

City of South Gate



2010 Urban Water Management Plan

Prepared by



Integrated Resource Management, LLC

Adopted

June 14, 2011

Amended

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List of Abbreviations

AF	Acre-Foot or -Feet (i.e., 1 acre x 1 foot deep)
AFY	Acre-Feet per Year
AWWARF	American Water Works Association Research Foundation
BMP	Best Management Practice
CARA	California Rivers Assessment
CBMWD	Central Basin Municipal Water District
ccf	Hundred Cubic Feet
CCR	Consumer Confidence Report
CEQA	California Environmental Quality Act
CRA	Colorado River Aqueduct
CUWCC	California Urban Water Conservation Council
DMM	Demand Management Measure (used by CUWCC)
DOST	DWR Online Submittal Tool
DWR	California Department of Water Resources
ET	Evapotranspiration
°F	Degrees Fahrenheit
FY	Fiscal Year
GPM	Gallons per Minute
MAF	Million Acre-Feet
MBR	Membrane Biological Reactors
mgd	Million Gallons Per Day
MLSS	Mixed Liquor Suspended Solids
MOU	Memorandum of Understanding
MWD	Metropolitan Water District
PEIR	Program Environmental Impact Report
psi	Pounds Per Square Inch
PWS	Public Water System
RO	Reverse Osmosis
RWQCP	Regional Water Quality Control Plant
SB	Senate Bill
SCAG	Southern California Association of Governments
SOP	Standard Operating Procedures
SWP	State Water Project
TMDL	Total Maximum Daily Load
USEPA	United States Environmental Protection Agency
UWMP	Urban Water Management Plan
WSIP	Water System Improvement Program



Contact Sheet

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Executive Summary

The City of South Gate 2010 Urban Water Management Plan has been prepared under contract by Integrated Resource Management, Inc in response to the California Urban Water Management Planning Act. The Act requires all publicly and privately owned urban water suppliers that either have 3,000 or more customers or provide over 3,000 acre-feet (acre-foot = amount of water required to cover one acre one foot deep) of water annually to prepare an updated Urban Water Management Plan (UWMP) by the end of the calendar years that end in five or zero. The Act requires that UWMPs describe the suppliers' service area, water use by customer class, water supply and demand, water service reliability and shortage response options, water transfer and exchange opportunities, water recycling efforts, and conservation measures. A municipal urban water supplier's UWMP is to be adopted by City Council resolution and submitted to the California Department of Water Resources (DWR) within thirty (30) days of adoption. A UWMP can be a condition of eligibility for state grant funds and other drought assistance allocations. The city invited the involvement of local agencies, community organizations and the general public in the development of this plan through mailed notifications, newspaper advertisements, draft availability and a public hearing which was held on June 14, 2011. The City Council adopted the UWMP following the public hearing on June 14, 2011.

Incorporated in 1923, the City of South Gate has grown to a City with approximately 100,000 people. It is mostly a City of families and is strongly Latino. Located in Los Angeles County, it is expected to have only small growth in future years and there is little room for development.

The water system has developed reliable sources. The City has an adjudicated water right of 11,183 AFY. This water is access via water wells pumping from the Central Basin. In addition, the City has interconnections with other agencies and two connections with MWD to purchase water if needed. The City has not needed to purchase water in recent years and has been able to lease the unused water rights they own. Those additional sources are available for when the City does exceed it current water rights and may need to supplement with purchased water.

The most significant aspect of the 2010 UWMP process, state-wide, is conservation. Due to the recent drought conditions, increased usage, and fewer source waters, California has mandated a reduction in water use. Most agencies are required to reduce by 20%. There are also regional targets including the 142 gallons-per-capita-per-day (gpcd) goal for the region that includes South Gate.

South Gate's average usage over the last ten years has been 97gpcd. As this is less than 100 gpcd, they are not required to reduce further and 97 gpcd will be the target through 2020. This low usage factor demonstrated the already efficient water use by the residents and businesses of South Gate. In 2010, the usage was only 72 gpcd so there is potential that the City will be substantially lower without utilizing further conservation measures.

The following table summarizes the recent and projected demands as well as the expected supply sources through 2035.

	2005	2010	2015	2020	2025	2030	2035
Demand (AFY)	10,745	8,402	11,582	11,939	12,257	12,576	12,894
Groundwater Supply (AFY)	10,745	8,402	11,183	11,183	11,183	11,183	11,183
MWD Supply (AFY)	0	0	399	756	1,074	1,393	1,711

The DWR guidelines also requires discussion of several Demand Management Measures (DMM). Due to the City's low usage rates, the City will not develop programs for many of them. It is not economically feasible to implement these DMM's particularly when the usage is already substantially below the regional targets.



A water shortage contingency plan is also required. The City has already adopted such a plan that implements mandatory usage reductions in the presence of certain water shortage situations. The current plan has stages for 10%, 15%, and 40%. The third stage will be amended for a 50% reduction to comply with this requirement. However, as the City's main source of water is an adjudicated water right that does not vary with climate conditions, this situation is unlikely.

Recycled water is currently being used in South Gate but on a limited basis. This water is available through the Central Basin MWD and from recycling efforts by the Sanitation Districts of Los Angeles County. There are additional supplies available however infrastructure would have to be installed to utilize this recycled water in other parts of the City.

The City of South Gate has an efficient, reliable system that is already well-ahead of many state guidelines for reduction. By maintaining the current distribution and production systems, they meet and exceed the goals of lower water use per person throughout the State.



1.0 Introduction

The City of South Gate is pleased to present to the general public its 2010 Urban Water Management Plan (UWMP). Although a previous UWMP was completed in 2007, this will be the first plan completed per the new state standards. The State of California Department of Water Resources (DWR) issued a new guidebook for 2010 UWMPs in February 2011.

An Urban Water Management Plan, as defined by the California Legislature in the California Urban Water Management Planning Act of 1983 (last updated in 2009—attached to this plan as Appendix A), informs residents, neighboring agencies and local community groups on how an urban water agency will provide a safe, secure water supply in the short and long term. The following plan attempts to look 25 years into the future to project what the City of South Gate's water supply will look like in 2035. Included in that long-term projection are predictions concerning future water demand, conservation planning, contingency planning in case of short- or long-term droughts and other catastrophes, and potential strategies to enhance and diversify South Gate's water portfolio.

Overall, this plan was developed to be used as a tool to recognize, protect and enhance the value of South Gate's water resources. This is a living document that will be updated periodically as needed by the City and as required by the State in five year increments

The City of South Gate is located in the urbanized area of southern Los Angeles, just 12 miles south of Los Angeles. The City is bordered by the cities of Huntington Park, Cudahy, Bell and Bell Gardens to the north; by Downey to the east, by Lynwood to the south, and by Paramount to the southeast. The City was incorporated in 1923 and is the sixteenth largest city in Los Angeles County, encompassing 7.5 square miles.

The City currently meets all of its water needs from its groundwater wells and adjudicated pumping rights. There are two MWD connections for purchased water that can be used but this has not been necessary since 1999 and not since 1990 have they been used on a regular basis. There are also several connections with other agencies that can be used in an emergency.

1.1 Urban Water Management Act

The City of South Gate 2010 Urban Water Management Plan has been prepared under contract by Integrated Resource Management, LLC in response to the California Urban Water Management Planning Act (Water Code Division 6, Part 2.6, Sections 10610-10656—included as Appendix A). The Act requires all publicly and privately owned urban water suppliers that either have 3,000 or more customers or provide over 3,000 acre-feet (acre-foot = amount of water required to cover one acre one foot deep) of water annually to prepare an updated Urban Water Management Plan (UWMP) by the end of the calendar years that end in five or zero. For 2010, an extension to July 1, 2011 was implemented by SBX7-7 to meet the requirements for adoption of a UWMP. A water supplier can also periodically review and adopt changes or amendments to its UWMP in intervening years.

The Act requires that UWMPs describe the suppliers' service area, water use by customer class, water supply and demand, water service reliability and shortage response options, water transfer and exchange opportunities, water recycling efforts and conservation measures. The state also expects the 2010 plans to reflect changes to the UWMP Act since the last round of UWMP updates in 2005 (see Section 1.1.1).

Overall, the UWMP requirements for 2010 reflect a heightened interest in water conservation. Additionally, recent litigation has added significant weight to documents like UWMPs which provide legal and authoritative assessments of water supply and environmental impacts. Urban planning managers are expected to use UWMPs to determine future development goals as well as vulnerabilities in security infrastructure.

This 2010 Urban Water Management Plan was prepared in compliance with the requirements of the current Urban Water Management Act and under the guidance provided by the California Department of Water Resources.



A municipal urban water supplier's UWMP is to be enacted by City Council resolution and submitted to the California Department of Water Resources (DWR) within thirty (30) days of adoption. The DWR reviews the UWMP for completion.

The City of South Gate prepared a UWMP in 2007.

1.1.1 Changes in the Act Since 2005

Since 2005, several amendments have been added to the Act. Some of the amendments provided for eligibility for state water management grants or loans, reporting on lower income and affordable household water projections, reporting on the feasibility of serving recycled water demands as well as Senate Bill 7 (also known as SBX7-7 or the Water Conservation Bill of 2009). The following is a summary of the significant changes in the Act that have occurred from 2005 to the present:

- Every urban water supplier preparing a plan must give at least 60 days advance notice to any city and county prior to the public hearing on the UWMP within which the supplier provides water supplies to allow opportunity for consultation on the proposed plan (Water Code § 10621(b)).
- Deems water suppliers that are members of the California Urban Water Conservation Council and comply with the CUWCC's Memorandum of Understanding Regarding Urban Water Conservation in California (MOU) (Water Code § 10631.5(a)) dated December 10, 2008, as it may be amended, to be in compliance with the requirement to describe the supplier's water demand management measures in its urban water management plan (Water Code § 10631(j)).
- Requires plan by retail water suppliers to include water use projections for single family and multifamily residential housing needed for lower income and affordable households to assist the water supplier in complying with the existing requirement under Section 65589.7 of the Government Code that suppliers grant a priority for the provision of service to housing units affordable to lower income households (Water Code § 10631.1).
- Conditions eligibility for a water management grant or loan made after January 1, 2009 to an urban water supplier and awarded or administered by DWR, the State Water Resources Control Board, or the California Bay-Delta Authority or its successor agency on the implementation of water demand management measures, including consideration of the extent of compliance with the conservation measures described in the MOU.
- Requires DWR, in consultation with other agencies and public input, to develop eligibility requirements for meeting compliance with DMM implementation. (Water Code § 10631.5(b)).
- Exempts projects funded by the American Recovery and Reinvestment Act of 2009 from the conditions placed on state funding for water management to urban water suppliers (Water Code § 10631.5(a)(2)).
- Repeals existing grant funding conditions of state water management grants or loans on July 1, 2016 if the UWMP is not extended or altered prior to this date (Water Code § 10631.5(f)).
- Required DWR, in consultation with the California Urban Water Conservation Council, to convene a technical panel, no later than January 1, 2009, to provide information and recommendations to the Department and the Legislature on new demand management measures, technologies, and approaches. The panel and DWR were to report to the Legislature on their findings no later than January 1, 2010 and each five years thereafter (Water Code § 10631.7).



- Clarifies that “indirect potable reuse” of recycled water should be described and quantified in the plan, including a determination with regard to the technical and economic feasibility of serving those uses (Water Code § 10633(d)).
- Requires DWR to recognize exemplary efforts by water suppliers by obligating DWR to identify and report to the technical panel, described above, any “exemplary elements” of individual water suppliers’ plans, meaning any water demand management measures adopted and implemented by specific urban water suppliers that achieve water savings significantly above the levels required to meet the conditions to state grant or loan funding (Water Code § 10644(c)).
- SBX 7-7 requires each urban retail water supplier to develop urban water use targets to help meet the 20 percent goal by 2020, and an interim urban water reduction target by 2015. The bill specifically includes reporting requirements in the upcoming UWMPs. Specifically, urban retail water suppliers must include in their 2010 UWMPs the following information from its target setting process: (1) baseline daily per capita water use; (2) urban water use target; (3) interim water use target; and (4) compliance daily per capita water use, including technical bases and supporting data for those determinations. An urban retail water supplier may update its 2020 urban water use target in its 2015 UWMP (Water Code § 10608.20). SBX7-7 grants an extension for submission of UWMPs due in 2010 to July 1, 2011.

1.2 Regional Coordination

The City of South Gate welcomed local and regional involvement in the development of this plan.

The City of South Gate coordinated with the agencies listed in Table 1. The City’s major water supply is provided via groundwater wells utilizing allocated pumping rights from the Central Basin. There are two connections with MWD although they have not been used in over ten years. The City also has emergency interconnections with several other water agencies.

The City of South Gate conveys its wastewater to the Sanitation Districts of Los Angeles County (LACSD). LACSD functions on a regional scale and consists of 23 independent special districts serving about 5.7 million people in Los Angeles County. The service area covers approximately 820 square miles and encompasses 78 cities and unincorporated territory within the county. LACSD was notified of the City’s intention to prepare the UWMP. Although the City may not develop their own recycling program, additional recycling opportunities are expected to be available through CBMWD. Their programs are discussed in more detail in Section 7.0.

See the “Contacts” section of this plan (starting on page 62) for a list of local and regional entities that received these notifications, and Appendix H for a sample notification.



Table 1 lists those agencies and organizations that were involved and/or actively participated in the development of the plan:

Table 1: Coordination with Appropriate Agencies and Organizations

	Contacted for Assistance	Participated in Plan Development	Attended Public Meetings	Requested/Received Copy of Draft	Commented on Draft
Los Angeles County	√				
Golden State Water Company	√				
Metropolitan Water District	√				
Sanitation Districts of Los Angeles County.	√			√	√
Central Basin Municipal Water District	√				
Water Replenishment District	√				
City of Downey	√				
City of Lynwood	√				
Southern California Association of Governments	√	√			
Walnut Park Mutual Water Company	√				
City of Huntington Park	√				
Gateway Authority	√	√			

1.3 Public Participation and Plan Adoption

The City of South Gate sought a wide range of involvement in the development of this plan, including direct public involvement. Public participation in the development of the UWMP was encouraged.

The city ran a 1.5"x2" advertisement in the March 3, 2011 and March 10, 2011 editions of the *Los Angeles Wave* announcing the initiation of plan preparation (see Appendix H for proof of publication).

Drafts of the plan were made available for public inspection at the City of South Gate's City Hall and May 26, 2011 before the public hearing which began prior to the City Council Meeting on June 14, 2011. The draft of the plan was also made available on the City's website beginning on June 1, 2011. All local cities, counties, water and planning agencies and community organizations were notified by mail of the availability of the plan for public inspection and the time and location of the public hearing.

Comments on the draft were collected and either incorporated into the plan or responded to in Appendix I.



1.4 Adoption Of 2010 Urban Water Management Plan

The City of South Gate's City Council adopted the 2010 Urban Water Management Plan at its regular meeting on June 14, 2011 after a public hearing. In late 2013 DWR requested some clarification to the document text. This Amendment to the UWMP was adopted by the City on July 8, 2014. Following adoption, the Amended RUWMP was submitted to DWR, the California State Library, and the County of Los Angeles within 30 days of Board approval. Resolutions adopting the Amended RUWMP are provided in Appendix C.



2.0 System Description

The South Gate water system serves the entire City with the exception of a portion of the Hollydale area, south of Gardendale Avenue, which is served by Golden State Water Company. Currently, the City potable water demand is served by eight active wells. Three additional wells are currently inactive, two due to ground water contamination and the other to excessive sand production. All wells draw water from the Central Groundwater Basin. Treated Colorado River water is available for purchase from the Metropolitan Water District through two turnouts within the City. The purchased MWD water can serve as an emergency water source during system or operations failure. The City also has five additional interconnections with surrounding water purveyors including the City of Downey, the City of Lynwood, City of Huntington Park, the Walnut Park Mutual Water Company, and Golden State Water Company in Hollydale.

The City of South Gate operates a municipal water utility located in an adjudicated water basin (the Court retains jurisdiction to assure a balanced Central Basin aquifer through a Judgment awarding groundwater pumping rights to water producers and the Court appointed Watermaster – the Department of Water Resources – assists the Court in the administration and enforcement of the Judgment). The Utility has annual pumping rights of 11,183 acre-feet of water. The City manages and operates wells, conduits, pipes, fire hydrants, and reservoirs. The water system in South Gate is regulated through federal law, state law, the South Gate Municipal Code, and court decisions. The exception is the Hollydale area which is served by Golden State Water Company, an investor-owned water utility. As of 2010, the City has a total of 15,555 metered connections. Seventy-five percent of water is used by residential users, nine percent commercial, fifteen percent industrial, and one percent other users.

2.1 City of South Gate

2.1.1 History

The Tongva tribe and other Native American tribes were the original inhabitants of the entire Los Angeles coastal area around South Gate. The vast Rancho San Antonio – stretching from the eastern boundary of the pueblo of Los Angeles to the San Gabriel River – was granted to Spanish settlers by the King of Spain in 1810, and South Gate grew up around the literal “south gate” of this Rancho. Before the end of the 1870’s, much of the Rancho had been divided into 40-acre tracts, and by 1880 agriculture had replaced cattle ranching as the area’s primary industry. In 1918, the Rancho was further subdivided and sold to 125 pioneering homeowners. This unincorporated community known as “Southgate Gardens” included some of the City’s earliest streets, running east from Long Beach Boulevard to Otis Street and south from Santa Ana Street to Independence Avenue. Post Street, State Street, and Victoria Avenue were also designated as the “business district.”

When the City was incorporated in 1923, it had a population of around 2,500, but as California – and particularly nearby Los Angeles – boomed in the 1920s, 1930s, 1940s, and 1950s, so did South Gate. Major manufacturers such as Ameron, Firestone Tires, General Motors, Purex, the Star Roofing Company (now U.S. Gypsum,) and the Weiser Hardware Company flourished in the new city, and the population increased. Most of the housing in South Gate was built between 1920 and 1970 to house blue collar and industrial workers in and around the City. Los Angeles’ intense post-WWII urban sprawl eventually surrounded the once rural South Gate and brought it into the center of one of the United States’ largest metropolitan areas (around 17 million people live in the greater Los Angeles area today)¹.

The City of South Gate is poised for positive change over the next 20 years – change that will simultaneously transform the landscape of the City and yet maintain the small town quality and characteristics cherished by residents and respected by neighbors.

¹ City of South Gate, www.cityofsouthgate.org/theearlyyears.htm



In many ways, South Gate is grappling with similar issues and forces facing many other cities in Southern California. The City's industrial job base – historically driven by such major employers as Firestone Tires and General Motors but now dominated by warehouse, distribution and small-scale manufacturing – is being forced to transform itself and provide 21st century technologies and jobs. As with built-out “inner ring” suburbs, there is almost no undeveloped land in the City for development or parks, and most new housing and jobs must come from redevelopment, infill, densification, or adaptive building reuse. South Gate is also grappling with developing a multi-modal, 21st century transportation system that enhances access and mobility for all residents. Demographically, South Gate's large Latino population, where many residents are first or second generation immigrants from Central and South America, reflects the demographic shifts occurring in the country at-large and, more specifically, in Southern California. And like many cities, South Gate is largely defined by the nature of its neighborhoods – most of which are stable, high-quality building blocks for community.

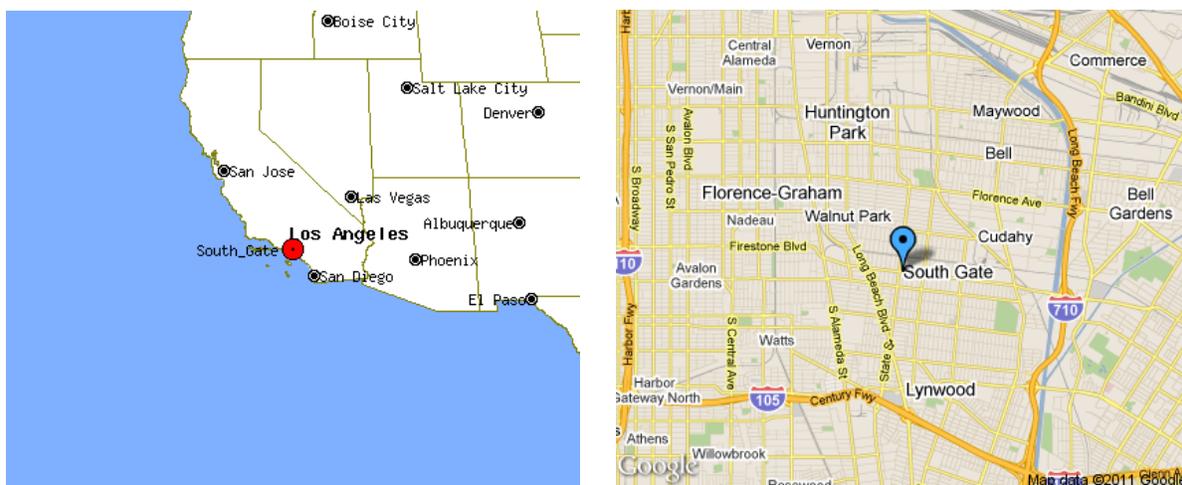
2.1.2 Location

The City of South Gate is located in the urbanized area of southern Los Angeles County, a few miles south of downtown Los Angeles. The City of South Gate covers approximately 7.5 square miles of the south-central area of Los Angeles County. The City is bounded by an unincorporated area of Los Angeles County known as Walnut Park; cities of Huntington Park, Cudahy, Bell, and Bell Gardens, Downey, Lynwood, and Paramount. The City is located in the coastal plain at the confluence of the Los Angeles River and Rio Hondo. The terrain is gently sloping, ranging from 80 to 135 feet in elevation above sea level.

The City provides water service to most of the area within the city limits. However, water service to one section, Hollydale, is provided by Golden State Water Company (See Figure 4). Sewer collection and storm drainage is provided for all areas within the City limits. The City manages the sewer system and is maintained by the LACSD. The Los Angeles County Department of Public Works provides storm drain management. All sewage is carried away to be treated at the County's treatment plant.

The topography of South Gate is dominated by the Los Angeles River (LA River) and Rio Hondo River. The LA River divides the City into eastern and western sections. Land west of the LA River gently slopes to the river. Land east of the river slopes toward the LA River or Rio Hondo. There are no significant hills or known faults within the City. The Newport-Inglewood fault is located about three miles to the southwest, the Whittier-Elsinore fault is about ten miles to the east, and the San Andreas fault is located about 40-miles to the northeast.

Figure 1: Location of South Gate



Source: South Gate, California Profile, 2011. <http://www.idcide.com>.



Figure 3: City of South Gate City Limits



Source: City of South Gate General Plan, December 2009

2.1.3 Climate

The City of South Gate is located in the desert climate of Southern California in the County of Los Angeles. South Gate has a semiarid Mediterranean climate with mild winters and hot, dry summers. Temperatures range from a low of 40 °F to a high of 110 °F. The average daily temperatures range from 54 °F to 83 °F. The average annual precipitation is 14.3 inches per year with most occurring between November and April.

Table 2 gives data on the climate of the region as it impinges on its water supplies, including average rainfall, average temperature, and average rate of evapotranspiration (ET—i.e., the rate that water either evaporates or is expired by vegetation into the atmosphere).



Table 2: Climate

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Annual
Average Rainfall (inches)	3.40	3.23	2.33	1.03	0.18	0.06	0.02	0.09	0.19	0.42	1.42	1.97	14.34
Average Temperature (°F)	64.3	*	54.5	63.8	64.3	77.7	82.3	83.1	80.0	73.0	64.9	60.5	69.8
Average ET (inches per month)	1.65	2.15	3.59	4.77	5.12	5.71	5.93	5.91	4.39	3.22	2.18	1.68	46.30

Sources: Monthly Average ETo Report (No. 174, Long Beach, Los Angeles Basin Region), CIMIS, Department of Water Resources, Office of Water Use Efficiency, Accessed March 6, 2011; Western Regional Climate Center, 1906-2010. Downey, California (Station 042494) <http://www.wrcc.dri.edu>. (February data was insufficient)

2.1.4 Population

By 2000, South Gate was home to an estimated 96,375 people, double what it was in 1960 and 10% more than in 1990. The actual current population may be 10-20% higher than that estimate because of the large immigrant and undocumented population in the City. Having fully transitioned away from its beginnings as a small agricultural outpost, South Gate can now be characterized as an increasingly urbanized city in greater Los Angeles that still retains a “small-town” identity, with a continued but diminishing manufacturing and industrial presence, and a still prevalent Spanish and Latino heritage.

Population figures were provided and developed from multiple sources and provided for the City of South Gate and the South Gate water service area. The City population was provided by the 2000 Census and from the Southern California Association of Governments (SCAG) projections. The service area population was developed by utilizing Appendix A in the Methodologies for Calculating Baseline and Compliance Urban Per Capita Water Use Handbook.

South Gate’s population since 2000 has grown by less than 1 percent per year and it expected to continue at that rate as the City has been mostly built out. Redevelopment of the vacant industrial areas are the most likely locations for additional population growth. By 2035 South Gate’s population is expected to reach 119,247.

SCAG has prepared population projections for the City of South Gate as well as other cities and counties throughout southern California. SCAG’s population calculations are for the entire City of South Gate and they do differ slightly from the populations as calculated by the methodology of the UWMP. However, the percentage growth they determine can be used in confidence. The SCAG projections began with a 2008 total population of 102, 498 and then projected a 2020 population of 110,412 and a 2035 population of 119,247. The numbers were then prorated to determine the projections from 2010-2035.

The City of South Gate’s water service area does not mirror the city boundaries. Therefore the population estimates must be adjusted accordingly for the Hollydale area, south of Gardendale Avenue, which is served by the Golden State Water Company within the city limits. The growth rate as determined by SCAG was then used to adjust the service area population as compared to the overall City population.

Table 3 gives the current and projected population for the City of South Gate’s Water Utility service area:

Table 3: Population – Current and Projected

	2010	2015	2020	2025	2030	2035
City of South Gate Population*	103,817	107,115	110,412	113,357	116,302	119,247
Service Area Population	102, 832	106,099	109,365	112,282	115, 199	118.116

*SCAG RTP 2012 Growth Forecast



2.1.5 Socioeconomic Conditions

At its core, South Gate is a city of families and neighborhoods. In 2000, 86% of all households in the City were made up of families (couples with or without children or single people living with children), an increase from 82% in 1990. Many families are young. More than one third of the population is 18 years old or younger, the City's median age is 27, and the 27-54 year old demographic is by far the fastest growing age group. Many of these young families live in single family residential homes, which are the most common type of housing found in most residential neighborhoods. The City is also strongly Latino. Many residents are first or second generation immigrants, and 92% of residents were identified as Hispanic in the 2000 census.

South Gate residents are about as likely to be renters as to be owners. According to the 2000 Census, approximately 47% of South Gate's housing units are owner-occupied and 53% are renter-occupied. In 2009 South Gate's vacancy rate were below five percent for rental housing and below two percent for ownership housing. These numbers point to a very tight rental and housing ownership market.

South Gate has a strong and active workforce. In 2000, 5.5% of South Gate residents were unemployed, significantly lower than Los Angeles County's unemployment rate of 8.2%. Those who were employed primarily worked in production (33%) and sales (28%) occupations that paid low wages, and the median household income was \$35,695. By 2005, unemployment in South Gate had increased to 6.5%, even though the countywide rate had dropped to 5.3%. There are fewer jobs in South Gate city limits (19,960 in 2003)¹ than housing units (24,411 in 2005)², and many residents that cannot find suitable jobs within city limits commute elsewhere for work. The jobs that exist in South Gate city limits are primarily in the industrial sector, with a low number of office or service jobs.³

South Gate's economy is supported by approximately 17,700 jobs, as reported by the Employment Development Department (EDD)¹ in 2007. The manufacturing sector provides 30 percent of these jobs, the largest share of any industry. Many direct and indirect manufacturing businesses are located in the City, taking advantage of its proximity to Downtown Los Angeles, one of the largest economic centers in the nation in addition to the Ports of Los Angeles, Long Beach and the Alameda Corridor.

Between 1996 and 2006, South Gate's economy grew, especially in relation to Los Angeles County's economy as a whole. South Gate's moderate annual job growth of 5.27 percent was well above Los Angeles County's average annual growth of 0.86 percent.

Retail trade is one of the fastest growing industries in the City. Between 1996 and 2006 South Gate saw a 12.4 percent growth in retail industry jobs. Much of the City's retail growth is occurring along Firestone Boulevard. Currently, Firestone is home to many new and used auto dealerships, which provide substantial taxable annual sales for the City. Other major commercial districts in the City include Tweedy Mile, Hollydale Business District, State Street, Paramount Boulevard, Long Beach Boulevard and El Paseo. Most areas of the City have experienced some growth in locally-based retailers but have not been able to consistently attract national credit-tenants. The

¹ Southern California Association of Governments estimate, 2003.

² California Department of Finance, 2006.

³ South Gate General Plan 2035



El Paseo Shopping Center, a 300,000 square foot regional retail center developed in 2000, signals a change in this trend. El Paseo not only attracts South Gate residents, but also brings patrons from Downey, Lynwood, Huntington Park and other nearby cities. The South Gate Towne Center is a 175,000 square foot retail center adjacent to the El Paseo. It also draws retail patrons to the City with the presence of a Sam's Club Warehouse and numerous inline retail stores and restaurants. The establishment of South Gate as a regional retail destination will be furthered by the anticipated El Portal retail center, at the intersection of Firestone Boulevard and Atlantic Avenue. El Portal will bring approximately 600,000 additional square feet of national-brand and local retailers to South Gate, providing an estimated \$1.93 million in annual sales tax revenue. Transportation and warehousing is a high-potential and high-growth industry attracted by South Gate's convenient location and proximity to major transportation nodes. Between 1996 and 2006 this sector grew 11 percent, resulting in an additional 668 jobs within the City.¹

Commercial establishments in South Gate are located mainly along major arterials such as Firestone Boulevard, Atlantic Avenue, Tweedy Boulevard, and Long Beach Boulevard. The section of Tweedy Boulevard between Long Beach Boulevard and Hunt Avenue is considered the central business district of South Gate. In recent years, the number of commercial establishments has increased as development occurs and industrially zoned land is converted to commercial uses.²

South Gate is currently home to a number of major industries including Schultz Steel, Saputo Cheese, U.S. Gypsum, Armstrong World, Philadelphia Quartz Industry, and Koos' Manufacturing.

In the 1980's, South Gate's industrial base changed as General Motors and Firestone Rubber closed manufacturing plants in the City. The City is updating the General Plan and industrial land use designations are not expected to change.

In the past, South Gate was a predominantly agricultural area until the mid-1930, when urban growth replaced much of the farm land. Currently, there is very little land dedicated to agricultural

production. Remaining agricultural land is located along the transmission utility right-of-way (owned by the Los Angeles Department of Water and Power and the Southern California Edison Company) adjacent to the Los Angeles and Rio Hondo Rivers and along a portion of Southern Avenue near Atlantic Avenue. The updated General Plan studies do not expect this agriculture use will change.¹

The discussions above were included in either the 2005 water master plan or the General Plan completed in 2009. The economic downturn of the recent years will have an effect on the socioeconomic conditions. Those exact effects will not be known until the next similar study.

2.1.6 Land Use

Land use categorized as residential, commercial, industrial, and public/institutional comprise approximately 82% of the City's total land area of 3,739 acres. The remaining land consists of public parks, freeways, flood control right-of-ways, and railroad right-of-ways. Almost all of South Gate is developed, with less than 60 acres remaining undeveloped or vacant. The composition of existing land use in South Gate by user category is shown on Table 4.

¹ South Gate General Plan 2035

² 2005 City of South Gate Water Master Plan



Table 4: Existing Land Use by Category

Land Use	Number of Parcels	Acres	Percent Acreage
Single-Family Residential	10,348	1,374	36.7%
Multi-Family Residential	3,718	570	15.2%
Residential Landscaping	1	6	0.2%
Commercial 1	335	114	3.0%
Commercial 2	598	228	6.1%
General Industrial	467	719	19.2%
Railroad	48	72	1.9%
Flood Control District Easement	69	158	4.2%
Easement/Powerline R/W	129	86	2.3%
Civic/Institutional	127	73	2.0%
Public Works	8	10	0.3%
Schools	96	72	1.9%
Schools with Green Areas	37	69	1.8%
Parks	46	128	3.4%
Vacant	191	60	1.6%
Totals	16,218	3,739	100%

**2005 City of South Gate Water Master Plan*

Commercial land use includes neighborhood, community, and regional shopping centers; commercial sales and service; general office; medical office; and lodging. Commercial development is located primarily on commercial strips located adjacent to major arterials such as Firestone Boulevard, Long Beach Boulevard and Tweedy Boulevard. The central business district is the section of Tweedy Boulevard between Long Beach Boulevard and Hunt Avenue.

