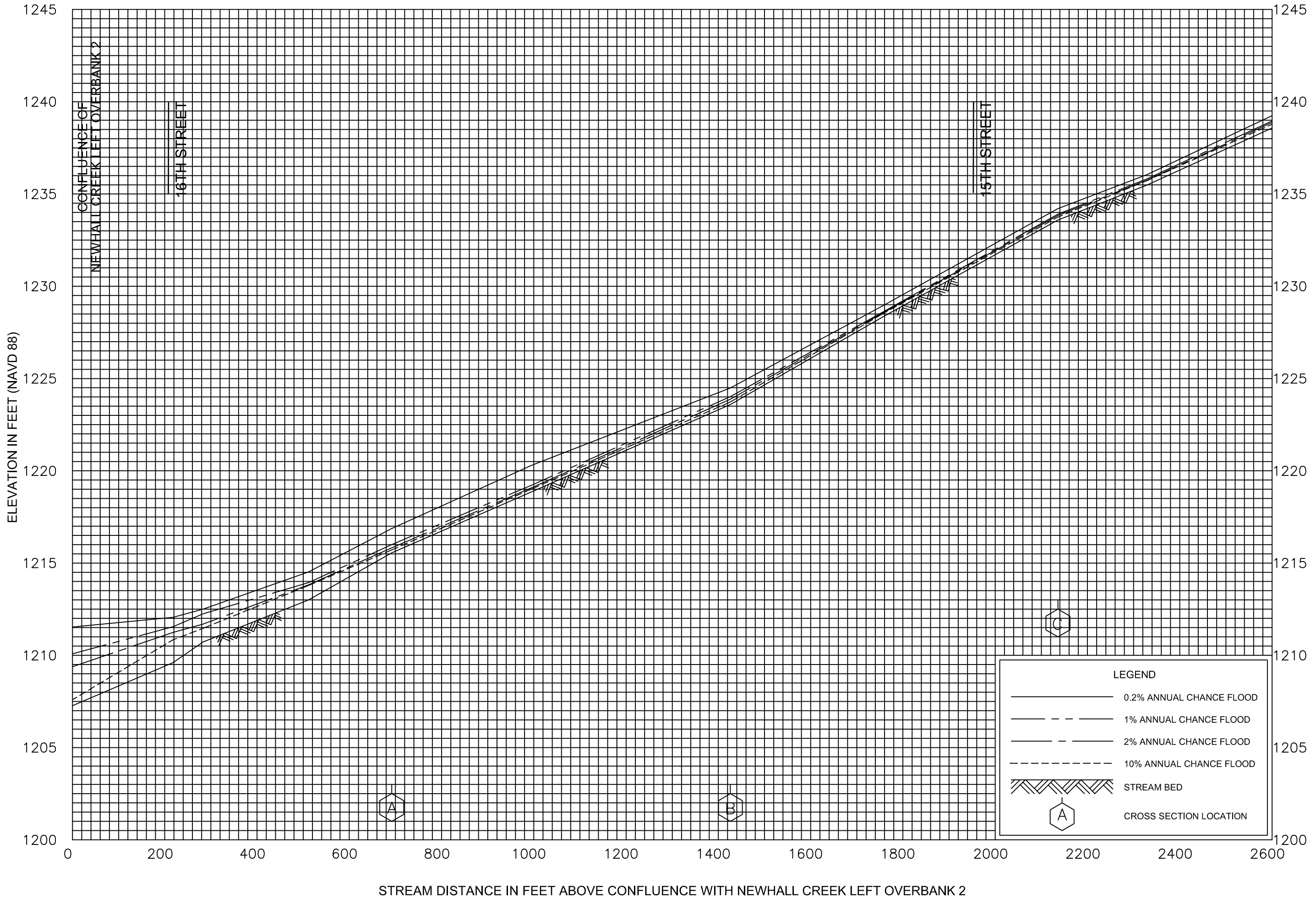
FEDERAL EMERGENCY MANAGEMENT AGENCY
LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS



FLOOD PROFILES

NEWHALL CREEK LEFT OVERBANK 2

FEDERAL EMERGENCY MANAGEMENT AGENCY
 LOS ANGELES COUNTY, CA
 AND INCORPORATED AREAS

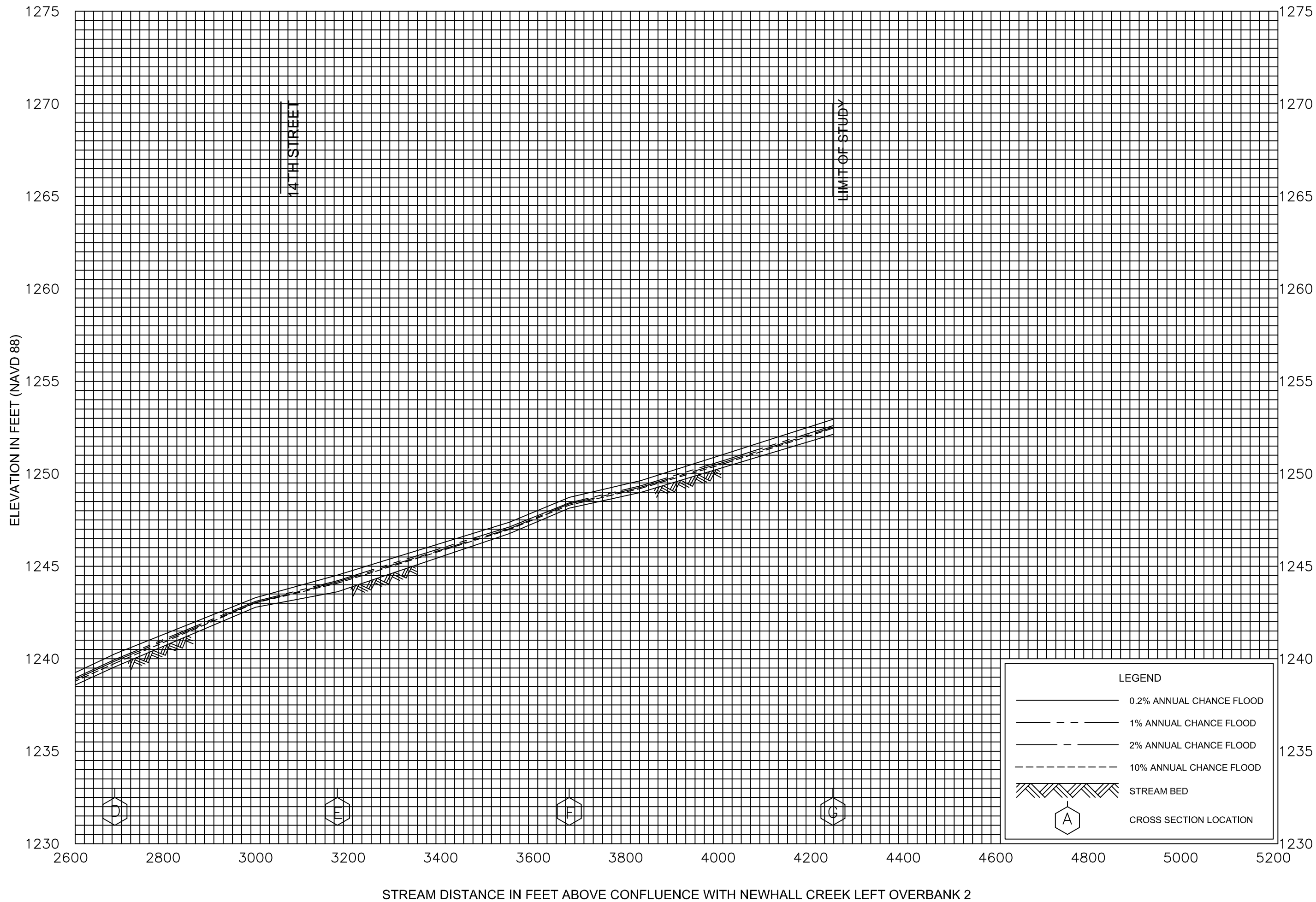


FLOOD PROFILES

NEWHALL CREEK LEFT OVERBANK 3

FEDERAL EMERGENCY MANAGEMENT AGENCY

LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS



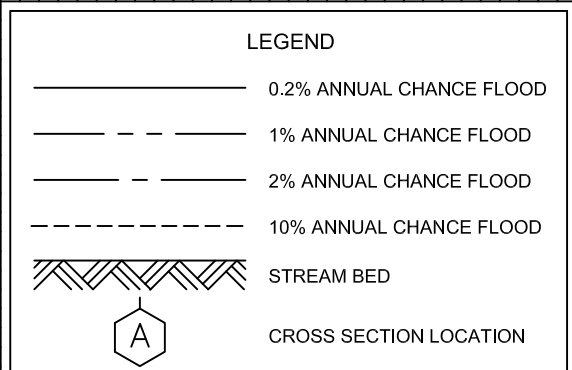
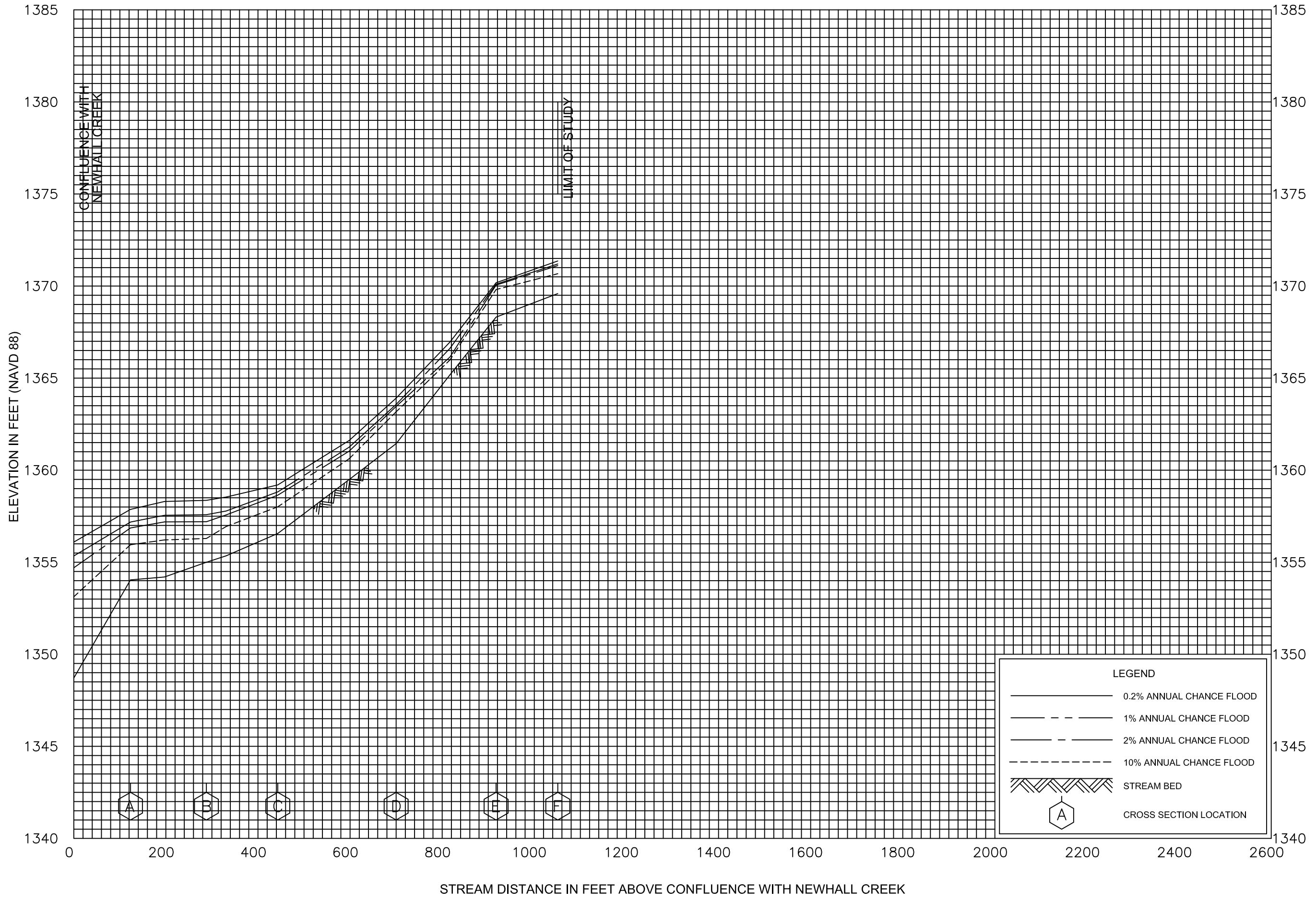
FLOOD PROFILES

NEWHALL CREEK LEFT OVERBANK 3

FEDERAL EMERGENCY MANAGEMENT AGENCY

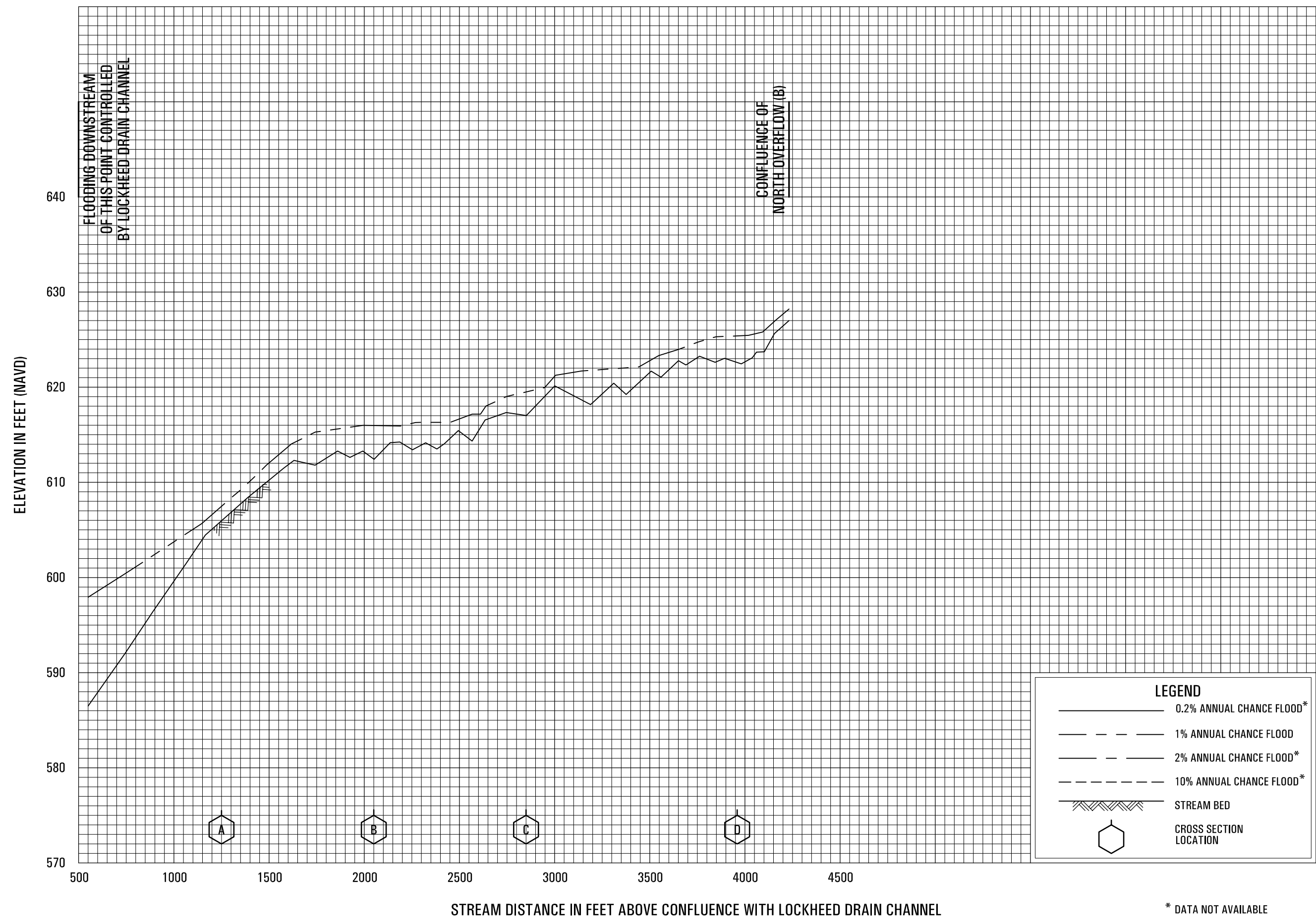
LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS

229P

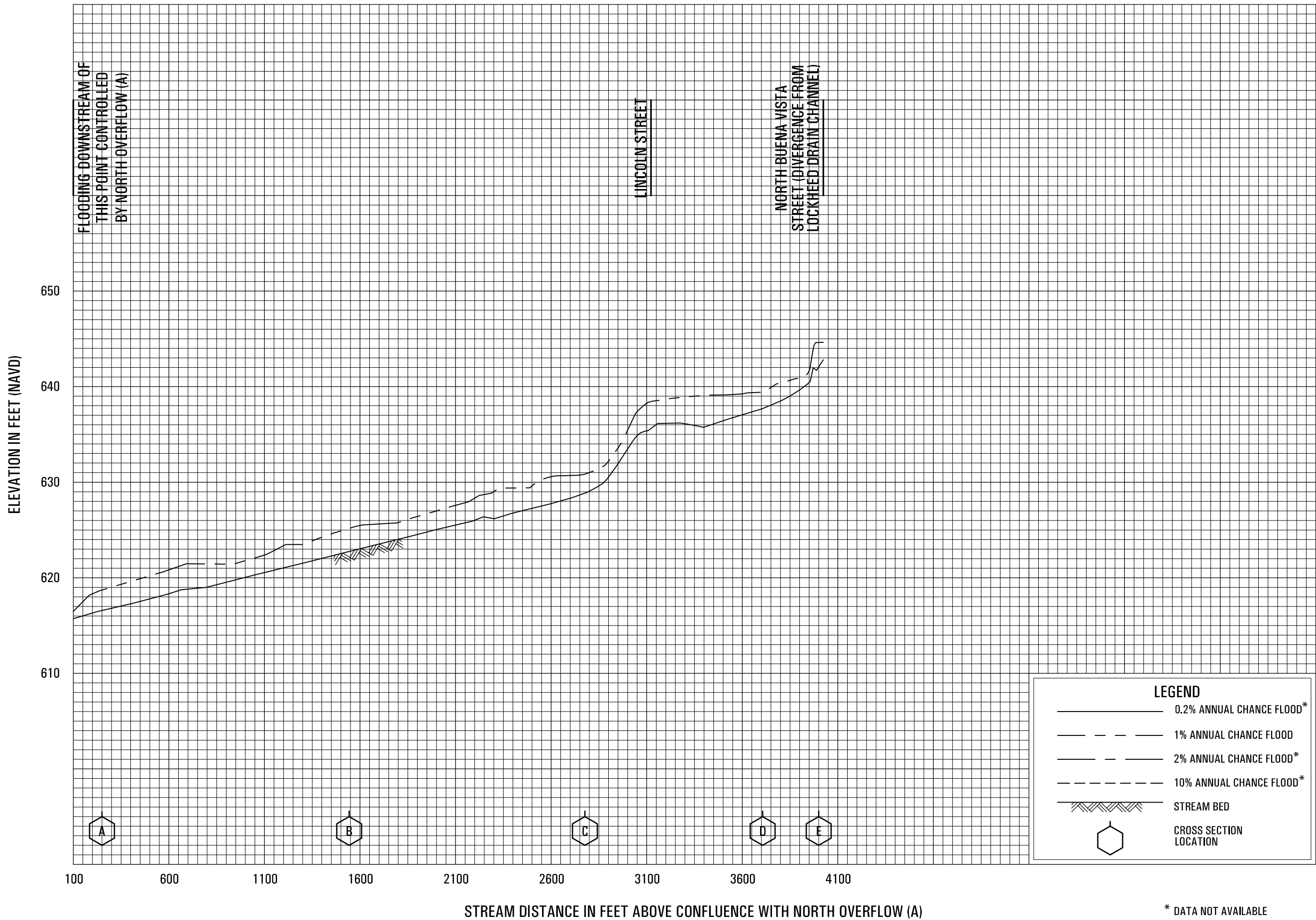


FLOOD PROFILES
 NEWHALL CREEK RIGHT OVERBANK 1

FEDERAL EMERGENCY MANAGEMENT AGENCY
 LOS ANGELES COUNTY, CA
 AND INCORPORATED AREAS



* DATA NOT AVAILABLE



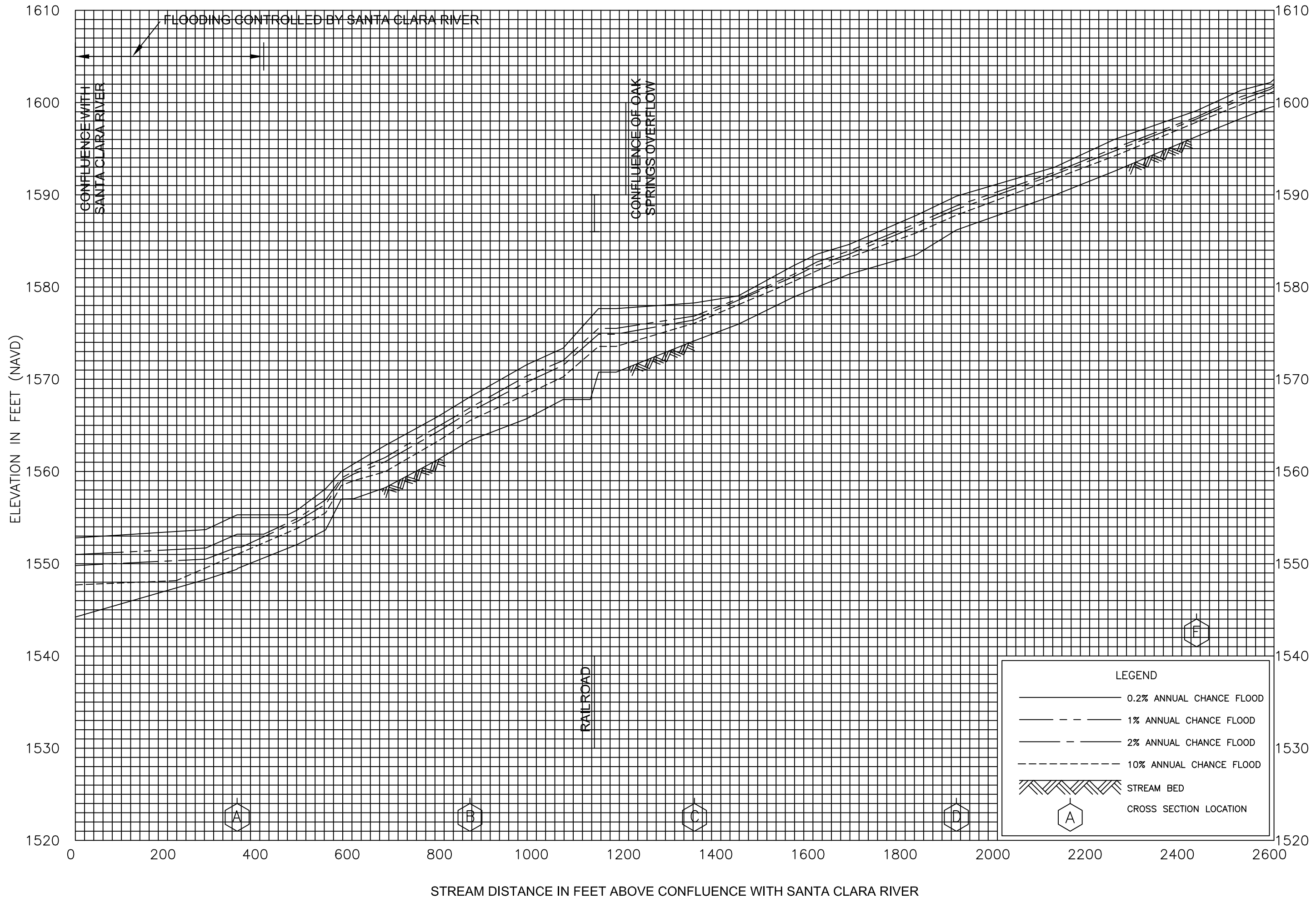
* DATA NOT AVAILABLE

FLOOD PROFILES

NORTH OVERFLOW (B)

FEDERAL EMERGENCY MANAGEMENT AGENCY

LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS



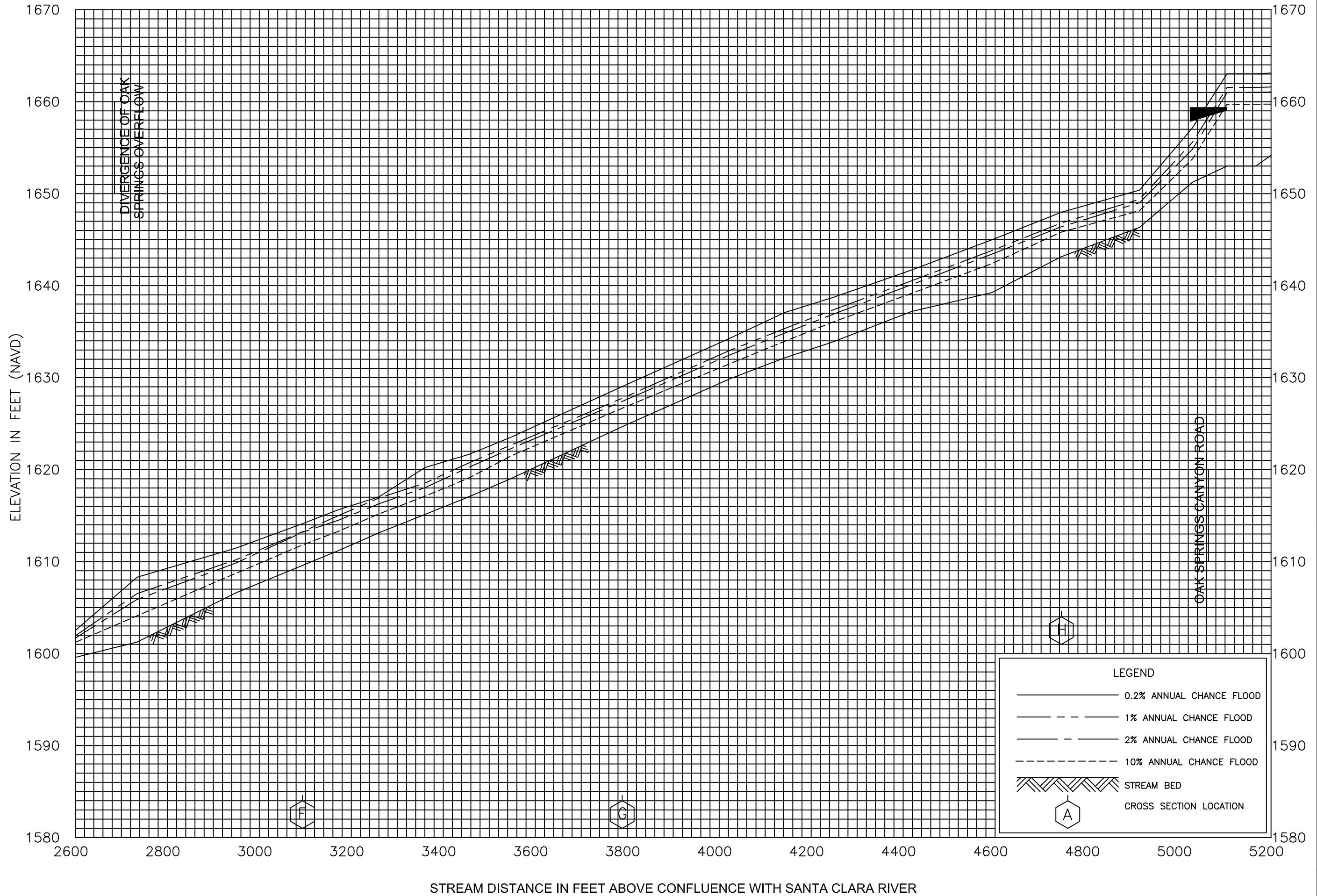
FLOOD PROFILES

OAK SPRINGS CANYON

FEDERAL EMERGENCY MANAGEMENT AGENCY

LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS

233P

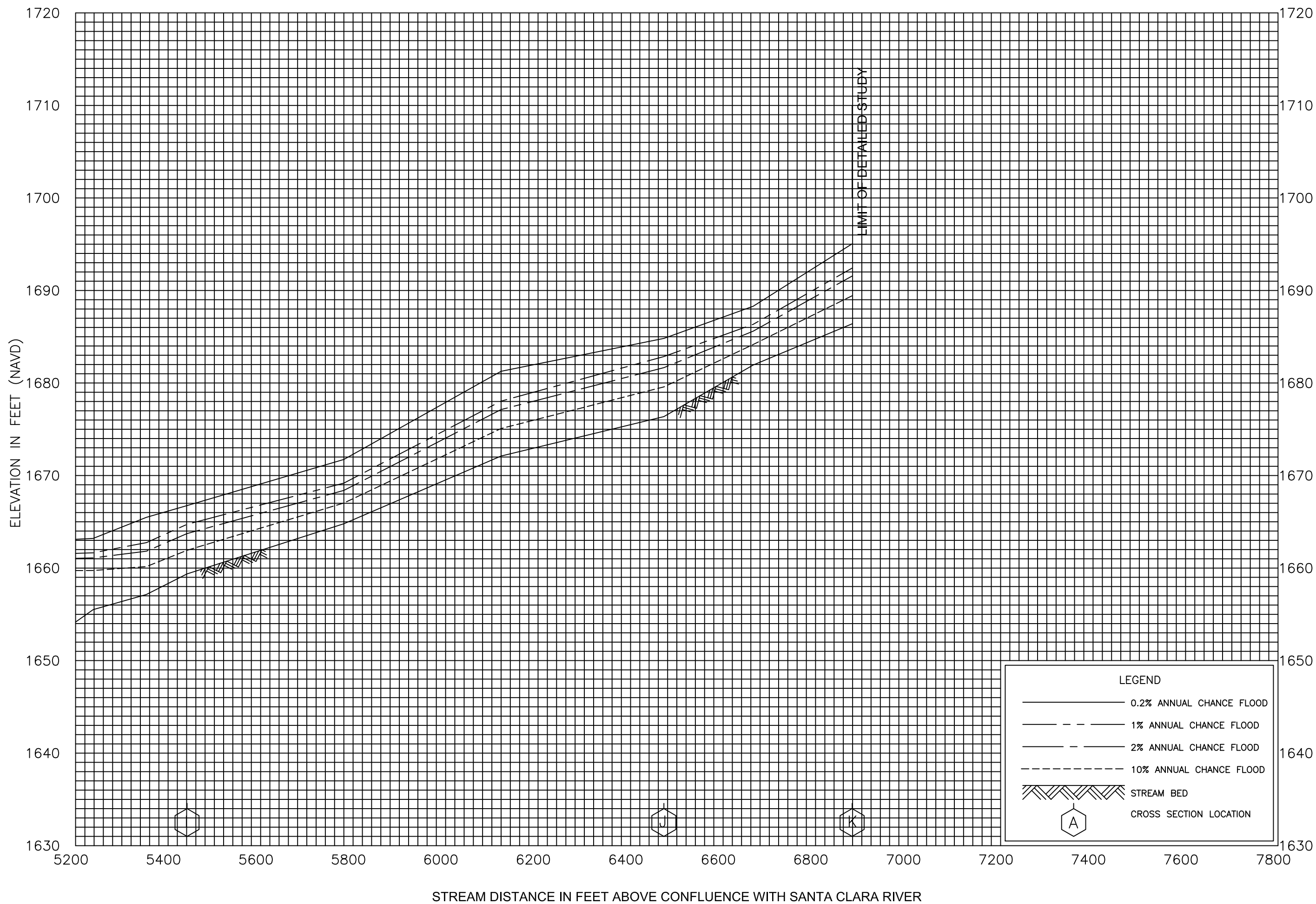


FLOOD PROFILES

OAK SPRINGS CANYON

FEDERAL EMERGENCY MANAGEMENT AGENCY
 LOS ANGELES COUNTY, CA
 AND INCORPORATED AREAS

234P



FLOOD PROFILES

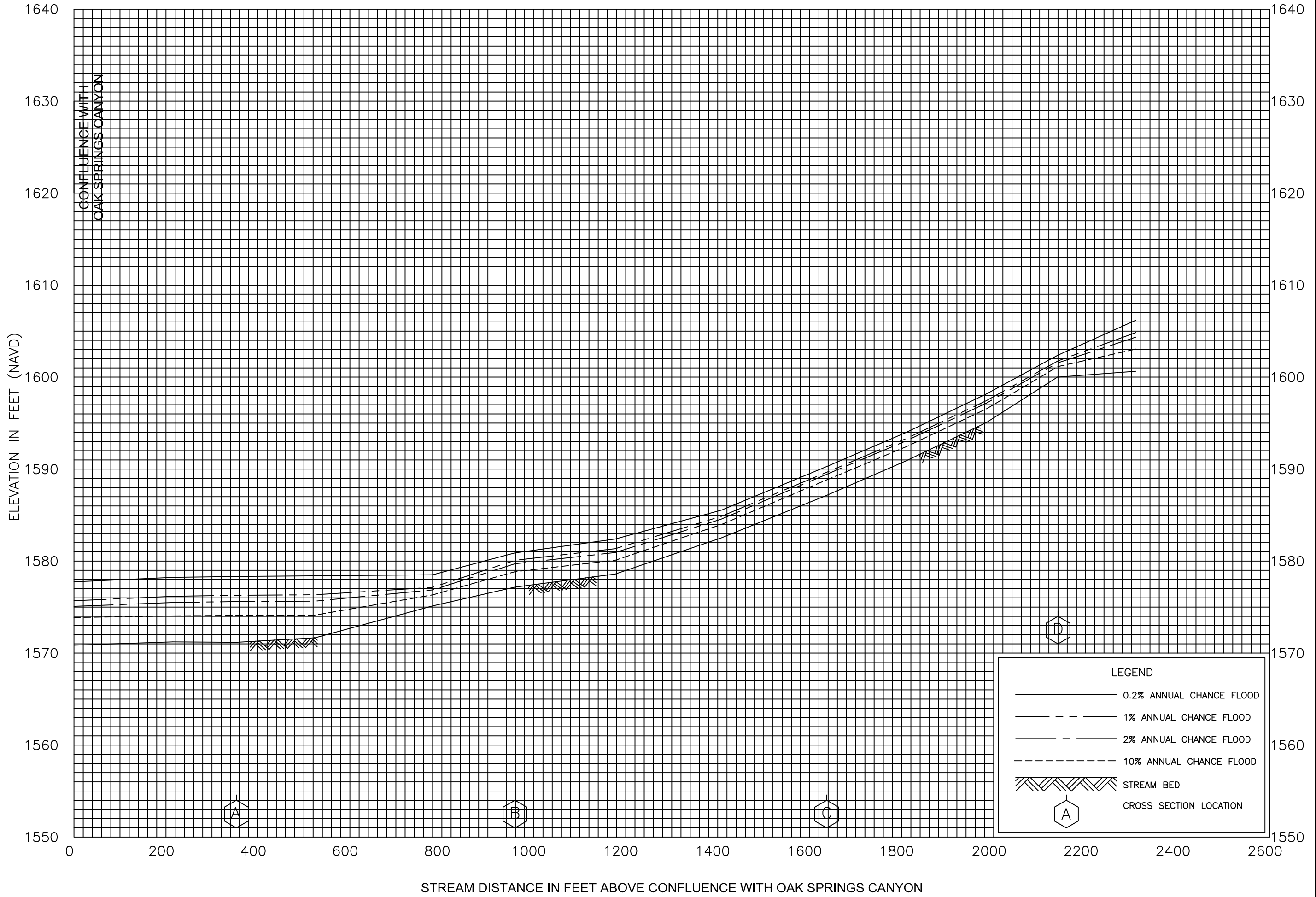
OAK SPRINGS CANYON

FEDERAL EMERGENCY MANAGEMENT AGENCY

LOS ANGELES COUNTY, CA

AND INCORPORATED AREAS

235P

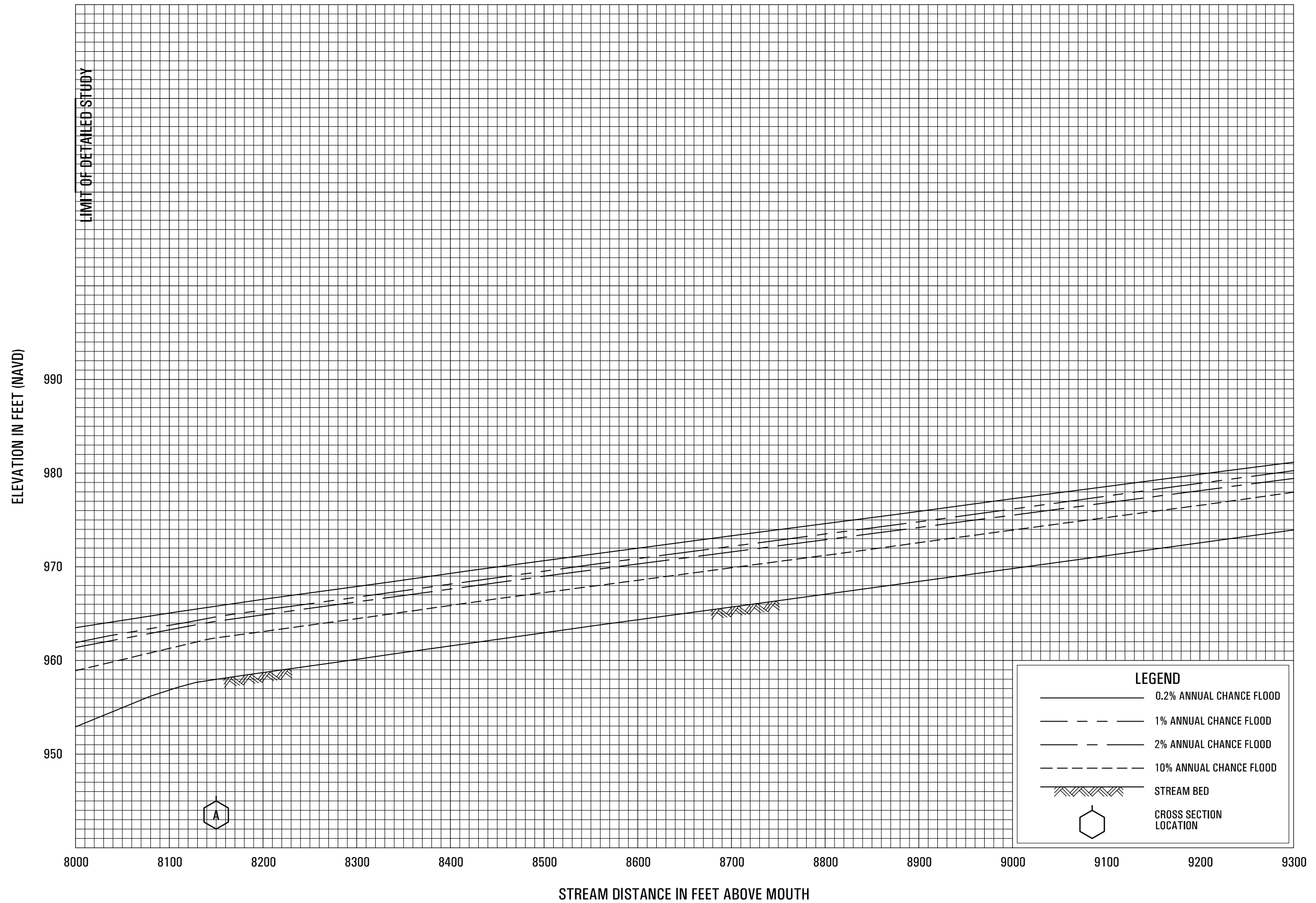


CONFLUENCE WITH
OAK SPRINGS CANYON

FLOOD PROFILES
OAK SPRINGS CANYON OVERFLOW

FEDERAL EMERGENCY MANAGEMENT AGENCY
LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS

236P



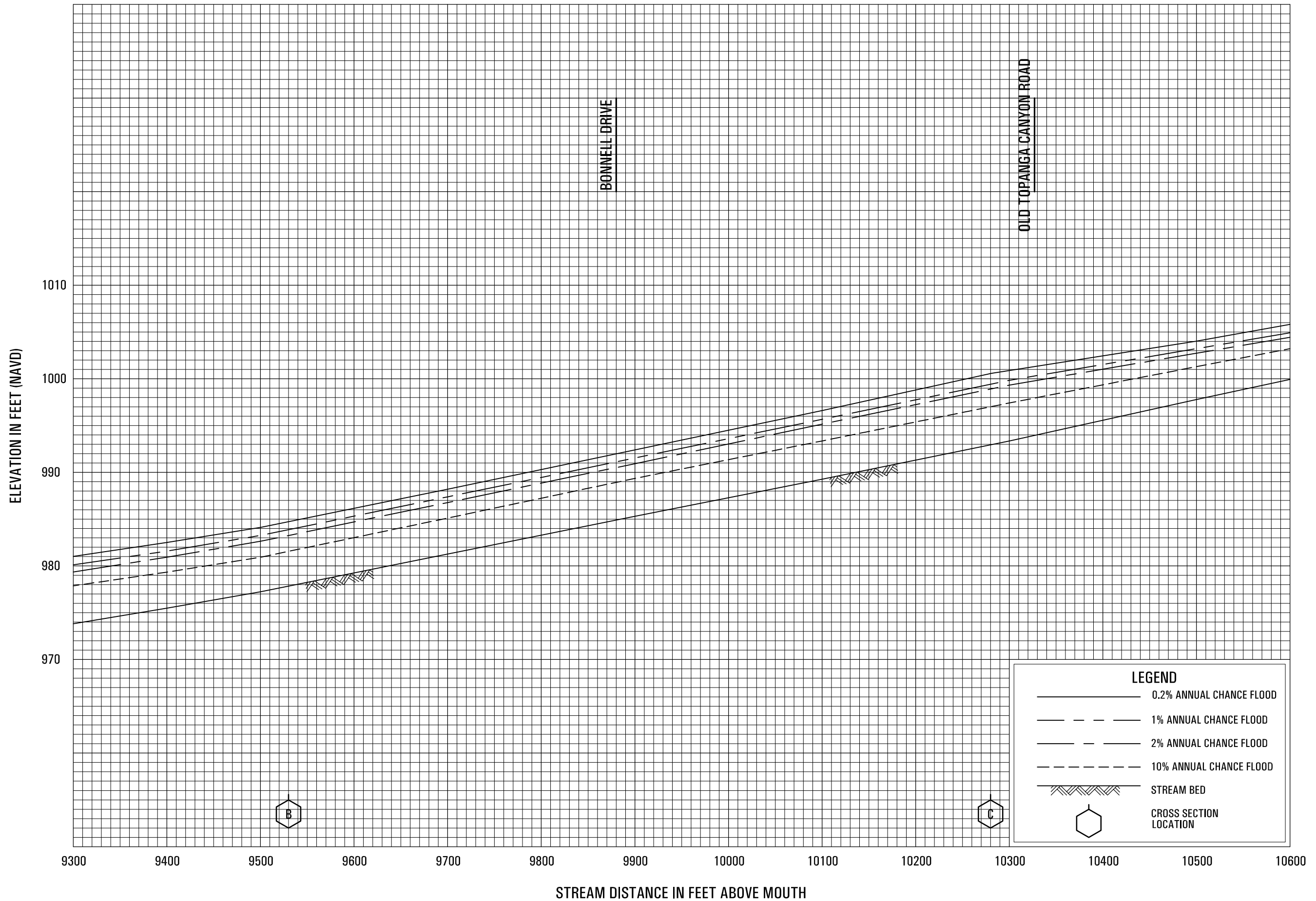
FLOOD PROFILES

OLD TOPANGA CANYON

FEDERAL EMERGENCY MANAGEMENT AGENCY

LOS ANGELES COUNTY, CA

AND INCORPORATED AREAS



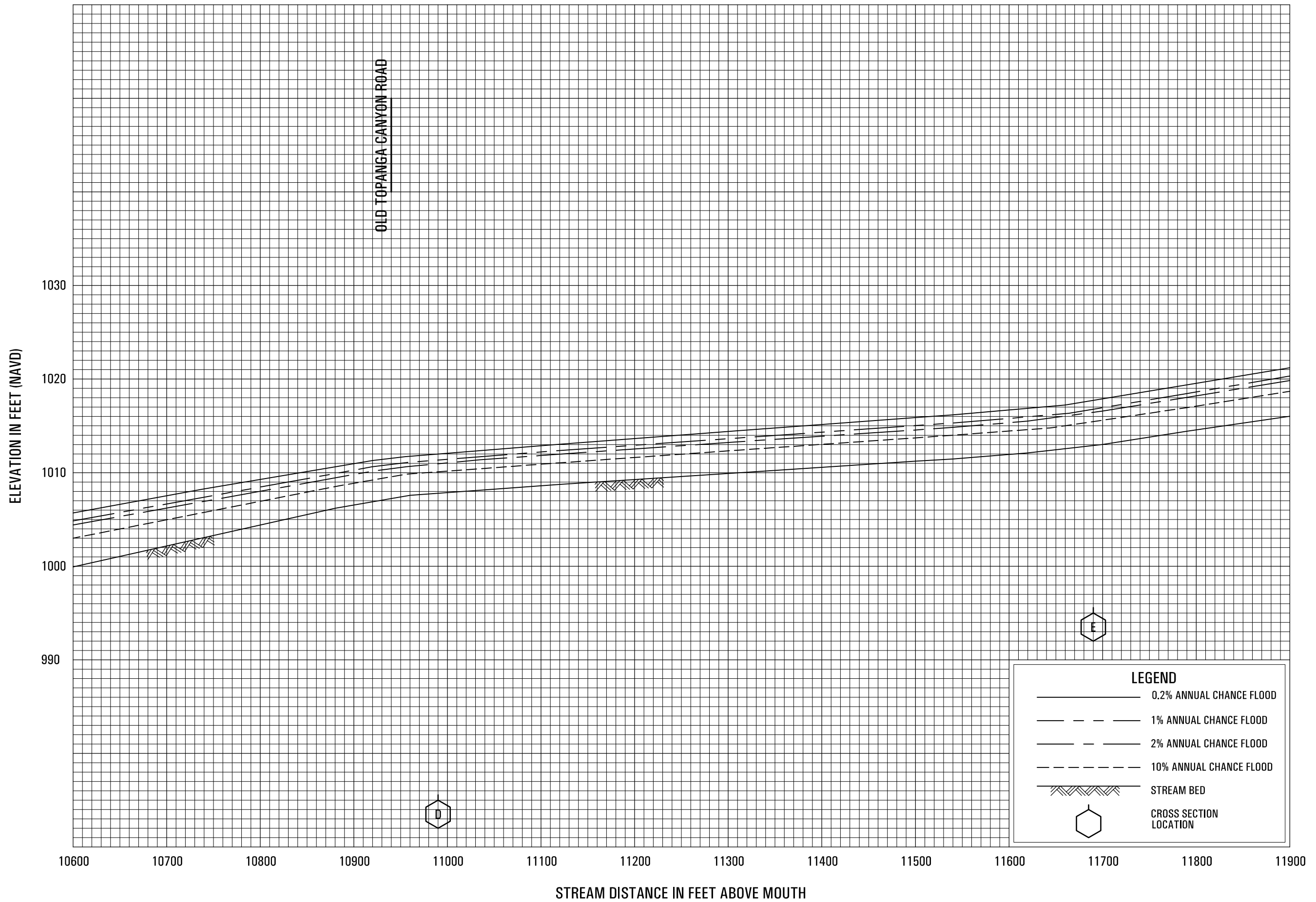
FLOOD PROFILES

OLD TOPANGA CANYON

FEDERAL EMERGENCY MANAGEMENT AGENCY

LOS ANGELES COUNTY, CA

AND INCORPORATED AREAS



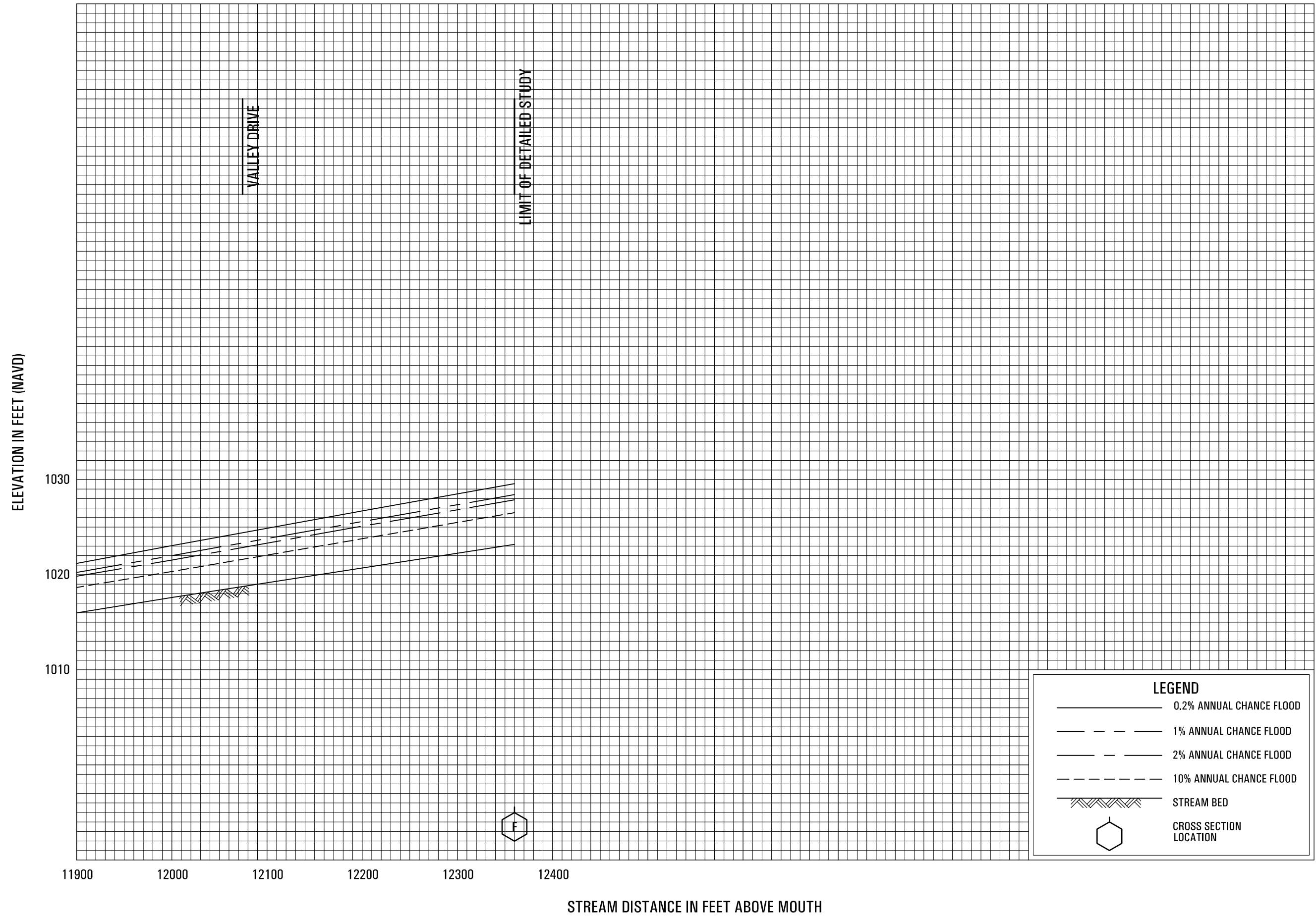
FLOOD PROFILES

OLD TOPANGA CANYON

FEDERAL EMERGENCY MANAGEMENT AGENCY

LOS ANGELES COUNTY, CA

AND INCORPORATED AREAS

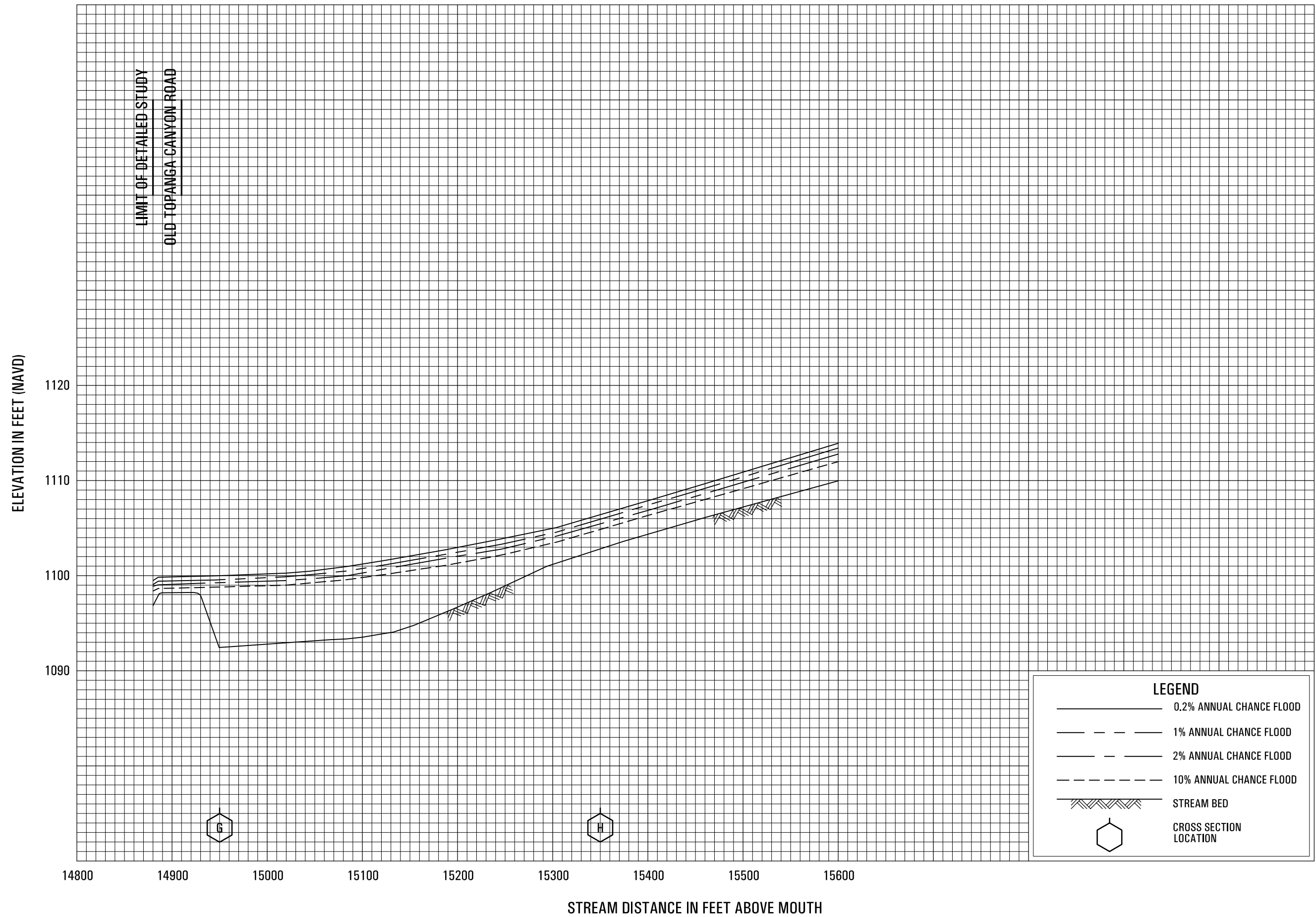


FLOOD PROFILES

OLD TOPANGA CANYON

FEDERAL EMERGENCY MANAGEMENT AGENCY

LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS

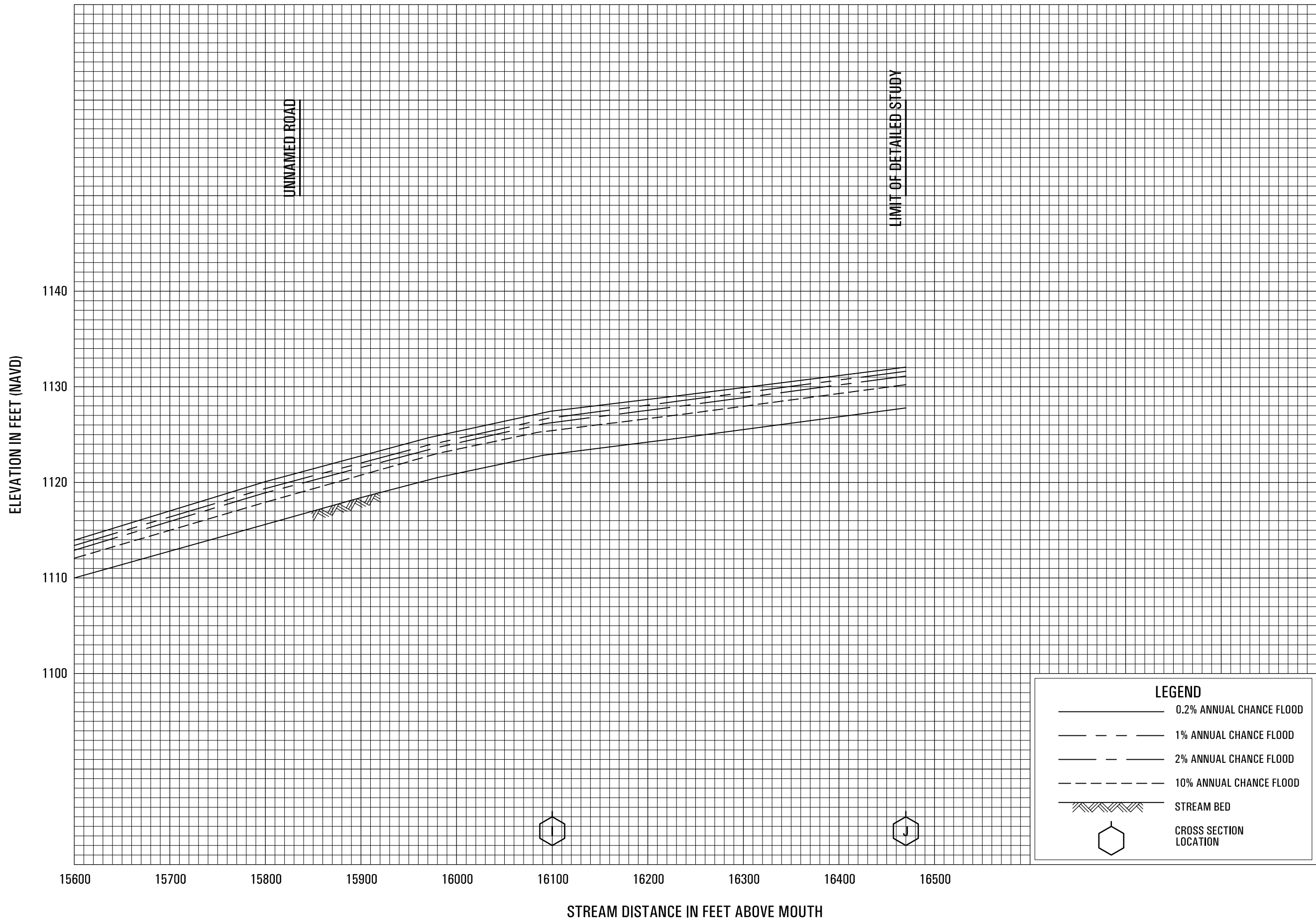


FLOOD PROFILES

OLD TOPANGA CANYON

FEDERAL EMERGENCY MANAGEMENT AGENCY

LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS



FLOOD PROFILES

OLD TOPANGA CANYON

FEDERAL EMERGENCY MANAGEMENT AGENCY

LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS

ELEVATION IN FEET (NAVD)

710
700

CITY OF BURBANK
CITY OF LOS ANGELES

VANDWEN STREET

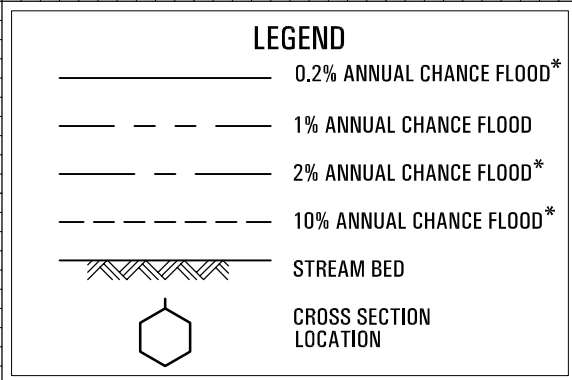
CITY OF LOS ANGELES
CITY OF BURBANK

SOUTHERN PACIFIC RAILROAD

LIMIT OF DETAILED STUDY

0 100 200 300 400 500 600

STREAM DISTANCE IN FEET ABOVE CORPORATE LIMITS ALONG PROFILE BASE LINE



* DATA NOT AVAILABLE

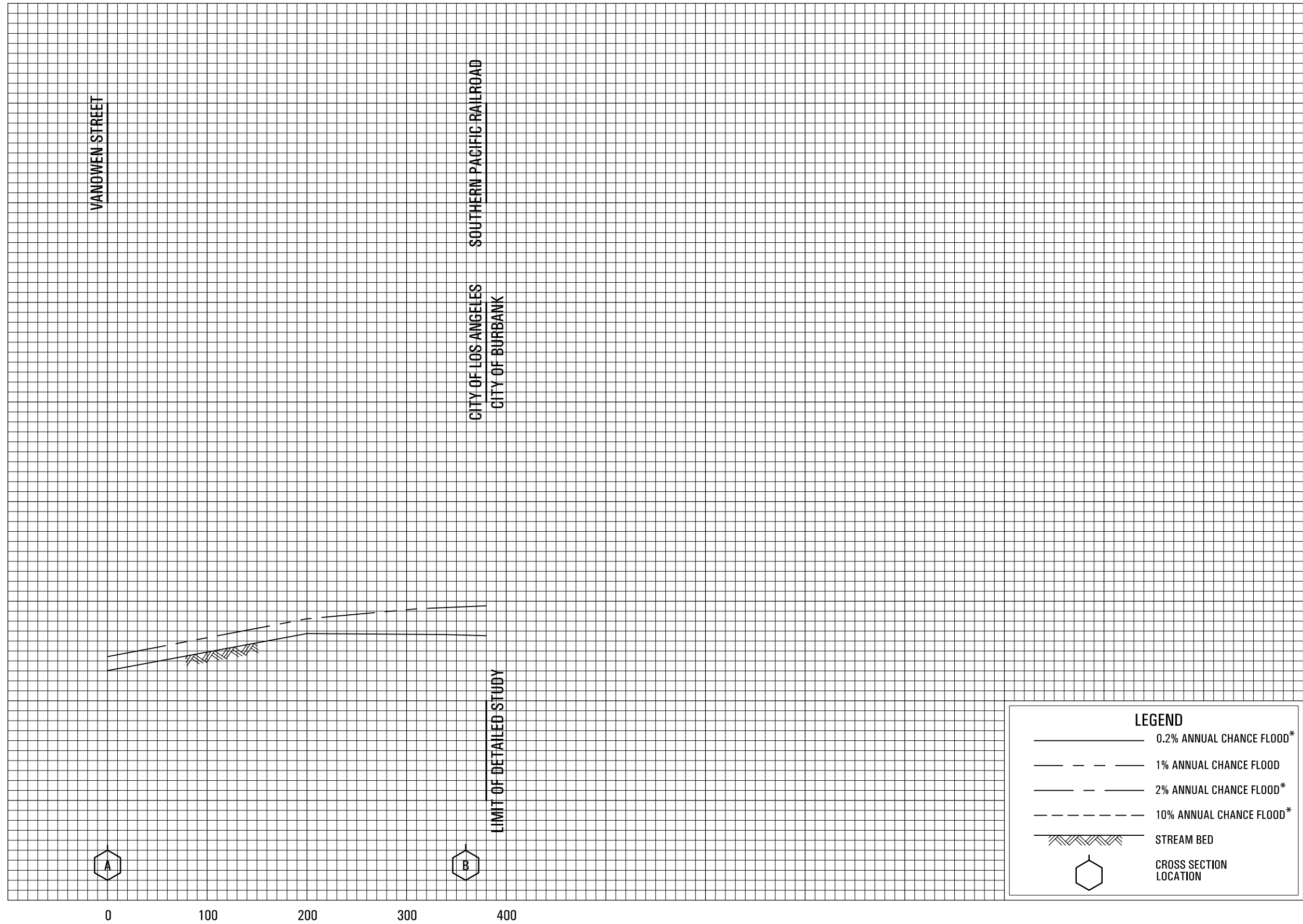
FLOOD PROFILES

OVERFLOW AREA OF LOCKHEED DRAIN CHANNEL

FEDERAL EMERGENCY MANAGEMENT AGENCY
LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS

243P

ELEVATION IN FEET (NAVD)



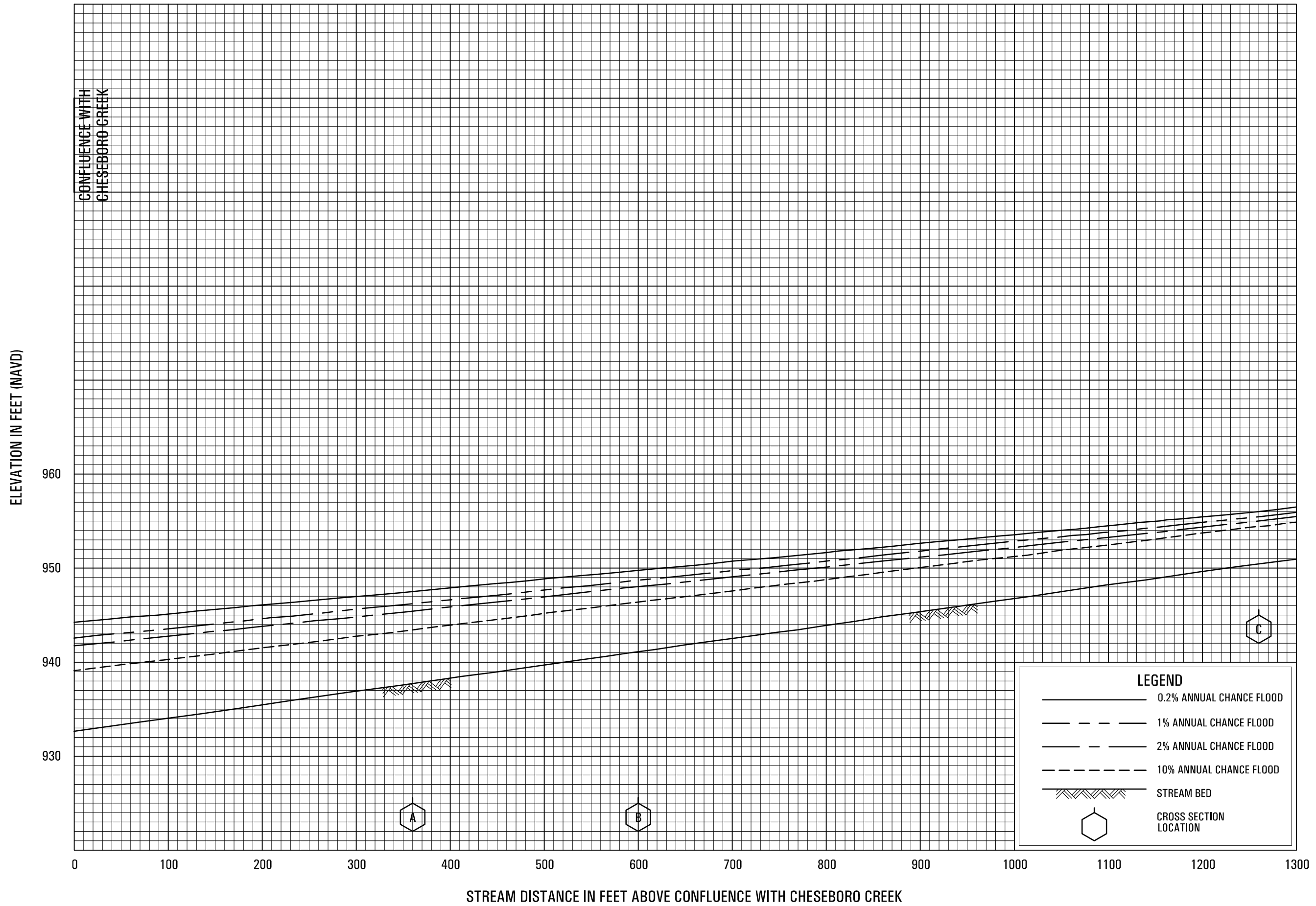
* DATA NOT AVAILABLE

FEDERAL EMERGENCY MANAGEMENT AGENCY
LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS

FLOOD PROFILES

OVERFLOW AREA OF LOCKHEED STORM DRAIN

244P



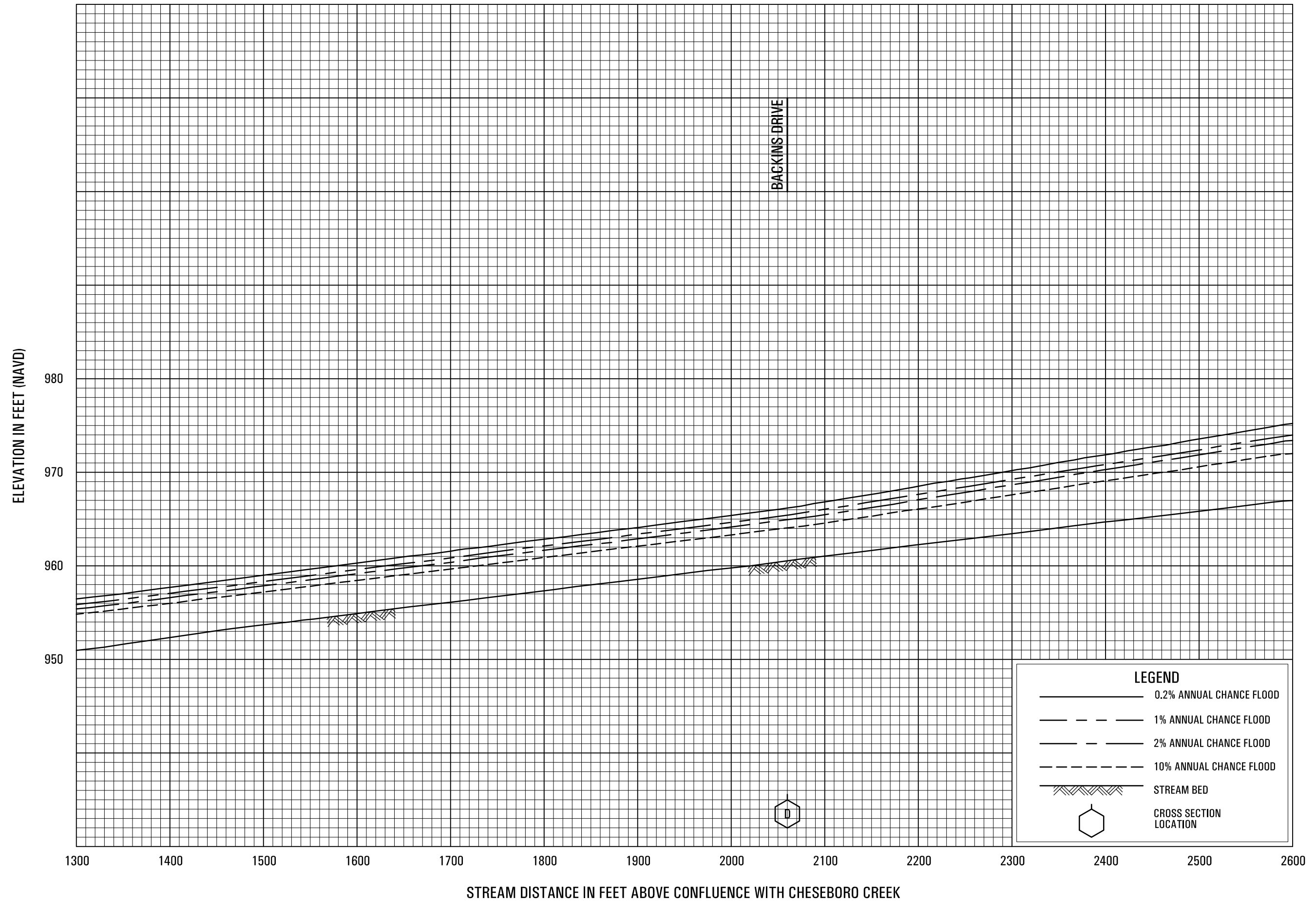
FLOOD PROFILES

PALO COMANDO CREEK

FEDERAL EMERGENCY MANAGEMENT AGENCY

LOS ANGELES COUNTY, CA

AND INCORPORATED AREAS



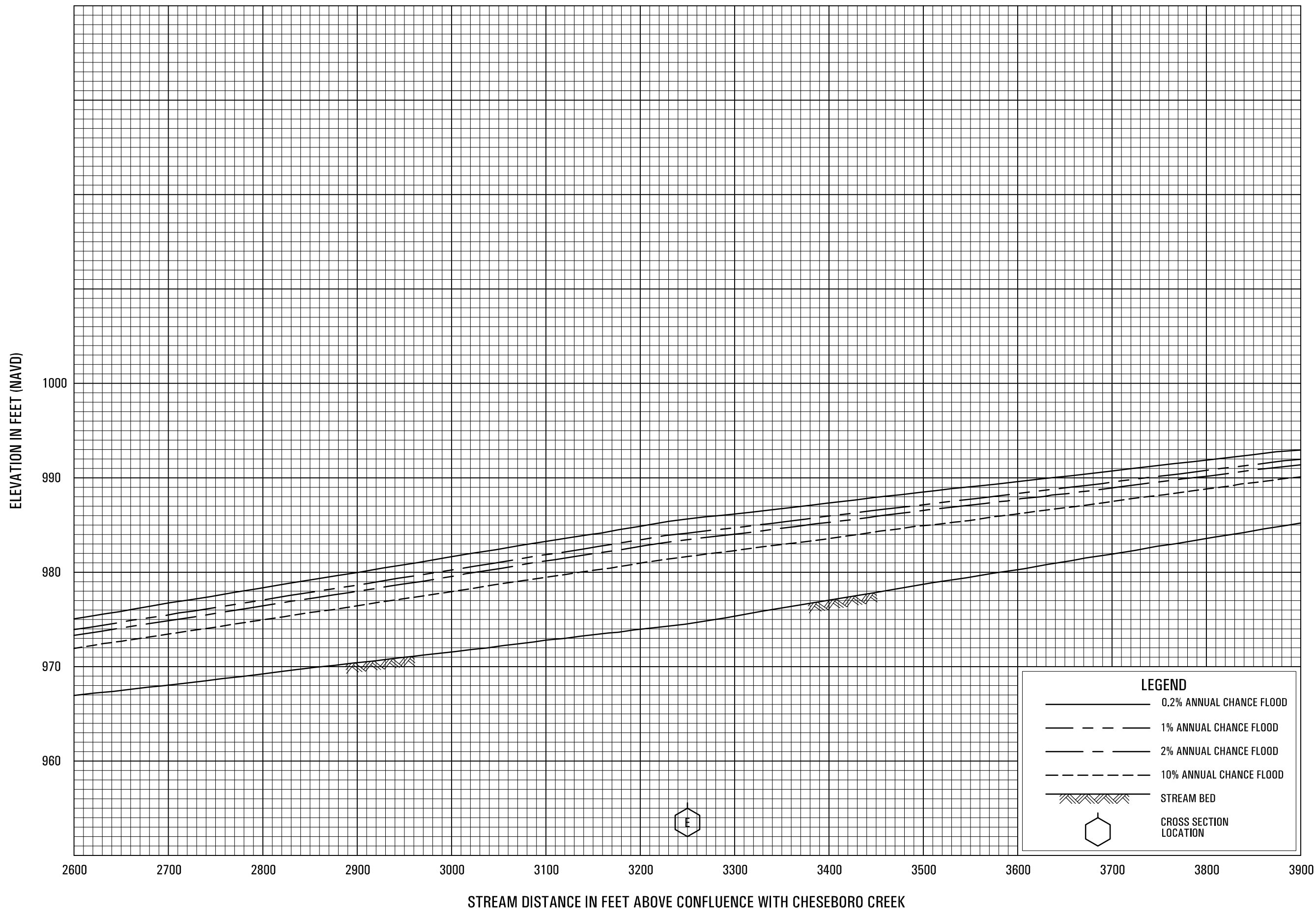
FLOOD PROFILES

PALO COMANDO CREEK

FEDERAL EMERGENCY MANAGEMENT AGENCY

LOS ANGELES COUNTY, CA

AND INCORPORATED AREAS

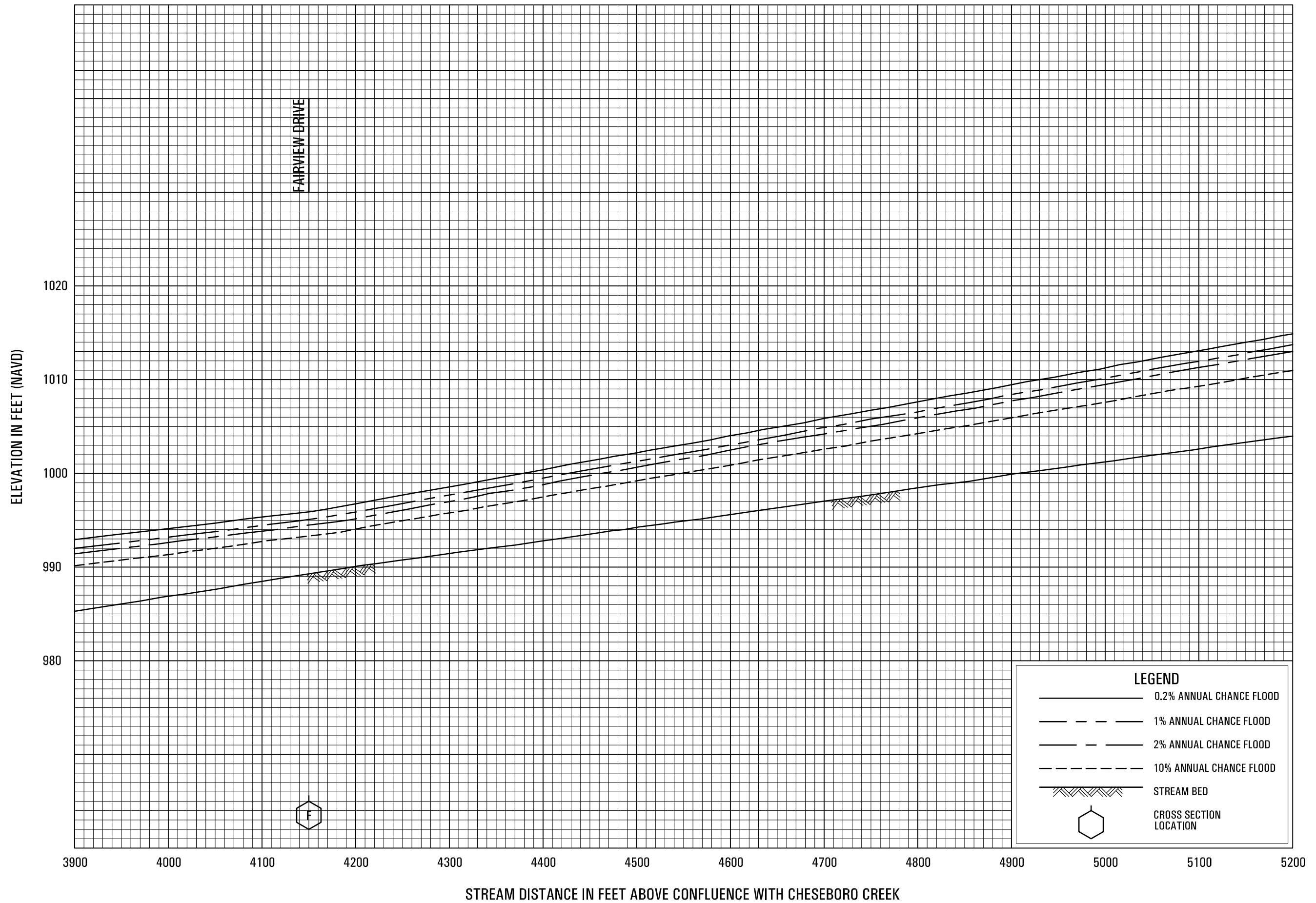


FLOOD PROFILES

PALO COMANDO CREEK

FEDERAL EMERGENCY MANAGEMENT AGENCY

**LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS**



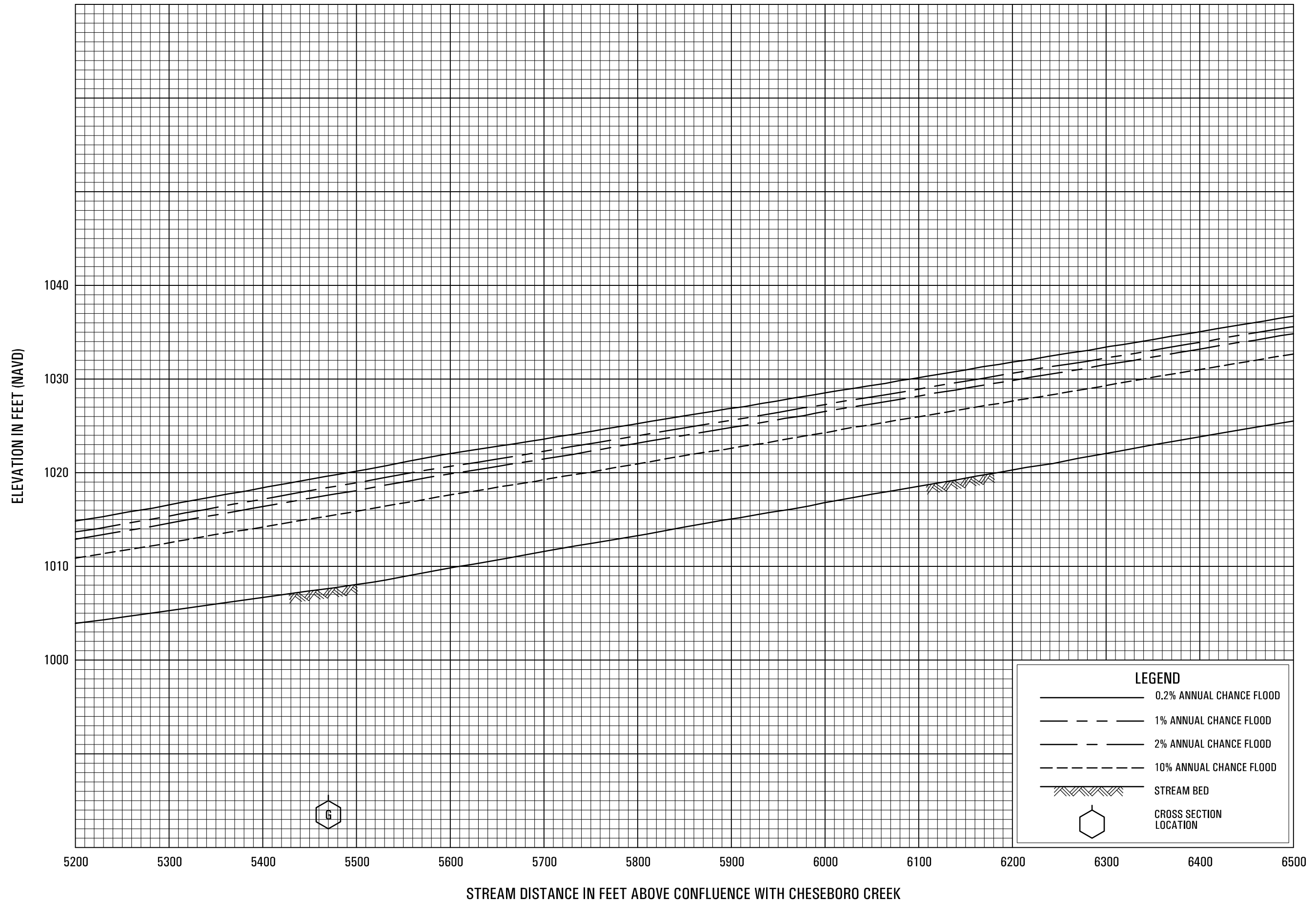
FLOOD PROFILES

PALO COMANDO CREEK

FEDERAL EMERGENCY MANAGEMENT AGENCY

LOS ANGELES COUNTY, CA

AND INCORPORATED AREAS



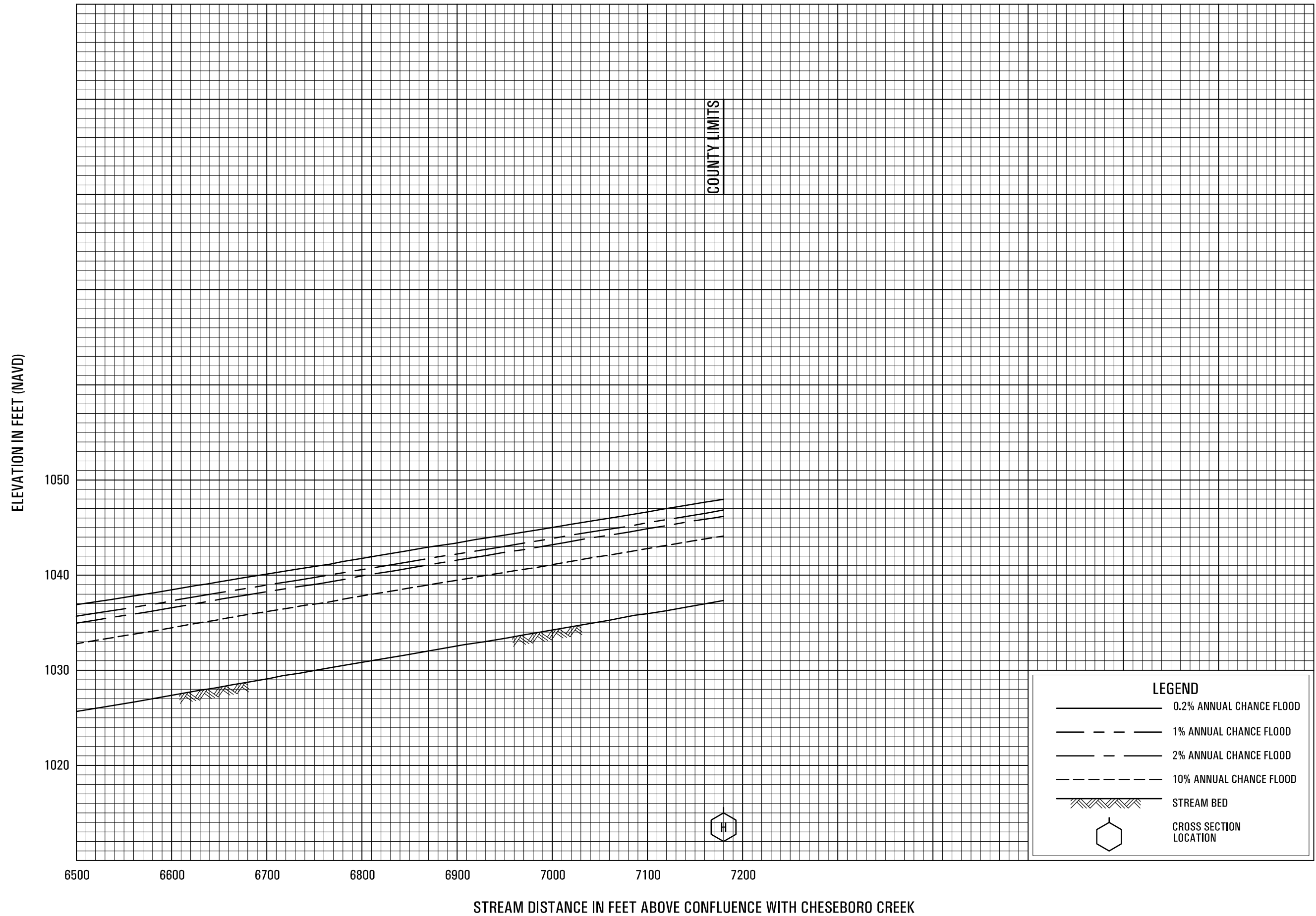
FLOOD PROFILES

PALO COMANDO CREEK

FEDERAL EMERGENCY MANAGEMENT AGENCY

LOS ANGELES COUNTY, CA

AND INCORPORATED AREAS

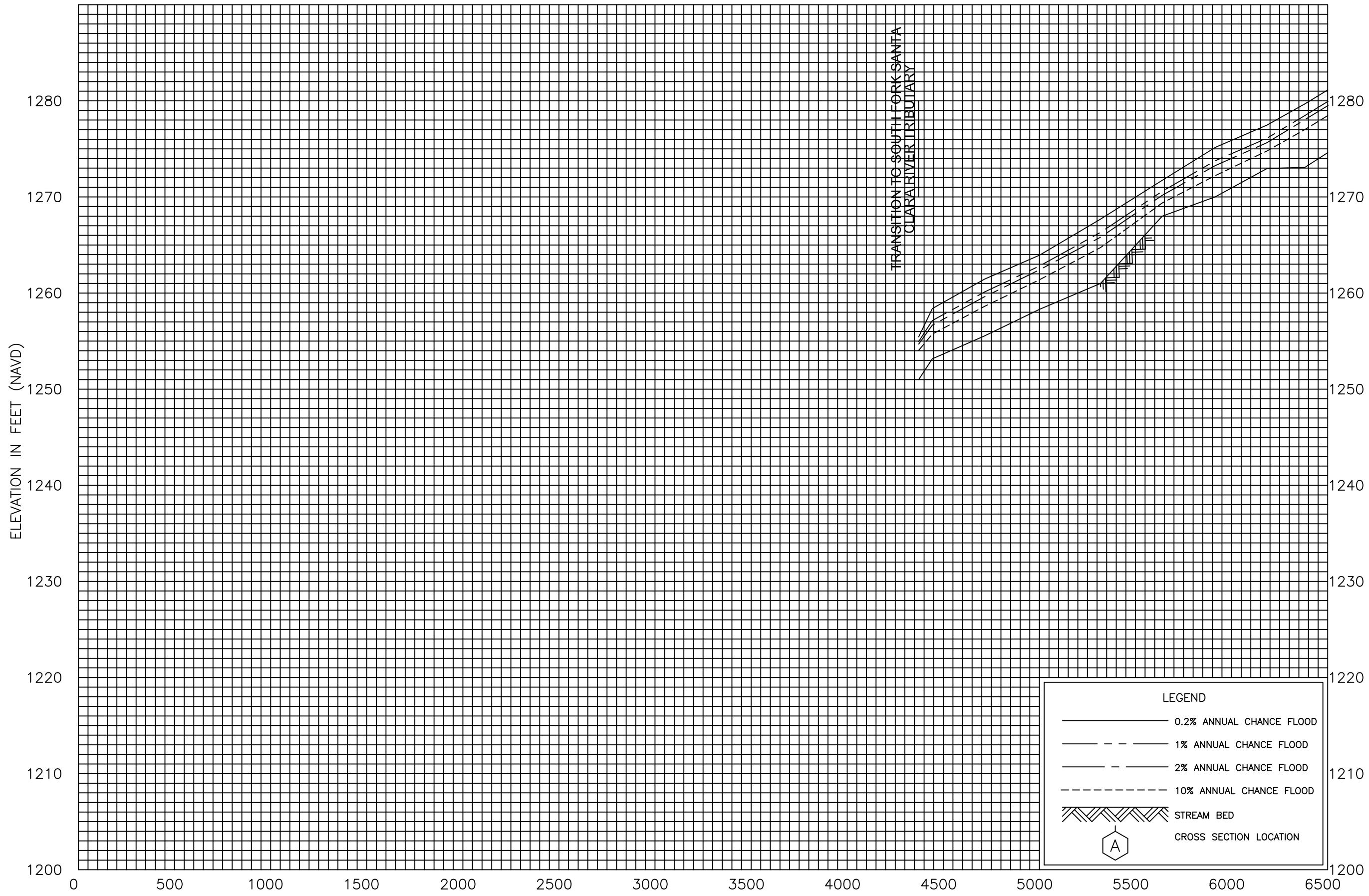


FLOOD PROFILES

PALO COMANDO CREEK

FEDERAL EMERGENCY MANAGEMENT AGENCY

LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS



LEGEND

- 0.2% ANNUAL CHANCE FLOOD
- - - 1% ANNUAL CHANCE FLOOD
- · - 2% ANNUAL CHANCE FLOOD
- · · 10% ANNUAL CHANCE FLOOD
- ▨ STREAM BED
- ⬡ A CROSS SECTION LOCATION