Commercial land uses account for approximately 9.1% of the City's total land area. The commercial parcels within the City showed a wide range of demand characteristics. In order to more effectively allocate water system demands, commercial land use was separated into Commercial 1 and Commercial 2. Commercial 1 is categorized as users with a daily average consumption of approximately 1200 gallons. Commercial 2 is categorized as users with a daily average consumption of approximately 4500 gallons. These categorizations are based purely on demand characteristics for the purposes of this master plan.

Industrial land uses are concentrated in the northeastern, eastern and extreme western parts of the City. The southwestern industrial sites are currently occupied by warehousing and distribution sites. The northwestern industrial sites are currently occupied by a variety of industrial users, including light manufacturing and mineral processing sites.

In the ultimate land use scenario, 376 parcels totaling 160 acres change land use with respect to current land use. The 160 acre total represents 60 acres of vacant land that are developed to the ultimate allowable land use and 100 acres that are redeveloped from existing land use. The large areas of concentrated redevelopment include two areas of new schools in the eastern/southeastern areas of the City.



There are three major parks and a number of smaller parks located throughout the City. Athletic fields and picnic areas are available at both South Gate Park and Hollydale Park. The City owns and maintains a 9 hole, par-3 golf course, and a recreation center equipped with a swimming pool at the South Gate Park. In addition, there are ten elementary schools, two junior high schools and two senior high schools located in the City. There are playgrounds and recreation programs at the elementary schools and athletic fields are available for public use at the junior and senior high schools.

2.1.7 System Description

The system consists of one pressure zone with 50-70 pounds per square inch (PSI) being maintained at all times. The distribution system consists mostly of cement-lined cast iron piping, includes some asbestos-cement pipes, steel, polyvinylchloride pipe (PVC) and ductile iron piping in the system. There are about 20 dead-ends equipped with blow-off valves and the system is flushed as needed. The system has about 130 miles of main lines. About 24 miles of this consist of 4-inch unlined pipes and these are being gradually replaced by 6" ductile iron pipes. As part of an improvement project, the system has completed approximately 8 miles of piping replacement work already.

There are three booster pump stations in the system. One of them containing four booster pumps rated at 150 HP each, is located at Firestone Boulevard and I-710 Freeway adjacent to the Hawkins reservoirs. These booster pumps can provide 2,800 GPM each. They pressurize the water from the Hawkins Reservoir. Wells No. 24 and 25 are also located here. There is also a 750 kilowatt (kW) diesel generator for emergency power interruptions to operate these boosters. There is another booster pump station at the South Gate Park Reservoir site which has four vertical turbine pumps. These are rated at 150 HP each and can pump 2,200 GPM each and pump water from this reservoir into the distribution system. There is also a 1,000 kW generator for auxiliary/emergency power at this site.

The third booster pump station is located on Tweedy Boulevard between Well No. 26 (2541 Tweedy Boulevard) and Well No. 27 (2645 Tweedy Boulevard). This booster pump station is equipped with four variable speed vertical turbine pumps. These are capable of producing 2,500 GPM each and they pump water from the reservoir into the distribution system. There is also a 1,000 kW generator for auxiliary/emergency power at this site.

The City treats the water pumped from Wells No. 13, 14, 18, and 19 to meet the requirements of the State Department of Health Services. The water from Wells No. 13, 14, 18, and 19 is treated by a 5,000 gallons per minute (GPM) spray aeration facility inside the 4 million gallon (MG) underground reservoir located in South Gate Park. In the past, these wells contain tetrachloroethylene (PCE) and have exceeded the maximum contaminant level (MCL). This water is also chlorinated before being pumped into the system. The two chlorine injection points are located on the common well discharge header prior to the reservoir and on the booster pump discharge header downstream of the reservoir. The chlorine residual analyzer is located near the latter injection point.

There are two elevated tanks, four ground level tanks and one underground concrete tank. Storage facilities are made of steel except for the buried reservoir in the South Gate Park which is made of steel-reinforced concrete:

The elevated tanks on the distribution system are the Santa Fe Avenue (0.5 MG) and Salt Lake Avenue tanks (0.5 MG). Two ground-level steel tanks are located at Firestone Boulevard and the I-710 Freeway, referred to as the Hawkins Reservoirs and are rated at 2.5 MG each. There is also a pump station at this site which boosts the water from these tanks. All tanks were inspected and recoated in 2003. An additional two ground level tanks are located at Tweedy Boulevard between Well No. 26 and Well No. 27 and these are rated at 1.8 MG each. A booster pump station is located at this site which boosts the water from these tanks as well as auxiliary power supply in the event of an electrical power outage.¹

¹ 2005 City of South Gate Urban Water Management Plan



Figure 4: City of South Gate Water Service Area



Source: City of South Gate Water Master Plan, August 2005



3.0 System Demands

This section provides an overview of water usage in the City of South Gate. It includes an overview of the system demands as well as the past, current and projected usage numbers, including water sales to other agencies and unaccounted-for water system losses, for the City of South Gate through 2035.

Analysis of present water use determines the make-up of the City's current water users, and the magnitude of consumption by these users. From this analysis, water use by customer class can be determined. Historical and present water use, in conjunction with planning information, is the basis for projecting future water demand.

Water production for South Gate is equal to the groundwater withdrawn by City wells plus any imported water purchased from MWD and interconnections with adjacent cities. It is the total amount of water introduced into the distribution system. Water produced by City wells and MWD connections are recorded by meters located at each production facility. Water consumption reflects water consumed by City customers as recorded by customer water meters. The difference between water production and water consumption is represented by unaccounted-for water.

Water demand is projected water consumption but not necessarily available. During a period of adequate supply, the amount of water that is desired will be consumed. During a period of restricted water availability, such as a drought, water consumption may be less than desired water demand if mandatory water conservation measures are imposed because of drought conditions.

3.1 Demand Projection Development

The projections for growth within the City are based on multiple resources. For residential uses, the main component is basic population growth. An analysis of recent, current and project populations and the amount of water used by the residents establishes the majority of the projected demand. For the industrial and commercial customers, the growth is based on planned projects provided by City staff and reports. Most development however is in redevelopment areas as the City has been built out for many years.

For the business customers, the top 3 consumers had been consistent for many years until US Gypsum left in 2007. The two years prior to that, US Gypsum had averaged over 90,000 units (220 AF) per year. However, Koos Manufacturing and Saputo Cheese have remained the top two users totaling an average of 160,000 units (371 AF) over the last five years. Those two typically have roughly double the consumption of the next largest user and about 8 times the 10th largest user.

The large projects anticipated by the City include:

- Gateway Retail Center-600, 000SF commercial area – 30.5 AC
- South Gate Civic Center-118,000 SF
- Hon Property-Retail – 19.23 AC
- East Los Angeles Community College Extension-18.51 AC

As these projects are less than a 10% increase to the commercial and industrial uses within the City, we will assume a 1% rate per year in each sector throughout the study period of this report. Although it is possible that a large industrial user, as US Gypsum was, could return to the City, there is no planned development at this time.

Table 5 lists projection data provided to MWD by South Gate. The City has not used MWD water for several years and currently only anticipates using the connections for emergencies. Based upon Table 7, it does not appear that capacity above the 11,183 AF of adjudicated allotment for groundwater will be necessary. The City has not provided any projected demand to MWD.



Table 5: Demand Projections Provided to Wholesale Suppliers

Wholesaler	Contracted Volume	2010	2015	2020	2025	2030	2035
MWD	N/A	0	0	0	0	0	0
Total	N/A	0	0	0	0	0	0

3.2 Baselines and Target

The City currently uses very little recycled water that is well below 10%, therefore a 10-year base period is used.

The DWR Guidebook establishes the procedure for determining the targets. This is summarized in the flow chart shown as Figure 5. There are four approved methods for determining the target water use. The method used by the City of South Gate to determine its water use target was Method 3: Ninety-five percent of the applicable state hydrologic region target as stated in the State’s April 30, 2009, draft 20x2020 Water Conservation Plan. The City of South Gate is located in the South Coast Hydrological Region. Method 3 establishes this area target as 142 GPCD. The 10 year base period is 97 gpcd and well below 95% of the regional target of 142 gpcd. The confirmation process requires a 5 year base period calculation as well. Since the City is at 97 gpcd for that period also, it is less than 100 gpcd, the five-year base period is not required and no further reduction is required. With both base periods being 97, the interim target for 2015 remains at 97 gpcd as well.

The City of South Gate has developed its baseline target for the water service area individually and not part of a regional target. The water service area does not directly overlap the city boundaries and therefore were adjusted based on the 2000 Census tract maps. The population estimates for the baseline years for the analysis were developed utilizing Appendix A in the Methodologies for Calculating Baseline and Compliance Urban Per Capita Water Use Handbook. This method utilizes the 2000 Census data and calculates the person per single-family connection and per multifamily connection then projects the population out based on the connections throughout the selected base period.

In addition, although the City is compliant with the 20x2020 goals by having a usage rate under 100 gpcd, it is also a participant in the Gateway Authority IRMWP. This Regional Alliance will also plan to meet the 20x2020 goals as well.



Table 6: Base Daily Per Capita Water Use

Calendar Year	Population	Gross Water Use (AF)	Gross Water Use (GD)	Per Capita Water Use(GPCD)
1995	94746	9820	8767293	93
1996	94746	10226	9129336	96
1997	94746	10165	9074772	96
1998	94746	10332	9223806	97
1999	94746	11304	10091588	107
2000	90258	11239	10033666	111
2001	90258	10941	9767460	108
2002	90258	11797	10531486	117
2003	90258	10462	9340238	103
2004	91261	10582	9446947	104
2005	101340	10745	9592839	95
2006	92310	9997	8924675	97
2007	101501	10112	9027805	89
2008	100337	9809	8757232	87
2009	91146	9819	8765990	96
2010	102832	8402	7500483	73
10 year base period			2001-2010	97
5 year base period			2003-2007	97



Figure 5: Target Development Flow chart

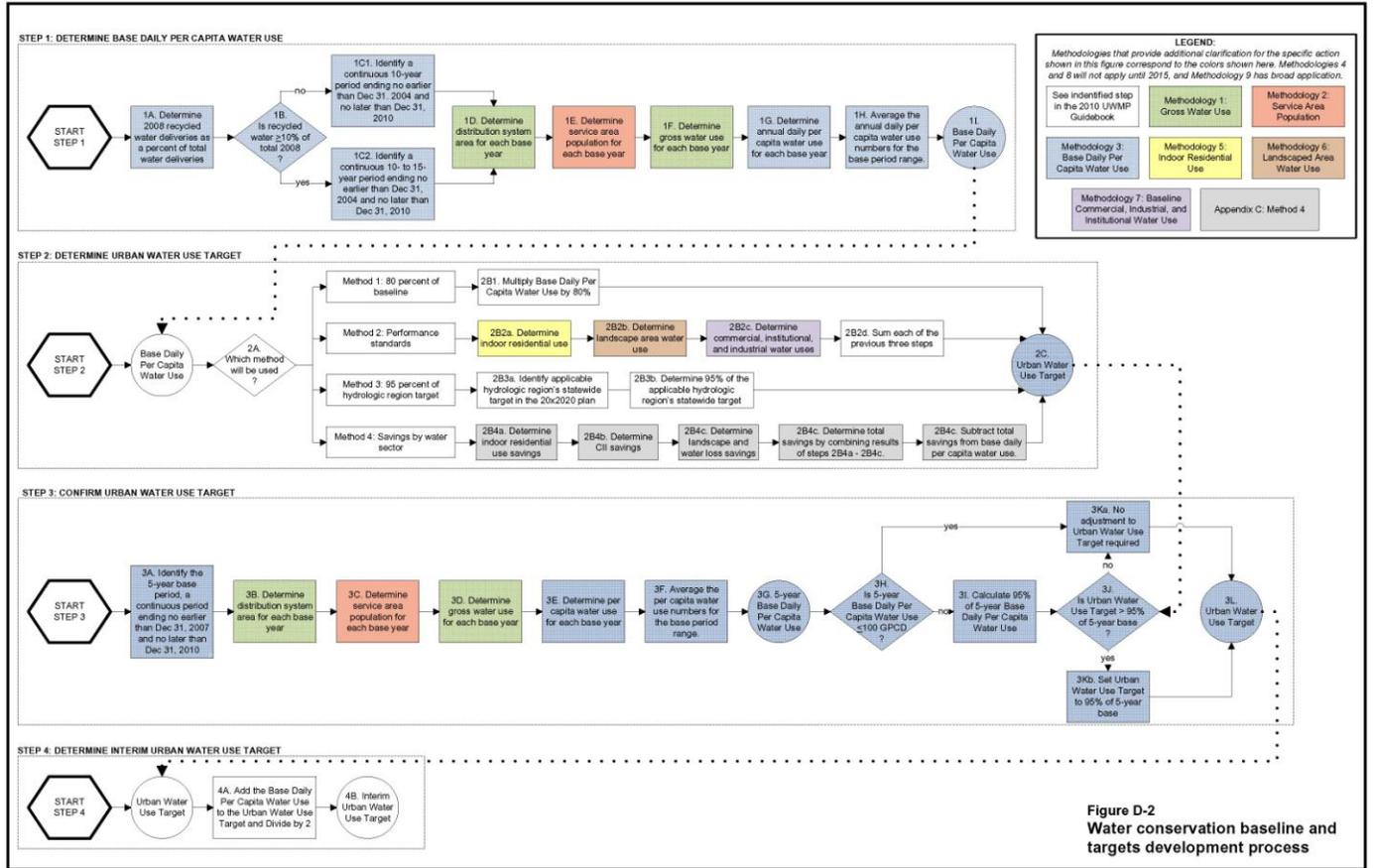


Figure D-2 Water conservation baseline and targets development process

Source: Guidebook to Assist Urban Water Suppliers to Prepare a 2010 Urban Water Management Plan, March 2011



3.3 Past, Current and Projected Water Deliveries by Sector

Industrial water consumption accounts for about 15 % of water used in South Gate. About 70% of all industrial water consumption is consumed by four of the City's top water users. These major industrial water users are: Saputo Cheese, Koo's Manufacturing, American Apparel and BGN Properties. There is some unoccupied industrial land that currently does not have any water demand, but it is anticipated vacant parcels may develop and water demand will increase with each development project.

Table 7 shows the projected water demands through 2035. The number of accounts for 2005 and 2010 are based upon accounts from the City finance department. The AFY total for 2005 and 2010 are based on actual production numbers as well. The 2015-2035 calculations are based upon the population growth rates and the average usage rates as calculated in the previous sections. For commercial and industrial, the projected growth is based upon planned projects as shown in Section 3.1

The City of South Gate delivered 8,402 acre-feet of water to 14,051 residential customers and 1,504 non-residential customers in Fiscal Year (FY) 2009-2010. This amount is much less than the city delivered in FY 2004-2005 (10,745 acre-feet to 13,847 residential customers and 1,491 non-residential customers).

Table 7 lists the past, current and projected water deliveries made by the City of South Gate from 2005 through 2035 in 5-year increments. The resulting water use data is separated by sector into the following categories: single-family and multi-family residential usage, commercial and industrial usage and other.

Demand at the South Gate Park varies from 108 to 432 GPM depending on the number of sprinkler heads that are on-line. The parks are watered at night and the demand does not impact daytime water distribution.

Table 7: Past, Current and Projected Water Deliveries

Water Use Sectors	2005		2010		2015	
	Accounts	AFY	Accounts	AFY	Accounts	AFY
Single-Family Residential	10,108	4,266	10,257	3,335	10,583	4,598
Multi-Family Residential	3,739	3,784	3,794	2,959	3,914	4,080
Commercial	1,388	1,010	1,402	789	1,474	1,088
Industrial	93	1,585	90	1,239	95	1,708
Other	10	100	12	78	13	108
Total	15,328	10,745	15,555	8,402	16,078	11,582

Water Use Sectors	2020		2025		2030		2035	
	Accts.	AFY	Accts.	AFY	Accts.	AFY	Accts.	AFY
Single-Family Residential	10,909	4,740	11,200	4,866	11,491	4,993	11,782	5,119
Multi-Family Residential	4,035	4,205	4,142	4,317	4,250	4,430	4,358	4,452
Commercial	1,549	1,122	1,628	1,152	1,711	1,181	1,798	1,211
Industrial	99	1,761	104	1,808	110	1,855	115	1,902
Other	14	111	15	114	16	117	17	120
Total	16,606	11,939	17,089	12,257	17,577	12,576	18,070	12,894



3.4 Sales to Other Agencies

The City of South Gate has interconnections with five agencies as shown in Table 8. The Golden State and Lynwood connections are operated automatically based upon pressure settings while the other 3 connections are operated manually. Each of these connections can be used to buy or sell water as needed by the two agencies.

As each of these connections are only utilized as needed or during a water emergency, it is not likely to be a large volume of sales comparatively. In 2010, there were no sales to other agencies and in 2009 only .19 AF was sold. But projecting forward, a small planned sale quantity needs to be anticipated.

Table 8 lists all City of South Gate current and projected sales to other agencies:

Table 8: Sales to Other Agencies

Water Distributed (AFY)	2010	2015	2020	2025	2030	2035
City of Downey	0	0.1	0.1	0.1	0.1	0.1
City of Lynwood	0	0.1	0.2	0.3	0.4	0.5
Walnut Park Mutual Water Company	0	0.1	0.1	0.1	0.1	0.1
City of Huntington Park	0	0.1	0.1	0.1	0.1	0.1
Golden State Water Company	0	0.1	0.2	0.3	0.4	0.5
Total	0	0.5	0.7	0.9	1.1	1.3

3.5 Low Income Housing Projection

The water use projections in Section 3.3 include water provided to low income housing units. The City does not have any specific projects planned for low income housing and they do not currently separate water accounts for low-income but based upon data provided from the Housing element, we can estimate the percentage of residences that are low-income. Lower income is based on 80% of median income of the County. In the 2000 Census, 52.1% of households were below this income level.¹ The ratios are expected to remain which allow us to project the water usage by using the rates as calculated in Table 6.

Table 9: Low-Income Projected Water Demands

Water Use (AFY)	2015	2020	2025	2030	2035
Single-Family Residential	1,793	1,848	1,897	1,947	1,996
Multi-family Residential	1,591	1,640	1,683	1,727	1,771
Total	3,384	3,488	3,580	3,674	7,230

¹ City of South Gate 2008-2014 Housing Element



3.6 Other Water Uses and Losses

The City of South Gate has the very unusual situation of having no losses. In effect they have a net gain within the system in most years. All systems have losses inherent to normal functions such as fire hydrant uses, leaks, theft, and under measurement by aging meters. Unaccounted for water system loss is typically calculated by subtracting metered water usage from the amount of water produced. It is believed that the net gain into the South Gate system is from a leak into the system from another connection. The City is working to determine the cause but have not been able to determine that as of yet. For the future projection, we assume that this anomaly will be found and a 2% system loss will occur.

Table 10 documents current and projected unaccounted-for system loss:

Table 10: Unaccounted-For Water System Loss

Water Use (AFY)	2005	2010	2015	2020	2025	2030	2035
Unaccounted-for System Losses	0	1	174	181	187	193	199
Total	0	1	174	181	187	193	199

3.7 Total Water Usage

The combined current and projected water usage, including sales and system losses, for the City of South Gate are given in Table 11:

Table 11: Total Water Use

Water Use (AFY)	2005	2010	2015	2020	2025	2030	2035
Total water deliveries (Table 7)	10,745	8,402	11,582	11,939	12,257	12,576	12,894
Sales to other Agencies (Table 8)	0	0	0.5	0.7	0.9	1.1	1.3
Unaccounted-for Water Losses (Table 10)	0	1	174	181	187	193	199
Total Water Usage	10,745	8,403	11,757	12,121	12,445	12,770	13,094

3.8 Water Use Reduction Plan

As detailed in Section 3.2, the current baselines and targets are all at 97 gpcd. Due to the water use being less than 100 gpcd, the City of South Gate is not required to do any water reduction at this time. However, the City will continue with current conservation measures and comply with the DMM's discussed further in Section 6.0.

The City is also a member of the Gateway Authority 20x2020 Regional Alliance which plans to meet the target goals from a regional perspective as well.



4.0 System Supplies

Groundwater is the major component of the City's water supply system. A secondary source, generally for emergencies, is from MWD connections and inter-connections with other water purveyors. Water generated by the groundwater wells is chlorinated and distributed to existing City customers or stored in elevated or ground-level (either buried or exposed on grade) reservoirs. Supply from the ground-level reservoirs is pressurized by booster pump stations into the distribution system.

The City of South Gate uses groundwater from the City wells as its primary source. Water generated from wells is chlorinated and distributed to City customers or stored in reservoirs. The total capacity of both active and stand-by wells is 32.97 million gallons per day (MGD), or 101.19 acre-feet per day. This represents a surplus over the City's average daily demand of 9.32 MGD, and the City's maximum daily demand of 16.78 MGD. Because the total capacity of these existing wells exceeds maximum daily demand, additional wells are not required. However, reservoir storage capacity needs to be improved and additional reservoirs or storage capacity needs to be developed.

In addition to its own sources, the City also has agreements to purchase water from other agencies including the Metropolitan Water District of Southern California (MWD), the City of Downey and the Golden State Water Company. These secondary sources are generally for emergencies only, and the City has not used purchased water during the last ten years. The City is allowed to pump 11,183 acre-feet per year, and has leased water rights of about 2,000 acre-feet per year to other agencies for many years. The City is working with other agencies to develop a "conjunctive use" program (water storage in the underground aquifer) and may be able to convert unused water to underground water storage. This plan requires cooperation with other water purveyors as well as court approval.

4.1 Groundwater

4.1.1 Metropolitan Water District and Central Basin

Central Basin relies on approximately 90,600 (AFY) of imported water from the Colorado River and California's State Water Project (SWP) to meet the District's retail and replenishment demands. MWD receives this supply from these two major water systems that supplies a majority of the Southern California region.

MWD was established to develop a supply from the Colorado River. Its first mission was to construct and operate the Colorado River Aqueduct (CRA), which can deliver roughly 1.2 million acre-feet (MAF) per year. Under its contract with the federal government, MWD has a basic entitlement of 550,000 AF per year of Colorado River water. MWD also holds a priority for an additional 662,000 AF per year.

SWP, MWD's second main source of imported water, is the nation's largest state-built water and power development and conveyance system. It includes facilities-pumping and power plants, reservoirs, lakes and storage tanks, and canals, tunnels and pipelines that capture, store and convey water from the Lake Oroville watershed in Northern California to 29 water agencies in Central and Southern California. Planned, designed, constructed and now operated and maintained by the California Department of Water Resources (DWR), this unique facility provides water supplies for 23 million Californians and for 755,000 acres of irrigated farmland.



The original State Water Contract called for an ultimate delivery capacity of 4.2 MAF, with MWD holding a contract for 1.9 MAF. More than two-thirds of California's drinking water, including all of the water supplied by the SWP, passes through the San Francisco- San Joaquin Bay-Delta (Bay-Delta). For decades, the Bay-Delta system has experienced water quality and supply reliability challenges and conflicts due to variable hydrology and environmental standards that limit pumping operations. In 1999, MWD's Board of Directors set new goals for the SWP with the adoption of its CALFED Policy Principles. These goals committed MWD to water quality objectives, the development of 0.65 MAF minimum dry-year supply from the SWP by 2020 and average annual deliveries of 1.5 MAF (excluding transfers and storage programs along the SWP). To achieve these goals while minimizing impacts to the Bay-Delta ecosystem, MWD would maximize deliveries to storage programs during wetter years, implement a number of source water qualities and supply reliability improvements in the Delta, remove operational conflicts with the Central Valley Project (CVP) and better coordinate planning and operations between the SWP and CVP.

MWD offers different types of imported water to its member agencies depending on the ultimate use. Among them, Central Basin has delivered Non-Interruptible Water (treated full-service), Seasonal Treated Replenishment Water and Seasonal Untreated Replenishment Water. Non-Interruptible Water is the treated firm supply that is available all year round. Central Basin delivers an average of 63,000 AFY of non-interruptible water annually. It is used as the main supplemental supply of cities and water agencies and has historically been used as the main supply for the Alamitos Barrier; however, the City of Long Beach now provides water for that barrier. Seasonal Treated Replenishment Water, also known as the "In-Lieu" water, is delivered to customer agencies that are eligible to offset groundwater production with imported water.

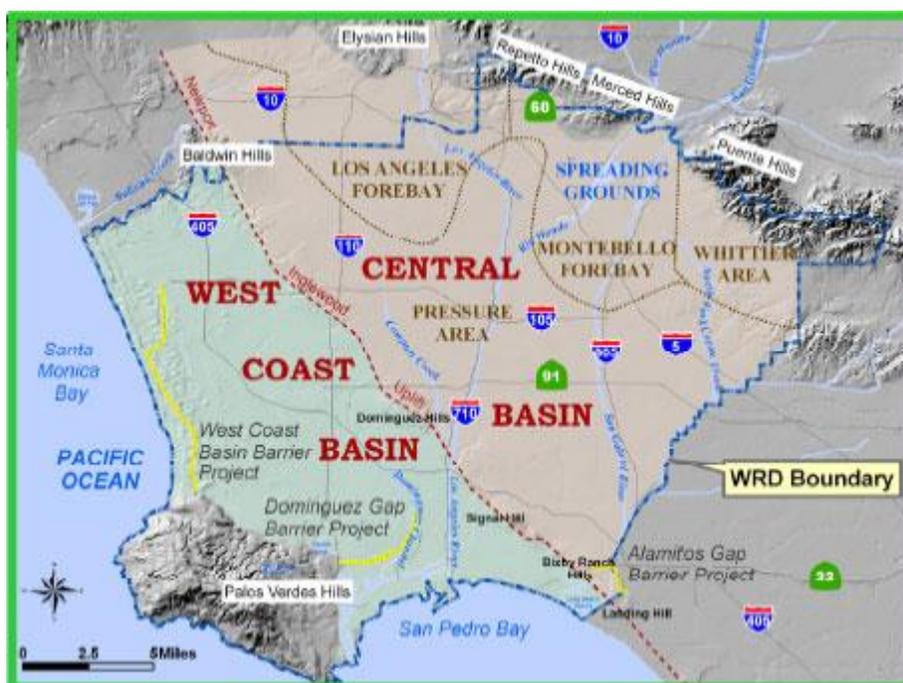
This program incentivizes customer agencies to take imported surplus water which indirectly replenishes the groundwater basin. This surplus water is purchased at a discount rate in exchange for leaving groundwater in the basin for no less than a year so that it can be used subsequently during dry years. Seasonal Untreated Replenishment Water, better known as "Spreading" water, is delivered to the replenishment spreading grounds in the Montebello Forebay. Spreading water does not require treatment and is generally provided during the seasonal months (October through April), which allows for it to be purchased at a discounted rate. Water Replenishment District of Southern California (WRD) is the sole purchaser of spreading water, and the amount varies year to year depending on replenishment needs of the Basin, with the long term average being approximately 27,600 acre-feet per year. Groundwater has for many years been the primary supply of water within Central Basin's service area. In fact, it was the sole source of water supply until the Central Groundwater Basin (Basin) was overdrafted in the late 1940s. Today, the average customer agency in Central Basin relies on groundwater production for 62% of its water supply, although there still remain a few agencies in the District's service area that rely exclusively on groundwater to meet all current water needs.

Ultimately, the extensive overpumping of the Basin through the years led to critically low groundwater levels. This overpumping of the Basin resulted in a legal judgment, or adjudication, that limited the allowable extraction that could occur in any given year and assigned water rights to basin pumpers. The adjudicated water rights were greater than the Basin yield; therefore, the Basin was operating with an annual overdraft. In order to address this overdraft, imported and recycled water sources and a means to purchase these sources were required.

The following graphic shows the location of the Central Basin



Figure 6: Central Basin Area



Source: Water Replenishment District of Southern California's: <http://www.wrd.org/engineering/groundwater-replenishment-spreading-grounds.php>

4.1.2 Water Replenishment District of Southern California (WRD)

The groundwater producers (pumpers) in the area, which are members of the Central Basin Water Association, led the creation of the WRD, which manages the replenishment of the groundwater basin. In 1959, the State Legislature enacted the Water Replenishment Act, enabling the water associations for the Basin to secure voter approval for the formation of the “Central and West Basin Water Replenishment District” (now referred to as the Water Replenishment District of Southern California or “WRD”) to be the permanent agency in charge of replenishing the Basin. The State Legislature has vested in WRD the statutory responsibility to manage, regulate, replenish and protect the quality of the groundwater supplies within its boundaries for the beneficial use of the approximately 3.5 million residents and water users who rely upon those groundwater resources to satisfy all or a portion of their beneficial water needs. Although the water rights have been bought, sold, exchanged or transferred through the years, the total amount of allowable extraction rights within the entire groundwater basin has remained virtually the same. The adjudicated pumping rights available within Central Basin's service area totaled 163,960 AF. However, not all of these water right holders are water retail agencies. Many of these holders are nurseries, businesses, cemeteries and private entities that make up approximately 23% (37,287 AF) of the total water rights.

For the past 42 years, WRD has replenished the Basin through “Spreading Grounds” and prevented further seawater intrusion by injecting recycled and imported water into the Alamitos Barrier, which were created by the Los Angeles County Flood Control District (LACFCD) and owned and operated by the Los Angeles County Department of Public Works. WRD assesses a groundwater production fee, known as their “Replenishment Assessment,” to pumpers in the Basin. This assessment provides funds that WRD uses to purchase and produce water for both spreading and injection to replace groundwater pumped as well as hydrological barriers to seawater intrusion.¹

¹ Central Basin Municipal Water District 2010 Urban Water Management Plan



4.1.3 Groundwater Well Facilities

The City's allocated pumping rights from Central Basin are shown in Appendix F and Appendix G. The original 1965 adjudication was allocated as 7,954 AF and an additional 3,229 AF were via succession from other water right holders. The 11,183 AF is the current adjudication. The City often leases a portion of these rights to other water uses in the Basin with 2,500 AF leased to Golden State Water Company in 2010.

Currently, eight (8) of the City's twelve (12) wells are active. The active wells are Nos. 13, 14, 18, 19, 24, 25, 26, and 27. The active wells have a combined rated/tested capacity of about 18,700 gallons per minute (gpm), or 26.9 million gallons per day (mgd). All eight active wells discharge into existing storage reservoirs.

The City is in the process of equipping Well No. 28, which was drilled within the City property at Ardmore Avenue (previous location of Well No. 2) in 2003. Well No. 28 has been pump tested and is anticipated to produce a supply of 2,500 gpm. Unlike all other active City wells which discharge to storage reservoirs, Well No. 28 will discharge straight into the distribution system using onsite chlorination.

The following are general descriptions of the twelve existing wells within the City of South Gate:

Well No. 7 (Inactive): Well No. 7 was drilled in 1935, and is located north of Firestone Boulevard and east of Atlantic Avenue. The well is 883 feet deep and has a 16-inch diameter casing. The well suffers from trichloroethylene (TCE) contamination and was previously equipped with a wellhead treatment system consisting of granular activated carbon filtration, followed by disinfection with sodium hypochlorite. The well has been inactivated due to continuous contamination.

Well No. 13: Well No. 13 was drilled in 1940 and is located in South Gate Park. The well is 810 feet deep and has 16- inch diameter casing. The well pump is a constant speed Byron Jackson seven-stage vertical turbine pump. The well was last tested by SCE in June of 2000. The well's overall efficiency was found to be 38 percent with a specific capacity of 118 gpm/ft and specific energy consumption of 351 kWh/ac-ft. The pump has a tested capacity of 2133 gpm. Well No. 13 discharges into the South Gate Park Reservoir. Chlorinated solvents including TCE and perchloroethylene (PCE) have been detected in this well. Spray aeration in the South Gate Park Reservoir is used to remove these contaminants from the water. This well has also experienced some higher manganese concentration. A project to include manganese filtration is expected in the future.

Well No. 14: Well No. 14 was drilled in 1944 and is located in South Gate Park. The well is 813 feet deep and has an 18- inch diameter casing. The well pump is a constant-speed Layne and Bowler four-stage vertical turbine pump. The well was last tested by SCE in April of 2000. The well had an overall efficiency rating of 53 percent. The well's specific energy consumption is 302 kWh/AF and specific capacity is 129 gpm/ft. The pump has a tested capacity of 3233 gpm. Well No. 14 discharges into the South Gate Park Reservoir.

Well No. 18: Well No. 18 was drilled in 1945 and is located in South Gate Park. The well is 792 feet deep and has an 18- inch diameter casing. The well pump is a constant speed Aurora vertical turbine pump. The well was last tested by SCE in May of 2001. The well had an overall efficiency rating of 73 percent. The well's specific energy consumption is 214 kWh/AF and specific capacity is 56 gpm/ft. The pump has a tested capacity of 1500 gpm. Well No. 18 discharges to South Gate Park Reservoir.

Well No. 19: Well No. 19 was drilled in 1947 and is located in South Gate Park. The well is 794 feet deep and has an 18- inch diameter casing. The well pump, a constant speed Layne and Bowler six-stage vertical turbine pump, was installed in 1984. The well was last tested by SCE in May 2001. The well had an overall efficiency rating of 66 percent. The well's specific energy consumption is 289 kWh/AF and specific capacity is 88 gpm/ft. The pump has a tested capacity of 3065 gpm. Well No. 19 discharges to South Gate Park Reservoir.



Well No. 22B (Inactive): Well No. 22B was drilled in 1948 and is located east of Garfield Avenue and south of Southern Avenue. The well is 578 feet deep and has a 16-inch diameter casing. The well has been inactive since the fall of 1985 due to PCE contamination, and consistent reliability problems. The well has experimental Ultraviolet/Ozone treatment equipment for disinfection. However, the city plans to remove the equipment and install aeration or Granular Activated Carbon (GAC) filtration equipment for treatment.

Well No. 23 (Standby): Well No. 23 was drilled in 1952 and is located at the Salt Lake Reservoir site, just west of the Los Angeles River and south of Southern Avenue. The well is 856 feet deep and has an 18-inch diameter casing. The well has suffered from periodic sand production problems, as well as manganese contamination. However, basic water quality at this well has been consistently good. The well is currently not equipped with disinfection facilities. Because of its inherent sanding problems, the well has remained inactive. However, it remains in a standby mode. The well was last tested in April of 2000, and was found to have a capacity of 622 gpm.

Well No. 24: Well No. 24 was drilled in 1985 and is located at the Hawkins Reservoir site. The well is 1,290 feet deep and has a 16-inch and 20-inch diameter casing. The well site is equipped with sodium hypochlorite disinfection facilities. The well pump, a constant-speed Aurora three-stage vertical turbine pump, was installed in 1985. The well was last tested by SCE in June of 2000. The well's overall efficiency was 64 percent. The well has a specific energy consumption of 245 kWh/AF and specific capacity at 112 gpm/ft. The pump has a tested capacity of 1500 gpm.

Well No. 25: Well No. 25 was drilled in 1985 and is located at the Hawkins Reservoir site. The well is 1,331 feet deep and has a 16-inch and 20-inch casing. Water quality has generally been good. The well site is equipped with sodium hypochlorite disinfection facilities. The well pump, a constant-speed Aurora three-stage vertical turbine pump, was installed in 1985. The well was last tested by SCE in June of 2000. The well's overall efficiency was 64 percent. The well has a specific energy consumption of 245 kWh/AF and specific capacity at 112 gpm/ft. The pump has a tested capacity of 3080 gpm. In recent years, a portion of the casing collapsed and this has resulted in lower production.

Well No. 26: Well No. 26 was drilled in 1987 and is located just north of Tweedy Boulevard, west of Long Beach Boulevard. The well is 1,226 feet deep and has a 16-inch and 18-inch diameter casing. Water quality has generally been good. The well site is equipped with sodium hypochlorite disinfection facilities. The well pump, a Floway five-stage vertical turbine pump, is powered by a natural gas engine with a variable speed drive. The well has not been tested by SCE. Installation tests indicate that the pump can move 2710 gpm at 224 feet of head at 83% efficiency.

Well No. 27: Well No. 27 was drilled in 1989 and is located approximately one block east of Well No. 26 to the north of Tweedy Boulevard. Well No. 27 is 1,200 feet deep and has a 16-inch and 18-inch diameter casing. Water quality has generally been good, but recent tests indicate that manganese contamination is a developing problem. The well site is equipped with sodium hypochlorite disinfection facilities. The current well pump, a constant-speed Ingersoll-Rand four-stage vertical turbine pump, was installed in 1992. Installation tests on the pump indicate that the pump can move 1500 gpm at 240 feet of head at a maximum efficiency of 85%.

Well No. 28: Well No. 28 was drilled in 2003 and is the City's newest well. The well was drilled in the same site as the recently demolished Well No. 2, which is on Ardmore Avenue, a few hundred feet west of Virginia Avenue. Well No. 28 is 1095 feet deep and has a 16-inch and 18-inch diameter casing. Based on the hydrogeological report prepared after the well drilling, the well will be able to produce 2,500 gpm. The aquifer testing resulted in an overall specific well capacity of 58.9 gpm/ft with a transmissivity value of 129,700 gpd/ft. Water quality in the well was tested to be in conformance to State Health Department requirements, and no treatment except disinfection is required.

The following graphic shows the location of the City wells throughout the service area.



Currently, the City has greater available supply from its groundwater wells than the demands. But based upon the future projections as shown in Table 11, MWD supplies will be necessary. The following table projects that the City will utilize its full adjudicated rights from groundwater well production and supplement with MWD for the remainder.

Table 12: Current and Planned Water Supplies

Water Supply Source (AFY)	2005	2010	2015	2020	2025	2030	2035
MWD	0	0	399	756	1,074	1,393	1,711
Well Production	10,745	8,403	11,183	11,183	11,183	11,183	11,183
Totals	10,745	8,403	11,582	11,939	12,257	12,576	12,894

4.2 Sources of Water Supply

4.2.1 Metropolitan Water District (MWD) Connections

The City has two connections to the MWD pipeline system. Connection CB-7 is located at Southern Avenue and State Street, and CB-11 is located at Southern Avenue and Kauffman Avenue. Each connection consists of a 16-inch outlet from MWD’s Middle Cross Feeder. The outlets branch into two 10-inch parallel lines, each having a 10-inch combination rate-of-flow, pressure-reducing and check valves.

Each connection has a rated capacity of 15 cfs (9.7 mgd), but the required pressure-reduction settings restrict actual capacity for CB-7 and CB-11 to 4.25 cfs (2.75 mgd) and 2.9 cfs (1.9 mgd), respectively. Prior to 1989, the City used MWD water to supplement well production during the peak summertime months. The MWD connections have not been used since 1989, but remain available for emergency or future use.

4.2.2 Inter-Agency connections

The City of South Gate has five interconnections to adjacent water systems. These interconnections are with the City of Downey, the City of Lynwood, the Walnut Park Mutual Water Company, the City of Huntington Park, and the Golden State Water Company (GSWC). Each is a two way connection, allowing water transfers to or from the City of South Gate, depending upon the given emergency situation and the relative pressures on each side of the inter-connections.

The interconnection with the City of Lynwood is an automatic connection. It is set to operate such that if local pressure in one of the two systems drops below 20 psi and there is a significant pressure differential between the two systems, the interconnection will open. Water will then flow from the system with higher pressure to the system with lower pressure. The connection to Golden State Water Company is automatic as well, set to open at 40 psi. The other connections are operated manually.

Although these connections all have two-way ability, the City of South Gate is the more frequent seller. The City currently has sufficient pumping rights and system to supply their residents and sell water to the neighboring agencies. But each of these connections provides the essential backup systems in case of emergencies or other system water supply deficits.

4.2.3 Local Groundwater

All local groundwater is pumped from Central Basin. The well facilities are described in more detail in Section 4.1.3.



Central Basin joined MWD in 1954 to purchase, on a wholesale level, potable water imported from the Colorado River and then sell it to the local municipalities, investor-owned and mutual water companies and water districts. Central Basin remains one of the largest member agencies of MWD's wholesalers with a population of about 1.6 million to 2 million.

Central Basin's service area covers approximately 227 square miles and includes 24 cities and several unincorporated areas in southeast Los Angeles County. In 2009-2010, the total water demand in Central Basin's service area was 257,492 AF. Central Basin projects that although population will increase, total demand will remain level due to increased recycled water use and consumption.¹

4.2.4 Local Surface Water

The City of South Gate does not draw on any local surface water sources for drinking water purposes, and has no plans to do so in the future

4.3 Threats to Water Supply

Certain potential threats to the City of South Gate's water supply must be monitored closely in order to detect and mitigate future impacts to the availability and sufficiency of the city's water supply. These threats include future extended droughts, legal issues, water quality and environmental concerns. A matrix of these threats to the city's current and future water sources are listed in Table 13:

Table 13: Factors Resulting in Inconsistency of Supply

Name of Water Source	Climactic	Legal	Water Quality	Environmental
Groundwater Wells	N/A	Adjudication	Salt Water Infiltration; Iron, Manganese, contamination	N/A
MWD	Drought	Allocation	N/A	Endangered Species

4.3.1 Climactic

The major potential supply impact would be a prolonged drought. However, due to the City's supply sources and use, this impact is minimal. As the City owns adjudicated rights that do not fluctuate with Basin levels there is no climate impact.

For MWD, drought conditions could have some impact. MWD has multiple sources, programs, and plans to address extended drought conditions so the impact to South Gate is minimal. MWD's plans are detailed further in their 2010 RUWMP. The City currently only uses their MWD connections in times of emergency and future projections have MWD supplies as a small percentage of the total.

4.3.2 Legal

Allocation

MWD determines an overall allotment to agencies within the Central Basin. South Gate does not have a set allotment but shares with the surrounding agencies. South Gate currently does not use MWD and projects to use only a small percentage of its needs, a reduction of overall allotments are not a significant impact.

¹ Central Basin Municipal Water District Draft 2010 Urban Water Management Plan



Adjudication

The City currently has adjudicated water rights in the Central Basin as shown in Appendix F and Appendix G. It is highly unlikely that these rights could be altered. But if there was a legal judgment that reduced these rights, it would be a great impact to South Gate.

4.3.3 Water Quality

The City of South Gate publishes an annual Consumer Confidence Report (CCR). The most recently published CCR that was provided, shows that there were no average results higher than a primary or secondary MCL. There were a few tests that were above a secondary MCL with the most notable being manganese.¹ As mentioned in previous sections, the City is aware of the manganese issue at several wells and both controls it with mixing and plans treatment projects in the future.

Iron and manganese are common metallic elements found in the earth's crust which are chemically similar and cause similar problems. When exposed to air, iron and manganese sediments are oxidized and change from colorless, dissolved forms to colored, solid forms. Excessive amounts of these sediments are responsible for staining, and may even plug water pipes. Iron and manganese can also affect the flavor and color of food and water. Finally, nonpathogenic bacteria that feed on iron and manganese in water form slime in toilet tanks and can clog water systems.

CBMWD manages water quality in the basin as a whole. Any contaminants that could become problematic would be handled by CBMWD. Although there are no major contaminant issues, basin wide contaminant plumes have impacted other basins in Southern California and other parts of the United States. A large unmitigated plume that affected many of South Gate's wells is unlikely, but would be a huge impact if it occurred. A small plume could be mitigated as the City has a surplus of well facilities.

The wholesale imported water is managed by MWD and they would handle any water quality issues that would arise. MWD has multiple sources of water including the California Water Project and the Colorado River Aqueduct. With multiple storage locations and treatment facilities, it is also unlikely that MWD would have significant water quality issues that would impact delivery.

4.3.4 Environmental

Although there are not significant environmental issues at this time, these can change in the future. With the majority of South Gate's supply coming from groundwater, this would be a minor impact. But it is possible for MWD to be impacted by environmental issues and endangered species are the most likely of those.

Endangered Species

The most specific potential impact to MWD's supply would be threatened or endangered fish in the Delta which could impact the SWP supply. These impacts are discussed in MWD's RUWMP. But with the multiple supplies of MWD and a small percentage of use of these facilities by South Gate, this is a not a significant concern.

4.4 Planned Water Supply Projects and Programs

The City of South Gate and its wholesale supplier, MWD, have planned water supply projects. Although all demands are being met, these projects will provide further security for supply shortages in the future. Also discussed below are opportunities to augment the city's water supply through transfers and exchanges, and desalination.

¹ City of South Gate Water Division 2008 Consumer Confidence Report



4.4.1 MWD and CBWMD Water Supply Improvement Projects

MWD's RUWMP lists many future water supply projects. None of those projects are within the Central Basin MWD but it can be expected that they would improve the overall reliability of MWD.

The Central Basin plans one significant water storage program. CBWMD is developing a Conjunctive Use Storage Program that it will define in 2011 and roll out the program in 2012.¹

4.4.2 City of South Gate Water Supply Projects

Potential plans for new sources are being considered at this time and will be addressed in the new Master Planning and Management Program. The City is working closely with the Central Basin Municipal Water District and the Water Replenishment District to consider expanded use of underground storage of water in the aquifer. This is referred to as "Conjunctive Use" and would benefit the City of South Gate. Conjunctive Use refers to the idea of storing water underground when it is plentiful, to be extracted during shortages.

Also, the City may consider the use of ultraviolet light and ozone to treat the Well No. 22-B water, so that it may be used as an active source. However, the City would need to prepare a demonstration study to show that the proposed treatment would reliably and consistently produce water of acceptable quality, before such treatment may be approved by the State Department of Health Services.

Because the City currently has excess supply compared to the current and projected water demands and multiple wells that are able to pump the current water rights, there is not a great need for new water supply projects. However, one potential project would be to provide manganese treatments on the two wells that have high manganese levels. This would provide additional system flexibility should another well be shut down.

Table 14 lists the future water supply projects for the City of South Gate water supply, including their projected start dates and completion dates and the amount of water each project will yield to the city during a normal year, single dry year and multiple dry-year periods:

Table 14: Future Water Supply Projects and Programs

Project Name	Projected Start Date	Projected Completion Date	Annual Yields (AFY)				
			Normal Year	Single Dry Year	Multiple Dry Year 1	Multiple Dry Year 2	Multiple Dry Year 3
Manganese Filtration for Wells 13 and 27	2012	2014	1400	1400	1400	1400	1400

4.4.3 Transfer or Exchange Opportunities

The City of South Gate has interconnections with other water agencies as described in section 4.2.2. The City also currently leases between 1500 to 2500 AFY to other agencies. Based on the previously discussed demands, the City will need to discontinue the water leases within the next 5 years of the projections withheld. If the City can lease additional water from other agencies once the demand exceeds the 11,183 AFY rights, they could avoid the higher cost MWD water.

¹ Central Basin Municipal Water District 2010 Draft Urban Water Management Plan



4.4.4 Desalination Opportunities

The act of changing seawater into potable or fresh drinking water is called desalination. As the demand and competition for water in California increases and traditional ways of increasing water supply (construction of dams, aqueducts and pipelines) becomes less publicly acceptable, alternative ways of developing new water sources are being looked at. In 2004 the California Congress passes legislation requiring urban water suppliers to consider desalination opportunities in their Urban Water Management Plans.

The City of South Gate is not a coastal city and therefore it would be very difficult to establish any desalination project. In the future, regional agencies including MWD and CBMWD may develop desalination supplies. But it is expected that future desalination supplies would be utilized by coastal areas. That would allow inland areas to utilize a greater proportion of the current water supplies including groundwater and imported water. CBMWD is not planning any desalination projects. MWD does have several planned but they are all along the coastal areas.

4.4.5 Recycled Water Opportunities

The City does not own or operate any water recycling facilities. The City is a member agency with the Sanitation Districts of Los Angeles County. The Sanitation Districts construct, operate, and maintain facilities to collect, treat, recycle, and dispose of residential, commercial, and industrial wastewater. Individual districts operate and maintain their own portions of the collection system. The City of South Gate is responsible for the collection of wastewater through local sewers.

The Sanitation District treats sewer water to produce recycled water. The water is treated to drinking water standards and allowed to percolate into aquifers or be used to irrigate golf courses,

landscaped medians and other greenbelt areas, or be used in industrial processes. The City is using recycled water to offset use of potable water from the aquifer. Recycled water is purchased from the CBMWD and the City uses some of that in two City parks, Hollydale Park and Circle Park. The recycled water line on Atlantic Avenue has enough capacity to provide for most of the industrial uses in that area, but the potential customers have not been motivated to use this resource so far. The City offers a 15% discount from the cost of potable water for recycled water deliveries.

MWD has many recycled water programs. Within the CBMWD, there are four projects planned that will ultimately utilize approximately 65,000 AFY of recycled water¹. CBMWD's current recycling effort produces more recycled water than the City of South Gate could use. The capital cost of the adding the recycled infrastructure does prevent expanded use at this time. The CBMWD UWMP Section 8 describes their current and proposed recycled water supplies.

Table 15 shows the recycled water used the City has delivered over the last ten years.

Table 15: Recycled Water Use 2001-2010

Water Supply Source (AFY)	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010
Recycled Water	164	191	162	177	213	153	176	210	127	113

¹ Metropolitan Water District of Southern California Regional Urban Water Management Plan, November 2010, Table A.5-2



5.0 Water Supply Reliability and Water Shortage Contingency Planning

Water supply reliability is a measure of the City of South Gate's ability to provide an adequate water supply during times of shortage. Reliability focuses mostly on drought, though it must take into consideration other potential threats to the water supply, such as those discussed in Section 4.3. To counter these threats, Section 4.4 lists the projects and programs planned or already being implemented which will address the most serious threats to maintaining a consistent supply. With the addition of the city's conservation potential discussed in Section 5.5, the City should most likely be able to handle any drought.

There have not been any major water shortage problems in the City. The City of South Gate has been making system improvements and is positioning the enterprise to be a first class water utility. The City's own groundwater facilities have been sufficient to provide for its water needs during the last fifteen years. A worst case scenario would be loss of production at key water well facilities. In that case, the City will rely on purchased water, which can provide for essential needs. The City has standby wells which can be a significant source of supply. The City monitors growth in residential, commercial, and industrial developments requiring estimates of water usage to calculate increases in water demand. The City encourages use of recycled water and water conservation measures.

Worst case water shortages can be managed. Unless there is a significant water quality problem in the whole system, it is unlikely the City will need to import potable water.

As previously explained, the City relies on its groundwater sources and its interconnections with other utilities. If an emergency occurs only within the City, the interconnected supplies can be of help. However, in case of an area wide problem, the City may be fully dependent on its own groundwater sources. Fortunately, the City's groundwater is sufficient to provide for the necessities of the residents.

Overall, the City of South Gate has a very reliable water supply, as this section demonstrates. Combining MWD's supply assurance with data from Section 3.7 on the city's total projected water demand, this chapter will lay out three climatic scenarios—an average water year, a single dry water year, and multiple dry water years—for the city's water supply in the next 25 years.

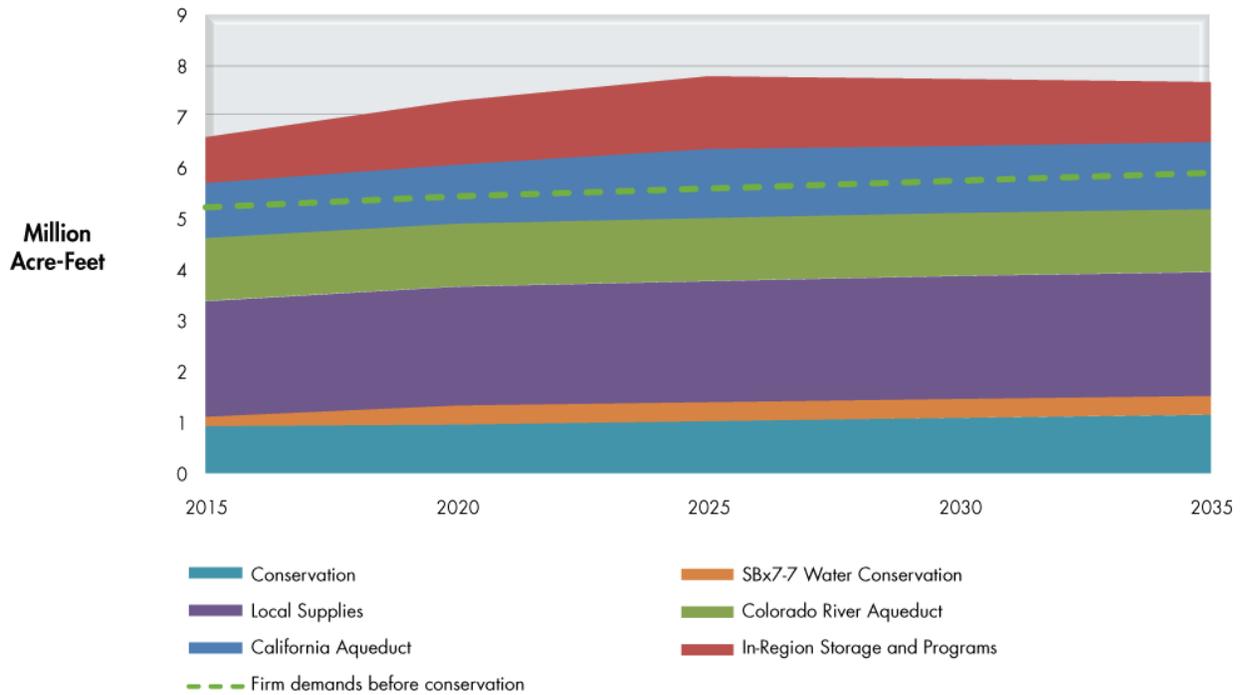
5.1 MWD Supply Assurance

Metropolitan Water District (MWD) supplies wholesale water throughout Southern California. Although the City of South Gate is not a member-agency, the Central Basin MWD is a member agency. South Gate has two connections with MWD. The City has typically only needed these connections during emergency operations.

MWD has numerous sources of supply which enables them to provide assurance to their member agencies and retailers regarding the supply. The Regional Urban Water Management plan prepared in November 2010 by MWD provides the necessary details of MWD's plans. The following figure shows the excess supply over demand as projected by MWD.



Figure 8: MWD Dry Year Supplies and Demand



Source: Metropolitan Water District of Southern California Regional Urban Water Management Plan, November 2010

5.2 Water Supply Reliability

Section 4.2 described the sources of water for the City of South Gate. These sources have very high reliability as there are multiple wells for the groundwater source and two connections with MWD.

The City's supply and particularly their adjudicated groundwater rights are greater than the current demands as detailed in the previous sections. However, it is projected that those demands will increase and MWD water will become necessary. MWD has supply assurances as well and it appears the City will be able to meet the projected demand during normal conditions for the next 25 years.

5.3 Water Quality

With the City's mostly exclusive use of groundwater, there are few water quality problems. There have been some instances of water quality problems, primarily with manganese as discussed in Section 4.1.3, but with multiple well options these have been controllable. Barring a future unforeseen and new problem, there does not appear to be a high concern for water quality issues that would impact the supply reliability.

5.4 Drought Planning

The following tables give the City of South Gate's current and future water supply reliability scenarios for both normal year, single dry year and multiple dry year periods. However, the City of South Gate does not utilize any surface water sources and all of its sources (groundwater pumping and purchased MWD water) are consistent regardless of the runoff.



For each of the following near-term and projected single and multiple dry water year scenarios, the calculated water reliability deficit is compared with potential new supplies from 1) additional water supply sources discussed in Section 4.4, 2) the city's projected conservation potential, and 3) potential recycled water supplies. (*Potential additional supplies are listed in italics.*)

Table 16: Supply Reliability-historic conditions

Current Supplies (AFY)	Normal Water Year	Single Dry Water Year	Multiple Dry Water Years		
			Year 1	Year 2	Year 3
MWD	Ready	Ready	Ready	Ready	Ready
% of Normal	N/A	N/A	N/A	N/A	N/A
Groundwater	11, 183	11, 183	11, 183	11, 183	11, 183
% of Normal	100%	100%	100%	100%	100%
Compared to Normal Year +(-)	0	0	0	0	0

Table 17 puts together the consistent water supply for the City of South Gate during normal years with the city's demand projections 25 years into the future. The following charts include the groundwater supply and the MWD component as that is sufficient for all demands. There is not an allocation limit on the MWD sources, but there are financial considerations if it is needed. For the purpose of this table, the MWD is shown to meet the total demand need. But there is more supply available if the demand increases further:

Table 17: Projected Normal Water Supply and Demand Comparison

	2015	2020	2025	2030	2035
Supply totals (AFY)	11,582	11,939	12,257	12,576	12,894
Demand totals (AFY)	11,582	11,939	12,257	12,576	12,894
Difference (AFY)	0	0	0	0	0
Difference as % of Supply	0%	0%	0%	0%	0%
Difference as % of Demand	0%	0%	0%	0%	0%

Table 18 gives the city's single dry year water supply reliability scenario for the years 2015, 2020, 2025, 2030, and 2035:

Table 18: Future Water Supply Reliability – Single Dry Water Year

Projected Supply and Demand Comparison During Single Dry Years (AFY)					
Current Supplies / <i>Potential Additional Supplies</i>	2015	2020	2025	2030	2035
Supply totals	11,582	11,939	12,257	12,576	12,894
Demand totals	11,582	11,939	12,257	12,576	12,894
Surplus or (Shortfall)	0	0	0	0	0
Difference as % of Supply	0%	0%	0%	0%	0%
Difference as % of Demand	0%	0%	0%	0%	0%

Table 19 is a compound table that gives the city's multiple dry year water supply reliability scenarios for the three year periods ending in years 2015 through 2035, displayed in five-year increments:



Table 19: Future Water Supply Reliability – Multiple Dry Water Years

Projected Supply and Demand Comparison During Multiple Dry Year Period Ending in year shown (AFY)					
Current Supplies / Potential Additional Supplies	2015	2020	2025	2030	2035
Supply totals	11,582	11,939	12,257	12,576	12,894
Demand totals	11,582	11,939	12,257	12,576	12,894
Surplus or (Shortfall)	0	0	0	0	0
Difference as % of Supply	0%	0%	0%	0%	0%
Difference as % of Demand	0%	0%	0%	0%	0%

With the city’s consistent supply that is not based on water runoff or drought conditions, the surplus above demand also remains consistent. Although the tables above show zero surplus or shortgall, the supply is not limited due to the availability of MWD water although it would be more costly. Therefore there are no scenarios prior to 2035 that would result in a supply shortage based upon dry year conditions.

5.5 Water Shortage Contingency Plan

The City of South Gate has adopted ordinances to respond to water shortage. The City is also a participant in the Member Agency Response System (MARS), which was developed by the Metropolitan Water District of Southern California for its members’ agencies. The MARS network was developed in a coordinated effort to improve emergency response and expedite mutual aid to participating agencies.

The City’s water conservation ordinances assist in reduction of water use. However, if a natural disaster such as an earthquake causes an emergency, the City will follow the Member Agency Response System (MARS) of the Metropolitan Water District.

The City of South Gate has adopted the Ordinance No. 2263 to respond to water shortages. This Ordinance amends Title 6.64 of the South Gate Municipal Code relating to the implementation of water conservation measures. This ordinance is referred to as the "Water Conservation Ordinance."

This ordinance authorizes the City Council to protect the public health, safety and welfare when it is determined there will be a water shortage. The City Council will determine by resolution the water conservation plan. The City Council may implement water conservation measures in addition to those specified in this ordinance.

Ordinance No. 2263 has three phases of water conservation:

Phase I places some restrictions upon the use of water for washing down driveways and other similar exteriors, washing vehicles, use of decorative fountains and other fixtures, water served in restaurants, water leakage loss, landscaping water waste, etc. It also requires some large users to submit a water conservation plan.

Phase II restricts landscape irrigation to two to three days per week at certain hours of the day to minimize water waste. Commercial nurseries and growers are exempt.

Phase III restricts landscape irrigation to one to two days per week at certain hours of the day to minimize water waste. Commercial nurseries and growers are required to observe these restrictions.

City Ordinances establish a lower priority for use of water to such uses as the commercial and industrial landscaping and washing down driveways or washing vehicles. The second step is to reduce the residential landscaping applications. Finally, the general water use by commercial and industrial users is reduced. The City will provide water to residential users.



The City's priority is not to reduce the availability of potable water for domestic use by residential customers, fire suppression, and the maintenance of health and safety. The conservation ordinances and program establish processes for reducing landscape use of water and curtail commercial and industrial water use.

The determination of water shortage and implementation of the Water Conservation Ordinance is to be made by the City Council. The Water Department provides reports and recommendations to the City Council regarding implementation of any water restriction measures.

Water allotment is focused on maintaining water service for public health and safety. The goals are to provide residential customers with sufficient water to provide for their needs including normal sanitary uses. Fire suppression is a primary goal to protect life and property. Landscaping water uses will be curtailed.

The Ordinance No. 2263 authorizes the City Council to impose a surcharge to the existing water charges paid by water customers. Such emergency charges may be imposed whenever a significant shortage in the potable water supply is anticipated.

A person violating any provision of Ordinance No. 2263 is committing a misdemeanor. Upon conviction, misdemeanor violations are punishable by a fine or imprisonment or both.

City customers are metered and the Water Department reviews water use to assess the need to reduce water consumption.

5.5.1 Stages of Action

The Water Shortage Contingency Plan establishes progressively more serious stages of action dependent on the percent of water shortage. This shortage can be for any reason. (The currently adopted plan has Stage 3 at a 40% shortage. It will be revised for a 50% shortage).

Table 20: Water Shortage Contingency Rationing Stages to Address Water Supply Shortages

Stage No.	Water Supply conditions	% Shortage
1	Level 1	10
2	Level 2	15
3	Level 3	50

5.5.2 Penalties and Charges

Each violation of the Plan also has penalties to the violator. These are established to enforce these regulations during the urgent time of a water shortage.

Table 21: Water Shortage Contingency Penalties and Charges

Penalties or Charges	Stage When Penalty Takes Effect
Written Warning	All Stages; First Violation
\$100 Administrative Fine	All Stages; Second Violation
\$250 Administrative Fine	All Stages; Third Violation
\$500 Administrative Fine	All Stages; Fourth Violation
Water Flow Restrictor (\$100 Charge to remove)	All Stages; Fourth Violation
Termination of Water Service	All Stages; Fourth Violation
Misdemeanor Charge	Possible for Any Violation



5.5.3 Prohibitions

The following is the list of each of the prohibitions and the stage when they are enforced.

Table 22: Water Shortage Contingency Mandatory Prohibitions

Examples of Prohibitions	Stage When Prohibition Becomes Mandatory
Limits on Watering Hours	Permanent
Limit on Water Duration	Permanent
No Excessive Water Flow or Runoff	Permanent
No Washing Down hard or Paved Surfaces	Permanent
Obligation to Fix Leaks, Breaks or Malfunctions (Excessive Loss-3 days)	Permanent
Re-circulating Water Required for Water Fountains and Decorative Water Features	Permanent
Limits on Washing Vehicles	Permanent
Drinking Water Served Upon Request Only	Permanent
Commercial Lodging Establishments Must Provide Option to Not Launder Linen Daily	Permanent
No Installation of Single Pass Cooling Systems	Permanent
No Installation of Non-re-circulating in Commercial Car Wash or Laundry Systems	Permanent
Restaurants Required to Use Water Conserving Dish Wash Spray Valves	Permanent
Limits on Watering Days (3 days/week May-Nov)	Level 1
Obligation to Fix Leaks, Breaks, or Malfunctions(All leaks-72 hours)	Level 1
Watering Days (2 days/week May-Nov)	Level 2
Obligation to Fix Leaks, Breaks, or Malfunctions(All leaks – 48 hours)	Level 2
Limits on Filling Ornamental Lakes or Ponds	Level 2
Limits on Washing Vehicles	Level 2
Limits on Filling Residential Swimming Pools and Spas	Level 2
Water Allocations/ Water Budget	Level 2
Water Supply Shortage Rates	Level 2
Mandatory % Use Reductions	Level 2
No Watering or Irrigating	Level 3
Obligation to Fix Leaks, Breaks, or Malfunctions(All leaks-24 hours)	Level 3
No new Potable Water Service	Level 3



5.5.4 Reduction Methods

Each of the methods to reduce consumption has an estimated percentage reduction. These establish the goals to achieve the necessary savings during a shortage.