FLOOD PROFILES

PICO CANYON

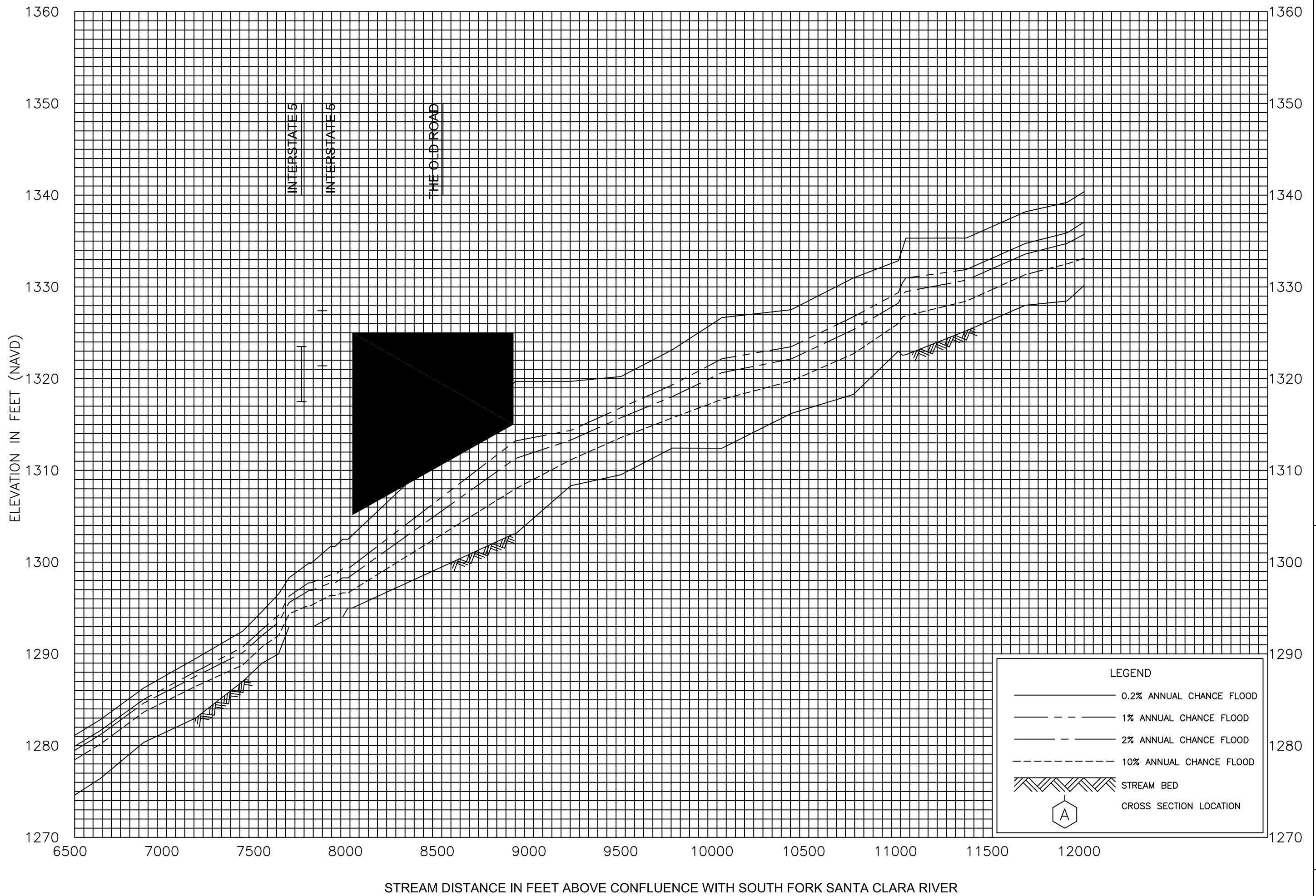
FEDERAL EMERGENCY MANAGEMENT AGENCY

LOS ANGELES COUNTY, CA

AND INCORPORATED AREAS

251P

STREAM DISTANCE IN FEET ABOVE CONFLUENCE WITH SOUTH FORK SANTA CLARA RIVER



FLOOD PROFILES

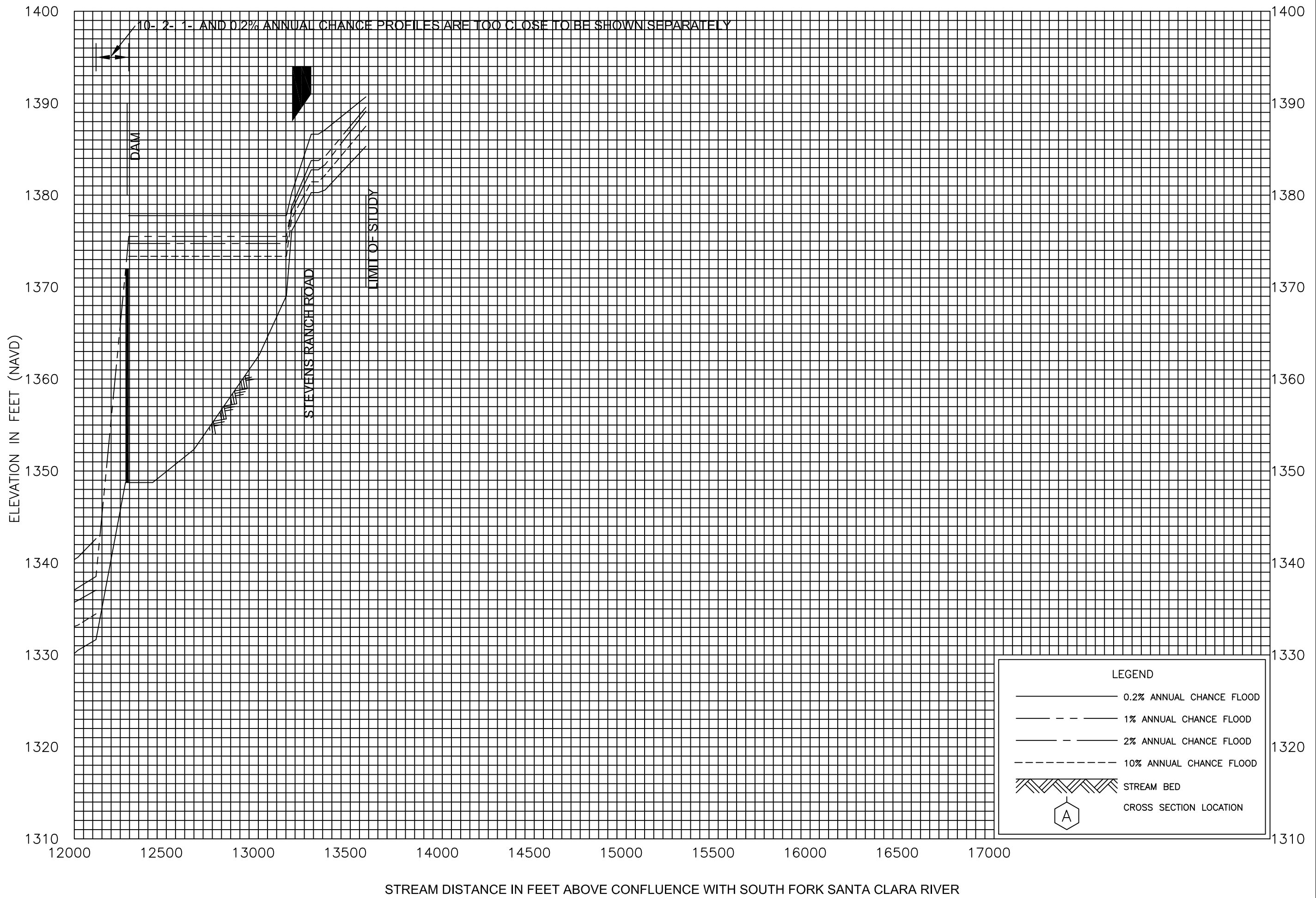
PICO CANYON

FEDERAL EMERGENCY MANAGEMENT AGENCY

LOS ANGELES COUNTY, CA

AND INCORPORATED AREAS

252P



FLOOD PROFILES

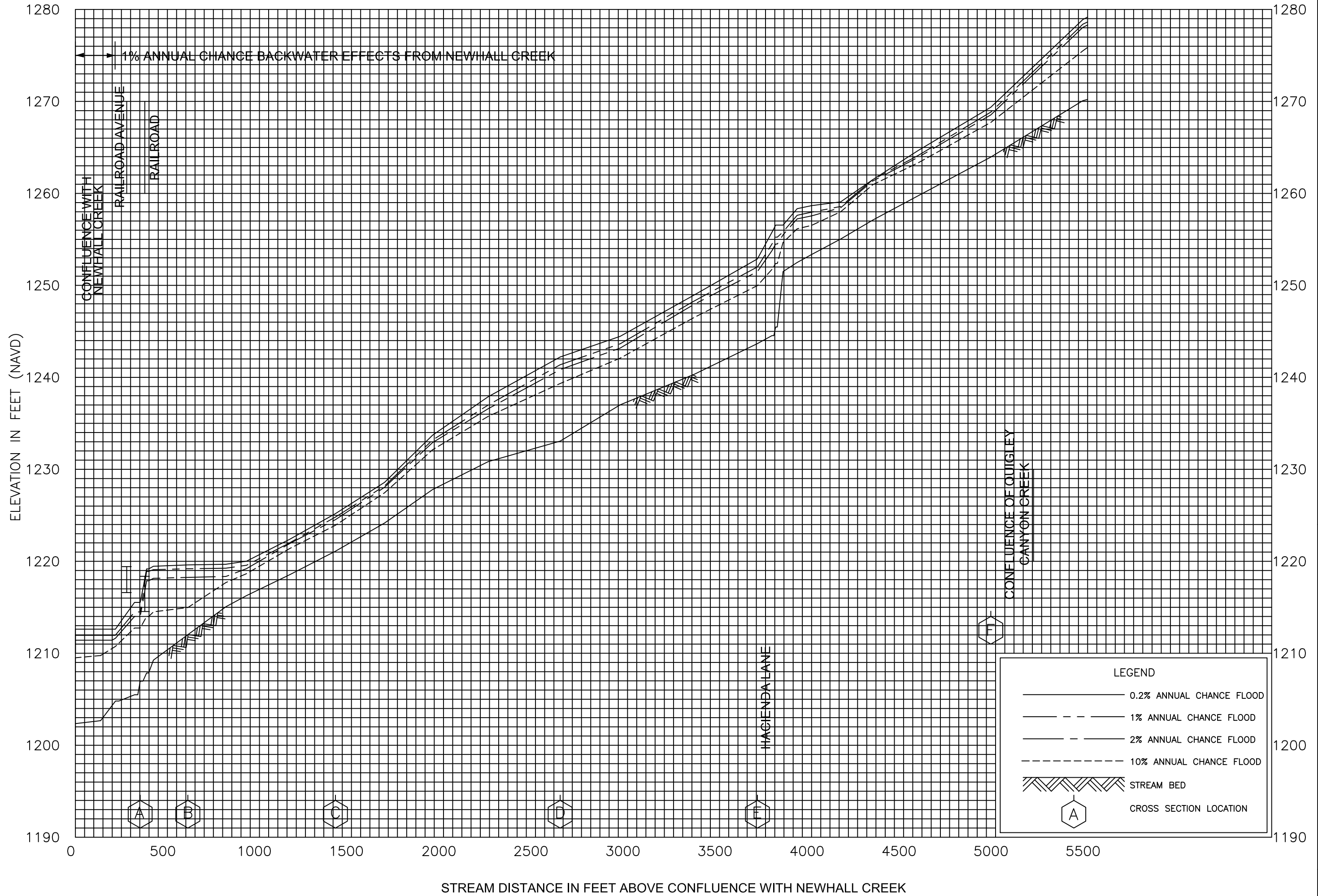
PICO CANYON

FEDERAL EMERGENCY MANAGEMENT AGENCY

LOS ANGELES COUNTY, CA

AND INCORPORATED AREAS

253P



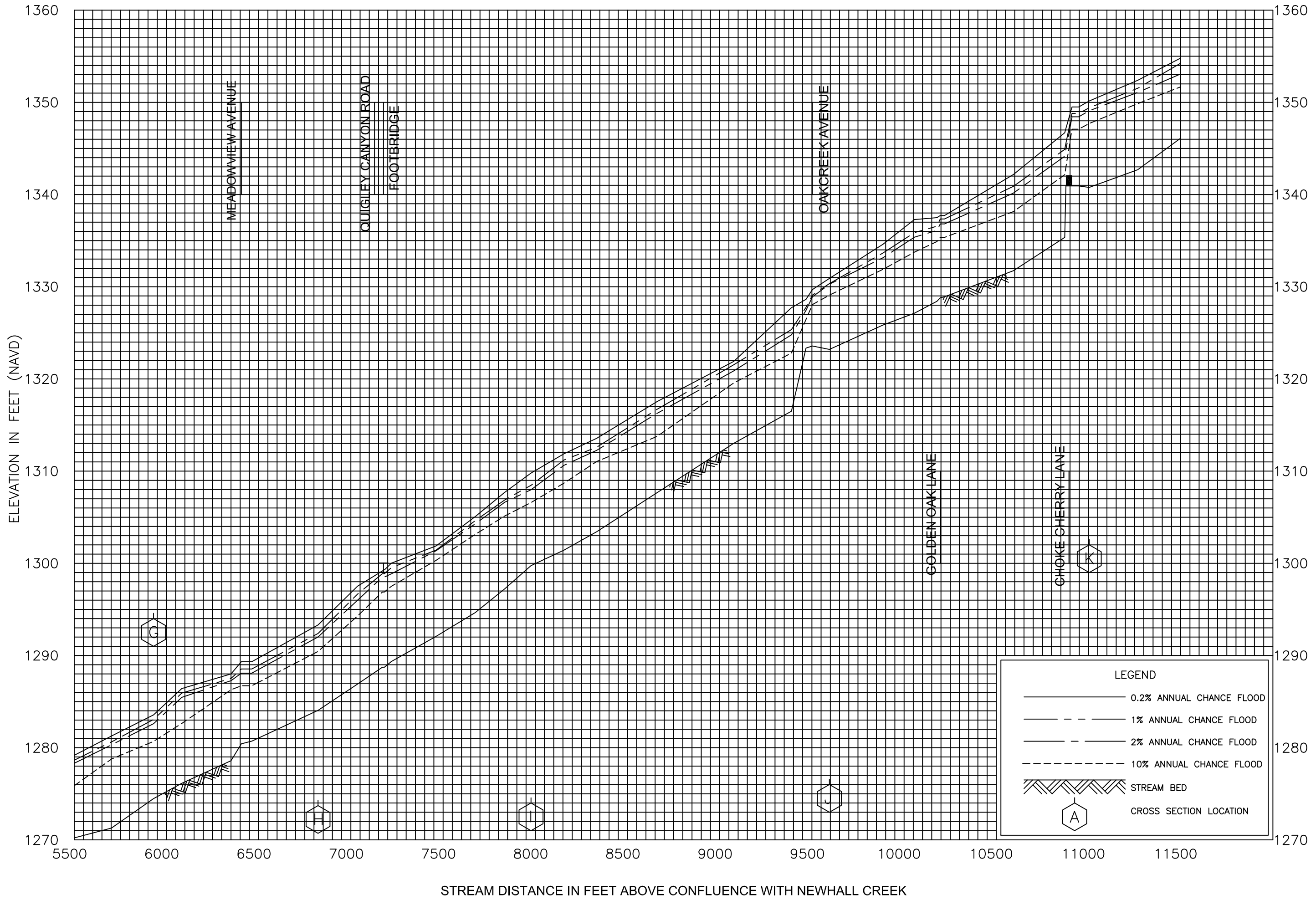
FLOOD PROFILES

PLACERITA CREEK

FEDERAL EMERGENCY MANAGEMENT AGENCY

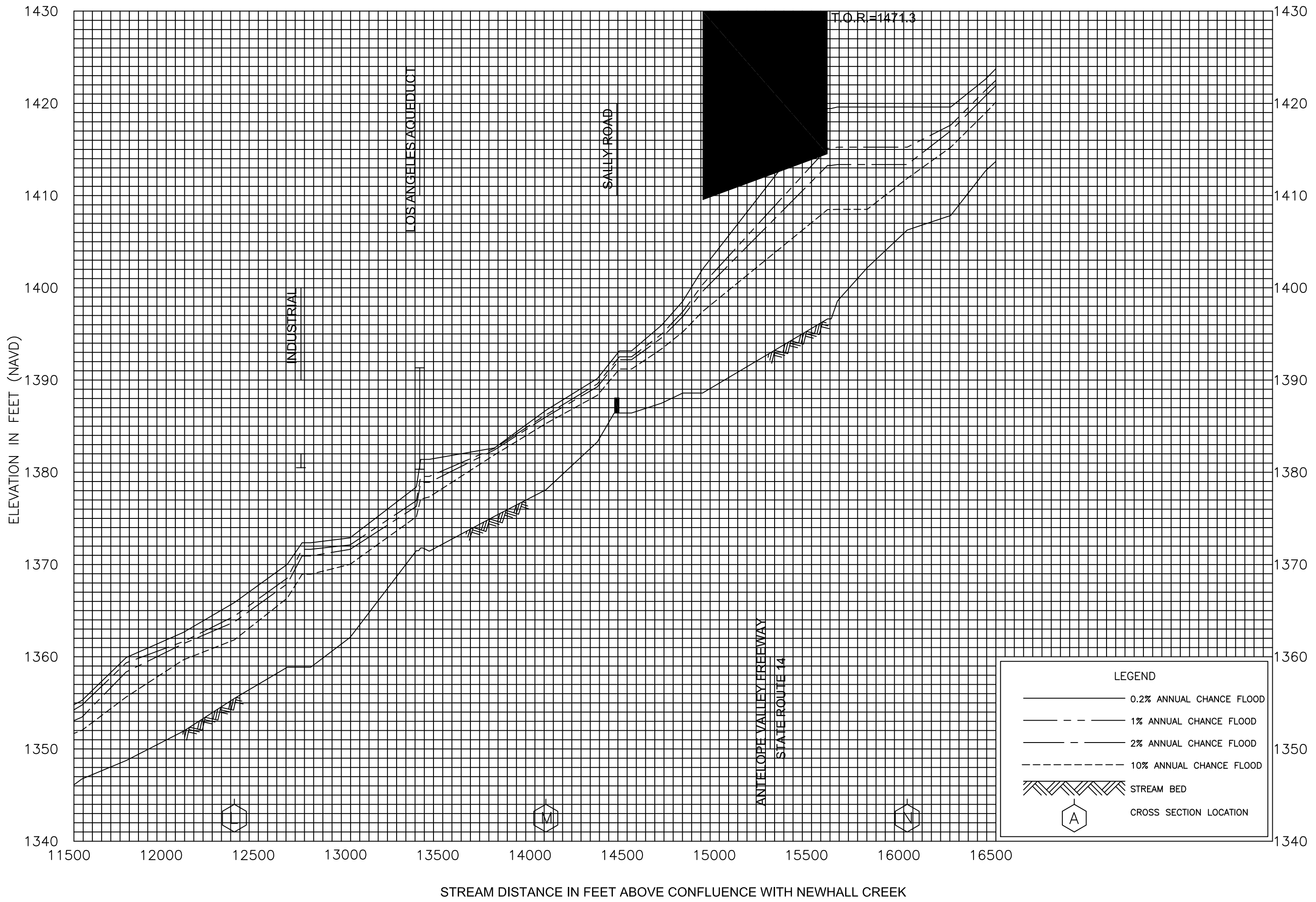
LOS ANGELES COUNTY, CA

AND INCORPORATED AREAS



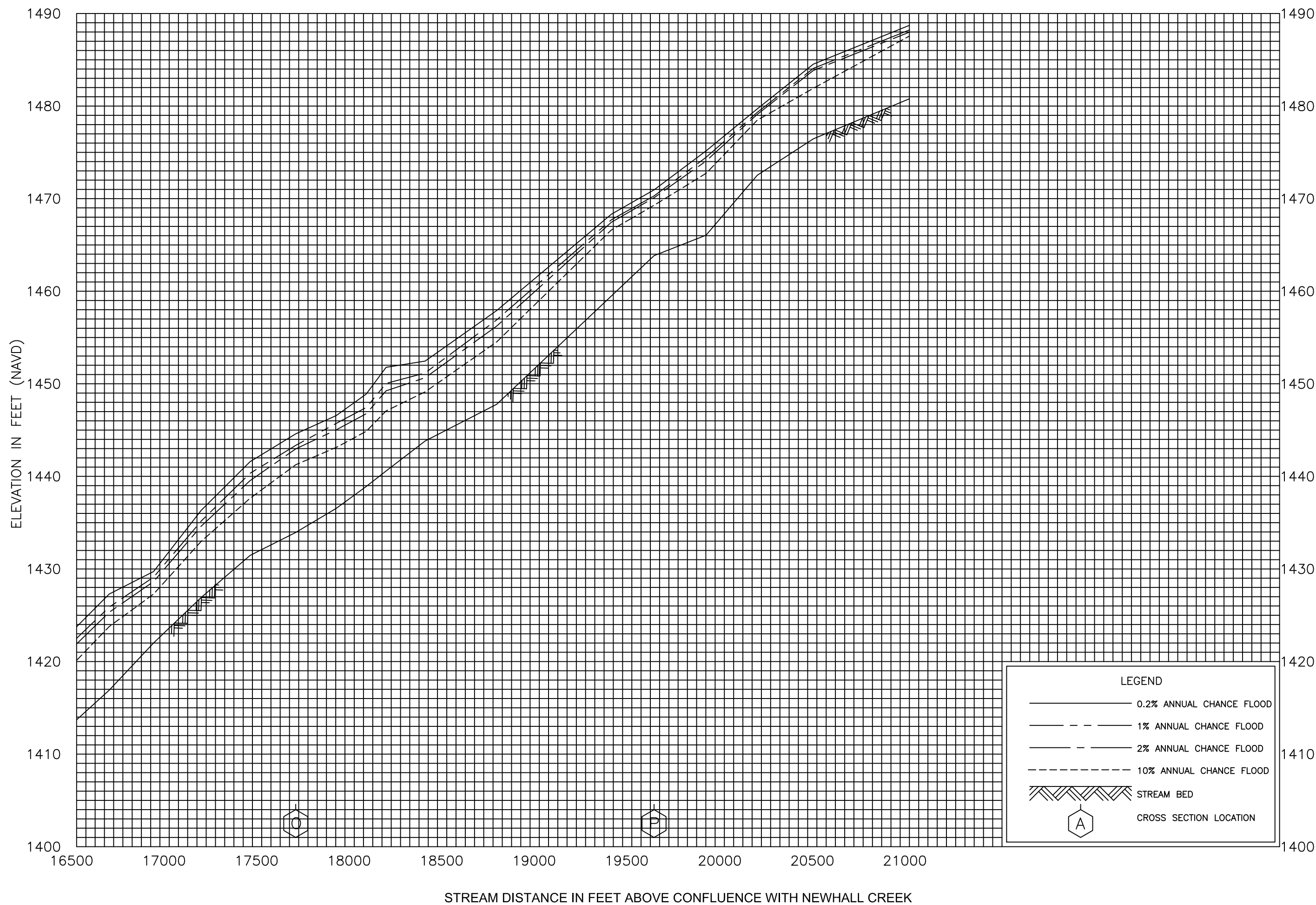
FLOOD PROFILES
PLACERITA CREEK

FEDERAL EMERGENCY MANAGEMENT AGENCY
LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS



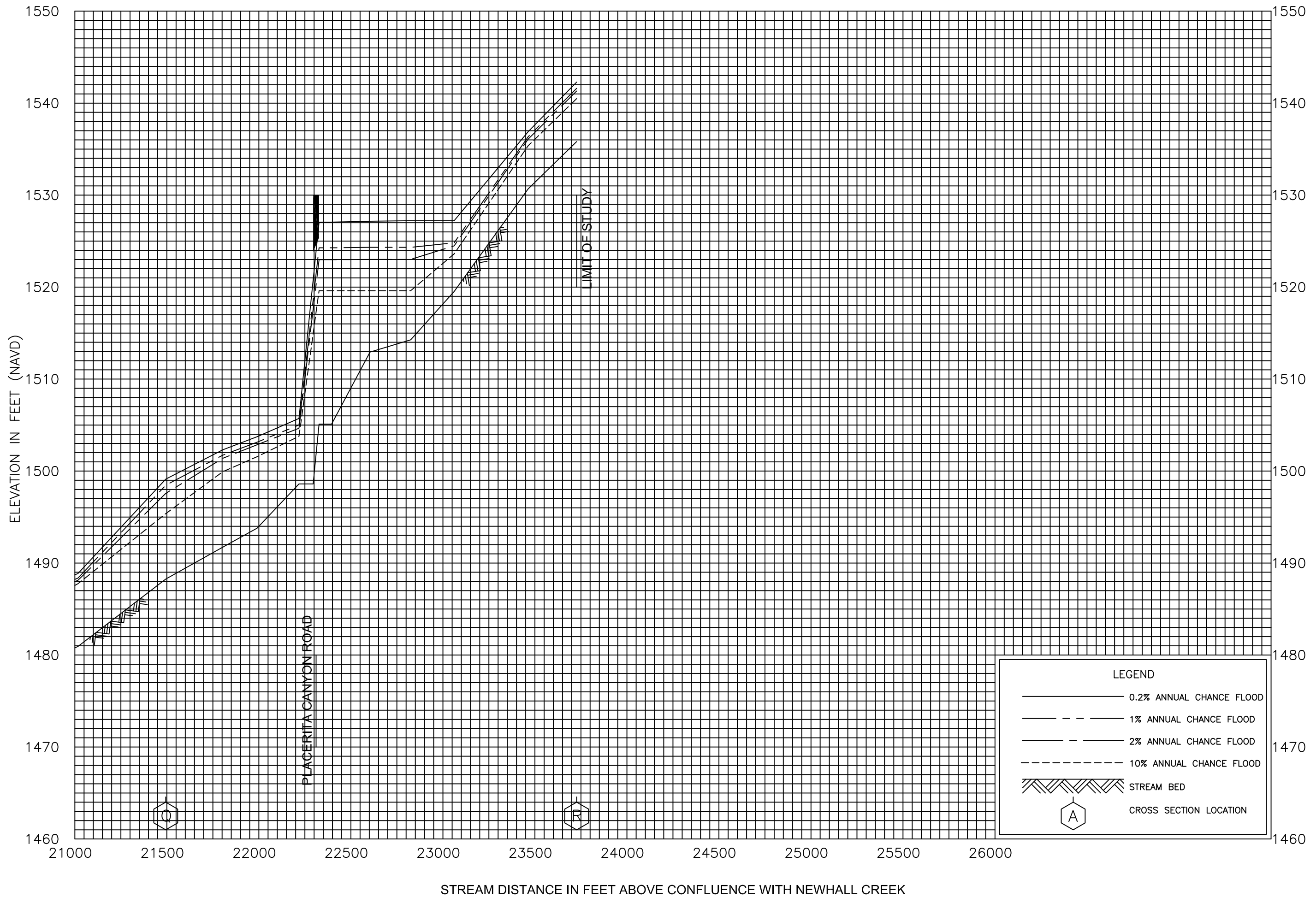
**FLOOD PROFILES
PLACERITA CREEK**

FEDERAL EMERGENCY MANAGEMENT AGENCY
LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS



FLOOD PROFILES
PLACERITA CREEK

FEDERAL EMERGENCY MANAGEMENT AGENCY
LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS



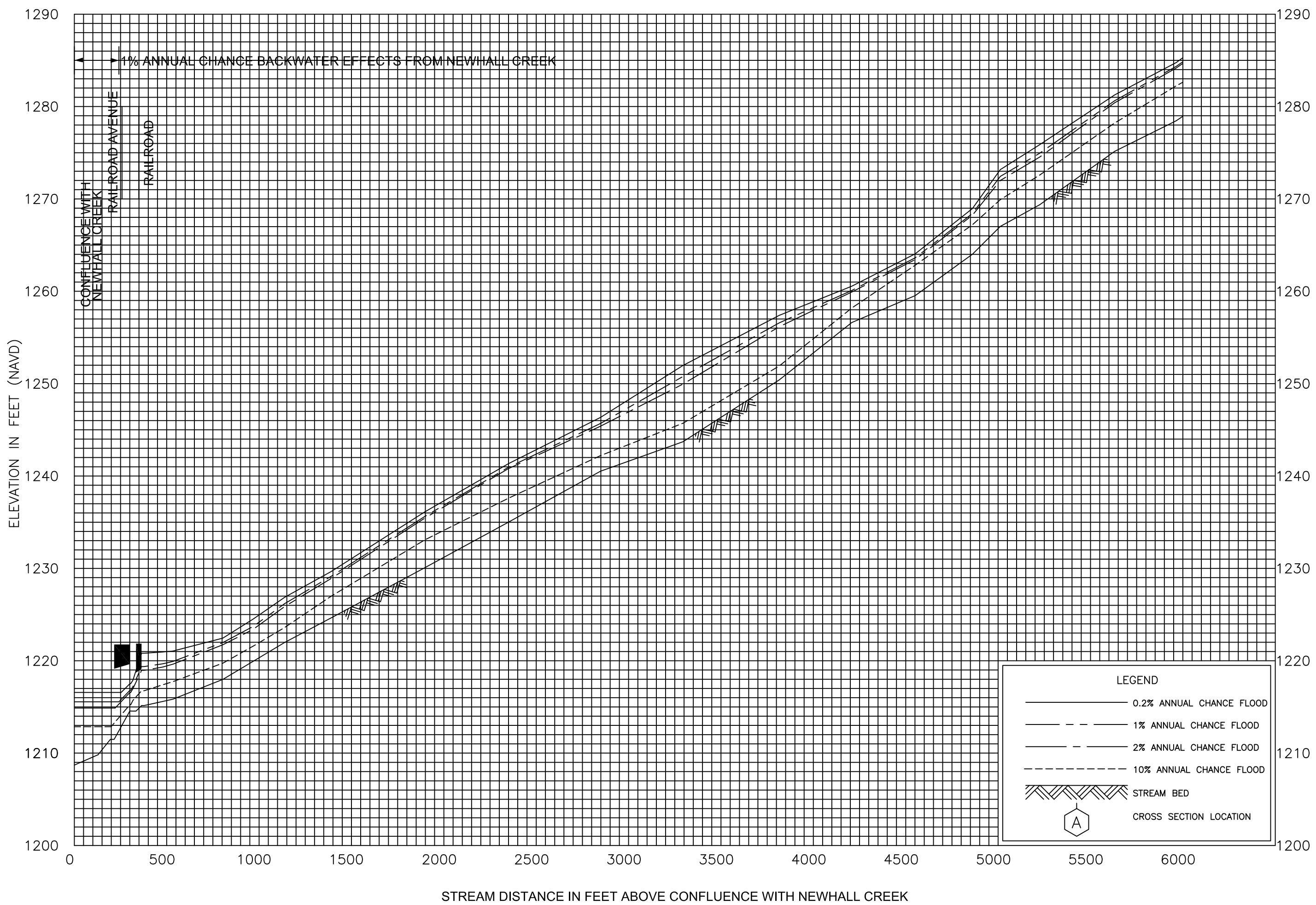
FLOOD PROFILES

PLACERITA CREEK

FEDERAL EMERGENCY MANAGEMENT AGENCY

LOS ANGELES COUNTY, CA

AND INCORPORATED AREAS



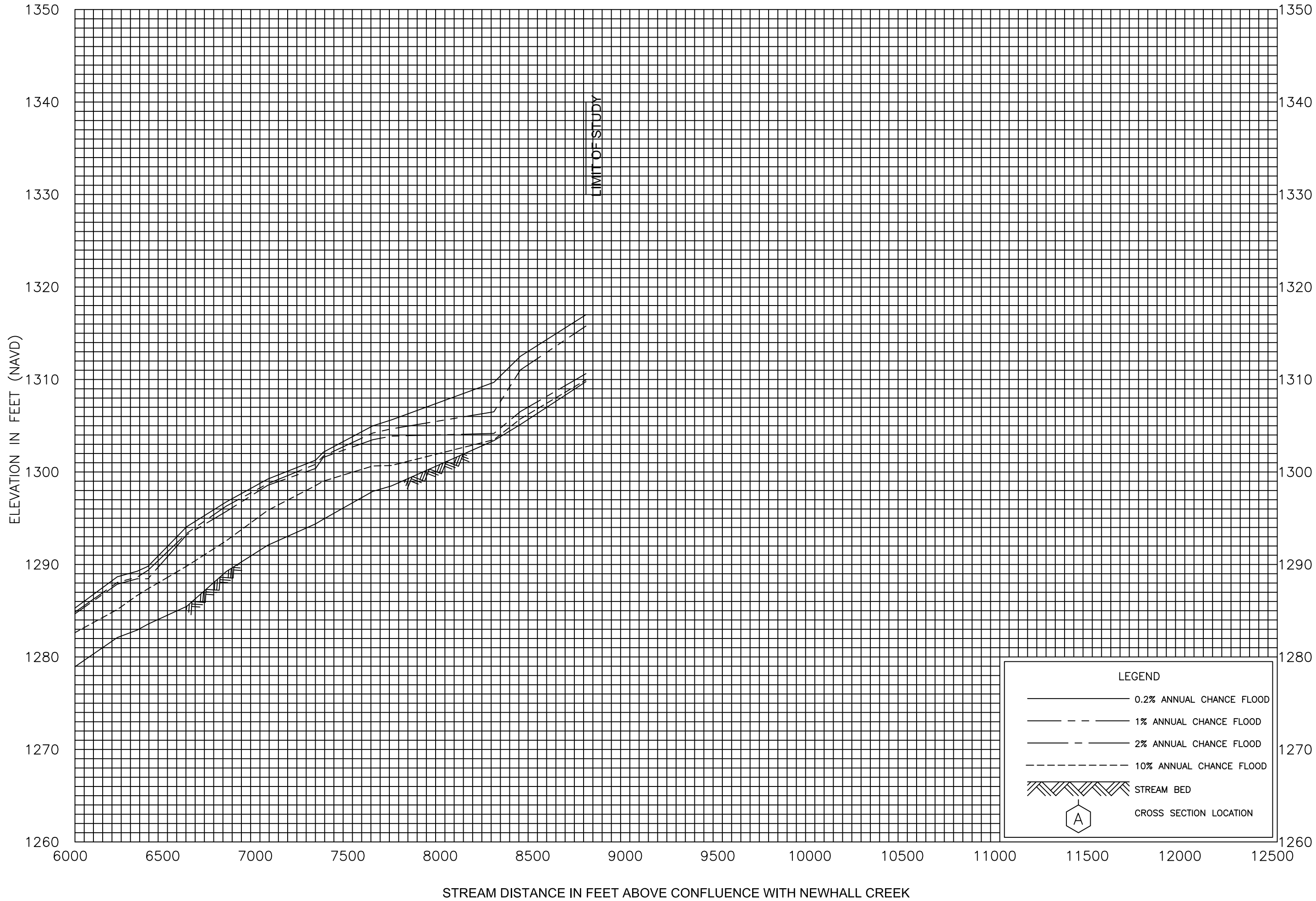
FLOOD PROFILES

PLACERITA CREEK OVERFLOW

FEDERAL EMERGENCY MANAGEMENT AGENCY

LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS

259P



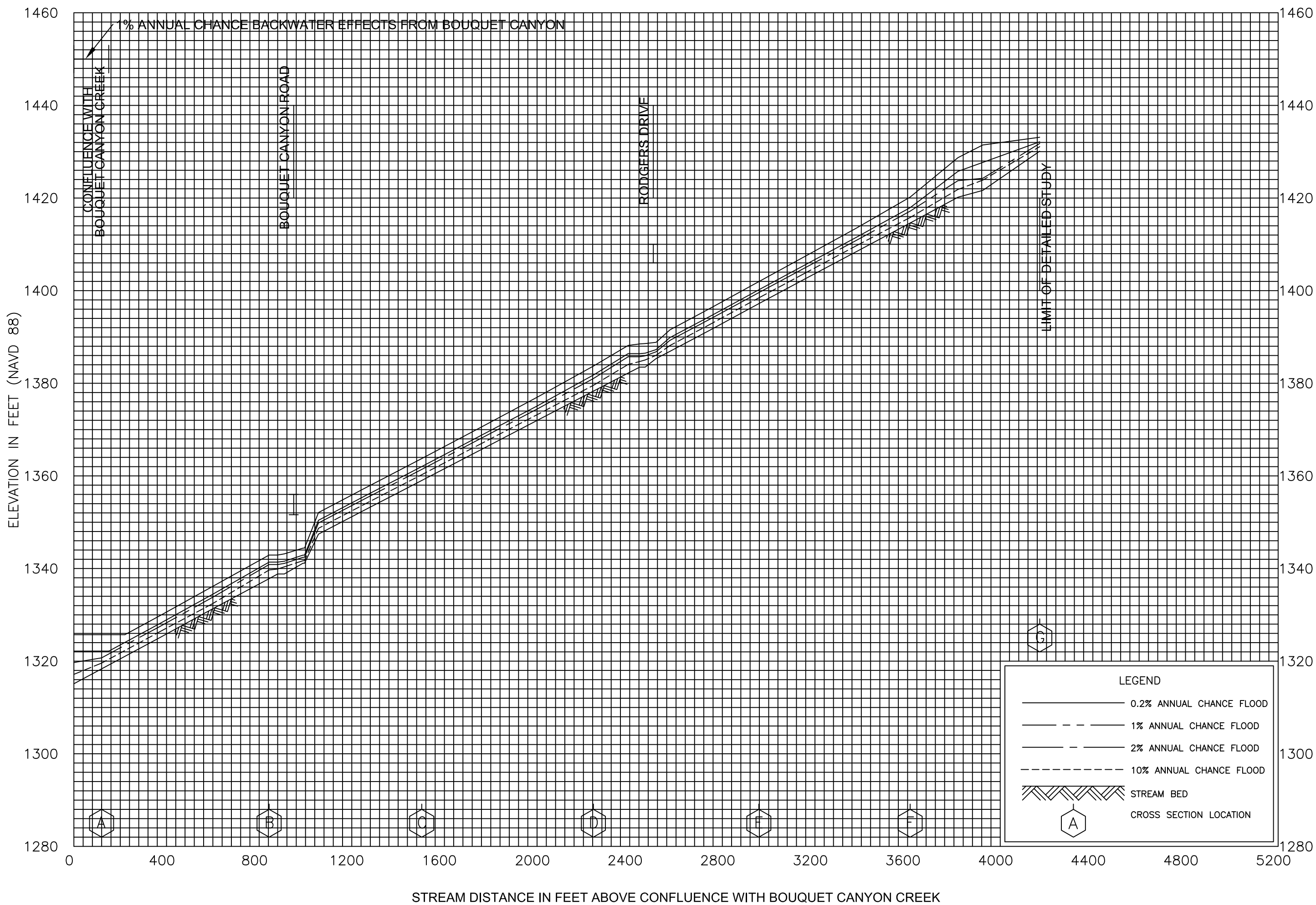
FLOOD PROFILES

PLACERITA CREEK OVERFLOW

FEDERAL EMERGENCY MANAGEMENT AGENCY

LOS ANGELES COUNTY, CA

AND INCORPORATED AREAS



FLOOD PROFILES

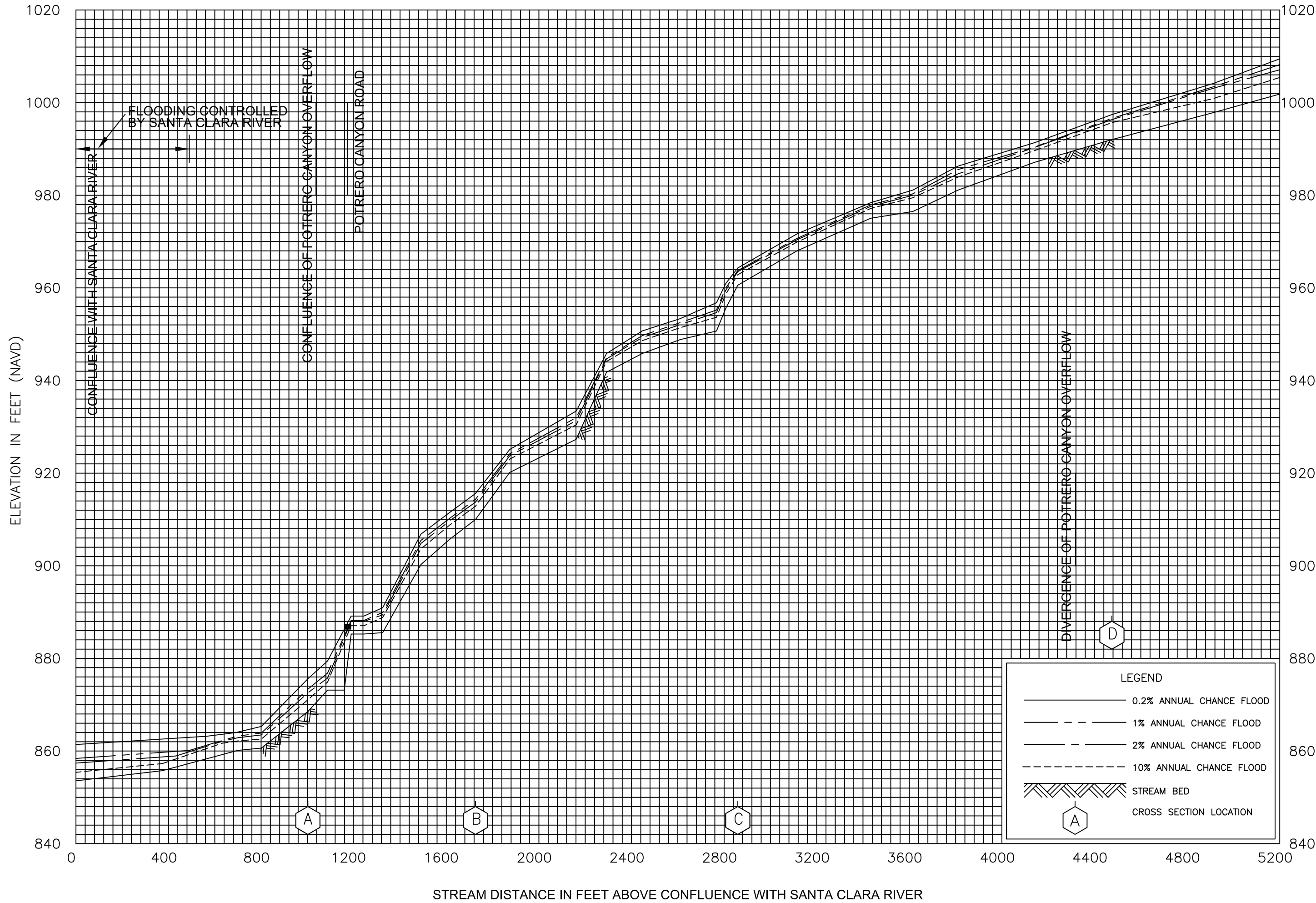
PLUM CANYON

FEDERAL EMERGENCY MANAGEMENT AGENCY

LOS ANGELES COUNTY, CA

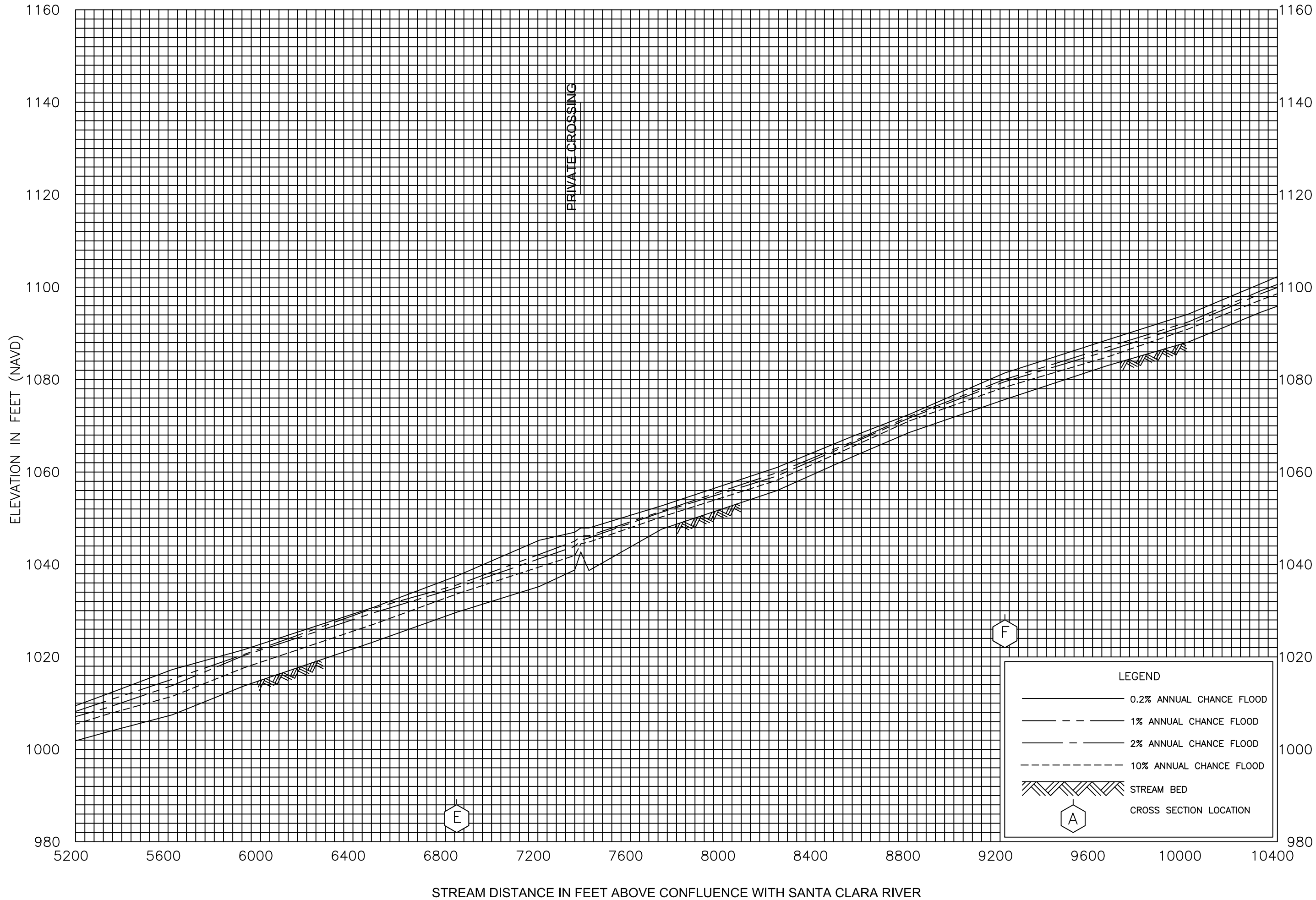
AND INCORPORATED AREAS

261P



FLOOD PROFILES
POTRERO CANYON

FEDERAL EMERGENCY MANAGEMENT AGENCY
LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS



FLOOD PROFILES

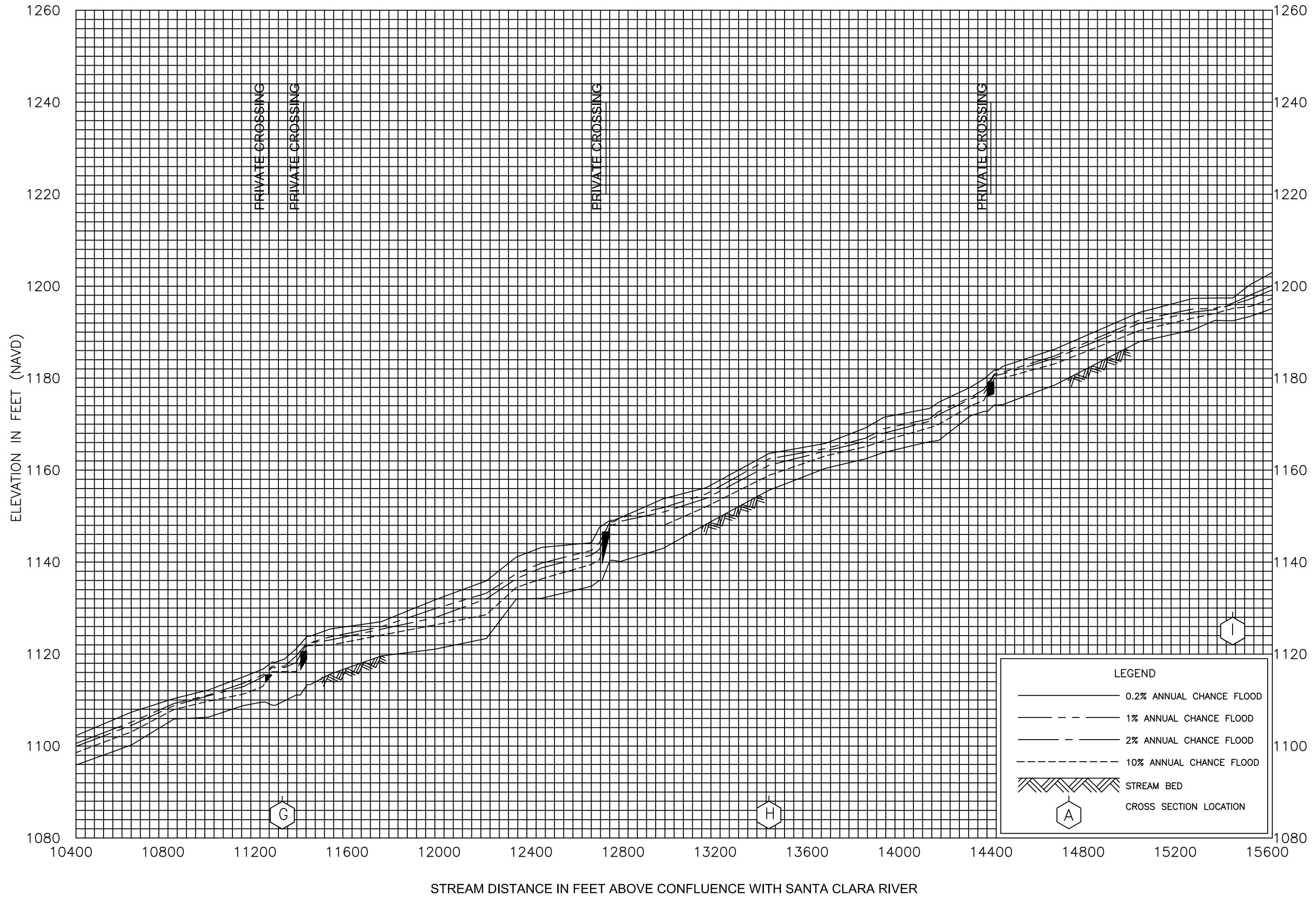
POTRERO CANYON

FEDERAL EMERGENCY MANAGEMENT AGENCY

LOS ANGELES COUNTY, CA

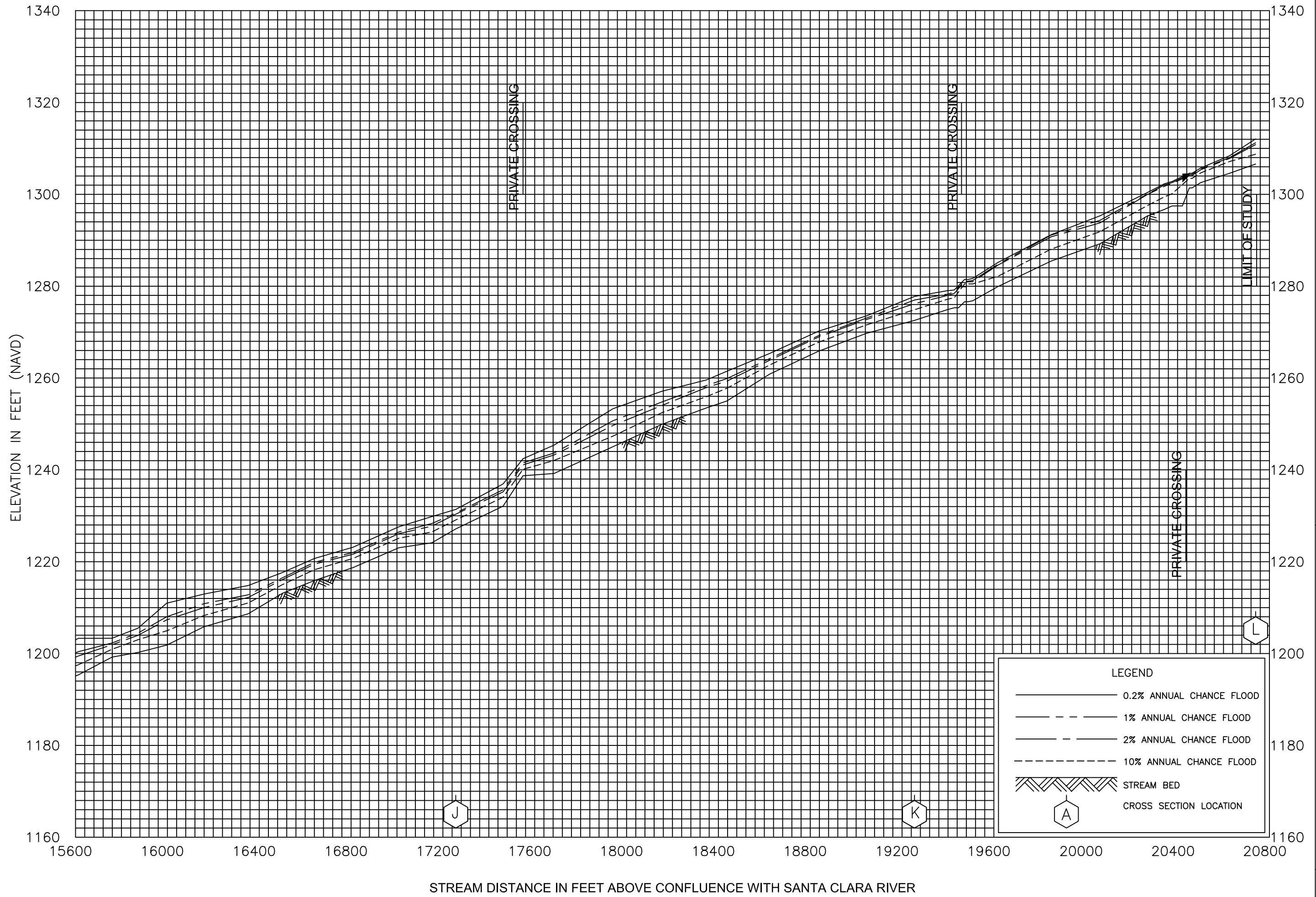
AND INCORPORATED AREAS

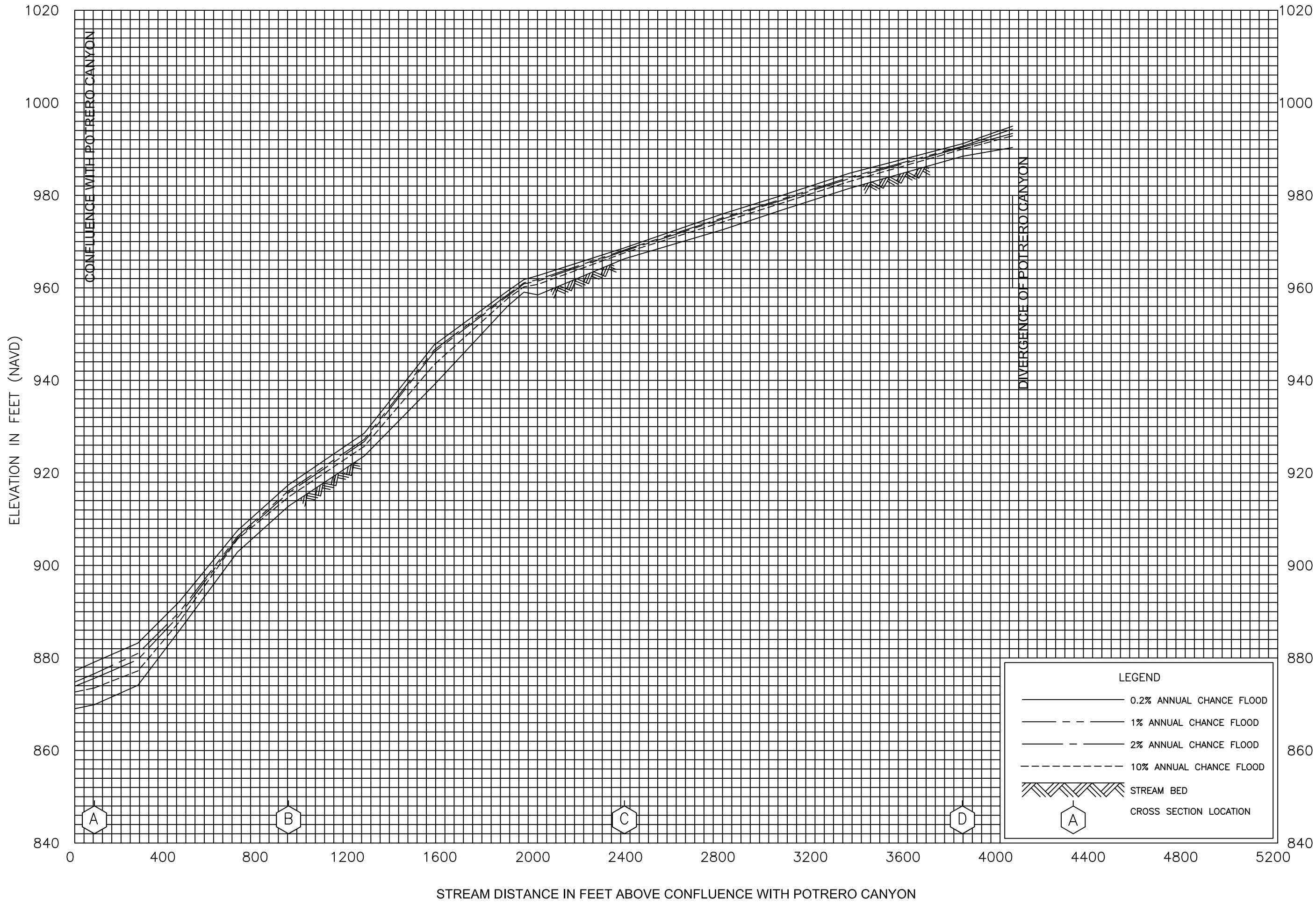
263P



FLOOD PROFILES
 POTRERO CANYON

FEDERAL EMERGENCY MANAGEMENT AGENCY
 LOS ANGELES COUNTY, CA
 AND INCORPORATED AREAS



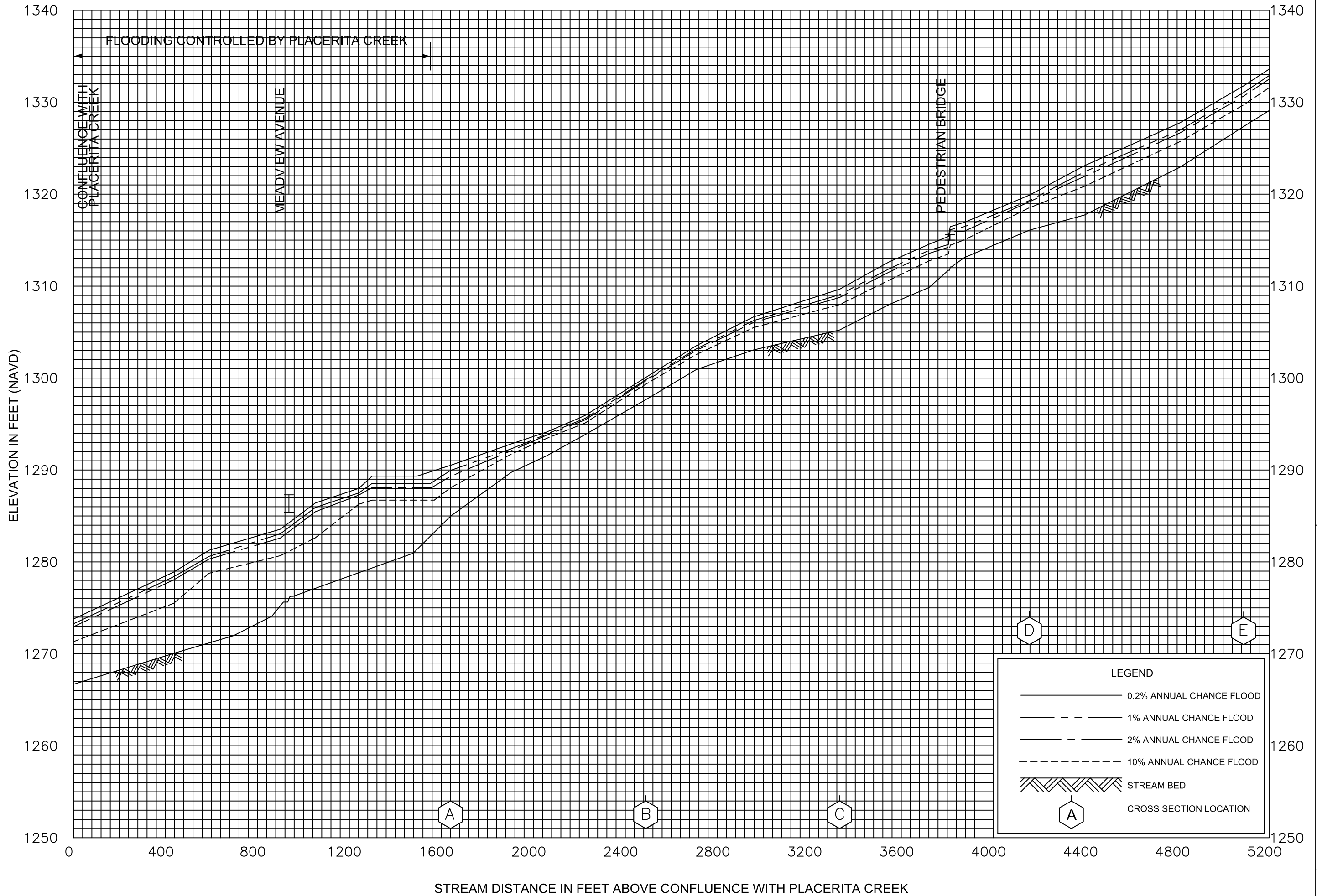


FLOOD PROFILES

POTRERO CANYON OVERFLOW

FEDERAL EMERGENCY MANAGEMENT AGENCY
LOS ANGELES COUNTY, CA
 AND INCORPORATED AREAS

266P



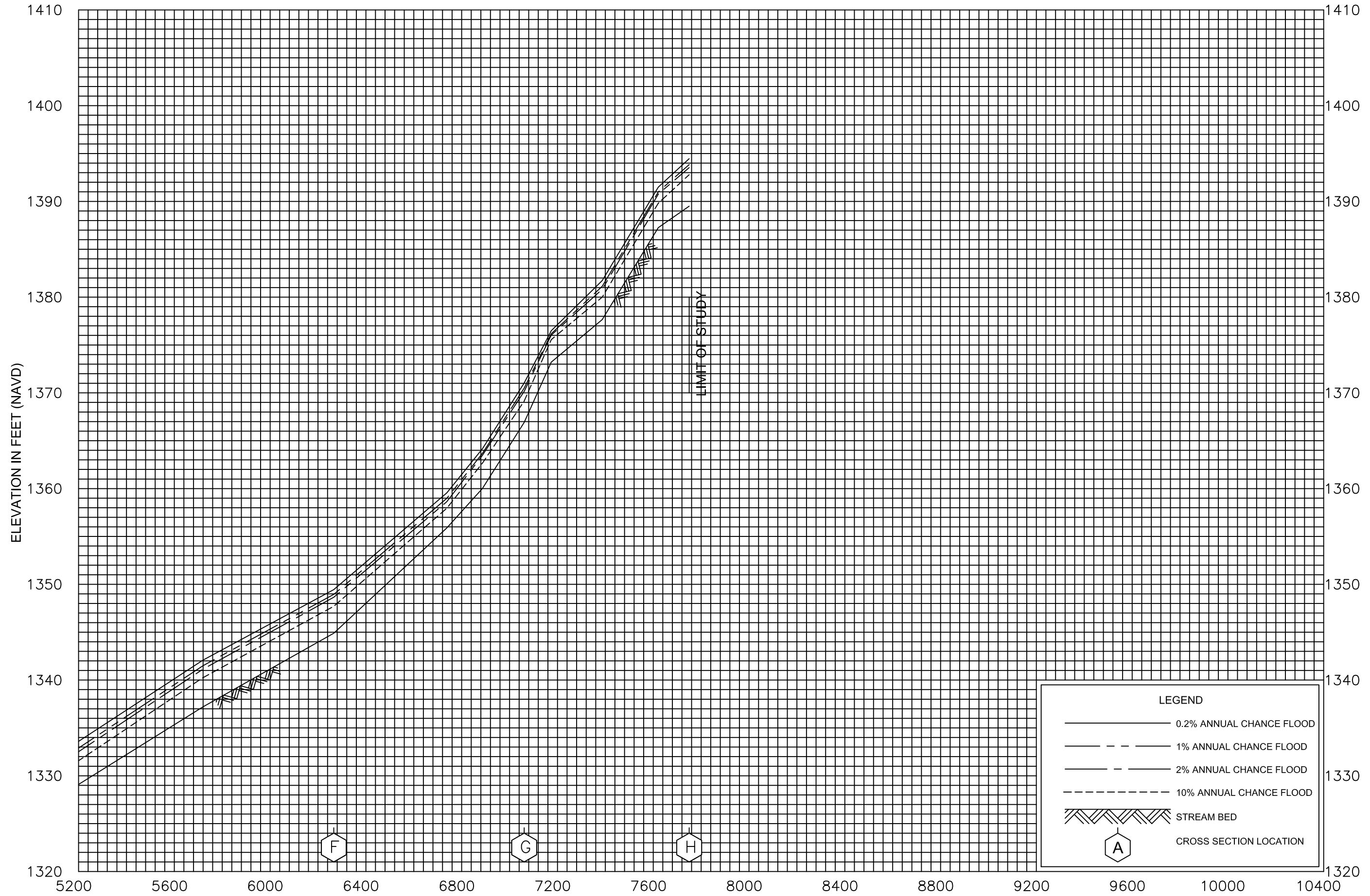
FLOOD PROFILES

QUIGLEY CANYON CREEK

FEDERAL EMERGENCY MANAGEMENT AGENCY







LOS ANGELES COUNTY, CA

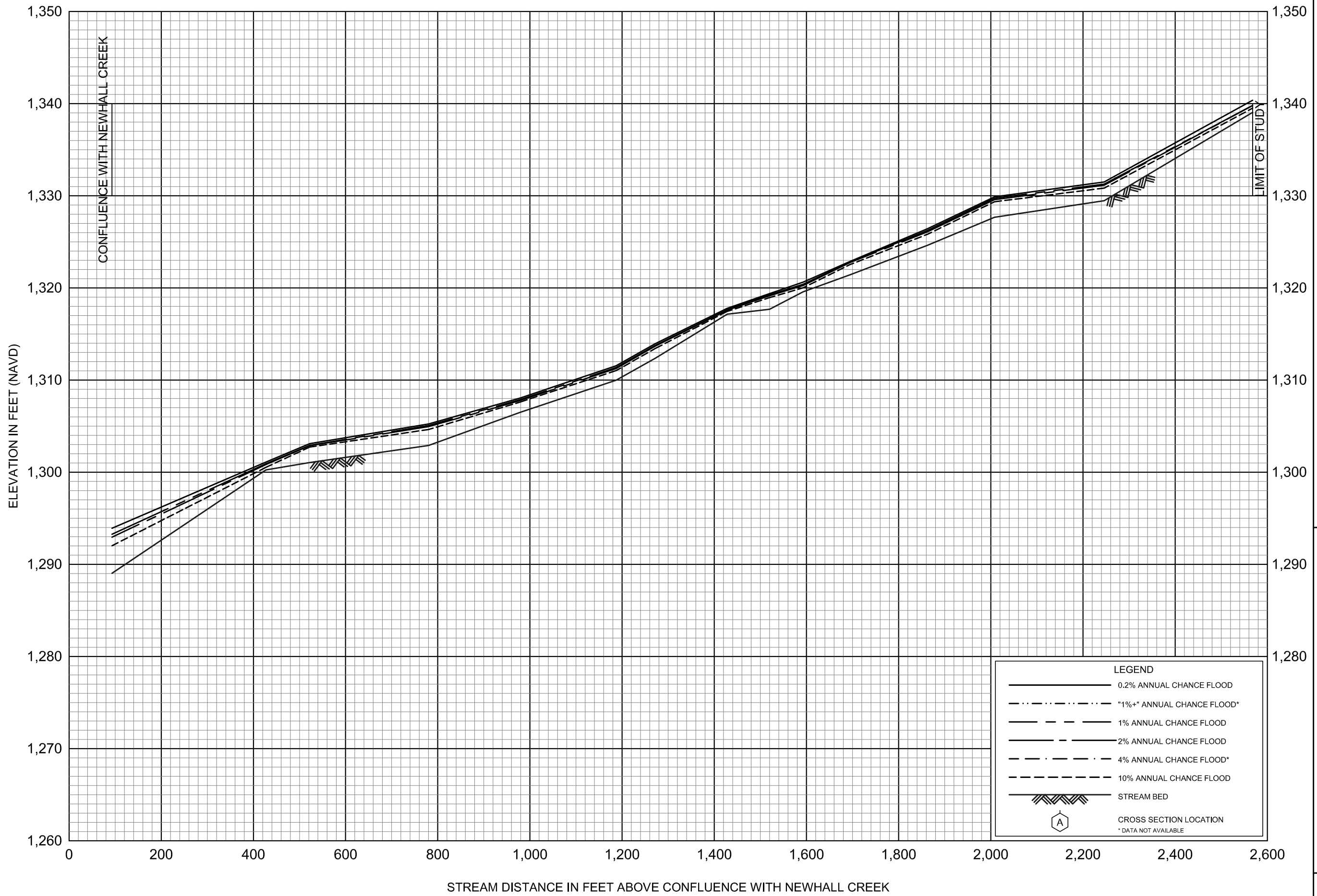
AND INCORPORATED AREAS



FLOOD PROFILES
QUIGLEY CANYON CREEK

FEDERAL EMERGENCY MANAGEMENT AGENCY
LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS

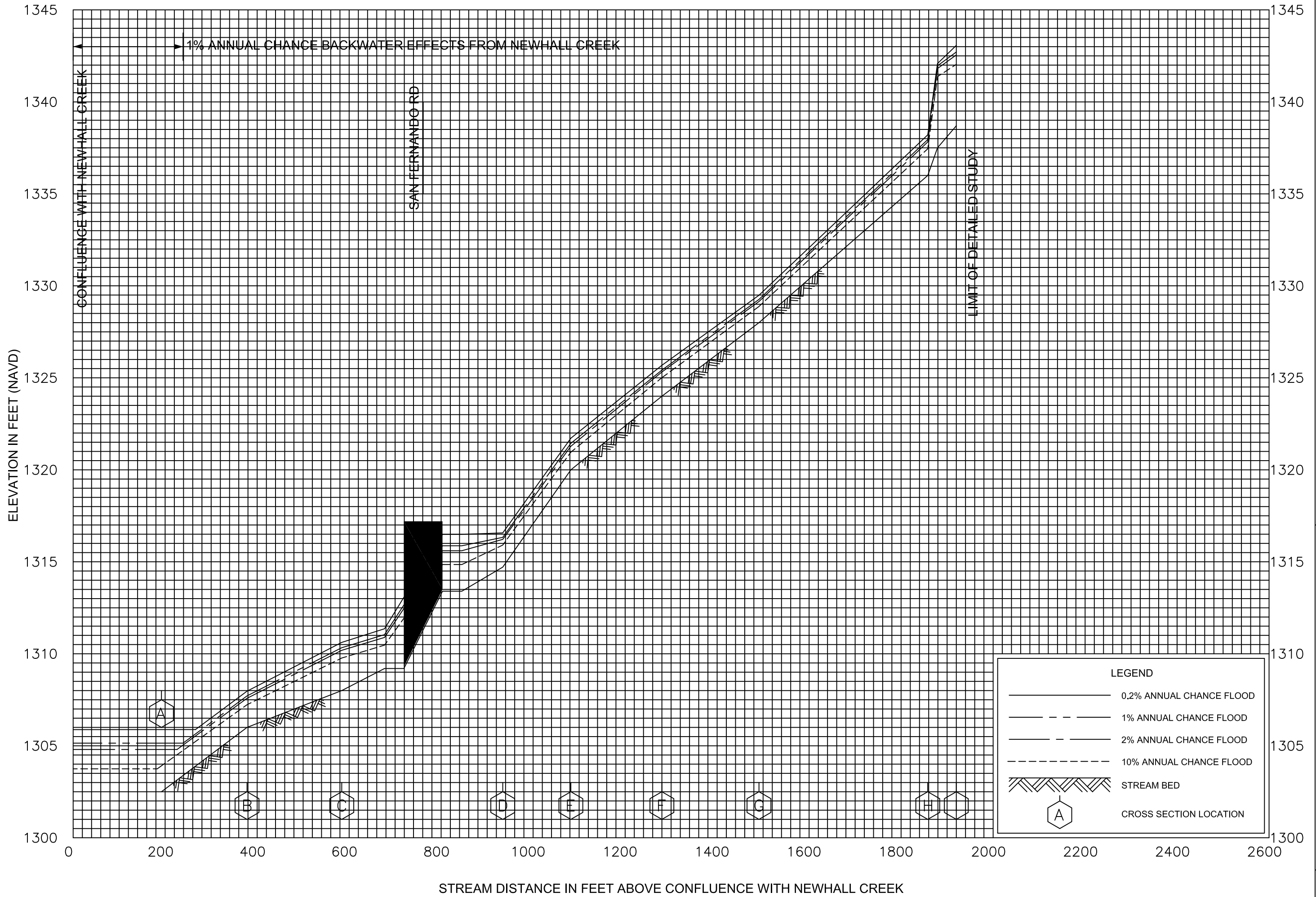
LEGEND	
	0.2% ANNUAL CHANCE FLOOD
	1% ANNUAL CHANCE FLOOD
	2% ANNUAL CHANCE FLOOD
	10% ANNUAL CHANCE FLOOD
	STREAM BED
	CROSS SECTION LOCATION



FLOOD PROFILES

RAILROAD CANYON LEFT OVERBANK

FEDERAL EMERGENCY MANAGEMENT AGENCY
LOS ANGELES COUNTY, CA
 AND INCORPORATED AREAS



FLOOD PROFILES

RAILROAD CANYON

FEDERAL EMERGENCY MANAGEMENT AGENCY

LOS ANGELES COUNTY, CA
AND INCORPORATED AREAS

270P