Table 23: Water Shortage Contingency Consumption Reduction Methods

Consumption	Stage When Method Takes Effect	Projected Reduction (%)
Limits on Watering Hours	Permanent	0
Limit on Water Duration	Permanent	0
No Excessive Water Flow or Runoff	Permanent	0
No Washing Down hard or Paved Surfaces	Permanent	0
Obligation to Fix Leaks, Breaks or Malfunctions (Excessive Loss-3 days)	Permanent	0
Re-circulating Water Required for Water Fountains and Decorative Water Features	Permanent	0
Limits on Washing Vehicles	Permanent	0
Drinking Water Served Upon Request Only	Permanent	0
Commercial Lodging Establishments Must Provide Option to Not Launder Linen Daily	Permanent	0
No Installation of Single Pass Cooling Systems	Permanent	0
No Installation of Non-re-circulating in Commercial Car Wash or Laundry Systems	Permanent	0
Restaurants Required to Use Water Conserving Dish Wash Spray Valves	Permanent	0
Limits on Watering Days (3 days/week May-Nov)	Level 1	1
Obligation to Fix Leaks, Breaks, or Malfunctions(All leaks-72 hours)	Level 1	1
Watering Days (2 days/week May-Nov)	Level 2	2
Obligation to Fix Leaks, Breaks, or Malfunctions(All leaks – 48 hours)	Level 2	1
Limits on Filling Ornamental Lakes or Ponds	Level 2	1
Limits on Washing Vehicles	Level 2	1
Limits on Filling Residential Swimming Pools and Spas	Level 2	1
Water Allocations/ Water Budget	Level 2	2
Water Supply Shortage Rates	Level 2	2
Mandatory % Use Reductions	Level 2	5
No Watering or Irrigating	Level 3	10
Obligation to Fix Leaks, Breaks, or Malfunctions(All leaks-24 hours)	Level 3	1
No new Potable Water Service	Level 3	2



5.5.5 Draft Resolution

The current Water Shortage Contingency Plan (Ordinance 2263 Appendix D) complies with requirements for this UWMP other than one item. Level 3 is currently implemented when there is a 40% demand reductions required. This portion of the Ordinance (Section 6.64.090A) needs to be revised for a 50% reduction. This resolution then needs to be re-adopted.



6.0 Demand Management

Many water managers today consider water conservation, or “demand management,” as essentially a new source of water supply. The City of South Gate is committed to implementing water conservation programs at the local and regional level. Doing so will make it possible for the city to manage demand of water, especially during times of water scarcity.

This chapter gives an overview of regional water conservation efforts, the statewide water conservation Memorandum of Understanding (MOU) administered by the California Urban Water Conservation Council (CUWCC), current and future City of South Gate conservation measures.

The City has been active in water conservation and has adopted Ordinances No 2263 and Resolutions 4892, 4963, 4964, and 5054 in support of its conservation efforts (See Appendix D and Appendix E). Both of these are designed to reduce water usage, especially during shortages. The City encourages and may also, by using the above ordinances, require users to use recycled water for landscaping. There are also other measures that are required by these ordinances to ensure that the water waste or unnecessary use of potable water is reduced. Based on the Ordinance No. 1960, the City has also prepared specific guidelines for water conservation and landscaping. The Ordinance No. 1960 is designed to place certain water conservation requirements upon new and rehabilitated landscaping for industrial, commercial and multifamily residential developments. It does so by requiring submittal of landscaping plans prepared in accordance with the City’s guidelines.

The City is using recycled water in two of its parks and further applications are possible. The City offers a 15% discount to its customers for using recycled water. Expanding the use of recycled water would reduce pumping of potable water. Alternatives will be reviewed to determine new uses and applications.

6.1 Regional Water Conservation Coordination

There are many regional plans for conservation. The City of South Gate receives most of its supply from groundwater pumping of the Central Basin. The CBMWD complies with a majority of the DMMs and these efforts are described in more detail in their UWMP.¹ Although the City may not participate in the programs directly, they indirectly are involved as the pumping fees that are paid contribute to the programs.

6.2 California Urban Water Conservation Council

The City of South Gate is not signatory to the CUWCC. However, the CUWCC has established the conservations guidelines that have been developed into the Demand Management Measures for the UWMP process. If a City is part of the CUWCC, they can include their compliance with the BMPs in their UWMP and not complete this DMM section. This may be something that the City of South Gate will consider prior to the 2015 UWMP.

The premier statewide organization dedicated to urban water conservation is the California Urban Water Conservation Council (CUWCC). The CUWCC administers the Memorandum of Understanding Regarding Urban Water Conservation in California (MOU), the result of a coordinated effort by the California Department of Water Resources (DWR), water utilities, environmental organizations and other interested groups to develop a central list of urban water conservation practices.

The CUWCC has identified fourteen (14) principal areas in which there are significant opportunities for urban water conservation, collectively known as “Best Management Practices,” or BMPs. The State Legislature codified these BMPs into the Urban Water Management Planning Act, renaming them “Demand Management Measures,” or DMMs. Table 24 lists these DMMs/BMPs:

¹ Central Basin Municipal Water District 2010 Urban Water Management Plan



Table 24: Demand Management Measures

DMM Number	DMM Name
A	Water Survey Programs for Single-Family Residential and Multi-Family Residential Connections
B	Residential Plumbing Retrofit
C	System Water Audits, Leak Detection and Repair
D	Metering With Commodity Rates for All New Connections and Retrofit of Existing Connections
E	Large Landscape Conservation Programs and Incentives
F	High-Efficiency Washing Machine Rebate Programs
G	Public Information Programs
H	School Education Programs
I	Conservation Programs for Commercial, Industrial and Institutional Accounts
J	Wholesale Agency Assistance Programs
K	Conservation Pricing
L	Water Conservation Coordinator
M	Water Waste Prohibition
N	Residential ULFT Replacement Programs

The MOU requires that a water utility implement only the DMMs that are economically feasible. If a DMM is not economically feasible, the water utility may request an economic exemption for that DMM. The DMMs as defined in the MOU are generally recognized as standard definitions of water conservation measures.

Water providers who are signatories to the CUWCC Memorandum of Understanding (MOU) are allowed to submit copies of their mandatory BMP annual reports in lieu of a description of the DMMs in their Urban Water Management Plans. Though South Gate is not a signatory to the MOU, it participates in the implementation of the DMMs.

6.3 City of South Gate Water Conservation Measures

Each DMM listed will discuss whether the City has implemented, is scheduled to implement or has not implemented. If they have not implemented the DMM, a method to achieve DMM compliance will be listed or it will explain the function reason why the City can not meet that DMM. As the City has a less than 100 gpcd usage rate, they are not required to reduce consumption as part of this Act. However, the City is committed to promoting conservation where possible.

Many of these conservation efforts would have costs associated with them. The City is currently performing a rate study which will most likely result in increased rates. With budgetary cutbacks, rate sensitivity and the overall economic situation, the City cannot proceed with additional expenditures when it is already well below regional usage rates.



6.3.1 DMM A - Water Survey Programs for Single-Family Residential and Multi-Family Residential Customers

Water Survey Programs for Single-Family Residential and Multi-Family Residential Customers consist of water audit services to all water customers. Customers who come into the City Office would be notified of the opportunity for water survey performed to help reduce their water use. City staff members would work with the water customers to check for leaks, check water using fixtures, irrigation and landscape. The customer would also be given instruction on how to read the water meter and water utility bill. Based on the survey, staff would make written recommendations based on the customer's water use practices. If leaks are found, staff works with the customer to repair the leaks.

Estimating the benefits from a residential water survey program is difficult because it is up to the individual customer to implement recommendations from a survey. Due to the already low GPC, the City estimates a five percent decrease in water use for each unit surveyed. The average cost of the survey program is estimated to be approximately \$50 per survey. The life span of a water survey is approximately three years. If 10 percent of residential connections are surveyed annually over the next ten years it would result in a savings of approximately 19.8 AFY. A snapshot of these potential savings is shown in Table 25.

Table 25: Cost-Benefit Analysis of DMM A

Total Cost	\$58,087
Total Benefits	\$54,250
Discount Rate (%)	5.0
B/C Ratio	0.93
Time Horizon (years)	12
Cost of Water (per AF)	\$300
Average Water Savings (AFY)	19.8

The B/C ratio for this DMM is approximately 0.92. Since this B/C ratio is less than 1.0, it is not currently cost-effective for the City to implement this DMM.

6.3.2 DMM B - Residential Plumbing Retrofit

The City is exploring the creation and distribution of home water conservation kits that may include water saving tips, low flow showerheads, faucet aerators, toilet tank banks, toilet leak detection tablets, and literature related to other city water conservation programs. By providing water saving kits the City will be directly promoting water conservation into the homes of city water customers while offering simple ways to save.

This program also would offer the City the opportunity to meet with individual customers who are interested in conserving water. During these meetings the City is able to educate customers regarding additional methods of saving water and let them know about the other rebate programs offered by Redlands and local agencies.

The City is expecting to implement the program in 2015.

Additionally, the Gas Company offers rebates for low-flow shower heads. More information is available at: <http://www.socalgas.com/for-your-home/rebates/>



6.3.3 DMM C - System Water Audits, Leak Detection and Repair

The City tracks the difference between water produced or purchased and the amount of water sold to its customers. The difference, expressed as a percentage of total water produced, is referred to as unaccounted for water. The City has the very unusual situation of having no losses. For the future projection, we assume that this anomaly will be found and a 2% system loss will occur. The generally accepted industry standard for unaccounted for water is from 7% to 15%. All water delivered to the City is recorded on master meters connected to each well. All water distributed by the City to its customers is metered, with the exception of water used from fire hydrants for emergencies, periodic flushing, leaks and theft. The Utility Billing Software program enables the City to log water use data and history of each service. Data for each service includes an account number, address, meter size and charges along with the water usage. With this data, the City can calculate the unaccounted for water.

The City does not have resources to perform leak detection. The City would have to hire a leak detection company. The estimated cost to perform the leak detection is \$250 per mile. The estimated cost to fix leaks is estimated to be \$4,000. The entire water system would be checked every other year. It is estimated that the losses would be reduced by half. A snapshot of these potential savings is shown in Table 26.

Table 26: Cost-Benefit Analysis of DMM C

Total Cost	\$384,133
Total Benefits	\$77,209
Discount Rate (%)	5.0
B/C Ratio	0.19
Time Horizon (years)	10
Cost of Water (per AF)	\$300
Average Water Savings (AFY)	35

The B/C ratio for this DMM is approximately 0.19. Since this B/C ratio is less than 1.0, it is not currently cost-effective for the City to implement this DMM.

6.3.4 DMM D - Metering With Commodity Rates for All New Connections and Retrofit of Existing Connections

The City requires meters on all connection to the water distribution system, including detector check meters on new private fire protection services. Currently, there are no known unmetered connections to the water distribution. All new commercial and industrial developments are required to have dedicated water meters and dedicated meters for landscape irrigation in commercial and industrial developments. Water customers currently pay the following rates:

Residential	\$4.52	/100 c.f.
Commercial/Industrial	\$4.77	/100 c.f.
Recycled water (Exceeding 4 ccf)	\$2.92	/100 c.f.
Minimum Base Rate Charge (4 ccf or less)	\$19.68	/100 c.f.



6.3.5 DMM E - Large Landscape Conservation Programs and Incentives

The largest landscape areas in the community are city-owned and consist primarily of parks. The parks are all utilizing recycled water for irrigation purposes. Additionally, to assist in landscape conservation for future developments, the City Council adopted the Chapter 11.33 Water Conservation and Landscaping. Chapter 11.33 established standards and procedures for the design, installation, and management of landscapes in order to utilize available plant, water, and land resources to avoid excessive landscape water demands while ensuring high quality landscape design. The ordinance requires developers to submit a landscape plan for review and approval by the City. These requirements are applicable to new and rehabilitated landscaping for apartments; condominiums; any multiple-unit residential developments; commercial developments; industrial developments; single-family residential and recreational developments.

6.3.6 DMM F - High-Efficiency Washing Machine Rebate Programs

Due to the lack of funding, the low gpcd for the City, and other agencies offering rebates, the City does not offer rebates for this DMM. The City is a member agency of MWD. MWD implements several conservation measures which customers of the participating agencies may receive rebates. Through MWD's SoCal WaterSmart program, customers may receive rebates of \$110.00 for the installation of high efficiency washing machines. Customers who inquire about rebates are directed to the MWD SoCal WaterSmart program at <http://socalwatersmart.com>.

Additionally, the Gas Company and Southern California Edison offer rebates for High Efficiency Clothes Washers. More information is available at:

<http://www.socalgas.com/for-your-home/rebates/>

<http://www.sce.com/residential/rebates-savings/rebates-savings.htm>

6.3.7 DMM G - Public Information Programs

The CBMWD has created the Shut Your Tap! Campaign. The City joined the Campaign in 2009. The Shut Your Tap! Campaign engages community partnerships, grassroots outreach, and media relations to promote water conservation within Central Basin's 24-city service area. The Shut Your Tap! program provides valuable information on ways to use water more efficiently and protect our most precious natural resource for the short and long-run. Central Basin Staff and Directors are available through the Speakers Bureau Program, to come to the City, local organization or school to give presentations on a variety of water related topics.

6.3.8 DMM H - School Education Programs

The City participates in school education programs through the CBMWD. Central Basin partners with 17 school districts in the District's service area to provide free water conservation education programming. The District funds programs that are designed for students from kindergarten through high school. Programs include Think Earth! It's Magic (K-5), Think Water! It's Magic, Water Wanderings (4-5), Think Watershed (4-6), Water for the City (4-8), Water Squad Investigations (4-12), Conservation Connection (6-8), Sewer Science (9-12) and Waterlogged (9-12). The education programs range from in class, extended daycare/after school and field trips. Educational topics range from watershed protection, marine animal and plants, water sources and wastewater treatment. Each year over 30,000 students from the District's service area participate in the CBWMD education program.

Additionally, CBWMD is partnering with local public agencies such as cities and school districts to create Demonstration Gardens that enrich the environmental awareness of the community and promote the benefits of water efficient gardens. The City is currently working with CBMWD on constructing a demonstration garden.



6.3.9 DMM I - Conservation Programs for Commercial, Industrial and Institutional Accounts

Currently, the City is not implementing this DMM. If the City were to implement this program in the future, the program could potentially provide a toilet replacement to commercial, industrial and institutional facilities. High volume, non ULFT toilets flushing at 3.5 or greater gallons per flush would be replaced with high efficiency toilets that flush at 1.28 or less gallons per flush. Additionally the city could offer free high efficiency flush valve retrofit kits (0.5 gpf) to replace flush valves in high volume urinals that flush at greater than 1.0 gallons per flush. Free installation could be included in this service for both toilets and urinals.

The goal of this program would be to achieve annual water savings by Commercial, Industrial and Institutional accounts. The average cost of the survey program is estimated to be approximately \$650 per survey. The life span of a program is approximately five years. If five percent of accounts are surveyed annually over the next ten years, it would result in an average savings of approximately 46 AFY. A snapshot of these potential savings is shown in Table 27.

Table 27: Cost-Benefit Analysis of DMM I

Total Cost	\$409,582
Total Benefits	\$133,535
Discount Rate (%)	5.0
B/C Ratio	0.33
Time Horizon (years)	15
Cost of Water (per AF)	\$300
Average Water Savings (AFY)	46

The B/C ratio for this DMM is approximately 0.32. Since this B/C ratio is less than 1.0, it is not currently cost-effective for the City to implement this DMM.

6.3.10 DMM J - Wholesale Agency Assistance Programs

The City is not a wholesale Agency and therefore this DMM is not applicable.

6.3.11 DMM K - Conservation Pricing

The City charges a set price per unit of potable water, referred to as a uniform volume charge. Water customers currently pay the following rates:

Residential	\$4.52	/100 c.f.
Commercial/Industrial	\$4.77	/100 c.f.
Recycled water (Exceeding 4 ccf)	\$2.92	/100 c.f.
Minimum Base Rate Charge (4 ccf or less)	\$19.68	/100 c.f.

A monthly minimum charge varies based on meter size. The current minimum charge for each meter size is listed below.

Two-inch (2")	\$40.75	bi-monthly
Three-inch (3")	\$61.11	bi-monthly
Four-inch (4")	\$81.50	bi-monthly
Six-inch (6")	\$122.23	bi-monthly
Eight-inch (8")	\$162.98	bi-monthly
Ten inch (10")	\$203.72	bi-monthly



This existing rate structure facilitates conservation since customer bills vary directly with the level of water usage. The Uniform Volume Charge also provides a clear and easy to understand price signal to the customer. To date the utility has avoided an inverted rate block structure in order to preserve this option for use during a prolonged drought.

6.3.12 DMM L - Conservation Coordinator

The City does not have a Water Conservation Coordinator classification position. Due to budget constraints, the conservation coordinator duties fall on the Senior City Engineer of the Public Works Department. The Senior City Engineer acting as the Conservation Coordinator duties include program management, tracking, planning, responding to public requests, and any required reporting.

6.3.13 DMM M - Water Waste Prohibition

The City adopted Ordinance 2263, Title 6 (Health and Sanitation), Chapter 6.64 (Water Conservation) of the South Gate Municipal Code in 2009. The Ordinance sets permanent water conservation requirements which prohibit the waste of water. Below are excerpts from the City's Municipal Code prohibiting water waste.

6.64.060(c)

No Excessive Water Flow or Runoff: Watering or irrigating of any lawn, landscape or other vegetated area in a manner that causes or allows excessive water flow or runoff onto an adjoining sidewalk, driveway, street, alley, gutter or ditch is prohibited.

6.64.060(d)

No Washing Down hard or Paved Surfaces: Washing down hard or paved surfaces, including but not limited to sidewalks, walkways, driveways, parking areas, tennis courts, patios or alleys, is prohibited except when necessary to alleviate safety or sanitary hazards, and then only by use of a hand-held bucket or similar container, a hand-held hose equipped with a positive self-closing water shut-off device or a low volume, high pressure cleaning machine equipped to recycle any water used.

6064.060(e)

Obligation to Fix Leaks, Breaks or Malfunctions: Excessive use, loss or escape of water through breaks, leaks or other malfunctions in the water user's plumbing or distribution system for any period of time after such escape of water should have reasonable been discovered and corrected and in no event more than ~ days of receiving notice from the City is prohibited.

The municipal code is enforced during normal and shortage conditions. Due to the lack of resources, the municipal code for waste is not strictly enforced during normal conditions. During times of water shortages, enforcement is increased. In the future and if resources become available, the City should enforce the municipal code during normal conditions.

6.3.14 DMM N - Residential ULFT Replacement Programs

The City currently does not operate an ultra-low-flush toilet replacement program. However, MWD, of which the City is within MWD's service area, maintains a residential ultra-low-flush toilet replacement program. MWD offers rebates starting at \$50 per toilet if a customer replaces a toilet that is a program-qualifying model. The water customer purchases and installs the program-qualifying model, completes an application provided by MWD, and then sends the application and proof of purchase, and proof of residency (water service account number) to MWD.



The City does not currently budget for this program. IF the City were to implement its own program, the average cost of the rebate is estimated to be \$75 and the man hours to verify installation would be approximately \$50. Approximately 100 ULFT's would be installed each year with an estimated life span of five years. Programs such as these have been shown to produce savings of approximately 1.9 gallons per flush over high-water-using toilets. A snapshot of these potential savings is shown in Table 28.

Table 28: Cost-Benefit Analysis of DMM N

Total Cost	\$101,348
Total Benefits	\$11,242
Discount Rate (%)	5.0
B/C Ratio	0.11
Time Horizon (years)	15
Cost of Water (per AF)	\$300
Average Water Savings (AFY)	3.8

The B/C ratio for this DMM is approximately 0.11. Since this B/C ratio is less than 1.0, it is not currently cost-effective for the City to implement this DMM.

6.4 Water Savings Analysis

Each of the individual DMM's that are currently being implemented are not easily quantifiable. However, the City's overall conservation of water is evident by the 97 gpcd that is in use. This is 32% less than the regional target that has been set and well below the average regional usage. The usage for the area is 178 gpcd¹. So South Gate is 46% below that regional average.

¹ Metropolitan Water District of Southern California Regional Urban Water Management Plan



7.0 Recycled Water Plan

Water recycling is the reuse of treated wastewater for non-potable (non-drinking) purposes, including industrial uses and irrigation for public landscaping, such as medians, parks and golf courses. Using recycled water can increase the availability of potable water supplies.

The City of South Gate does not own or operate any water recycling facilities. The City purchases recycled water from the Central Basin Municipal Water District (CBMWD), which is offered to industrial users at a 15 percent discount. CBMWD obtains recycled water from the San Jose Creek Water Reclamation Plant in Whittier and the Los Coyotes Water Reclamation Plant in Cerritos, which are owned and operated by the Sanitation District of Los Angeles County. The City is a member agency with the Sanitation Districts of Los Angeles County. The Sanitation Districts construct, operate, and maintain facilities to collect, treat, recycle, and dispose of residential, commercial, and industrial wastewater.

From 1996 to 2010, South Gate purchased 2,486 acre feet of recycled water from the CBMWD. The City itself uses recycled water for irrigation in Hollydale Park and Circle Park. There are also two carwash facilities in the City that recycle their own water. CBMWD operates a recycled water pipeline on Atlantic Avenue that has enough capacity to provide for most of the industrial uses in that area, but despite the reduced cost the potential customers have not been motivated to use this resource. CBMWD may extend additional recycled water pipeline to the westside of the City.

Individual districts operate and maintain their own portions of the collection system. The City of South Gate is responsible for the collection of wastewater through local sewers and the collection of solid waste.

The City is planning on expanded use of recycled water for medians, and park facilities where possible. It may be necessary in the future to require landscaping on private property to use recycled water. A program to educate and guide the potential customers about the benefits and safety of the recycled water will be pursued. Recycled water is less expensive to acquire, more reliable and is the best means to reduce potable water demand.

7.1 CBMWD Recycling Plan

Recycled water is a cornerstone of Central Basin's efforts to augment local supplies and reduce dependence on imported water. Since planning and constructing its recycled water distribution systems in the early 1990s, Central Basin had become an industry leader in promoting water re-use. Recycled water is used for non-potable applications such as landscape irrigation, commercial and industrial processes such as cooling, and indirect potable use through groundwater replenishment.

In FY 2006-2007, recycled water demand within Central Basin's service area peaked at 5,311 AF. This amount represented about 2 percent of the Central Basin service area total water demand.

The source of Central Basin's recycled water is the Sanitation Districts of Los Angeles County (LACSD). LACSD operates six water recycling plants in the Los Angeles basin and is described in more detail in Section 7.2.

Wastewater that is treated at the San Jose Creek and the Los Coyotes water reclamation plants undergoes tertiary treatment and denitrification. Tertiary recycled water is filtered and disinfected wastewater that meets specific Title 22 testing criteria.¹ Tertiary treated water can be used for a wide variety of industrial and irrigation purposes where high-quality non-potable water is needed.

¹ California Health Laws Related to Recycled Water, "The Purple Book", June 2001, Title 22, Chapter 3, Article 1, 60301.230



Central Basin's recycled system is comprised of two separate projects: E. Thornton Ibbetson Century Water Recycling Project (Ibbetson Century Project) and the Esteban E. Torres Rio Hondo Water Recycling Project (Torres Project). Both projects deliver recycled water for landscape irrigation and industrial uses throughout the Central Basin service area.

The potential of recycled water use will increase among cities, water agencies, and businesses/industries through the years. The increased cost of imported water and groundwater will enhance the beneficial usages of recycled water.

In 2008, Central Basin developed a Recycled Water Program Master Plan to help identify all of the potential customers that could benefit from recycled water. Although there is great potential to increase recycled water use in Central Basin, there are challenges and limitation in connecting customers. Among them is proximity to recycled water pipelines, capacity and pressure to serve, and retrofit cost feasibility. These factors play a significant role in meeting the potential growth of recycled water.¹

7.2 Sanitation Districts of Los Angeles County

The Sanitation Districts of Los Angeles County (Sanitation Districts) operate 11 wastewater treatment facilities, 10 of which are classified as water reclamation plants (WRPs). These facilities serve approximately five million people in 78 cities and unincorporated areas within Los Angeles County. Effluent quality from the WRPs ranges from undisinfected secondary to coagulated, filtered, disinfected tertiary. During Fiscal Year 2008-09 (FY 08-09), Sanitation Districts' facilities produced an average of 456.92 million gallons per day (MGD), or 512,001 acre-feet per year (AFY) of effluent, which is a decrease of 4.5% from the preceding fiscal year, and a 14.7% decrease from the historic peak of FY 89-90.

Capacity at the ten Sanitation Districts' water reclamation facilities is now 252.8 MGD (283,285 AFY). However, of the total effluent produced, only 170.75 MGD (191,336 AFY) consisted of recycled water suitable for reuse (67.8% of capacity). This amount is 37.4% of the total amount of effluent produced, a decrease of 0.9% from the preceding fiscal year. The remaining 286.17 MGD (320,664 AFY) was effluent discharged to the ocean from the Sanitation Districts' Joint Water Pollution Control Plant (JWPCP) in the City of Carson, a 6.6% decrease from the preceding fiscal year.

The Sanitation Districts have made efforts over the past four-and-a-half decades to divert high quality wastewater flows away from direct ocean disposal to the upstream WRPs, which provide recycled water supplies for eventual reuse. Discharge to the ocean has steadily decreased since the WRPs in the Los Angeles Basin (i.e., the Joint Outfall System, or JOS) were built in the early 1970's, while additional needed treatment capacity has been added to the WRPs. Significant drops in effluent production occurred in 1977 and 1991 in response to serious droughts. A similar drop in effluent production has been occurring since 2006 when the current water crisis in the State became apparent and conservation actions began to be implemented. The majority of these decreases came from the JWPCP, while the upstream WRPs were able to maintain a relatively high level of production, which contributed to recycled water's reputation as being "drought-proof."

Of the total amount of recycled water produced, 70.13 MGD (78,580 AFY) was actively reused for a variety of applications including urban landscape irrigation, agricultural irrigation, industrial process water, recreational impoundments, wildlife habitat maintenance, and groundwater replenishment.

The amount of recycled water used for replenishment of the underground water supply can vary greatly from year to year, depending on the amount and timing of rainfall runoff, maintenance activities in the spreading grounds, and other factors. The long-term trend of recycled water usage is best represented by the increase in direct, non-potable reuse for landscape and agricultural irrigation, industrial process supply, and environmental enhancement.

¹ Central Basin Municipal Water District 2010 Urban Water Management Plan



More recycled water is typically used for groundwater recharge (via surface spreading) than for all other applications combined because of its cost-effectiveness. The San Jose Creek, Whittier Narrows, and Pomona WRPs discharge to rivers or creeks (i.e., flood control channels) that can convey the water by gravity to existing off-stream recharge basins. These basins and the unlined portions of the rivers and creeks permit large volumes of recycled water to percolate by gravity into the aquifer. Recycled water used in this way incurs no additional capital improvement and related operation and maintenance (O&M) costs or any energy consumption for pumping.¹

7.3 Future Recycled Water Uses

Regionally, the use of recycled water is growing. The CBMWD, MWD, and Sanitation Districts plans are growing.

Locally, providing treated wastewater for reuse in the City of South Gate for municipal parks, school and landscaped median irrigation, commercial and industrial facilities has long been an effort to conserve water supplies in the face of ever increasing growth and water demand. However, the costs associated with installing treatment systems to produce high-quality effluent and installing pipelines to distribute it locally has been prohibitive. There are other options that can be explored in the future.

7.3.1 Satellite Wastewater Treatment Plants

Satellite wastewater treatment plants or point-of-use facilities collect wastewater from an interceptor or trunk line, treat it so that it meets appropriate reuse standards, and then release it to nearby customers. Because the plants have such a small footprint, Membrane Biological Reactors (MBR) generally can be located even in dense urban locations without difficulty. The highly automated systems require relatively little operator oversight and tend to perform reliably.

The MBR process combines an aerobic biological process with an immersed membrane system. Cost-effective and reliable, this separation technology is suited for a wide range of municipal and industrial wastewater applications. MBR systems can also provide advanced nitrogen and phosphorus removal to meet the most stringent effluent requirements.

There are many equipment variations, configurations and options that can be used with MBR systems, all of which are designed to provide the necessary treatment for each wastewater or water reuse project. The equipment selected depends on effluent requirements, operation and maintenance requirements, power consumption, future expansion and initial capital costs.

Within the MBR process, the biological process and membrane operating systems are located in separate tanks to optimize performance of the overall process and to simplify operation and maintenance. This unique combination eliminates the need for clarifiers, return sludge pumping, polishing effluent filters and maintenance normally associated with a conventional clarification process.

By eliminating clarifiers, the biological process can be designed and operated for high-rate wastewater treatment, rather than sludge settleability. The biological system can also be operated at much higher mixed liquor suspended solids (MLSS) concentrations (8,000 to 16,000 mg/L). This results in a more efficient biological process that increases solids retention time, reduces sludge yield and improves reactor efficiency for nitrification and denitrification.

High MLSS levels also mean that the plants can operate with shorter hydraulic retention times, allowing smaller reactor basins than with conventional treatment. Space requirements in the plant can be up to 50 percent less than with a conventional biological process.

Operation of the MBR treatment process is easily automated and can be controlled with a microprocessor such as a membrane monitoring system, which continuously monitors and records important operational parameters. A highly automated design helps operators meet stringent environmental requirements.

¹ Twentieth Annual Status Report on Recycled Water



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Appendix A

Urban Water Management Planning Act

Established: AB 797, Klehs, 1983
Amended: AB 2661, Klehs, 1990
AB 11X, Filante, 1991
AB 1869, Speier, 1991
AB 892, Frazee, 1993
SB 1017, McCorquodale, 1994
AB 2853, Cortese, 1994
AB 1845, Cortese, 1995
SB 1011, Polanco, 1995
AB 2552, Bates, 2000
SB 553, Kelley, 2000
SB 610, Costa, 2001
AB 901, Daucher, 2001
SB 672, Machado, 2001
SB 1348, Brulte, 2002
SB 1384 Costa, 2002
SB 1518 Torlakson, 2002
AB 105, Wiggins, 2003
SB 318, Alpert, 2004
SB 1087, Florez, 2007
SBX7 7, Steinberg, 2009

CALIFORNIA WATER CODE DIVISION 6

PART 2.6. URBAN WATER MANAGEMENT PLANNING

Chapter 1. General Declaration and Policy

10610. This part shall be known and may be cited as the “Urban Water Management Planning Act.”

10610.2.

(a) The Legislature finds and declares all of the following:

- (1) The waters of the state are a limited and renewable resource subject to ever increasing demands.
- (2) The conservation and efficient use of urban water supplies are of statewide concern; however, the planning for that use and the implementation of those plans can best be accomplished at the local level.
- (3) A long-term, reliable supply of water is essential to protect the productivity of California's businesses and economic climate.
- (4) As part of its long-range planning activities, every urban water supplier



should make every effort to ensure the appropriate level of reliability in its water service sufficient to meet the needs of its various categories of customers during normal, dry, and multiple dry water years.

- (5) Public health issues have been raised over a number of contaminants that have been identified in certain local and imported water supplies.
 - (6) Implementing effective water management strategies, including groundwater storage projects and recycled water projects, may require specific water quality and salinity targets for meeting groundwater basins water quality objectives and promoting beneficial use of recycled water.
 - (7) Water quality regulations are becoming an increasingly important factor in water agencies' selection of raw water sources, treatment alternatives, and modifications to existing treatment facilities.
 - (8) Changes in drinking water quality standards may also impact the usefulness of water supplies and may ultimately impact supply reliability.
 - (9) The quality of source supplies can have a significant impact on water management strategies and supply reliability.
- (b) This part is intended to provide assistance to water agencies in carrying out their long-term resource planning responsibilities to ensure adequate water supplies to meet existing and future demands for water.

10610.4. The Legislature finds and declares that it is the policy of the state as follows:

- (a) The management of urban water demands and efficient use of water shall be actively pursued to protect both the people of the state and their water resources.
- (b) The management of urban water demands and efficient use of urban water supplies shall be a guiding criterion in public decisions.
- (c) Urban water suppliers shall be required to develop water management plans to actively pursue the efficient use of available supplies.

Chapter 2. Definitions

10611. Unless the context otherwise requires, the definitions of this chapter govern the construction of this part.

10611.5. "Demand management" means those water conservation measures, programs, and incentives that prevent the waste of water and promote the reasonable and efficient use and reuse of available supplies.

10612. "Customer" means a purchaser of water from a water supplier who uses the water for municipal purposes, including residential, commercial, governmental, and industrial uses.

10613. "Efficient use" means those management measures that result in the most effective use of water so as to prevent its waste or unreasonable use or unreasonable method of use.



10614. “Person” means any individual, firm, association, organization, partnership, business, trust, corporation, company, public agency, or any agency of such an entity.

10615. “Plan” means an urban water management plan prepared pursuant to this part. A plan shall describe and evaluate sources of supply, reasonable and practical efficient uses, reclamation and demand management activities. The components of the plan may vary according to an individual community or area’s characteristics and its capabilities to efficiently use and conserve water. The plan shall address measures for residential, commercial, governmental, and industrial water demand management as set forth in Article 2 (commencing with Section 10630) of Chapter 3. In addition, a strategy and time schedule for implementation shall be included in the plan.

10616. “Public agency” means any board, commission, county, city and county, city, regional agency, district, or other public entity.

10616.5. “Recycled water” means the reclamation and reuse of wastewater for beneficial use.

10617. “Urban water supplier” means a supplier, either publicly or privately owned, providing water for municipal purposes either directly or indirectly to more than 3,000 customers or supplying more than 3,000 acre-feet of water annually. An urban water supplier includes a supplier or contractor for water, regardless of the basis of right, which distributes or sells for ultimate resale to customers. This part applies only to water supplied from public water systems subject to Chapter 4 (commencing with Section 116275) of Part 12 of Division 104 of the Health and Safety Code.

Chapter 3. Urban Water Management Plans

Article 1. General Provisions

10620.

- (a) Every urban water supplier shall prepare and adopt an urban water management plan in the manner set forth in Article 3 (commencing with Section 10640).
- (b) Every person that becomes an urban water supplier shall adopt an urban water management plan within one year after it has become an urban water supplier.
- (c) An urban water supplier indirectly providing water shall not include planning elements in its water management plan as provided in Article 2 (commencing with Section 10630) that would be applicable to urban water suppliers or public agencies directly providing water, or to their customers, without the consent of those suppliers or public agencies.
- (d) (1) An urban water supplier may satisfy the requirements of this part by participation in area-wide, regional, watershed, or basin-wide urban water management planning where those plans will reduce preparation costs and contribute to the achievement of conservation and efficient water use.

(2) Each urban water supplier shall coordinate the preparation of its plan with other appropriate agencies in the area, including other water suppliers that share a common source, water management agencies, and relevant public agencies, to the extent practicable.
- (e) The urban water supplier may prepare the plan with its own staff, by contract, or



in cooperation with other governmental agencies.

- (f) An urban water supplier shall describe in the plan water management tools and options used by that entity that will maximize resources and minimize the need to import water from other regions.

10621.

- (a) Each urban water supplier shall update its plan at least once every five years on or before December 31, in years ending in five and zero.
- (b) Every urban water supplier required to prepare a plan pursuant to this part shall, at least 60 days prior to the public hearing on the plan required by Section 10642, notify any city or county within which the supplier provides water supplies that the urban water supplier will be reviewing the plan and considering amendments or changes to the plan. The urban water supplier may consult with, and obtain comments from, any city or county that receives notice pursuant to this subdivision.
- (c) The amendments to, or changes in, the plan shall be adopted and filed in the manner set forth in Article 3 (commencing with Section 10640).

Article 2. Contents of Plans

10630. It is the intention of the Legislature, in enacting this part, to permit levels of water management planning commensurate with the numbers of customers served and the volume of water supplied.

10631. A plan shall be adopted in accordance with this chapter that shall do all of the following:

- (a) Describe the service area of the supplier, including current and projected population, climate, and other demographic factors affecting the supplier's water management planning. The projected population estimates shall be based upon data from the state, regional, or local service agency population projections within the service area of the urban water supplier and shall be in five-year increments to 20 years or as far as data is available.
- (b) Identify and quantify, to the extent practicable, the existing and planned sources of water available to the supplier over the same five-year increments described in subdivision (a). If groundwater is identified as an existing or planned source of water available to the supplier, all of the following information shall be included in the plan:
 - (1) A copy of any groundwater management plan adopted by the urban water supplier, including plans adopted pursuant to Part 2.75 (commencing with Section 10750), or any other specific authorization for groundwater management.
 - (2) A description of any groundwater basin or basins from which the urban water supplier pumps groundwater. For those basins for which a court or the board has adjudicated the rights to pump groundwater, a copy of the order or decree adopted by the court or the board and a description of the amount of groundwater the urban water supplier has the legal right to pump under the order or decree. For basins that have not been adjudicated, information as to whether the department has identified the basin or basins as overdrafted or



has projected that the basin will become overdrafted if present management conditions continue, in the most current official departmental bulletin that characterizes the condition of the groundwater basin, and a detailed description of the efforts being undertaken by the urban water supplier to eliminate the long-term overdraft condition.

- (3) A detailed description and analysis of the location, amount, and sufficiency of groundwater pumped by the urban water supplier for the past five years. The description and analysis shall be based on information that is reasonably available, including, but not limited to, historic use records.
 - (4) A detailed description and analysis of the amount and location of groundwater that is projected to be pumped by the urban water supplier. The description and analysis shall be based on information that is reasonably available, including, but not limited to, historic use records.
- (c) (1) Describe the reliability of the water supply and vulnerability to seasonal or climatic shortage, to the extent practicable, and provide data for each of the following:
- (A) An average water year.
 - (B) A single dry water year.
 - (C) Multiple dry water years.
- (2) For any water source that may not be available at a consistent level of use, given specific legal, environmental, water quality, or climatic factors, describe plans to supplement or replace that source with alternative sources or water demand management measures, to the extent practicable.
- (d) Describe the opportunities for exchanges or transfers of water on a short-term or long-term basis.
- (e) (1) Quantify, to the extent records are available, past and current water use, over the same five-year increments described in subdivision (a), and projected water use, identifying the uses among water use sectors, including, but not necessarily limited to, all of the following uses:
- (A) Single-family residential.
 - (B) Multifamily.
 - (C) Commercial.
 - (D) Industrial.
 - (E) Institutional and governmental.
 - (F) Landscape.
 - (G) Sales to other agencies.
 - (H) Saline water intrusion barriers, groundwater recharge, or conjunctive use, or any combination thereof.



- (l) Agricultural.
- (2) The water use projections shall be in the same five-year increments described in subdivision (a).
- (f) Provide a description of the supplier's water demand management measures. This description shall include all of the following:
 - (1) A description of each water demand management measure that is currently being implemented, or scheduled for implementation, including the steps necessary to implement any proposed measures, including, but not limited to, all of the following:
 - (A) Water survey programs for single-family residential and multifamily residential customers.
 - (B) Residential plumbing retrofit.
 - (C) System water audits, leak detection, and repair.
 - (D) Metering with commodity rates for all new connections and retrofit of existing connections.
 - (E) Large landscape conservation programs and incentives.
 - (F) High-efficiency washing machine rebate programs.
 - (G) Public information programs.
 - (H) School education programs.
 - (I) Conservation programs for commercial, industrial, and institutional accounts.
 - (J) Wholesale agency programs.
 - (K) Conservation pricing.
 - (L) Water conservation coordinator.
 - (M) Water waste prohibition.
 - (N) Residential ultra-low-flush toilet replacement programs.
 - (2) A schedule of implementation for all water demand management measures proposed or described in the plan.
 - (3) A description of the methods, if any, that the supplier will use to evaluate the effectiveness of water demand management measures implemented or described under the plan.
 - (4) An estimate, if available, of existing conservation savings on water use within the supplier's service area, and the effect of the savings on the supplier's ability to further reduce demand.



- (g) An evaluation of each water demand management measure listed in paragraph (1) of subdivision (f) that is not currently being implemented or scheduled for implementation. In the course of the evaluation, first consideration shall be given to water demand management measures, or combination of measures, that offer lower incremental costs than expanded or additional water supplies. This evaluation shall do all of the following:
- (1) Take into account economic and noneconomic factors, including environmental, social, health, customer impact, and technological factors.
 - (2) Include a cost-benefit analysis, identifying total benefits and total costs.
 - (3) Include a description of funding available to implement any planned water supply project that would provide water at a higher unit cost.
 - (4) Include a description of the water supplier's legal authority to implement the measure and efforts to work with other relevant agencies to ensure the implementation of the measure and to share the cost of implementation.
- (h) Include a description of all water supply projects and water supply programs that may be undertaken by the urban water supplier to meet the total projected water use as established pursuant to subdivision (a) of Section 10635. The urban water supplier shall include a detailed description of expected future projects and programs, other than the demand management programs identified pursuant to paragraph (1) of subdivision (f), that the urban water supplier may implement to increase the amount of the water supply available to the urban water supplier in average, single-dry, and multiple-dry water years. The description shall identify specific projects and include a description of the increase in water supply that is expected to be available from each project. The description shall include an estimate with regard to the implementation timeline for each project or program.
- (i) Describe the opportunities for development of desalinated water, including, but not limited to, ocean water, brackish water, and groundwater, as a long-term supply.
- (j) For purposes of this part, urban water suppliers that are members of the California Urban Water Conservation Council shall be deemed in compliance with the requirements of subdivisions (f) and (g) by complying with all the provisions of the "Memorandum of Understanding Regarding Urban Water Conservation in California," dated December 10, 2008, as it may be amended, and by submitting the annual reports required by Section 6.2 of that memorandum.
- (k) Urban water suppliers that rely upon a wholesale agency for a source of water shall provide the wholesale agency with water use projections from that agency for that source of water in five-year increments to 20 years or as far as data is available. The wholesale agency shall provide information to the urban water supplier for inclusion in the urban water supplier's plan that identifies and quantifies, to the extent practicable, the existing and planned sources of water as required by subdivision (b), available from the wholesale agency to the urban water supplier over the same five-year increments, and during various water-year types in accordance with subdivision (c). An urban water supplier may rely upon water supply information provided by the wholesale agency in fulfilling the plan informational requirements of subdivisions (b) and (c).



10631.1.

- (a) The water use projections required by Section 10631 shall include projected water use for single-family and multifamily residential housing needed for lower income households, as defined in Section 50079.5 of the Health and Safety Code, as identified in the housing element of any city, county, or city and county in the service area of the supplier.
- (b) It is the intent of the Legislature that the identification of projected water use for single-family and multifamily residential housing for lower income households will assist a supplier in complying with the requirement under Section 65589.7 of the Government Code to grant a priority for the provision of service to housing units affordable to lower income households.

10631.5.

- (a) (1) Beginning January 1, 2009, the terms of, and eligibility for, a water management grant or loan made to an urban water supplier and awarded or administered by the department, state board, or California Bay-Delta Authority or its successor agency shall be conditioned on the implementation of the water demand management measures described in Section 10631, as determined by the department pursuant to subdivision (b).
- (2) For the purposes of this section, water management grants and loans include funding for programs and projects for surface water or groundwater storage, recycling, desalination, water conservation, water supply reliability, and water supply augmentation. This section does not apply to water management projects funded by the federal American Recovery and Reinvestment Act of 2009 (Public Law 111-5).
- (3) Notwithstanding paragraph (1), the department shall determine that an urban water supplier is eligible for a water management grant or loan even though the supplier is not implementing all of the water demand management measures described in Section 10631, if the urban water supplier has submitted to the department for approval a schedule, financing plan, and budget, to be included in the grant or loan agreement, for implementation of the water demand management measures. The supplier may request grant or loan funds to implement the water demand management measures to the extent the request is consistent with the eligibility requirements applicable to the water management funds.
- (4) (A) Notwithstanding paragraph (1), the department shall determine that an urban water supplier is eligible for a water management grant or loan even though the supplier is not implementing all of the water demand management measures described in Section 10631, if an urban water supplier submits to the department for approval documentation demonstrating that a water demand management measure is not locally cost effective. If the department determines that the documentation submitted by the urban water supplier fails to demonstrate that a water demand management measure is not locally cost effective, the department shall notify the urban water supplier and the agency administering the grant or loan program within 120 days that the documentation does not satisfy the requirements for an exemption, and include in that notification a detailed statement to support the



determination.

(B) For purposes of this paragraph, “not locally cost effective” means that the present value of the local benefits of implementing a water demand management measure is less than the present value of the local costs of implementing that measure.

(b) (1) The department, in consultation with the state board and the California Bay-Delta Authority or its successor agency, and after soliciting public comment regarding eligibility requirements, shall develop eligibility requirements to implement the requirement of paragraph (1) of subdivision (a). In establishing these eligibility requirements, the department shall do both of the following:

(A) Consider the conservation measures described in the Memorandum of Understanding Regarding Urban Water Conservation in California, and alternative conservation approaches that provide equal or greater water savings.

(B) Recognize the different legal, technical, fiscal, and practical roles and responsibilities of wholesale water suppliers and retail water suppliers.

(2) (A) For the purposes of this section, the department shall determine whether an urban water supplier is implementing all of the water demand management measures described in Section 10631 based on either, or a combination, of the following:

(i) Compliance on an individual basis.

(ii) Compliance on a regional basis. Regional compliance shall require participation in a regional conservation program consisting of two or more urban water suppliers that achieves the level of conservation or water efficiency savings equivalent to the amount of conservation or savings achieved if each of the participating urban water suppliers implemented the water demand management measures. The urban water supplier administering the regional program shall provide participating urban water suppliers and the department with data to demonstrate that the regional program is consistent with this clause. The department shall review the data to determine whether the urban water suppliers in the regional program are meeting the eligibility requirements.

(B) The department may require additional information for any determination pursuant to this section.

(3) The department shall not deny eligibility to an urban water supplier in compliance with the requirements of this section that is participating in a multiagency water project, or an integrated regional water management plan, developed pursuant to Section 75026 of the Public Resources Code, solely on the basis that one or more of the agencies participating in the project or plan is not implementing all of the water demand management measures described in Section 10631.

(c) In establishing guidelines pursuant to the specific funding authorization for any water management grant or loan program subject to this section, the agency



administering the grant or loan program shall include in the guidelines the eligibility requirements developed by the department pursuant to subdivision (b).

- (d) Upon receipt of a water management grant or loan application by an agency administering a grant and loan program subject to this section, the agency shall request an eligibility determination from the department with respect to the requirements of this section. The department shall respond to the request within 60 days of the request.
- (e) The urban water supplier may submit to the department copies of its annual reports and other relevant documents to assist the department in determining whether the urban water supplier is implementing or scheduling the implementation of water demand management activities. In addition, for urban water suppliers that are signatories to the Memorandum of Understanding Regarding Urban Water Conservation in California and submit annual reports to the California Urban Water Conservation Council in accordance with the memorandum, the department may use these reports to assist in tracking the implementation of water demand management measures.
- (f) This section shall remain in effect only until July 1, 2016, and as of that date is repealed, unless a later enacted statute, that is enacted before July 1, 2016, deletes or extends that date.

10631.7. The department, in consultation with the California Urban Water Conservation Council, shall convene an independent technical panel to provide information and recommendations to the department and the Legislature on new demand management measures, technologies, and approaches. The panel shall consist of no more than seven members, who shall be selected by the department to reflect a balanced representation of experts. The panel shall have at least one, but no more than two, representatives from each of the following: retail water suppliers, environmental organizations, the business community, wholesale water suppliers, and academia. The panel shall be convened by January 1, 2009, and shall report to the Legislature no later than January 1, 2010, and every five years thereafter. The department shall review the panel report and include in the final report to the Legislature the department's recommendations and comments regarding the panel process and the panel's recommendations.

10632. The plan shall provide an urban water shortage contingency analysis which includes each of the following elements which are within the authority of the urban water supplier:

- (a) Stages of action to be undertaken by the urban water supplier in response to water supply shortages, including up to a 50 percent reduction in water supply, and an outline of specific water supply conditions which are applicable to each stage.
- (b) An estimate of the minimum water supply available during each of the next three water years based on the driest three-year historic sequence for the agency's water supply.
- (c) Actions to be undertaken by the urban water supplier to prepare for, and implement during, a catastrophic interruption of water supplies including, but not limited to, a regional power outage, an earthquake, or other disaster.
- (d) Additional, mandatory prohibitions against specific water use practices during



water shortages, including, but not limited to, prohibiting the use of potable water for street cleaning.

- (e) Consumption reduction methods in the most restrictive stages. Each urban water supplier may use any type of consumption reduction methods in its water shortage contingency analysis that would reduce water use, are appropriate for its area, and have the ability to achieve a water use reduction consistent with up to a 50 percent reduction in water supply.
- (f) Penalties or charges for excessive use, where applicable.
- (g) An analysis of the impacts of each of the actions and conditions described in subdivisions (a) to (f), inclusive, on the revenues and expenditures of the urban water supplier, and proposed measures to overcome those impacts, such as the development of reserves and rate adjustments.
- (h) A draft water shortage contingency resolution or ordinance.
- (i) A mechanism for determining actual reductions in water use pursuant to the urban water shortage contingency analysis.

10633. The plan shall provide, to the extent available, information on recycled water and its potential for use as a water source in the service area of the urban water supplier. The preparation of the plan shall be coordinated with local water, wastewater, groundwater, and planning agencies that operate within the supplier's service area, and shall include all of the following:

- (a) A description of the wastewater collection and treatment systems in the supplier's service area, including a quantification of the amount of wastewater collected and treated and the methods of wastewater disposal.
- (b) A description of the quantity of treated wastewater that meets recycled water standards, is being discharged, and is otherwise available for use in a recycled water project.
- (c) A description of the recycled water currently being used in the supplier's service area, including, but not limited to, the type, place, and quantity of use.
- (d) A description and quantification of the potential uses of recycled water, including, but not limited to, agricultural irrigation, landscape irrigation, wildlife habitat enhancement, wetlands, industrial reuse, groundwater recharge, indirect potable reuse, and other appropriate uses, and a determination with regard to the technical and economic feasibility of serving those uses.
- (e) The projected use of recycled water within the supplier's service area at the end of 5, 10, 15, and 20 years, and a description of the actual use of recycled water in comparison to uses previously projected pursuant to this subdivision.
- (f) A description of actions, including financial incentives, which may be taken to encourage the use of recycled water, and the projected results of these actions in terms of acre-feet of recycled water used per year.
- (g) A plan for optimizing the use of recycled water in the supplier's service area, including actions to facilitate the installation of dual distribution systems, to promote recirculating uses, to facilitate the increased use of treated wastewater



that meets recycled water standards, and to overcome any obstacles to achieving that increased use.

10634. The plan shall include information, to the extent practicable, relating to the quality of existing sources of water available to the supplier over the same five-year increments as described in subdivision (a) of Section 10631, and the manner in which water quality affects water management strategies and supply reliability.

Article 2.5. Water Service Reliability

10635.

- (a) Every urban water supplier shall include, as part of its urban water management plan, an assessment of the reliability of its water service to its customers during normal, dry, and multiple dry water years. This water supply and demand assessment shall compare the total water supply sources available to the water supplier with the total projected water use over the next 20 years, in five-year increments, for a normal water year, a single dry water year, and multiple dry water years. The water service reliability assessment shall be based upon the information compiled pursuant to Section 10631, including available data from state, regional, or local agency population projections within the service area of the urban water supplier.
- (b) The urban water supplier shall provide that portion of its urban water management plan prepared pursuant to this article to any city or county within which it provides water supplies no later than 60 days after the submission of its urban water management plan.
- (c) Nothing in this article is intended to create a right or entitlement to water service or any specific level of water service.
- (d) Nothing in this article is intended to change existing law concerning an urban water supplier's obligation to provide water service to its existing customers or to any potential future customers.

Article 3. Adoption and Implementation of Plans

10640. Every urban water supplier required to prepare a plan pursuant to this part shall prepare its plan pursuant to Article 2 (commencing with Section 10630). The supplier shall likewise periodically review the plan as required by Section 10621, and any amendments or changes required as a result of that review shall be adopted pursuant to this article.

10641. An urban water supplier required to prepare a plan may consult with, and obtain comments from, any public agency or state agency or any person who has special expertise with respect to water demand management methods and techniques.

10642. Each urban water supplier shall encourage the active involvement of diverse social, cultural, and economic elements of the population within the service area prior to and during the preparation of the plan. Prior to adopting a plan, the urban water supplier shall make the plan available for public inspection and shall hold a public hearing thereon. Prior to the hearing, notice of the time and place of hearing shall be published within the jurisdiction of the publicly owned water supplier pursuant to Section 6066 of the Government Code. The urban water supplier shall provide notice of the time and place of hearing to any city or county within which the supplier provides water supplies. A privately owned water supplier shall provide an



equivalent notice within its service area. After the hearing, the plan shall be adopted as prepared or as modified after the hearing.

10643. An urban water supplier shall implement its plan adopted pursuant to this chapter in accordance with the schedule set forth in its plan.

10644.

- (a) An urban water supplier shall submit to the department, the California State Library, and any city or county within which the supplier provides water supplies a copy of its plan no later than 30 days after adoption. Copies of amendments or changes to the plans shall be submitted to the department, the California State Library, and any city or county within which the supplier provides water supplies within 30 days after adoption.
- (b) The department shall prepare and submit to the Legislature, on or before December 31, in the years ending in six and one, a report summarizing the status of the plans adopted pursuant to this part. The report prepared by the department shall identify the exemplary elements of the individual plans. The department shall provide a copy of the report to each urban water supplier that has submitted its plan to the department. The department shall also prepare reports and provide data for any legislative hearings designed to consider the effectiveness of plans submitted pursuant to this part.
- (c) (1) For the purpose of identifying the exemplary elements of the individual plans, the department shall identify in the report those water demand management measures adopted and implemented by specific urban water suppliers, and identified pursuant to Section 10631, that achieve water savings significantly above the levels established by the department to meet the requirements of Section 10631.5.
- (2) The department shall distribute to the panel convened pursuant to Section 10631.7 the results achieved by the implementation of those water demand management measures described in paragraph (1).
- (3) The department shall make available to the public the standard the department will use to identify exemplary water demand management measures.

10645. Not later than 30 days after filing a copy of its plan with the department, the urban water supplier and the department shall make the plan available for public review during normal business hours.

Chapter 4. Miscellaneous Provisions

10650. Any actions or proceedings to attack, review, set aside, void, or annul the acts or decisions of an urban water supplier on the grounds of noncompliance with this part shall be commenced as follows:

- (a) An action or proceeding alleging failure to adopt a plan shall be commenced within 18 months after that adoption is required by this part.
- (b) Any action or proceeding alleging that a plan, or action taken pursuant to the plan, does not comply with this part shall be commenced within 90 days after filing of the plan or amendment thereto pursuant to Section 10644 or the taking of that



action.

10651. In any action or proceeding to attack, review, set aside, void, or annul a plan, or an action taken pursuant to the plan by an urban water supplier on the grounds of noncompliance with this part, the inquiry shall extend only to whether there was a prejudicial abuse of discretion. Abuse of discretion is established if the supplier has not proceeded in a manner required by law or if the action by the water supplier is not supported by substantial evidence.

10652. The California Environmental Quality Act (Division 13 (commencing with Section 21000) of the Public Resources Code) does not apply to the preparation and adoption of plans pursuant to this part or to the implementation of actions taken pursuant to Section 10632. Nothing in this part shall be interpreted as exempting from the California Environmental Quality Act any project that would significantly affect water supplies for fish and wildlife, or any project for implementation of the plan, other than projects implementing Section 10632, or any project for expanded or additional water supplies.

10653. The adoption of a plan shall satisfy any requirements of state law, regulation, or order, including those of the State Water Resources Control Board and the Public Utilities Commission, for the preparation of water management plans or conservation plans; provided, that if the State Water Resources Control Board or the Public Utilities Commission requires additional information concerning water conservation to implement its existing authority, nothing in this part shall be deemed to limit the board or the commission in obtaining that information. The requirements of this part shall be satisfied by any urban water demand management plan prepared to meet federal laws or regulations after the effective date of this part, and which substantially meets the requirements of this part, or by any existing urban water management plan which includes the contents of a plan required under this part.

10654. An urban water supplier may recover in its rates the costs incurred in preparing its plan and implementing the reasonable water conservation measures included in the plan. Any best water management practice that is included in the plan that is identified in the "Memorandum of Understanding Regarding Urban Water Conservation in California" is deemed to be reasonable for the purposes of this section.

10655. If any provision of this part or the application thereof to any person or circumstances is held invalid, that invalidity shall not affect other provisions or applications of this part which can be given effect without the invalid provision or application thereof, and to this end the provisions of this part are severable.

10656. An urban water supplier that does not prepare, adopt, and submit its urban water management plan to the department in accordance with this part, is ineligible to receive funding pursuant to Division 24 (commencing with Section 78500) or Division 26 (commencing with Section 79000), or receive drought assistance from the state until the urban water management plan is submitted pursuant to this article.

Source: *Guidebook to Assist Urban Water Suppliers to Prepare a 2010 Urban Water Management Plan*, California Department of Water Resources, March 2011.



Appendix B

SBX7 7

Established: SB 7, Steinberg, 2009

CALIFORNIA WATER CODE DIVISION 6

PART 255. WATER CONSERVATION

Legislative Counsel's Digest

Senate Bill No. 7

Chapter 4

An act to amend and repeal Section 10631.5 of, to add Part 2.55 (commencing with Section 10608) to Division 6 of, and to repeal and add Part 2.8 (commencing with Section 10800) of Division 6 of, the Water Code, relating to water.

[Approved by Governor November 10, 2009. Filed with Secretary of State November 10, 2009.]

Legislative Counsel's Digest

SB 7, Steinberg. Water conservation.

(1) Existing law requires the Department of Water Resources to convene an independent technical panel to provide information to the department and the Legislature on new demand management measures, technologies, and approaches. "Demand management measures" means those water conservation measures, programs, and incentives that prevent the waste of water and promote the reasonable and efficient use and reuse of available supplies.

This bill would require the state to achieve a 20% reduction in urban per capita water use in California by December 31, 2020. The state would be required to make incremental progress towards this goal by reducing per capita water use by at least 10% on or before December 31, 2015. The bill would require each urban retail water supplier to develop urban water use targets and an interim urban water use target, in accordance with specified requirements. The bill would require agricultural water suppliers to implement efficient water management practices. The bill would require the department, in consultation with other state agencies, to develop a single standardized water use reporting form. The bill, with certain exceptions, would provide that urban retail water suppliers, on and after July 1, 2016, and agricultural water suppliers, on and after July 1, 2013, are not eligible for state water grants or loans unless they comply with the water conservation requirements established by the bill. The bill would repeal, on July 1, 2016, an existing requirement that conditions eligibility for certain water management grants or loans to an urban water supplier on the implementation of certain water demand management measures.

(2) Existing law, until January 1, 1993, and thereafter only as specified, requires



certain agricultural water suppliers to prepare and adopt water management plans.

This bill would revise existing law relating to agricultural water management planning to require agricultural water suppliers to prepare and adopt agricultural water management plans with specified components on or before December 31, 2012, and update those plans on or before December 31, 2015, and on or before December 31 every 5 years thereafter. An agricultural water supplier that becomes an agricultural water supplier after December 31, 2012, would be required to prepare and adopt an agricultural water management plan within one year after becoming an agricultural water supplier. The agricultural water supplier would be required to notify each city or county within which the supplier provides water supplies with regard to the preparation or review of the plan. The bill would require the agricultural water supplier to submit copies of the plan to the department and other specified entities. The bill would provide that an agricultural water supplier is not eligible for state water grants or loans unless the supplier complies with the water management planning requirements established by the bill.

(3) The bill would take effect only if SB 1 and SB 6 of the 2009–10 7th Extraordinary Session of the Legislature are enacted and become effective.

The people of the State of California do enact as follows:

SECTION 1. Part 2.55 (commencing with Section 10608) is added to Division 6 of the Water Code, to read:

Part 2.55. Sustainable Water Use and Demand Reduction

Chapter 1. General Declarations and Policy

10608. The Legislature finds and declares all of the following:

(a) Water is a public resource that the California Constitution protects against waste and unreasonable use.

(b) Growing population, climate change, and the need to protect and grow California's economy while protecting and restoring our fish and wildlife habitats make it essential that the state manage its water resources as efficiently as possible.

(c) Diverse regional water supply portfolios will increase water supply reliability and reduce dependence on the Delta.

(d) Reduced water use through conservation provides significant energy and environmental benefits, and can help protect water quality, improve streamflows, and reduce greenhouse gas emissions.

(e) The success of state and local water conservation programs to increase efficiency of water use is best determined on the basis of measurable outcomes related to water use or efficiency.

(f) Improvements in technology and management practices offer the potential for increasing water efficiency in California over time, providing an essential water management tool to meet the need for water for urban, agricultural, and environmental uses.



(g) The Governor has called for a 20 percent per capita reduction in urban water use statewide by 2020.

(h) The factors used to formulate water use efficiency targets can vary significantly from location to location based on factors including weather, patterns of urban and suburban development, and past efforts to enhance water use efficiency.

(i) Per capita water use is a valid measure of a water provider's efforts to reduce urban water use within its service area. However, per capita water use is less useful for measuring relative water use efficiency between different water providers. Differences in weather, historical patterns of urban and suburban development, and density of housing in a particular location need to be considered when assessing per capita water use as a measure of efficiency.

10608.4. It is the intent of the Legislature, by the enactment of this part, to do all of the following:

(a) Require all water suppliers to increase the efficiency of use of this essential resource.

(b) Establish a framework to meet the state targets for urban water conservation identified in this part and called for by the Governor.

(c) Measure increased efficiency of urban water use on a per capita basis.

(d) Establish a method or methods for urban retail water suppliers to determine targets for achieving increased water use efficiency by the year 2020, in accordance with the Governor's goal of a 20-percent reduction.

(e) Establish consistent water use efficiency planning and implementation standards for urban water suppliers and agricultural water suppliers.

(f) Promote urban water conservation standards that are consistent with the California Urban Water Conservation Council's adopted best management practices and the requirements for demand management in Section 10631.

(g) Establish standards that recognize and provide credit to water suppliers that made substantial capital investments in urban water conservation since the drought of the early 1990s.

(h) Recognize and account for the investment of urban retail water suppliers in providing recycled water for beneficial uses.

(i) Require implementation of specified efficient water management practices for agricultural water suppliers.

(j) Support the economic productivity of California's agricultural, commercial, and industrial sectors.

(k) Advance regional water resources management.

10608.8.

(a) (1) Water use efficiency measures adopted and implemented pursuant to this part or Part 2.8 (commencing with Section 10800) are water conservation



measures subject to the protections provided under Section 1011.

(2) Because an urban agency is not required to meet its urban water use target until 2020 pursuant to subdivision (b) of Section 10608.24, an urban retail water supplier's failure to meet those targets shall not establish a violation of law for purposes of any state administrative or judicial proceeding prior to January 1, 2021. Nothing in this paragraph limits the use of data reported to the department or the board in litigation or an administrative proceeding. This paragraph shall become inoperative on January 1, 2021.

(3) To the extent feasible, the department and the board shall provide for the use of water conservation reports required under this part to meet the requirements of Section 1011 for water conservation reporting.

(b) This part does not limit or otherwise affect the application of Chapter 3.5 (commencing with Section 11340), Chapter 4 (commencing with Section 11370), Chapter 4.5 (commencing with Section 11400), and Chapter 5 (commencing with Section 11500) of Part 1 of Division 3 of Title 2 of the Government Code.

(c) This part does not require a reduction in the total water used in the agricultural or urban sectors, because other factors, including, but not limited to, changes in agricultural economics or population growth may have greater effects on water use. This part does not limit the economic productivity of California's agricultural, commercial, or industrial sectors.

(d) The requirements of this part do not apply to an agricultural water supplier that is a party to the Quantification Settlement Agreement, as defined in subdivision (a) of Section 1 of Chapter 617 of the Statutes of 2002, during the period within which the Quantification Settlement Agreement remains in effect. After the expiration of the Quantification Settlement Agreement, to the extent conservation water projects implemented as part of the Quantification Settlement Agreement remain in effect, the conserved water created as part of those projects shall be credited against the obligations of the agricultural water supplier pursuant to this part.

Chapter 2. Definitions

10608.12. Unless the context otherwise requires, the following definitions govern the construction of this part:

(a) "Agricultural water supplier" means a water supplier, either publicly or privately owned, providing water to 10,000 or more irrigated acres, excluding recycled water. "Agricultural water supplier" includes a supplier or contractor for water, regardless of the basis of right, that distributes or sells water for ultimate resale to customers. "Agricultural water supplier" does not include the department.

(b) "Base daily per capita water use" means any of the following:

(1) The urban retail water supplier's estimate of its average gross water use, reported in gallons per capita per day and calculated over a continuous 10-year period ending no earlier than December 31, 2004, and no later than December 31, 2010.

(2) For an urban retail water supplier that meets at least 10 percent of its 2008 measured retail water demand through recycled water that is delivered within



the service area of an urban retail water supplier or its urban wholesale water supplier, the urban retail water supplier may extend the calculation described in paragraph (1) up to an additional five years to a maximum of a continuous 15-year period ending no earlier than December 31, 2004, and no later than December 31, 2010.

(3) For the purposes of Section 10608.22, the urban retail water supplier's estimate of its average gross water use, reported in gallons per capita per day and calculated over a continuous five-year period ending no earlier than December 31, 2007, and no later than December 31, 2010.

(c) "Baseline commercial, industrial, and institutional water use" means an urban retail water supplier's base daily per capita water use for commercial, industrial, and institutional users.

(d) "Commercial water user" means a water user that provides or distributes a product or service.

(e) "Compliance daily per capita water use" means the gross water use during the final year of the reporting period, reported in gallons per capita per day.

(f) "Disadvantaged community" means a community with an annual median household income that is less than 80 percent of the statewide annual median household income.

(g) "Gross water use" means the total volume of water, whether treated or untreated, entering the distribution system of an urban retail water supplier, excluding all of the following:

(1) Recycled water that is delivered within the service area of an urban retail water supplier or its urban wholesale water supplier.

(2) The net volume of water that the urban retail water supplier places into longterm storage.

(3) The volume of water the urban retail water supplier conveys for use by another urban water supplier.

(4) The volume of water delivered for agricultural use, except as otherwise provided in subdivision (f) of Section 10608.24.

(h) "Industrial water user" means a water user that is primarily a manufacturer or processor of materials as defined by the North American Industry Classification System code sectors 31 to 33, inclusive, or an entity that is a water user primarily engaged in research and development.

(i) "Institutional water user" means a water user dedicated to public service. This type of user includes, among other users, higher education institutions, schools, courts, churches, hospitals, government facilities, and nonprofit research institutions.

(j) "Interim urban water use target" means the midpoint between the urban retail water supplier's base daily per capita water use and the urban retail water supplier's urban water use target for 2020.



(k) “Locally cost effective” means that the present value of the local benefits of implementing an agricultural efficiency water management practice is greater than or equal to the present value of the local cost of implementing that measure.

(l) “Process water” means water used for producing a product or product content or water used for research and development, including, but not limited to, continuous manufacturing processes, water used for testing and maintaining equipment used in producing a product or product content, and water used in combined heat and power facilities used in producing a product or product content. Process water does not mean incidental water uses not related to the production of a product or product content, including, but not limited to, water used for restrooms, landscaping, air conditioning, heating, kitchens, and laundry.

(m) “Recycled water” means recycled water, as defined in subdivision (n) of Section 13050, that is used to offset potable demand, including recycled water supplied for direct use and indirect potable reuse, that meets the following requirements, where applicable:

(1) For groundwater recharge, including recharge through spreading basins, water supplies that are all of the following:

(A) Metered.

(B) Developed through planned investment by the urban water supplier or a wastewater treatment agency.

(C) Treated to a minimum tertiary level.

(D) Delivered within the service area of an urban retail water supplier or its urban wholesale water supplier that helps an urban retail water supplier meet its urban water use target.

(2) For reservoir augmentation, water supplies that meet the criteria of paragraph (1) and are conveyed through a distribution system constructed specifically for recycled water.

(n) “Regional water resources management” means sources of supply resulting from watershed-based planning for sustainable local water reliability or any of the following alternative sources of water:

(1) The capture and reuse of stormwater or rainwater.

(2) The use of recycled water.

(3) The desalination of brackish groundwater.

(4) The conjunctive use of surface water and groundwater in a manner that is consistent with the safe yield of the groundwater basin.

(o) “Reporting period” means the years for which an urban retail water supplier reports compliance with the urban water use targets.

(p) “Urban retail water supplier” means a water supplier, either publicly or privately owned, that directly provides potable municipal water to more than 3,000 end users or that supplies more than 3,000 acre-feet of potable water annually at retail



for municipal purposes.

(q) "Urban water use target" means the urban retail water supplier's targeted future daily per capita water use.

(r) "Urban wholesale water supplier," means a water supplier, either publicly or privately owned, that provides more than 3,000 acre-feet of water annually at wholesale for potable municipal purposes.

Chapter 3. Urban Retail Water Suppliers

10608.16.

(a) The state shall achieve a 20-percent reduction in urban per capita water use in California on or before December 31, 2020.

(b) The state shall make incremental progress towards the state target specified in subdivision (a) by reducing urban per capita water use by at least 10 percent on or before December 31, 2015.

10608.20.

(a) (1) Each urban retail water supplier shall develop urban water use targets and an interim urban water use target by July 1, 2011. Urban retail water suppliers may elect to determine and report progress toward achieving these targets on an individual or regional basis, as provided in subdivision (a) of Section 10608.28, and may determine the targets on a fiscal year or calendar year basis.

(2) It is the intent of the Legislature that the urban water use targets described in subdivision (a) cumulatively result in a 20-percent reduction from the baseline daily per capita water use by December 31, 2020.

(b) An urban retail water supplier shall adopt one of the following methods for determining its urban water use target pursuant to subdivision (a):

(1) Eighty percent of the urban retail water supplier's baseline per capita daily water use.

(2) The per capita daily water use that is estimated using the sum of the following performance standards:

(A) For indoor residential water use, 55 gallons per capita daily water use as a provisional standard. Upon completion of the department's 2016 report to the Legislature pursuant to Section 10608.42, this standard may be adjusted by the Legislature by statute.

(B) For landscape irrigated through dedicated or residential meters or connections, water efficiency equivalent to the standards of the Model Water Efficient Landscape Ordinance set forth in Chapter 2.7 (commencing with Section 490) of Division 2 of Title 23 of the California Code of Regulations, as in effect the later of the year of the landscape's installation or 1992. An urban retail water supplier using the approach specified in this subparagraph shall use satellite imagery, site visits, or other best available technology to develop an accurate estimate



of landscaped areas.

(C) For commercial, industrial, and institutional uses, a 10-percent reduction in water use from the baseline commercial, industrial, and institutional water use by 2020.

(3) Ninety-five percent of the applicable state hydrologic region target, as set forth in the state's draft 20x2020 Water Conservation Plan (dated April 30, 2009). If the service area of an urban water supplier includes more than one hydrologic region, the supplier shall apportion its service area to each region based on population or area.

(4) A method that shall be identified and developed by the department, through a public process, and reported to the Legislature no later than December 31, 2010. The method developed by the department shall identify per capita targets that cumulatively result in a statewide 20-percent reduction in urban daily per capita water use by December 31, 2020. In developing urban daily per capita water use targets, the department shall do all of the following:

(A) Consider climatic differences within the state.

(B) Consider population density differences within the state.

(C) Provide flexibility to communities and regions in meeting the targets.

(D) Consider different levels of per capita water use according to plant water needs in different regions.

(E) Consider different levels of commercial, industrial, and institutional water use in different regions of the state.

(F) Avoid placing an undue hardship on communities that have implemented conservation measures or taken actions to keep per capita water use low.

(c) If the department adopts a regulation pursuant to paragraph (4) of subdivision (b) that results in a requirement that an urban retail water supplier achieve a reduction in daily per capita water use that is greater than 20 percent by December 31, 2020, an urban retail water supplier that adopted the method described in paragraph (4) of subdivision (b) may limit its urban water use target to a reduction of not more than 20 percent by December 31, 2020, by adopting the method described in paragraph (1) of subdivision (b).

(d) The department shall update the method described in paragraph (4) of subdivision (b) and report to the Legislature by December 31, 2014. An urban retail water supplier that adopted the method described in paragraph (4) of subdivision (b) may adopt a new urban daily per capita water use target pursuant to this updated method.

(e) An urban retail water supplier shall include in its urban water management plan required pursuant to Part 2.6 (commencing with Section 10610) due in 2010 the baseline daily per capita water use, urban water use target, interim urban water use target, and compliance daily per capita water use, along with the bases for determining those estimates, including references to supporting data.

(f) When calculating per capita values for the purposes of this chapter, an urban



retail water supplier shall determine population using federal, state, and local population reports and projections.

(g) An urban retail water supplier may update its 2020 urban water use target in its 2015 urban water management plan required pursuant to Part 2.6 (commencing with Section 10610).

(h) (1) The department, through a public process and in consultation with the California Urban Water Conservation Council, shall develop technical methodologies and criteria for the consistent implementation of this part, including, but not limited to, both of the following:

(A) Methodologies for calculating base daily per capita water use, baseline commercial, industrial, and institutional water use, compliance daily per capita water use, gross water use, service area population, indoor residential water use, and landscaped area water use.

(B) Criteria for adjustments pursuant to subdivisions (d) and (e) of Section 10608.24.

(2) The department shall post the methodologies and criteria developed pursuant to this subdivision on its Internet Web site, and make written copies available, by October 1, 2010. An urban retail water supplier shall use the methods developed by the department in compliance with this part.

(i) (1) The department shall adopt regulations for implementation of the provisions relating to process water in accordance with subdivision (l) of Section 10608.12, subdivision (e) of Section 10608.24, and subdivision (d) of Section 10608.26.

(2) The initial adoption of a regulation authorized by this subdivision is deemed to address an emergency, for purposes of Sections 11346.1 and 11349.6 of the Government Code, and the department is hereby exempted for that purpose from the requirements of subdivision (b) of Section 11346.1 of the Government Code. After the initial adoption of an emergency regulation pursuant to this subdivision, the department shall not request approval from the Office of Administrative Law to readopt the regulation as an emergency regulation pursuant to Section 11346.1 of the Government Code.

(j) An urban retail water supplier shall be granted an extension to July 1, 2011, for adoption of an urban water management plan pursuant to Part 2.6 (commencing with Section 10610) due in 2010 to allow use of technical methodologies developed by the department pursuant to paragraph (4) of subdivision (b) and subdivision (h). An urban retail water supplier that adopts an urban water management plan due in 2010 that does not use the methodologies developed by the department pursuant to subdivision (h) shall amend the plan by July 1, 2011, to comply with this part.

10608.22. Notwithstanding the method adopted by an urban retail water supplier pursuant to Section 10608.20, an urban retail water supplier's per capita daily water use reduction shall be no less than 5 percent of base daily per capita water use as defined in paragraph (3) of subdivision (b) of Section 10608.12. This section does not apply to an urban retail water supplier with a base daily per capita water use at or below 100 gallons per capita per day.



10608.24.

(a) Each urban retail water supplier shall meet its interim urban water use target by December 31, 2015.

(b) Each urban retail water supplier shall meet its urban water use target by December 31, 2020.

(c) An urban retail water supplier's compliance daily per capita water use shall be the measure of progress toward achievement of its urban water use target.

(d) (1) When determining compliance daily per capita water use, an urban retail water supplier may consider the following factors:

(A) Differences in evapotranspiration and rainfall in the baseline period compared to the compliance reporting period.

(B) Substantial changes to commercial or industrial water use resulting from increased business output and economic development that have occurred during the reporting period.

(C) Substantial changes to institutional water use resulting from fire suppression services or other extraordinary events, or from new or expanded operations, that have occurred during the reporting period.

(2) If the urban retail water supplier elects to adjust its estimate of compliance daily per capita water use due to one or more of the factors described in paragraph (1), it shall provide the basis for, and data supporting, the adjustment in the report required by Section 10608.40.

(e) When developing the urban water use target pursuant to Section 10608.20, an urban retail water supplier that has a substantial percentage of industrial water use in its service area, may exclude process water from the calculation of gross water use to avoid a disproportionate burden on another customer sector.

(f) (1) An urban retail water supplier that includes agricultural water use in an urban water management plan pursuant to Part 2.6 (commencing with Section 10610) may include the agricultural water use in determining gross water use. An urban retail water supplier that includes agricultural water use in determining gross water use and develops its urban water use target pursuant to paragraph (2) of subdivision (b) of Section 10608.20 shall use a water efficient standard for agricultural irrigation of 100 percent of reference evapotranspiration multiplied by the crop coefficient for irrigated acres.

(2) An urban retail water supplier, that is also an agricultural water supplier, is not subject to the requirements of Chapter 4 (commencing with Section 10608.48), if the agricultural water use is incorporated into its urban water use target pursuant to paragraph (1).

10608.26.

(a) In complying with this part, an urban retail water supplier shall conduct at least one public hearing to accomplish all of the following:

(1) Allow community input regarding the urban retail water supplier's



implementation plan for complying with this part.

(2) Consider the economic impacts of the urban retail water supplier's implementation plan for complying with this part.

(3) Adopt a method, pursuant to subdivision (b) of Section 10608.20, for determining its urban water use target.

(b) In complying with this part, an urban retail water supplier may meet its urban water use target through efficiency improvements in any combination among its customer sectors. An urban retail water supplier shall avoid placing a disproportionate burden on any customer sector.

(c) For an urban retail water supplier that supplies water to a United States Department of Defense military installation, the urban retail water supplier's implementation plan for complying with this part shall consider the United States Department of Defense military installation's requirements under federal Executive Order 13423.

(d) (1) Any ordinance or resolution adopted by an urban retail water supplier after the effective date of this section shall not require existing customers as of the effective date of this section, to undertake changes in product formulation, operations, or equipment that would reduce process water use, but may provide technical assistance and financial incentives to those customers to implement efficiency measures for process water. This section shall not limit an ordinance or resolution adopted pursuant to a declaration of drought emergency by an urban retail water supplier.

(2) This part shall not be construed or enforced so as to interfere with the requirements of Chapter 4 (commencing with Section 113980) to Chapter 13 (commencing with Section 114380), inclusive, of Part 7 of Division 104 of the Health and Safety Code, or any requirement or standard for the protection of public health, public safety, or worker safety established by federal, state, or local government or recommended by recognized standard setting organizations or trade associations.

10608.28.

(a) An urban retail water supplier may meet its urban water use target within its retail service area, or through mutual agreement, by any of the following:

(1) Through an urban wholesale water supplier.

(2) Through a regional agency authorized to plan and implement water conservation, including, but not limited to, an agency established under the Bay Area Water Supply and Conservation Agency Act (Division 31 (commencing with Section 81300)).

(3) Through a regional water management group as defined in Section 10537.

(4) By an integrated regional water management funding area.

(5) By hydrologic region.

(6) Through other appropriate geographic scales for which computation methods



have been developed by the department.

(b) A regional water management group, with the written consent of its member agencies, may undertake any or all planning, reporting, and implementation functions under this chapter for the member agencies that consent to those activities. Any data or reports shall provide information both for the regional water management group and separately for each consenting urban retail water supplier and urban wholesale water supplier.

10608.32. All costs incurred pursuant to this part by a water utility regulated by the Public Utilities Commission may be recoverable in rates subject to review and approval by the Public Utilities Commission, and may be recorded in a memorandum account and reviewed for reasonableness by the Public Utilities Commission.

10608.36. Urban wholesale water suppliers shall include in the urban water management plans required pursuant to Part 2.6 (commencing with Section 10610) an assessment of their present and proposed future measures, programs, and policies to help achieve the water use reductions required by this part.

10608.40. Urban water retail suppliers shall report to the department on their progress in meeting their urban water use targets as part of their urban water management plans submitted pursuant to Section 10631. The data shall be reported using a standardized form developed pursuant to Section 10608.52.

10608.42. The department shall review the 2015 urban water management plans and report to the Legislature by December 31, 2016, on progress towards achieving a 20-percent reduction in urban water use by December 31, 2020. The report shall include recommendations on changes to water efficiency standards or urban water use targets in order to achieve the 20-percent reduction and to reflect updated efficiency information and technology changes.

10608.43. The department, in conjunction with the California Urban Water Conservation Council, by April 1, 2010, shall convene a representative task force consisting of academic experts, urban retail water suppliers, environmental organizations, commercial water users, industrial water users, and institutional water users to develop alternative best management practices for commercial, industrial, and institutional users and an assessment of the potential statewide water use efficiency improvement in the commercial, industrial, and institutional sectors that would result from implementation of these best management practices. The taskforce, in conjunction with the department, shall submit a report to the Legislature by April 1, 2012, that shall include a review of multiple sectors within commercial, industrial, and institutional users and that shall recommend water use efficiency standards for commercial, industrial, and institutional users among various sectors of water use. The report shall include, but not be limited to, the following:

(a) Appropriate metrics for evaluating commercial, industrial, and institutional water use.

(b) Evaluation of water demands for manufacturing processes, goods, and cooling.

(c) Evaluation of public infrastructure necessary for delivery of recycled water to the commercial, industrial, and institutional sectors.

(d) Evaluation of institutional and economic barriers to increased recycled water use within the commercial, industrial, and institutional sectors.



(e) Identification of technical feasibility and cost of the best management practices to achieve more efficient water use statewide in the commercial, industrial, and institutional sectors that is consistent with the public interest and reflects past investments in water use efficiency.

10608.44. Each state agency shall reduce water use on facilities it operates to support urban retail water suppliers in meeting the target identified in Section 10608.16.

Source: *Guidebook to Assist Urban Water Suppliers to Prepare a 2010 Urban Water Management Plan*, California Department of Water Resources, March 2011.



Appendix C

Resolution to Adopt the Urban Water Management Plan

RESOLUTION NO. 7432

CITY OF SOUTH GATE
LOS ANGELES COUNTY, CALIFORNIA

**A RESOLUTION OF THE CITY COUNCIL OF THE CITY OF
SOUTH GATE ADOPTING THE CITY'S 2010 URBAN
WATER MANAGEMENT PLAN TO COMPLY WITH SB X7-7,
THE WATER CONSERVATION ACT OF 2009**

WHEREAS, the Urban Water Management Planning Act (California Water Code Division 6, Part 2.6, Sections 10610 through 10656) requires that all urban water suppliers providing water for municipal purposes, either directly or indirectly to more than 3,000 customers, or supplying more than 3,000 acre-feet of water annually, must prepare and submit an urban water management plan at least every five years; and

WHEREAS, Senate Bill X7-7, also known as the Water Conservation Act of 2009, extended the deadline for adoption of the 2010 Urban Water Management Plan from December 31, 2010 to July 1, 2011 to allow urban retail water suppliers additional time to comply with the requirements of Senate Bill X7-7 and incorporate the adopted per capita water use targets required by Senate Bill X7-7 into the 2010 Urban Water Management Plan; and

WHEREAS, the City has prepared its 2010 Urban Water Management Plan as a coordinated plan to ensure the availability and reliability of the City's water supplies through the year 2035; and

WHEREAS, consistent with Section 6066 of the Government Code, said plan was made available for public review, and notice of the Public Hearing was published in *The Press* and posted on the City's Website; and

WHEREAS, the City Council held a Public Hearing on the City's 2010 Urban Water Management Plan on June 14, 2011; and

WHEREAS, no later than 30 days after submittal of the adopted plan to the State of California Department of Water Resources, a copy will be provided to the California State Library and the City Clerk's office as required by the California Water Code;

**NOW, THEREFORE, THE CITY COUNCIL OF THE CITY OF SOUTH GATE
DOES HEREBY RESOLVE AS FOLLOWS:**

SECTION 1. The above recitals are all true and correct.



SECTION 2. The City Council of the City of South Gate hereby adopts the City's Urban Water Management Plan attached hereon at Exhibit A as promulgated by the State of California Department of Water Resources as the Urban Water Management Plan for the City of South Gate in accordance with Section 10642 of the California Water Code.

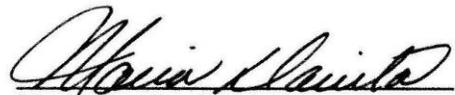
SECTION 3. The Public Works Director is hereby directed to make a copy of the City's adopted 2010 Urban Water Management Plan available for public review at the City Clerk's office no later than 30 days after submittal to the California Department of Water Resources in accordance with Section 10645 of the California Water Code.

SECTION 4. The Public Works Director is hereby directed to provide an adopted copy of the 2010 Urban Water Management Plan to other agencies as required by law.

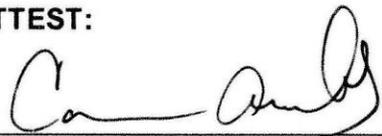
SECTION 5. The City Clerk shall certify to the adoption of this Resolution which shall be effective upon its adoption.

PASSED, APPROVED, and ADOPTED this 14th day of June 2011.

CITY OF SOUTH GATE


Maria Davila, Mayor

ATTEST:



Carmen Avalos, City Clerk
(SEAL)

APPROVED AS TO FORM:



Raul F. Salinas, City Attorney



Resolution to Adopt the Amended Urban Water Management Plan

RESOLUTION NO. 7614

CITY OF SOUTH GATE
LOS ANGELES COUNTY, CALIFORNIA

A RESOLUTION OF THE CITY COUNCIL OF THE CITY OF SOUTH GATE ADOPTING THE CITY'S 2010 URBAN WATER MANAGEMENT PLAN, AMENDED FEBRUARY 3, 2014 (AMENDED PLAN), TO COMPLY WITH THE WATER CODE

WHEREAS, the Urban Water Management Planning Act (California Water Code Division 6, Part 2.6, Sections 10610 through 10656) requires that all urban water suppliers providing water for municipal purposes must prepare and submit an urban water management plan (UWMP) at least every five years; and

WHEREAS, in 2011, the City prepared its 2010 UWMP as a coordinated plan to ensure the availability and reliability of the City's water supplies through the year 2035; and

WHEREAS, the City Council adopted Resolution No. 7432 adopting the 2010 UWMP (Plan) on June 14, 2011; and

WHEREAS, in January 2014, the City received comments from the Department of Water Resources (DWR) stating that the Demand Management Measures (e.g. water management, reduction in water consumption and water conservation, etc.) identified in the Plan did not fully describe the measures to be used to promote water efficiency; and

WHEREAS, the City deemed it necessary to amend the adopted Plan and consider adopting the Revised Plan to ensure DWR regulations are fully satisfied; and

WHEREAS, consistent with Section 6066 of the Government Code, said plan was made available for public review, and notice of the Public Hearing was published in *The Press* and posted on the City's Website; and

WHEREAS, the City Council held a Public Hearing on the Amended Plan on July 8, 2014;

NOW, THEREFORE, THE CITY COUNCIL OF THE CITY OF SOUTH GATE DOES HEREBY RESOLVE AS FOLLOWS:

SECTION 1. The above recitals are all true and correct.



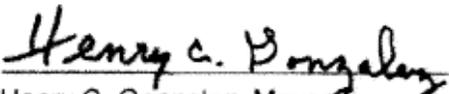
SECTION 2. The City Council of the City of South Gate hereby adopts the City's Urban Water Management Plan, amended February 3, 2014 (Amended Plan) attached hereon as Exhibit A as promulgated by the DWR as the Urban Water Management Plan for the City of South Gate in accordance with Section 10642 of the California Water Code.

SECTION 3. The City Clerk is hereby directed to make a copy of the Revised Plan available for public review at the City Clerk's office no later than 30 days after submittal to the DWR and the California State Library in accordance with Section 10645 of the California Water Code.

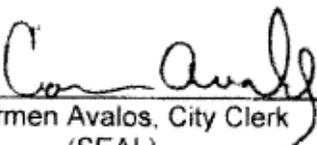
SECTION 4. The City Clerk shall certify to the adoption of this Resolution which shall be effective upon its adoption.

PASSED, APPROVED and ADOPTED this 8th day of July 2014.

CITY OF SOUTH GATE


Henry C. Gonzalez, Mayor

ATTEST:


Carmen Avalos, City Clerk
(SEAL)

APPROVED AS TO FORM:


Raul F. Salinas, City Attorney



Appendix D

City of South Gate Ordinance 2263 Amending Muni Code Ch. 6.64 Water Conservation Measures



ORDINANCE NO. 2263

**CITY OF SOUTH GATE
LOS ANGELES COUNTY, CALIFORNIA**

**AN ORDINANCE OF THE CITY COUNCIL OF THE CITY OF
SOUTH GATE AMENDING TITLE 6 (HEALTH AND
SANITATION), CHAPTER 6.64 (WATER CONSERVATION)
OF THE SOUTH GATE MUNICIPAL CODE IN ITS ENTIRETY**

WHEREAS, the purpose of this ordinance is to modify water conservation regulations and water shortage contingency measures consistent with the State law; and

WHEREAS, California enters its third consecutive year of drought; and

WHEREAS, the City's policy promotes conservation and efficient use of water; and

WHEREAS, mandatory conservation will begin replacing voluntary efforts at the local government level; and

WHEREAS, cities must begin implementing local efforts through partnerships, ordinances, and tiered rate systems in order to meet pending state requirements and qualify for much-needed funding through the Metropolitan Water District; and

WHEREAS, The Metropolitan Water District (MWD) Board of Directors has adopted a policy requiring cities in its jurisdiction to have a water conservation ordinance in place by June 30, 2009, as a prerequisite for funding through the Public Sector Program (PSP) and Enhanced Conservation Program (ECP); and

WHEREAS, this ordinance has been determined to be Categorically Exempt pursuant to Section 15308, Class 8 of the California Environmental Quality Act (CEQA);

NOW, THEREFORE, THE CITY COUNCIL OF THE CITY OF SOUTH GATE DOES HEREBY ORDAIN AS FOLLOWS:

CHAPTER 6.64 (WATER CONSERVATION)

Sections:

- 6.64.010 Title.**
- 6.64.020 Findings.**
- 6.64.030 Declaration of Purpose and Intent.**



6.64.040	Definitions.
6.64.050	Application.
6.64.060	Permanent Water Conservation Requirements – Prohibition Against Waste.
6.64.070	Level 1 Water Supply Shortage.
6.64.080	Level 2 Water Supply Shortage.
6.64.090	Level 3 Water Supply Shortage – Emergency Condition.
6.64.100	Procedures for Determination/Notification of Water Supply Shortage.
6.64.110	Level 3 Alternate Provisions.
6.64.120	Hardship Waiver.
6.64.130	Penalties and Violations.
6.64.140	Severability.

SECTION 1. Title 6 (Health and Sanitation) of the South Gate Municipal Code is amended by adding Chapter 6.64 (Water Conservation Ordinance) as follows:

6.64.010. Title.

This chapter will be known as the City of South Gate Water Conservation and Water Supply Shortage Program.

6.64.020. Findings.

A. A reliable minimum supply of potable water is essential to the public health, safety and welfare of the people and economy of the City of South Gate and Southern California region.

B. Southern California is a semi-arid region and is largely dependent upon imported water supplies. A growing population, climate change, environmental concerns, and other factors in other parts of the State of and western United States, make the region highly susceptible to water supply reliability issues.

C. Careful water management that includes active water conservation measures not only in times of drought, but at all times, is essential to ensure a reliable minimum supply of water to meet current and future water supply needs.

D. Article XI, Section 7 of the California Constitution declares that a City or County may make and enforce within its limits all local, police, sanitary and other ordinances and regulations not in conflict with general laws.

E. Article X, Section 2 of the California Constitution declares that the general welfare requires that water resources be put to beneficial use, waste or unreasonable use or unreasonable method of use of water be prevented, and conservation of water be fully exercised with a view to the reasonable and beneficial use thereof.

F. California Water Code Section 375 authorizes water suppliers to adopt and enforce a comprehensive water conservation program to reduce water consumption and conserve supplies.

G. The adoption and enforcement of a water conservation and supply shortage program is necessary to manage the City's potable water supply in the short and long-term and to avoid or minimize the effects of drought and shortages within the



City. Such program is essential to ensure a reliable and sustainable minimum supply of water for the public health, safety and welfare.

6.64.030. Declaration of Purpose and Intent.

A. The purpose of this chapter is to establish a water conservation and supply shortage program that will reduce water consumption within the City of South Gate through conservation, enable effective water supply planning, assure reasonable and beneficial use of water, prevent waste of water, and maximize the efficient use of water within the City of South Gate to avoid and minimize the effect and hardship of water shortage to the greatest extent possible.

B. This chapter establishes permanent water conservation standards intended to alter behavior related to water use efficiency for non-shortage conditions and further establishes three levels of water supply shortage response actions to be implemented during times of declared water shortage or declared water shortage emergency, with increasing restrictions on water use in response to worsening drought or emergency conditions and decreasing supplies.

6.64.040. Definitions.

A. The following words and phrases whenever used in this chapter have the meaning defined in this section:

1. "City" means the City of South Gate.
2. "Person" means any natural person or persons, corporation, public or private entity, governmental agency or institution, or any other user of water provided by the City.
3. "Landscape Irrigation System" means an irrigation system with pipes, hoses, spray heads, or sprinkling devices that are operated by hand or through an automated system.
4. "Large Landscape Areas" means a lawn, landscape, or other vegetated area, or combination thereof, equal to more than one (1) acre of irrigable land.
5. "Single Pass Cooling Systems" means equipment where water is circulated only one to cool equipment before being disposed.
6. "Potable Water" means water which is suitable for drinking.
7. "Recycled Water" means the reclamation and reuse of non-potable water for beneficial use.
8. "Billing Unit" means the unit of water used to apply water rates for purposes of calculating water charges for a persons water usage and equals one hundred (100) cubic feet or seven hundred forty-eight (748) gallons of water.

6.64.050. Application.

A. The provisions of this chapter apply to any person in the use of any potable water provided by the City.

B. The provisions of this chapter do not apply to uses of water necessary to protect public health and safety or for essential government services, such as police, fire and other similar emergency services.



C. The provisions of this chapter do not apply to the use of recycled water, with the exception of Section VI (a).

D. The provisions of this chapter do not apply to the use of water by commercial nurseries and commercial growers to sustain plants, trees, shrubs, crops or other vegetation intended for commercial sale.

E. This chapter is intended solely to further the conservation of water. It is not intended to implement any provision of federal, state, or local statutes, ordinances, or regulations relating to protection of water quality or control of drainage or runoff. Refer to the local jurisdiction or Regional Water Quality Control Board for information on any storm water ordinances and storm water management plan.

6.64.060. Permanent Water Conservation Requirements- Prohibition Against Waste.

The following water conservation requirements are effective at all times and are permanent. Violations of this section will be considered waste and an unreasonable use of water.

A. **Limits on Watering Hours:** Watering or irrigating of lawn, landscape or other vegetated area with potable water is prohibited between the hours of 9 a.m. and 6 p.m. Pacific Standard Time on any day, except by use of a hand-held bucket or similar container, a hand-held hose equipped with a positive self-closing water shut-off nozzle or device, or for very short periods of time for the express purpose of adjusting or repairing an irrigation system.

B. **Limit on Watering Duration:** Watering or irrigating of lawn, landscape or other vegetated area with potable water using a landscape irrigation system or a watering device that is not continuously attended is limited to no more than fifteen (15) minutes watering per day per station. This subsection does not apply to landscape irrigation systems that exclusively use very low-flow drip type irrigation systems when no emitter produces more than two (2) gallons of water per hour and weather based controllers or stream rotor sprinklers that meet a 70% efficiency standard.

C. **No Excessive Water Flow or Runoff:** Watering or irrigating of any lawn, landscape or other vegetated area in a manner that causes or allows excessive water flow or runoff onto an adjoining sidewalk, driveway, street, alley, gutter or ditch is prohibited.

D. **No Washing Down hard or Paved Surfaces:** Washing down hard or paved surfaces, including but not limited to sidewalks, walkways, driveways, parking areas, tennis courts, patios or alleys, is prohibited except when necessary to alleviate safety or sanitary hazards, and then only by use of a hand-held bucket or similar container, a hand-held hose equipped with a positive self-closing water shut-off device or a low-volume, high pressure cleaning machine equipped to recycle any water used.

E. **Obligation to Fix Leaks, Breaks or Malfunctions:** Excessive use, loss or escape of water through breaks, leaks or other malfunctions in the water user's plumbing or distribution system for any period of time after such escape of water should have reasonable been discovered and corrected and in no event more than 3 days of receiving notice from the City is prohibited.



F. Re-circulating Water Required for Water Fountains and Decorative Water Features: Operating a water fountain or other decorative water feature that does not use re-circulated water is prohibited.

G. Limits on Washing Vehicles: Using water to wash or clean a vehicle, including but not limited to any automobile, truck, van, bus, motorcycle, boat or trailer, whether motorized or not is prohibited, except by use of a hand-held bucket or similar container or a hand-held hose equipped with a positive self-closing water shut-off nozzle or device. This subsection does not apply to any commercial car washing facility.

H. Drinking Water Served Upon Request Only: Eating or drinking establishments, including but not limited to a restaurant, hotel, café, cafeteria, bar, club or other public place where food or drinks are sold, served, or offered for sale, are prohibited from providing drinking water to any person unless expressly requested.

I. Commercial Lodging Establishments Must Provide Option to Not Launder Linen Daily: Hotels, motels, and other commercial lodging establishments must provide customers the option of not having towels and linen laundered daily. Commercial lodging establishments must prominently display notice of this option in each bathroom using clear and easily understood language.

J. No Installation of Single Pass Cooling Systems: Installation of single pass cooling systems is prohibited in buildings requesting new water service.

K. No Installation of Non-re-circulating in Commercial Car Wash and Laundry Systems: Installation of no-re-circulating water systems is prohibited in new commercial conveyor car wash and new commercial laundry systems.

L. Restaurants Required to Use Water Conserving Dish Wash Spray Valves: Food preparation establishments, such as restaurants or cafes, are prohibited from using non-water conserving dish wash spray valves.

6.64.070. Level 1 Water Supply Shortage.

A. A Level 1 Water Supply Shortage exists when the City determines, in its sole discretion, that due to drought or other water supply reductions, a water supply shortage exists and a consumer demand reduction is necessary to make more efficient use of water and appropriately respond to existing water conditions. Upon the declaration by the City of a Level 1 Water Supply Shortage condition, the City will implement the mandatory Level 1 conservation measures identified in this section. The type of event that may prompt the City to declare a Level 1 Water Supply Shortage may include, among other factors, a finding that its wholesale water provider calls for extraordinary water conservation.

A Level 1 Water Supply Shortage condition exists when the City notifies its water users that due to drought or other supply reductions, a consumer demand reduction of up to 10% is necessary to make more efficient use of water and respond to existing water conditions. Upon the declaration of a Level 1 Water Supply Shortage condition, the City shall implement the mandatory Level 1 conservation measures identified in this Ordinance. The type of event that may prompt the City to declare a Level 1 Water Supply Shortage may include, among other factors, a finding that its wholesale water provider calls for extraordinary water conservation.



B. Additional Water Conservation Measures: In addition to the prohibited uses of water identified in Section VI, the following water conservation requirements apply during a declared Level 1 Water Supply Shortage:

1. Limits on Watering Days: Watering or irrigating of lawn, landscape or other vegetated area with potable water is limited to three days per week on a schedule established and posted by the City. During the months of November through March, watering or irrigating of lawn, landscape or other vegetated area with potable water is limited to no more than one day per week on a schedule established and posted by the City. This provision does not apply to landscape irrigation zones that exclusively use very low flow drip type irrigation systems when no emitter produces more than two (2) gallons of water per hour. This provision also does not apply to watering or irrigating by use of a hand-held bucket or similar container, a hand-held hose equipped with a positive self-closing water shut-off nozzle or device, or for very short periods of time for the express purpose of adjusting or repairing an irrigation system.

2. Obligation to Fix Leaks, Breaks or Malfunctions: All leaks, breaks, or other malfunctions in the water user's plumbing or distribution system must be repaired within seventy-two (72) hours of notification by the City unless other arrangements are made with the City.

3. Other Prohibited Uses: The City may implement other prohibited water uses as determined by the City, after notice to customers.

6.64.080. Level 2 Water Supply Shortage.

A. A Level 2 Water Supply Shortage exists when the City determines, in its sole discretion, that due to drought or other supply reductions, a water supply shortage exists and a consumer demand reduction is necessary to make more efficient use of water and respond to existing water conditions. Upon the declaration by the City of a Level 2 Water Supply Shortage condition, the City will implement the mandatory Level 2 conservation measures identified in this section.

A Level 2 Water Supply Shortage condition exists when the City notifies its water users that due to drought or other supply reductions, a consumer demand reduction of up to 15% is necessary to make more efficient use of water and respond to existing water conditions. Upon the declaration of Level 2 Water Supply Shortage condition, the City shall implement the mandatory Level 2 conservation measures identified in this Ordinance.

B. Additional Conservation Measures: In addition to the prohibited uses of water identified in Section VI and VII, the following additional water conservation requirements apply during a declared Level 2 Water Supply Shortage.

1. Watering Days: Watering or irrigating of lawn, landscape or other vegetated area with potable water is limited to two days per week on a schedule established and posted by the City. During the months of November through March, watering or irrigating of lawn, landscape or other vegetated area with potable water is limited to no more than one day per week on a schedule established and posted by the City. This



provision does not apply to landscape irrigation zones that exclusively use very low flow drip type irrigation systems when no emitter produces more than two (2) gallons of water per hour. This provision also does not apply to watering or irrigating by use of a hand-held bucket or similar container, a hand-held hose equipped with a positive self-closing water shut-off nozzle or device, or for very short periods of time for the express purpose of adjusting or repairing an irrigation system.

2. **Obligation to Fix Leaks, Breaks or Malfunctions:** All leaks, breaks, or other malfunctions in the water user's plumbing or distribution system must be repaired within forty-eight (48) hours of notification by the city unless other arrangements are made with the City.

3. **Limits on Filling Ornamental Lakes or Ponds:** Filling or re-filling ornamental lakes or ponds is prohibited, except to the extent needed to sustain aquatic life, provided that such animals are of significant value and have been actively managed within the water feature prior to declaration of a supply shortage level under this ordinance.

4. **Limits on Washing Vehicles:** Using water to wash or clean a vehicle, including but not limited to, any automobile, truck, van, bus motorcycle, boat or trailer, whether motorized or not, is prohibited except by use of a hand-held bucket or similar container, a hand-held hose equipped with a positive self-closing water shut-off nozzle or device, by high pressure/low volume wash systems, or at a commercial car washing facility that utilizes a re-circulating water system to capture or reuse water.

5. **Limits on Filling Residential Swimming Pools and Spas:** Refilling of more than one foot and initial filling of residential swimming pools or outdoor spas with potable water is prohibited.

6. **Other Prohibited Uses:** The City may implement other prohibitions on water uses as determined by the City, after notice to customers.

Other Options at Level II:

1. **Water Allocations/ Water Budget:** The City may establish a water allocation for property served by the City using a method that does not penalize persons for the implementation of conservation methods or the installation of water saving devices. The City must provide notice of the allocation by including it in the regular billing statement for the fee or charge or by any other mailing to the address to which the City customarily mails the billing statement for fees or charges for on-going water service.

Following the effective date of the water allocation as established by the City, any person that uses water in excess of the allocation will be subject to a penalty in the amount of \$2.50 for each billing unit of water in excess of the allocation or an amount established by the Resolution of City Council whichever is greater. The penalty for excess water usage will be cumulative to any other remedy or penalty that may be imposed for violation of this Ordinance.

2. **Water Supply Shortage Rates:** During a Level 2 Water Supply Shortage condition, the City may increase water rates, other than Tier 1 Lifeline rates of 15 units per residential household.



3. Mandatory % Use Reductions: During a Level 2 Water Supply Shortage condition, all customers will be required to reduce water consumption by a percentage determined by the City.

6.64.090. Level 3 Water Supply Shortage- Emergency Condition.

A. A Level 3 Water Supply Shortage condition is also referred to as an "Emergency" condition. A Level 3 condition exists when the City declares a water shortage emergency and notifies its residents and businesses that a significant reduction in consumer demand is necessary to make more efficient use of water and respond to existing water conditions. Upon the declaration of a Level 3 Water Supply Shortage Emergency condition, the City will implement the mandatory Level 3 conservation measures identified in this section.

A Level 3 Water Supply Shortage Emergency exists when the City declares a water shortage emergency condition pursuant to California Water Code Section 350 and notifies its residents and businesses that more than a 40% consumer demand reduction is required to ensure sufficient supplies for human consumption, sanitation and fire protection. The City must declare a Water Supply Shortage Emergency in the manner and on the grounds provided in California Water Code Section 350.

B. Additional Conservation Measures: In addition to the prohibited uses of water identified in Section VI, VII, and VIII, the following water conservation requirements apply during a declared Level 3 Water Supply Shortage Emergency:

1. No Watering or Irrigating: Watering or irrigating of lawn, landscape or other vegetated area with potable water is prohibited. This restriction does not apply to the following categories of use unless the City has determined that recycled water is available and may be lawfully applied to the use:

- i. Maintenance of vegetation, including trees and shrubs, that are watered using a hand-held bucket or similar container, hand-held hose equipped with a positive self-closing water shut-off nozzle or device, or a very low-flow drip type irrigation system when no emitter produces more than two (2) gallons of water per hour subject to the hour restrictions in Section VI (a);
- ii. Maintenance of existing landscape necessary for fire protection;
- iii. Maintenance of existing landscape for soil erosion control;
- iv. Maintenance of plant materials identified to be rare or essential to the well being of rare animals;
- v. Maintenance of landscape within active public parks and playing fields, day care centers, school grounds, cemeteries, and golf course greens, provided that such irrigation does not exceed two (2) days per week according to the schedule established in Section VIII (b) (1) and time restrictions in Section VI (a) and (b)(1);
- vi. Public Works projects and actively irrigated environmental mitigation projects.



2. **Obligation to Fix Leaks, Breaks or Malfunctions:** All leaks, breaks, or other malfunctions in the water user's plumbing or distribution system must be repaired within twenty four (24) hours of notification by the City unless other arrangements are made with the City.

3. **No new Potable Water Service:** Upon declaration of a Level 3 Water Supply Shortage Emergency condition, no new potable water service will be provided, no new temporary meters or permanent meters will be provided, and no statements of immediate ability to serve or provide potable water service (such as, will serve letters, certificates, or letters of availability) will be issued, except under the following circumstances:

- a. A valid, unexpired building permit has been issued for the project; or
- b. The project is necessary to protect the public's health, safety, and welfare; or
- c. The applicant provides substantial evidence of an enforceable commitment that water demands for the project will be offset prior to the provision of a new water meter(s) to the satisfaction of the City.

This provision does not preclude the resetting or turn-on of meters to provide continuation of water service or the restoration of service that has been interrupted for a period of one year or less.

d. **Discontinue Service:** The City, in its sole discretion, may discontinue service to consumers who willfully violate provisions of this section.

e. **Other Prohibited Uses:** The City may implement other prohibited water uses as determined by the City, after notice to customers.

6.64.100. Procedures for Determination/Notification of Water Supply Shortage.

A. **Declaration and Notification of Level 1 and 2 Water Supply Shortage:** The existence of Level 1 and Level 2 Water Supply Shortage conditions may be declared by resolution of the City adopted at a regular or special public meeting held in accordance with State law. The mandatory conservation requirements applicable to Level 1 or Level 2 conditions will take effect on the tenth day after the date the shortage level is declared. Within five days following the declaration of the shortage level, the City must publish a copy of the resolution in a newspaper used for publication of official notices. If the City establishes a water allocation, it must provide notice of the allocation by including it in the regular billing statement for fees or charges for ongoing water service. A water allocation will be effective on the fifth day following the date of mailing or at such later date as specified in the notice.

B. **Declaration and Notification of Level 3 Water Supply Shortage:** The existence of a Level 3 Water Supply Shortage Emergency condition may be declared in accordance with the procedures specified in Water Code Sections 351 and 352. The mandatory conservation requirements applicable to the Level 3 conditions will take effect on the tenth (10) day after the date the shortage level is declared. Within five (5) days following the declaration of the shortage level, the City must publish a copy of the Resolution in a newspaper used for the publication of official notices. If the City establishes a water allocation, it will provide notice of the allocation by including it in the regular billing statement or by any other mailing to the address to which the City



customarily mails the billing statement or by any other mailing to the address to which the City customarily mails the billing statement for fees or charges for ongoing water service. A water allocation will be effective on the fifth day following the date of mailing or at such later date as specified in the notice.

6.64.110. Level 3 Alternate Provisions.

A. Commercial Car Wash Systems: Effective on January 1, 2011, all commercial conveyor car wash systems must have installed and operational re-circulating water systems, or must have secured a waiver of this requirement from the City.

B. Large Landscape Areas- Rain Sensors: Large landscape areas, such as parks, cemeteries, golf courses, school grounds, and playing fields, that use landscape irrigation systems to water or irrigate, must use landscape irrigation systems with rain sensors that automatically shut off such systems during periods of rain or irrigation timers which automatically use information such as evapotranspiration sensors to set an efficient water use schedule.

C. Construction Purposes: Recycled or non-potable water must be used for construction purposes when available.

D. No New Annexations: Upon the declaration of a Level 3 Water Supply Shortage condition, the City will suspend consideration of annexations to its service area. This subsection does not apply to boundary corrections and annexations that will not result in any increased use of water.

E. Limits on Building Permits: The City may limit or withhold the issuance of building permits which require new or expanded water service, except to protect the public health, safety and welfare, or in cases which meet the City's adopted conservation offset requirements.

F. Water Recycling Required if Alternative Available: The use of potable water, other than recycled water, is prohibited for specified uses after the City has provided to the customer an analysis showing that recycled water is a cost-effective alternative to potable water for such uses and the customer has had a reasonable time, as determined by the City Manager, to make the conversion to recycled water.

G. Water Recycling- New Service: Prior to the connection of any new water service, an evaluation must be done by the City to determine whether recycled water exists to supply all or some of the water needed and recycled water must be utilize to the extent feasible.

H. City Conservation Reports: Upon request of the City Manager, City Departments must prepare and submit quarterly reports on their water conservation efforts. The reports will be consolidated by the City Manager and reported to the City Council at a minimum of once a year.

I. Customer Water Conservation Reports: The City may be written request require all commercial, residential and industrial customers using twenty five thousand (25,000) or more billing units per year to submit a water conservation plan and to submit quarterly progress reports on such plan. The conservation plan must include recommendations for increased water savings, including increased water recycling based on feasibility, and the reports must include progress to date on implementation of such recommendations.



J. Reporting Mechanism- Hotline: The City will establish a water waste hotline for residents to report violation of this chapter.

6.64.120. Hardship Waiver

A. Undue and Disproportionate Hardship: if, due to unique circumstances, a specific requirement of this chapter would result in undue hardship to a person using water or to property upon which water is used, that is disproportionate to the impacts to water users generally or to similar property or classes of water users, then the person may apply for a waiver to the requirements as provided in this section.

B. Written Finding: The waiver may be granted or conditionally granted only upon a written finding of the existence of facts demonstrating an undue hardship to a person using water or to property upon which water is used, that is disproportionate to the impacts to water users generally or to similar property or classes of water use due to specific and unique circumstances of the user or the user's property.

1. Application: Application for a waiver must be on a form prescribed by the City and accompanied by a non-refundable processing fee in an amount of five hundred dollars (\$500) or as established by the Resolution by the City Council whichever is greater.

2. Supporting Documentation: The application must be accompanied by photographs, maps, drawings, and other information, including a written statement of the applicant.

3. Required Findings for Waiver: An application for a waiver will be denied unless the Water Division Manager finds, based on the information provided in the application, supporting documents, or such additional information as may be requested, and on water use information for the property as shown by the records of the City or its Agent, all of the following:

- i. That the waiver does not constitute a grant of special privilege inconsistent with the limitations upon other residents and businesses;
- ii. That because of special circumstances applicable to the property or its use, the strict application of this chapter would have a disproportionate impact on the property or use that exceeds the impacts to residents and businesses generally;
- iii. That the authorizing of such waiver will not be of substantial detriment to adjacent properties, and will not materially affect the ability of the City to effectuate the purpose of this chapter and will not be detrimental to the public interest; and
- iv. That the condition or situation of the subject property or the intended use of the property for which the waiver is sought is not common, recurrent or general in nature.

4. Approval Authority: The City Manager or Water Division Manager must act upon any completed application no later than ten (10) business days after submittal and may approve, conditionally approve, or deny the waiver. The applicant requesting the waiver must be promptly notified in writing of any action taken. Unless



specified otherwise at the time a waiver is approved, the waiver will apply to the subject property during the period of the mandatory water supply shortage condition. The decision of the City Manager or Water Division Manager will be final.

6.64.130. Penalties and Violations.

A. Misdemeanor: Any violation of this chapter may be prosecuted as a misdemeanor punishable by imprisonment in the county jail for not more than thirty (30) days, or by a fine not exceeding one thousand dollars (\$1,000) or as established by Resolution of the City Council whichever is greater, or by both.

B. Civil Penalties: Civil penalties for failure to comply with any provisions of the Ordinance are as follows:

1. First Violation: The City will issue a written warning and deliver a copy of this Ordinance by certified mail.

2. Second Violation: A second violation within the preceding twelve (12) calendar months is punishable by a fine not to exceed one hundred dollars (\$100) or as established by Resolution of the City Council whichever is greater.

3. Third Violation: A third violation within the preceding twelve (12) calendar months is punishable by a fine not to exceed two hundred and fifty (\$250) or as established by Resolution of the City Council whichever is greater .

4. Fourth and Subsequent Violations: A fourth and any subsequent violation is punishable by a fine not to exceed five hundred (\$500) or as established by Resolution of the City Council whichever is greater

i. Water Flow Restrictor: In addition to any fines, the City may install a services water flow restrictor device of approximately one gallon per minute capacity for services up to one and one-half inch size and comparatively sized restrictors for larger services after written notice of intent to install a flow restrictor for a minimum of forty eight (48) hours.

ii. Termination of Service: In addition to any fines and the installation of a water flow restrictor, the City may disconnect and/or terminate a customer's water service.

C. Cost of Flow Restrictor and Disconnecting Service: A person or entity that violates this Ordinance is responsible for payment of the City's charges for installing and/or removing any flow restricting device and for disconnecting and/or reconnecting service per the City's schedule of charges then in effect. This charge for installing or removing a flow restriction device will be set at one hundred dollars (\$100) each or as established by Resolution of the City Council whichever is greater. The charge for installing and/or removing any flow restricting device must be paid to the City before the device is removed. Nonpayment will be subject to the same remedies as nonpayment of basic water rates.

D. Separate Offenses: Each day that violation of this Ordinance occurs is a separate offense.

E. Notice and Hearing:



1. The City will issue a Notice of Violation by certified mail or personal delivery at least ten (10) days before taking enforcement action. Such notice must describe the violation and the date by which corrective action must be taken. A customer may appeal the Notice of Violation by filing a written notice of appeal with the City no later than the close of business on the day before the date scheduled for enforcement action. Any Notice of Violation not timely appealed will be final. Upon receipt of a timely appeal, a hearing on the appeal will be scheduled, and the City will mail written notice of the hearing date to the customer at least ten (10) days before the date of the hearing.

2. Pending receipt of a written appeal or pending a hearing pursuant to an appeal, the City may take appropriate steps to prevent the unauthorized use of water as appropriate to the nature and extent of the violations and the current declared water Level condition.

6.64.140. Severability.

If any section, subsection, sentence, clause or phrase in this chapter is for any reason held invalid, the validity of the remainder of the chapter will not be affected. The City Council hereby declares it would have passed this chapter and each section, subsection, sentence, clause or phrase thereof, irrespective of the fact that one or more sections, subsections, sentences, clauses, or phases or is declared invalid.

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ORDINANCE CERTIFICATION PAGE

STATE OF CALIFORNIA)
COUNTY OF LOS ANGELES) SS
CITY OF SOUTH GATE)

I, Carmen Avalos, City Clerk of the City of South Gate, California, hereby certify that the whole number of Members of the City Council of said City is five; that Ordinance No. 2263 was adopted by the City Council at their Regular Meeting held on July 28, 2009, by the following vote:

Ayes: Council Members: Gonzalez, Martinez, Davila, De Witt and Hurtado
Noes: Council Members: None
Absent: Council Members: None
Abstain: Council Members: None

Witness my hand and the seal of said City on August 11, 2009.



Carmen Avalos, City Clerk
City of South Gate, California

Source: City of South Gate Municipal Code



Appendix E

City of South Gate Resolutions 4892, 4963, 4964, and 5054 Regarding Water Conservation Plan



RESOLUTION NO. 4892

1
2 A RESOLUTION OF THE CITY COUNCIL OF
3 THE CITY OF SOUTH GATE, CALIFORNIA,
4 REQUESTING AND ENCOURAGING WATER
5 CONSERVATION PRACTICES BY ALL WATER
6 USERS IN THE CITY OF SOUTH GATE.

7
8 WHEREAS, the Southern California area is in its fourth
9 consecutive year of drought; and

10 WHEREAS, the Metropolitan Water District has declared a
11 water shortage in its service area, which includes the City of
12 South Gate, and has urged its member agencies to voluntary
13 reduce water consumption by ten percent; and

14 WHEREAS, all member agencies and cities served by the
15 Metropolitan Water District have been requested to adopt a
16 voluntary drought resolution; and

17 WHEREAS, failure to meet the ten percent reduction may
18 result in mandatory reduction in greater levels later in the
19 summer.

20 NOW, THEREFORE, BE IT RESOLVED BY THE CITY COUNCIL OF THE
21 CITY OF SOUTH GATE, CALIFORNIA, AS FOLLOWS:

22 SECTION 1. The City Council of the City of South Gate
23 declares that a water shortage exists and requests and
24 encourages all water users to reduce water usage by at least
25 ten percent.

26 SECTION 2. The following activities are hereby
27 discouraged during this period of voluntary conservation:

- 28 1. Use of a hose to wash walkways, driveways, parking
29 areas and other hard surfaces;
30 2. Cleaning, filling, or refilling non-recirculating
31 decorative fountains;
3. Serving water to restaurant customers, unless
expressly requested;



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4. Watering lawns and landscape areas between 10:00 A.M. and 4:00 P.M.;

5. Allowing water leaks to continue without repair.

SECTION 3. South Gate Water users are further urged to consider the installation of water efficient plumbing fixtures and the use of drought-tolerant landscaping when possible.

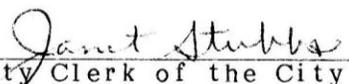
SECTION 4. The Mayor of the City of South Gate is hereby authorized to affix his signature to this Resolution thereby signifying its adoption by the City Council of the City of South Gate, and

SECTION 5. That the City Clerk shall certify to the passage and adoption of this Resolution; shall cause the same to be entered in the book of original resolutions of said City; and shall make a minute of the passage and adoption thereof in the records of the proceedings of the City Council of said City in the minutes of the meeting at which the same is passed and adopted.

Passed, approved and adopted this 9th day of July, 1990.


Mayor of the City of
South Gate, California.

ATTEST:


City Clerk of the City of
South Gate, California.

(SEAL)



CITY OF SOUTH GATE
LOS ANGELES COUNTY, CALIFORNIA

A RESOLUTION OF THE CITY COUNCIL OF THE CITY OF SOUTH GATE DETERMINING THAT A SIGNIFICANT SHORTAGE IN POTABLE WATER SUPPLY IS ANTICIPATED AND IMPLEMENTING PHASE I OF THE SOUTH GATE WATER CONSERVATION PLAN.

WHEREAS, California is experiencing a fifth year of drought state-wide; and

WHEREAS, the Metropolitan Water District of Southern California has adopted a water conservation plan which will reduce the amount of imported water available for purchase; and

WHEREAS, the reduction will affect direct purchases of water supplies from the Metropolitan Water District of Southern California as well as indirect purchases for the purpose of groundwater recharge into the Central Basin; and

WHEREAS, the City of South Gate relies on local groundwater and imported water supplies to meet its total demand; and

WHEREAS, the Metropolitan Water District of Southern California has implemented Stage 6 of its water conservation program to be effective April 1, 1991; and

WHEREAS, the implementation of said water conservation program requires the City of South Gate to reduce its purchases of imported water supplies by up to 100%; and

WHEREAS, the implementation of said water conservation program also reduces the amount of water available for purchase which may be used for groundwater recharge into the Central Basin; and

WHEREAS, the City of South Gate has historically obtained, during certain months, up to 20% of its water supply from imported water purchased from the Metropolitan Water District of Southern California; and



1 WHEREAS, the City of South Gate cannot satisfy demands
2 without depleting the available water supply and thereby
3 subjecting the City to severe penalties; and

4 WHEREAS, the City Council has adopted a Water Conservation
5 Ordinance pursuant to which a water conservation plan may be
6 implemented by resolution;

7 NOW, THEREFORE, THE CITY COUNCIL OF THE CITY OF SOUTH GATE
8 DOES HEREBY FIND, DETERMINE AND RESOLVE AS FOLLOWS:

9 SECTION 1. The City Council hereby determines that a
10 significant water shortage in potable water supply is
11 anticipated, and that implementation of the Water Conservation
12 Ordinance is necessary to protect the public health, welfare and
13 safety.

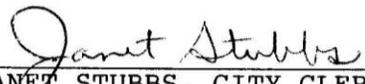
14 SECTION 2. The City Council hereby directs the
15 implementation of Phase I of the water conservation plan as set
16 forth in Section 6.64.050 of the Water Conservation Ordinance,
17 and authorizes the Chief Administrative Officer to take all
18 necessary actions to effectuate the provisions of Phase I in
19 order to achieve water conservation objectives.

20 SECTION 3. The City Clerk shall certify to the passage
21 and adoption of this Resolution.

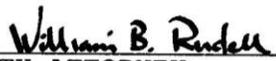
22 Passed, approved and adopted this 8th day of April ,
23 1991.

24 
25 ROBERT A. PHILIPP, MAYOR

26 ATTEST:

27 
28 JANET STUBBS, CITY CLERK
29 (SEAL)

30 APPROVED AS TO FORM:

31 
32 CITY ATTORNEY



CITY OF SOUTH GATE
LOS ANGELES COUNTY, CALIFORNIA

A RESOLUTION OF THE CITY COUNCIL OF THE CITY OF SOUTH GATE AMENDING SECTION 5 OF RESOLUTION NO. 4797 TO ESTABLISH EMERGENCY SURCHARGE RATES AND FEES FOR IMPROPER WATER USE PURSUANT TO SECTIONS 6.64.080 AND 6.64.100 OF ORDINANCE NO. 1867 (THE WATER CONSERVATION ORDINANCE).

THE CITY COUNCIL OF THE CITY OF SOUTH GATE DOES HEREBY RESOLVE AS FOLLOWS:

SECTION 1. Section 5 of Resolution No. 4797 is hereby amended by adding to Rule Two ("Rate Schedules") thereof, a new Schedule IV ("Emergency Surcharge Rates") which shall read as follows:

"SCHEDULE IV
EMERGENCY SURCHARGE RATES

A. Phase I Water Conservation Plan: Emergency Surcharge Rates.

For the duration of any Phase I Water Conservation Plan implemented by the City Council pursuant to the provisions of Ordinance No. ____ ("Water Conservation Ordinance"), the emergency surcharge rates set forth in this Schedule IV shall be applicable. As used herein, the term "billing unit" shall mean the amount billed for each 100 cubic feet of water consumed.

1. Single Family Residential Customers.

A water customer owning or occupying a single-family residence shall be billed monthly for each 100 cubic feet of water consumed, through and including the first 15 billing units, at the applicable "quantity rate" set forth in Section 2 ("Rates") of Schedule 1 ("Meter Rates") of this Rule Two. All billing units in excess of 15 shall be subject to the emergency surcharge rate and shall be billed at one and one-half times the applicable quantity rate.

2. Duplex Residential Customers.

A water customer owning or occupying a residential structure with two dwelling-units shall be billed monthly for each 100 cubic feet of water consumed, through and including the first 13 billing units used per dwelling-unit, at the applicable "quantity rate" set forth in Section 2 ("Rates") of Schedule 1 ("Meter Rates") of this Rule Two. All billing units in excess of an average of 13 billing units per dwelling-unit shall be subject to the emergency surcharge rate and shall be billed at one and one-half times the applicable quantity rate. If each dwelling-unit is separately metered and billed, the emergency surcharge rate shall apply to all billing units in excess of 13 per dwelling-unit and shall be billed at one and one-half times the applicable quantity rate.



1 3. Multi-family Residential Customers.

2 A water customer owning or occupying a residential
3 structure with three or more dwelling-units shall be billed
4 monthly for each 100 cubic feet of water consumed, through and
5 including that total number of billing units equal to 9 billing
6 units times the number of dwelling units at the service address.
7 Such billing shall be made at the applicable "quantity rate" set
8 forth in Section 2 ("Rates") of Schedule 1 ("Meter Rates") of
9 this Rule Two. All billing units in excess of an average of 9
10 billing units per dwelling-unit shall be subject to the emergency
11 surcharge rate and shall be billed at one and one-half times the
12 applicable quantity rate. If each dwelling-unit is separately
13 metered and billed, the emergency surcharge rate shall apply to
14 all billing units in excess of 9 per dwelling-unit and shall be
15 billed at one and one-half times the applicable quantity rate.

9 4. Other Water Customers.

10 A water customer other than one specified above in
11 subparagraphs 1 through 3 shall be billed monthly for each 100
12 cubic feet of water consumed, through and including the first 5
13 billing units, at the applicable "quantity rate" set forth in
14 Section 2 ("Rates") of Schedule 1 ("Meter Rates") of this Rule
15 Two. Any water usage in excess of 5 billing units shall be
16 subject to an allocation by the Director of Public Works, which
17 allocation shall not exceed ninety percent (90%) of the billing
18 units for water consumed by the water customer during the
19 corresponding calendar month in 1989. The billing units
20 representing the water allocation made by the Director of Public
21 Works shall likewise be billed at the applicable "quantity rate"
22 set forth in Section 2 ("Rates") of Schedule 1 ("Meter Rates") of
23 this Rule Two. However, all billing units for water in excess of
24 that allocated by the Director of Public Works shall be subject
25 to the emergency surcharge rate and shall be billed at one and
26 one-half times the applicable quantity rate.

19 B. Phase II and III Water Conservation Plan: Emergency
20 Surcharge Rates.

21 For the duration of any Phase II and III Water Conservation
22 Plan implemented by the City Council pursuant to the provisions
23 of Ordinance No. 1867 ("Water Conservation Ordinance"), the
24 following emergency surcharge rates shall be applicable:

23 1. Single Family Residential Customers.

24 A water customer owning or occupying a single-family
25 residence shall be billed monthly for each 100 cubic feet of
26 water consumed, through and including the first 13 billing units,
27 at the applicable "quantity rate" set forth in Section 2
28 ("Rates") of Schedule 1 ("Meter Rates") of this Rule Two. All
29 billing units in excess of 13 shall be subject to the emergency
30 surcharge rate and shall be billed at two times the applicable
31 quantity rate.

29 2. Duplex Residential Customers.

30 A water customer owning or occupying a residential
31 structure with two dwelling-units shall be billed monthly for
32 each 100 cubic feet of water consumed, through and including the
first 12 billing units used per dwelling unit, at the applicable
"quantity rate" set forth in Section 2 ("Rates") of Schedule 1
("Meter Rates") of this Rule Two. All billing units in excess of



1 an average of 12 billing units per dwelling-unit shall be subject
2 to the emergency surcharge rate and shall be billed at two times
3 the applicable quantity rate. If each dwelling-unit is
4 separately metered and billed, the emergency surcharge rate shall
5 apply to all billing units in excess of 12 per dwelling-unit and
6 shall be billed at two times the applicable quantity rate.

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3. Multi-family Residential Customers.

A water customer owning or occupying a residential structure with three or more dwelling units shall be billed monthly for each 100 cubic feet of water consumed, through and including that total number of billing units equal to 8 billing units times the number of dwelling units at the service address. Such billing shall be made at the applicable "quantity rate" set forth in Section 2 ("Rates") of Schedule 1 ("Meter Rates") of this Rule Two. All billing units in excess of an average of 8 billing units per dwelling-unit shall be subject to the emergency surcharge rate and shall be billed at two times the applicable quantity rate. If each dwelling-unit is separately metered and billed, the emergency surcharge rate shall apply to all billing units in excess of 8 per dwelling-unit and shall be billed at two times the applicable quantity rate.

4. Other Water Customers.

A water customer other than one specified above in subparagraphs 1 through 3 shall be billed monthly for each 100 cubic feet of water consumed, through and including the first 5 billing units, at the applicable "quantity rate" set forth in Section 2 ("Rates") of Schedule 1 ("Meter Rates") of this Rule Two. Any water usage in excess of 5 billing units shall, except as provided below, be subject to an allocation by the Director of Public Works, which allocation shall not exceed eighty-five percent (85%) of the billing units for water consumed by the water customer during the corresponding calendar month in 1989. Each separately metered customer purchasing water solely for irrigation purposes shall be subject to an allocation by the Director of Public Works not exceeding eighty percent (80%) of the billing units for water consumed by the water customer during the corresponding calendar month in 1989. The billing units representing the water allocation made by the Director of Public Works shall likewise be billed at the applicable "quantity rate" set forth in Section 2 ("Rates") of Schedule 1 ("Meter Rates") of this Rule Two. However, all billing units for water in excess of that allocated by the Director of Public Works shall be subject to the emergency surcharge rate and shall be billed at two times the applicable quantity rate."

SECTION 2. Section 5 of Resolution No. 4797 is hereby amended by amending Rule Thirteen ("Waste of Water") as follows:

- A. By designating the first paragraph of Rule Thirteen as paragraph 1.
- B. By adding to said Rule Thirteen a new paragraph 2 which shall read in its entirety as follows:

" 2. Violations of this Rule Thirteen or of any ordinance prohibiting improper water use shall be subject to the following sanctions and fees:



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A. First Violation.

The Director of Public Works shall issue a written warning to the customer for the first violation.

B. Second and Third Violations.

The Director of Public Works shall issue a written notice and assess an improper water use fee of \$25.00. If the fee is not paid in full within fifteen (15) days of issuance of the notice, the amount of the fee will be added to the customer's water bill.

C. Fourth Violation.

The Director of Public Works shall issue a written notice, charge an improper water use fee of \$75.00, and install a flow-restricting device on the customer's water service for a period of not less than twenty-four (24) hours. Such flow-restricting device shall reduce water flow to one gallon per minute for metered services, one and one-half inch or under. A similar flow-restricting device will be placed on larger meters. The fee shall be paid prior to the resumption of normal water service.

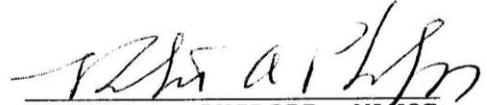
D. Fifth Violation.

The Director of Public Works shall issue a written notice, charge an improper water use fee of \$75.00, and install a flow-restricting device on the customer's water service for a period of not less than forty-eight (48) hours. Such flow-restricting device shall reduce water flow to one gallon per minute for metered services, one and one-half inch or under. A similar flow-restricting device will be placed on larger meters. The fee shall be paid prior to resumption of normal water service."

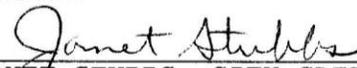
SECTION 3. This Resolution shall be operative upon April 8, 1991, which is the effective date of Ordinance No. 1867.

SECTION 4. The City Clerk shall certify to the passage and adoption of this Resolution.

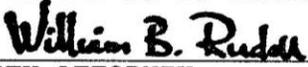
Passed, approved and adopted this 8th day of April, 1991.


ROBERT A. PHILIPP, MAYOR

ATTEST:


JANET STUBBS, CITY CLERK
(SEAL)

APPROVED AS TO FORM:


CITY ATTORNEY



CITY OF SOUTH GATE
LOS ANGELES COUNTY, CALIFORNIA

A RESOLUTION OF THE CITY COUNCIL OF THE CITY OF SOUTH GATE DETERMINING THAT A CONTINUING SHORTAGE IN POTABLE WATER SUPPLY IS ANTICIPATED, DIRECTING THE IMPLEMENTATION OF VOLUNTARY WATER CONSERVATION EFFORTS, AND REPEALING RESOLUTION NO. 4963

THE CITY COUNCIL OF THE CITY OF SOUTH GATE DOES HEREBY FIND, DETERMINE AND RESOLVE AS FOLLOWS:

Section 1. The City Council hereby determines that a continuing shortage in potable water supply is anticipated, but that measures less severe than those set forth in Phase I of the Water Conservation Ordinance may reasonably be expected to achieve water conservation objectives.

Section 2. The City Council hereby directs the City Manager to take all appropriate actions so as to develop and implement a voluntary water conservation plan in order to achieve water conservation objectives.

Section 3. Resolution No. 4963, as adopted on April 8, 1991, is hereby repealed.

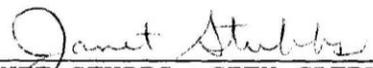
Section 4. The City Clerk shall certify to the passage and adoption of this Resolution.

Passed, approved and adopted this 9th day of December, 1991.



GREGORY SLAUGHTER, MAYOR

ATTEST:



JANET STUBBS, CITY CLERK
(SEAL)

APPROVED AS TO FORM:



CITY ATTORNEY

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Appendix F

Central Basin Judgement

The following document is the original adjudication of the Central Basin water rights. The top of Page 18 shows South Gate's original allocation.



1 LAGERLOF, SENEAL, DRESCHER & SWIFT
2 301 North Lake Avenue, 10th Floor
3 Pasadena, California 91101
4 (818) 793-9400 or (213) 385-4345
5
6
7

8 SUPERIOR COURT OF THE STATE OF CALIFORNIA
9 FOR THE COUNTY OF LOS ANGELES
10

11 CENTRAL AND WEST BASIN WATER)
12 REPLENISHMENT DISTRICT, etc.,)
13 Plaintiff,)

No. 786,656
SECOND AMENDED
JUDGMENT

14 v.)

(Declaring and establishing
water rights in Central Basin
and enjoining extractions
therefrom in excess of
specified quantities.)

15 CHARLES E. ADAMS, et al.,)
16 Defendants.)

17 CITY OF LAKEWOOD, a municipal)
18 corporation,)
19 Cross-Complainant,)

20 v.)

21 CHARLES E. ADAMS, et al.,)
22 Cross-Defendants.)

23 The above-entitled matter duly and regularly came on
24 for trial in Department 73 of the above-entitled Court (having
25 been transferred thereto from Department 75 by order of the
26 presiding Judge), before the Honorable Edmund M. Moor, specially
27 assigned Judge, on May 17, 1965, at 10:00 a.m. Plaintiff was
28 represented by its attorneys BEWLEY, KNOOP, LASSLEBEN & WHELAN,

- 1 -



1 MARTIN E. WHELAN, JR., and EDWIN H. VAIL, JR., and cross-
2 complainant was represented by its attorney JOHN S. TODD.
3 Various defendants and cross-defendants were also represented at
4 the trial. Evidence both oral and documentary was introduced.
5 The trial continued from day to day on May 17, 18, 19, 20, 21 and
6 24, 1965, at which time it was continued by order of Court for
7 further trial on August 25, 1965, at 10:00 a.m. in Department 73
8 of the above-entitled Court; whereupon, having then been
9 transferred to Department 74, trial was resumed in Department 74
10 on August 25, 1965, and then continued to August 27, 1965 at
11 10:00 a.m. in the same Department. On the latter date, trial was
12 concluded and the matter submitted. Findings of fact and conclu-
13 sions of law have heretofore been signed and filed. Pursuant to
14 the reserved and continuing jurisdiction of the court under the
15 judgment herein, certain amendments to said judgment and
16 temporary orders have heretofore been made and entered.
17 Continuing jurisdiction of the court for this action is currently
18 assigned to HON. FLORENCE T. PICKARD. Motion of Plaintiff herein
19 for further amendments to the judgment, notice thereof and of the
20 hearing thereon having been duly and regularly given to all
21 parties, came on for hearing in Department 38 of the above-
22 entitled court on MAY 6, 1991 at 8:45 a.m. before said HONORABLE
23 PICKARD. Plaintiff was represented by its attorneys LAGERLOF,
24 SENEAL, DRESCHER & SWIFT, by William F. Kruse. Various
25 defendants were represented by counsel of record appearing on the
26 Clerk's records. Hearing thereon was concluded on that date.
27 The within "Second Amended Judgment" incorporates amendments and
28 orders heretofore made to the extent presently operable and



1 amendments pursuant to said last mentioned motion. To the extent
2 this Amended Judgment is a restatement of the judgment as
3 heretofore amended, it is for convenience in incorporating all
4 matters in one document, is not a readjudication of such matters
5 and is not intended to reopen any such matters. As used
6 hereinafter the word "judgment" shall include the original
7 judgment as amended to date. In connection with the following
8 judgment, the following terms, words, phrases and clauses are
9 used by the Court with the following meanings:

10 "Administrative Year" means the water year until
11 operation under the judgment is converted to a fiscal year
12 pursuant to Paragraph 4, Part I, p. 53 hereof, whereupon it
13 shall mean a fiscal year, including the initial 'short fiscal
14 year' therein provided.

15 "Allowed Pumping Allocation" is that quantity in acre
16 feet which the Court adjudges to be the maximum quantity which a
17 party should be allowed to extract annually from Central Basin as
18 set forth in Part I hereof, which constitutes 80% of such party's
19 Total Water Right.

20 "Allowed Pumping Allocation for a particular Administra-
21 tive year" and "Allowed Pumping Allocation in the following
22 Administrative year" and similar clauses, mean the Allowed
23 Pumping Allocation as increased in a particular Administrative
24 year by any authorized carryovers pursuant to Part III, Subpart A
25 of this judgment and as reduced by reason of any over-extractions
26 in a previous Administrative year.

27 "Artificial Replenishment" is the replenishment of Central
28 Basin achieved through the spreading of imported or reclaimed



1 water for percolation thereof into Central Basin by a govern-
2 mental agency.

3 "Base Water Right" is the highest continuous extractions of
4 water by a party from Central Basin for a beneficial use in any
5 period of five consecutive years after the commencement of over-
6 draft in Central Basin and prior to the commencement of this
7 action, as to which there has been no cessation of use by that
8 party during any subsequent period of five consecutive years. As
9 employed in the above definition, the words "extractions of water
10 by a party" and "cessation of use by that party" include such
11 extractions and cessations by any predecessor or predecessors in
12 interest.

13 "Calendar Year" is the twelve month period commencing
14 January 1 of each year and ending December 31 of each year.

15 "Central Basin" is the underground water basin or reservoir
16 underlying Central Basin Area, the exterior boundaries of which
17 Central Basin are the same as the exterior boundaries of Central
18 Basin Area.

19 "Central Basin Area" is the territory described in Appendix
20 "1" to this judgment, and is a segment of the territory
21 comprising Plaintiff District.

22 "Declared water emergency" shall mean a period commencing
23 with the adoption of a resolution of the Board of Directors of
24 the Central and West Basin Water Replenishment District declaring
25 that conditions within the Central Basin relating to natural and
26 imported supplies of water are such that, without implementation
27 of the water emergency provisions of this Judgment, the water
28 resources of the Central Basin risk degradation. In making such



1 declaration, the Board of Directors shall consider any
2 information and requests provided by water producers, purveyors
3 and other affected entities and may, for that purpose, hold a
4 public hearing in advance of such declaration. A Declared Water
5 Emergency shall extend for one (1) year following such
6 resolution, unless sooner ended by similar resolution.

7 "Extraction", "extractions", "extracting", "extracted", and
8 other variations of the same noun and verb, mean pumping, taking,
9 diverting or withdrawing ground water by any manner or means
10 whatsoever from Central Basin.

11 "Fiscal Year" is the twelve (12) month period July 1 through
12 June 30 following.

13 "Imported Water" means water brought into Central Basin Area
14 from a non-tributary source by a party and any predecessors in
15 interest, either through purchase directly from The Metropolitan
16 Water District of Southern California or by direct purchase from
17 a member agency thereof, and additionally as to the Department of
18 Water and Power of the City of Los Angeles, water brought into
19 Central Basin Area by that party by means of the Owens River
20 Aqueduct.

21 "Imported Water Use Credit" is the annual amount, computed
22 on a calendar year basis, of imported water which any party and
23 any predecessors in interest, who have timely made the required
24 filings under Water Code Section 1005.1, have imported into
25 Central Basin Area in any calendar year and subsequent to July 9,
26 1951, for beneficial use therein, but not exceeding the amount by
27 which that party and any predecessors in interest reduces his or
28 their extractions of ground water from Central Basin in that



1 calendar year from the level of his or their extractions in the
2 preceding calendar year, or in any prior calendar year not
3 earlier than the calendar year 1950, whichever is the greater.

4 "Natural Replenishment" means and includes all processes
5 other than "Artificial Replenishment" by which water may become a
6 part of the ground water supply of Central Basin.

7 "Natural Safe Yield" is the maximum quantity of ground
8 water, not in excess of the long term average annual quantity of
9 Natural Replenishment, which may be extracted annually from
10 Central Basin without eventual depletion thereof or without
11 otherwise causing eventual permanent damage to Central Basin as a
12 source of ground water for beneficial use, said maximum quantity
13 being determined without reference to Artificial Replenishment.

14 "Overdraft" is that condition of a ground water basin
15 resulting from extractions in any given annual period or periods
16 in excess of the long term average annual quantity of Natural
17 Replenishment, or in excess of that quantity which may be
18 extracted annually without otherwise causing eventual permanent
19 damage to the basin.

20 "Party" means a party to this action. Whenever the
21 term "party" is used in connection with a quantitative water
22 right, or any quantitative right, privilege or obligation, or in
23 connection with the assessment for the budget of the Watermaster,
24 it shall be deemed to refer collectively to those parties to whom
25 are attributed a Total Water Right in Part I of this judgment.

26 "Person" or "persons" include individuals, partner-
27 ships, associations, governmental agencies and corporations, and
28 any and all types of entities.



1 "Total Water Right" is the quantity arrived at in the
2 same manner as in the computation of "Base Water Right", but
3 including as if extracted in any particular year the Imported
4 Water Use Credit, if any, to which a particular party may be
5 entitled.

6 "Water" includes only non-saline water, which is that
7 having less than 1,000 parts of chlorides to 1,000,000 parts of
8 water.

9 "Water Year" is the 12-month period commencing Octo-
10 ber 1 of each year and ending September 30th of the following
11 year.

12 In those instances where any of the above-defined
13 words, terms, phrases or clauses are utilized in the definition
14 of any of the other above-defined words, terms, phrases and
15 clauses, such use is with the same meaning as is above set forth.

16
17 NOW THEREFORE, IT IS ORDERED, DECLARED, ADJUDGED AND
18 DECREED WITH RESPECT TO THE ACTION AND CROSS-ACTION AS FOLLOWS:

19 I. DECLARATION AND DETERMINATION OF WATER RIGHTS OF
20 PARTIES; RESTRICTION ON THE EXERCISE THEREOF.¹

21 1. Determination of Rights of Parties.

22 (a) Each party, except defendants, The City of Los
23 Angeles and Department of Water and Power of the City of Los
24 Angeles, whose name is hereinafter set forth in the tabulation at
25 the conclusion of Subpart 3 of Part 1, and after whose name there
26

27 ¹Headings in the judgment are for purposes of reference and
28 the language of said headings do not constitute, other than for
such purpose, a portion of this judgment.



1 appears under the column "Total Water Right" a figure other than
2 "0", was the owner of and had the right to extract annually
3 groundwater from Central Basin for beneficial use in the quantity
4 set forth after that party's name under said column "Total Water
5 Right" pursuant to the Judgment as originally entered herein.
6 Attached hereto as Appendix "2" and by this reference made a part
7 hereof as though fully set forth are the water rights of parties
8 and successors in interest as they existed as of the close of the
9 water year ending September 30, 1978 in accordance with the
10 Watermaster Reports on file with this Court and the records of
11 the Plaintiff. This tabulation does not take into account
12 additions or subtractions from any Allowed Pumping Allocation of
13 a producer for the 1978-79 water year, nor other adjustments not
14 representing change in fee title to water rights, such as leases
15 of water rights, nor does it include the names of lessees of
16 landowners where the lessees are exercising the water rights.
17 The exercise of all water rights is subject, however, to the
18 provisions of this Judgment as hereinafter contained. All of
19 said rights are of the same legal force and effect and are
20 without priority with reference to each other. Each party whose
21 name is hereinafter set forth in the tabulation set forth in
22 Appendix "2" of this judgment, and after whose name there appears
23 under the column "Total Water Right" the figure "0" owns no
24 rights to extract any ground water from Central Basin, and has no
25 right to extract any ground water from Central Basin.

26 (b) Defendant The City of Los Angeles is the owner of
27 the right to extract fifteen thousand (15,000) acre feet per
28 annum of ground water from Central Basin. Defendant Department



1 of Water and Power of the City of Los Angeles has no right to
2 extract ground water from Central Basin except insofar as it has
3 the right, power, duty or obligation on behalf of defendant The
4 City of Los Angeles to exercise the water rights in Central Basin
5 of defendant The City of Los Angeles. The exercise of said
6 rights are subject, however, to the provisions of this judgment
7 hereafter contained, including but not limited to, sharing with
8 other parties in any subsequent decreases or increases in the
9 quantity of extractions permitted from Central Basin, pursuant to
10 continuing jurisdiction of the Court, on the basis that fifteen
11 thousand (15,000) acre feet bears to the Allowed Pumping
12 Allocations of the other parties.

13 (c) No party to this action is the owner of or has any
14 right to extract ground water from Central Basin except as herein
15 affirmatively determined.

16 2. Parties Enjoined as Regards Quantities of Extractions.

17 (a) Each party, other than The State of California and The
18 City of Los Angeles and Department of Water and Power of The City
19 of Los Angeles, is enjoined and restrained in any Administrative
20 year commencing after the date this judgment becomes final from
21 extracting from Central Basin any quantity of Water greater than
22 the party's Allowed Pumping Allocation as hereinafter set forth
23 next to the name of the party in the tabulation appearing in
24 Appendix 2 at the end of this Judgment, subject to further
25 provisions of this judgment. Subject to such further provisions,
26 the officials, agents and employees of The State of California
27 are enjoined and restrained in any such Administrative year from
28 extracting from Central Basin collectively any quantity of water



1 greater than the Allowed Pumping Allocation of The State of
2 California as hereinafter set forth next to the name of that
3 party in the same tabulation. Each party adjudged and declared
4 above not to be the owner of and not to have the right to extract
5 ground water from Central Basin is enjoined and restrained in any
6 Administrative year commencing after the date this judgment
7 becomes final from extracting any ground water from Central
8 Basin, except as may be hereinafter permitted to any such party
9 under the Exchange Pool provisions of this judgment.

10 (b) Defendant The City of Los Angeles is enjoined and
11 restrained in any Administrative year commencing after the date
12 this judgment becomes final from extracting from Central Basin
13 any quantity of water greater than fifteen thousand (15,000) acre
14 feet, subject to further provisions of this judgment, including
15 but not limited to, sharing with other parties in any subsequent
16 decreases or increases in the quantity of extractions permitted
17 from Central Basin by parties, pursuant to continuing
18 jurisdiction of the Court, on the basis that fifteen thousand
19 (15,000) acre feet bears to the Allowed Pumping Allocations of
20 the other parties. Defendant Department of Water and Power of
21 The City of Los Angeles is enjoined and restrained in any
22 Administrative year commencing after the date this judgment
23 becomes final from extracting from Central Basin any quantity of
24 water other than such as it may extract on behalf of defendant
25 The City of Los Angeles, and which extractions, along with any
26 extractions by said City, shall not exceed that quantity
27 permitted by this judgment to that City in any Administrative
28 year. Whenever in this judgment the term "Allowed Pumping



1 Allocation" appears, it shall be deemed to mean as to defendant
 2 The City of Los Angeles the quantity of fifteen thousand (15,000)
 3 acre feet.

Name ²	Total Water Right	Allowed Pumping Allocation
J. P. Abbott, Inc.	21	17
Charles E. Adams (Corty Van Dyke, tenant) (see additional listing below for Charles E. Adams)	8	6
Charles E. Adams and Rhoda E. Adams	5	4
Juan Aguayo and Salome Y. Aguayo	1	1
Aguiar Dairy, Inc.	33	26
Airfloor Company of California, Inc.	1	1
J. N. Albers and Nellie Albers	98	78
Jake J. Alewyn and Mrs. Jake J. Alewyn aka Normalie May Alewyn (see listing under name of Victor E. Gamboni)		
Tom Alger and Hilda Alger	9	7
Clarence M. Alvis and Doris M. Alvis	0	0
American Brake Shoe Company	52	42

²Parties and Rights as originally adjudicated



	<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
1			
2			
3	American Pipe and Construction Co.	188	150
4	Anaconda American Brass Company	0	0
5	Gerrit Anker (see listing under name of Agnes De Vries		
6			
7	Archdiocese of Los Angeles Education & Welfare Corporation	8	6
8			
9	George W. Armstrong and Ruth H. Armstrong (Armstrong Poultry Ranch, tenant)	28	22
10	Artesia Cemetery District	30	24
11	Artesia Milling Company (see listing under name of Dick Zuidervaart)		
12			
13	Artesia School District	51	41
14	Arthur Land Co., Inc.	13	10
15	Charles Arzouman and Neuart Arzouman	1	1
16			
17	Associated Southern Investment Company (William R. Morris, George V. Gutierrez and Mrs. Socorro Gutierrez, tenants and licensees)	16	13
18			
19	The Atchison, Topeka and Santa Fe Railway Co.	124	99
20	Atkinson Brick Company	11	9
21	Arthur Atsma (see listing under name of Andrew De Voss)		
22			
23	B.F.S. Mutual Water Company	183	146
24	Henry Baar (see listing under name of Steve Stefani, Sr.)		
25			
26	Vernon E. Bacon (see listing under name of Southern California Edison Company)		
27			
28			

- 12 -



<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
Adolph Bader and Gesine Bader (Fred Bader, tenant)	14	11
K. R. Bailey and Virginia R. Bailey	1	1
Dave Bajema (see listing under name of Peter Dotinga)		
Donald L. Baker and Patsy Ruth Baker	5	4
Allen Bakker	0	0
Sam Bangma and Ida Bangma	17	14
Bank of America National Trust and Savings Association, as Trustee of Trust created by Will of Tony V. Freitas, Deceased (Frank A. Gonsalves, tenant)	29	23
Emma Barbaria, as to undivided 1/2 interest; John Barbaria, Jr. and Lorraine Barbaria as to undivided 1/4 interest; and Frank Barbaria as to undivided 1/4 interest (John Barbaria & Sons Dairy, tenant)	27	22
Antonio B. Barcellos and Manuel B. Barcellos	12	10
John Barcelos and Guilhermina Barcelos	16	13
Sam Bartsma and Birdie Bartsma	34	27
Bateson's School of Horticulture, Inc. (see listing under name of John Brown Schools of California, Inc.)		
Bechard Mutual Water Corporation	4	4
Beck Tract Water Company, Inc.	29	23
Iver F. Becklund	1	1
Margaret E. Becklund	1	1
P. T. Beeghly (International Carbonic, Inc., tenant)	1	1
Doutzen Bekendam and Hank Bekendam	0	0
John Bekendam	0	0
Tillie Bekendam	0	0

- 13 -



<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
Bell Trailer City (see listing under name of Bennett E. Simmons)	1	1
E. F. Bellenbaum and Marie P. Bellenbaum	32	26
Bellflower Christian School	243	194
Bellflower Home Garden Water Company	111	89
Bellflower Unified School District	2,109	1,687
Bellflower Water Company	11	9
Belmont Water Association	0	0
Tony Beltman	0	0
Berlu Water Company, Inc.	32	26
Jack R. Bettencourt and Bella Bettencourt	151	121
Bigby Townsite Water Co.		
Siegfried Binggeli and Trina L. Binggeli (see listing under name of Paul H. Lussman, Jr.)	0	0
Fred H. Bixby Ranch Company		
Delbert G. Black and Lennie O. Black as to undivided one-half; and Harley Lee, as to undivided one-half	40	32
Bloomfield School District	11	9
Adrian Boer and Julia Boer	5	4
Gerard Boere and Rosalyn Boer		
Henry Boer and Annie Boer (William Offinga & Son, including Sidney Offinga, tenants as to 33 acre feet of water right and 26 acre feet of allowed pumping allocation)	34	27
John Boere, Jr. and Mary J. Boere	30	24
John Boere, Sr. and Edna Boere (John Boere, Jr., tenant)	30	24
John Boere, Jr. (see also listing under name of Leonard A. Grenier)		

- 14 -



	<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
1			
2			
3	Frank Boersma and Angie Boersma	31	25
4	Gerrit Boersma and Jennie Boersma (George Boersma, tenant)	8	6
5	Jack Boersma	0	0
6	Sam Boersma and Berdina Boersma	42	34
7			
8	Jan Bokma (see listing under name of August Vandenberg)		
9	Jacob Bollema	0	0
10	James C. Boogerd (see listing under name of Jake Van Leeuwen, Jr.)		
11			
12	Bernard William Bootsma, Carrie Agnes Van Dam and Gladys Marie Romberg	12	10
13	Michel Bordato and Anna M. Bordato (Charlie Vander Kooi, tenant)	12	10
14			
15	John Borges and Mary Borges, aka Mrs. John Borges (Manuel B. Ourique, tenant)	14	11
16	Mary Borges, widow of Manuel Borges (Manuel Borges, Jr., tenant)	7	6
17			
18	Gerrit Bos and Margaret Bos	88	70
19	Jacob J. Bosma (see listing under name of Sieger Vierstra)		
20	Peter Bothof	6	5
21	William Bothof and Antonette Bothof	7	6
22	Frank Bouma and Myron D. Kolstad	3	3
23	Ted Bouma and Jeanette Bouma	21	17
24	Sam Bouman (Arie C. Van Leeuwen, tenant)	8	6
25	John Brown Schools of California, Inc. (Bateson's School of Horticulture, Inc., tenant)	2	2
26			
27	M. J. Brown, Jr. and Margaret Brown	0	0
28	Adrian Bulk and Alice Bulk	20	16

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	<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
1			
2			
3	Duke Buma and Martha Buma	8	6
4	Miles A. Burson and Rose Burson	7	6
5	Calavar Corporation (see listing under name of H R M Land Company)		
6			
7	California Cotton Oil Corporation	101	81
8	California Portland Cement Company	0	0
9	California Rendering Company, Ltd.	149	119
10	California Water and Telephone Company	2,584	2,067
11	California Water Service Company (Base Water Right - 13,477)	14, 717	11,774
12	Candlewood Country Club	184	147
13	V. Capovilla and Mary Capovilla	0	0
14	Carmenita School District	9	7
15	Carson Estate Company	139	111
16	Paul Carver	0	0
17	Catalin Corporation of America	13	10
18	Center City Water Co.	86	69
19	Central Manufacturing District, Inc. (Louis Guglielmana and Richard Wigboly, tenants)	825	660
20			
21	Century Center Mutual Water Association	317	254
22	Century City Mutual Water Company, Ltd.	62	50
23	Cerritos Junior College District	119	95
24	Cerritos Park Mutual Water Company	77	62
25	Challenge Cream & Butter Association	146	117
26	Chansall Mutual Water Company	101	81
27	Maynard W. Chapin, as Executor of the Estate of Hugh L. Chapin, deceased	36	29
28			

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<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
Cherryvale Water Users' Association	14	11
Shigeru Chikami and Jack Chikami doing business as Chikami Bros. Farming (see also listing under name of Southern California Edison Company)	10	8
John Christoffels and Effie Christoffels	14	11
Citrus Grove Heights Water Company	277	222
City Farms Mutual Water Company No. 1	37	30
City Farms Mutual Water Company No. 2	15	12
City of Artesia	30	24
City of Bellflower	60	48
City of Compton	6,511	5,209
City of Downey	5,713	4,570
City of Huntington Park	4,788	3,830
City of Inglewood (Base Water Right - 629)	1,118	894
City of Lakewood	10,631	8,505
City of Long Beach (Base Water Right - 29,876)	33,538	26,830
City of Los Angeles (see paragraph 2 above of this Part I for water rights and restrictions on the exercise thereof of said defendant. See also such reference with respect to Department of Water and Power of the City of Los Angeles.)		
City of Lynwood	6,238	4,990
City of Montebello	260	208
City of Norwalk	613	490
City of Santa Fe Springs	505	404
City of Signal Hill	1,675	1,340

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	<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
1			
2			
3	City of South Gate	9,942	7,954
4	City of Vernon	9,008	7,206
5	City of Whittier	776	621
6	Allan Clanton and Ina Clanton	80	64
7	Claretian Jr. Seminary (see listing under name of Dominguez Seminary)		
8			
9	Dr. Russell B. Clark (see listing under name of Research Building Corporation)		
10	Jacob Cloo and Grace Cloo	16	13
11	Clougherty Packing Company	80	64
12	Coast Packing Company	426	341
13	Coast Water Company	588	470
14	Joe A. Coelho, Jr. and Isabel Coelho	5	4
15	J. H. Coito, Jr.	0	0
16	John H. Coito and Guilhermina Coito (Zylstra Bros., a partnership consisting of Lammert Zylstra and William Zylstra, tenant)	17	14
17			
18	J. E. Collinsworth	15	12
19	Compton Union High School District	48	38
20	Conservative Water Company (Base Water Right - 4,101)	133	3,306
21			
22	Container Corporation of America	323	1,058
23	Nicholas C. Contoas and P. Basil Lambros (Vehicle Maintenance & Painting Corporation, tenant)	1	1
24			
25	Continental Can Company, Inc.	946	757
26	Contractors Asphalt Products Company, Inc.	16	13
27			
28	R. M. Contreras	8	6

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	<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
1			
2			
3	Copp Equipment Company, Inc. and Humphries Investments Incorporated	7	6
4			
5	Mary Cordeiro and First Western Bank & Trust Company, as Trustee pursuant to last will and testament of Tony Cordeiro, deceased	46	37
6			
7	Corporation of the Presiding Bishop of the Church of Jesus Christ of Latter Day Saints (Ray Mitchell, tenant)	39	31
8			
9	Harry Lee Cotton and Doris L. Cotton	5	4
10	County of Los Angeles	737	590
11	County Water Company	280	224
12	Cowlitz Amusements, Inc. (La Mirada Drive-In Theater, tenant)	4	4
13			
14	Pete Coy	28	22
15	Crest Holding Corporation	20	16
16	Katherine M. Culbertson	2	2
17	Orlyn L. Culp and Garnetle Culp	21	17
18	Everett Curry and Marguerite Curry	2	2
19	D. V. Dairy (see listing under name of Frank C. Leal)		
20	Dairymen's Fertilizer Co-op, Inc.	1	1
21	Noble G. Daniels (see listing under name of Harold Marcroft)		
22			
23	John A. Davis	0	0
24	Henry De Bie, Jr. and Jessie De Bie	17	14
25	Clifford S. Deeth	0	0
26	Ernest De Groot and Dorothy De Groot	81	65
27	Pete de Groot	15	12
28	Pier De Groot and Fay De Groot	21	17

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<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
Martin De Hoog and Adriana De Hoog	12	10
Edward De Jager and Alice De Jager	37	30
Cornelius De Jong and Grace De Jong	13	10
Jake De Jong and Lena De Jong (Frank A. Gonsalves, tenant as to 8 acre-feet of water right)	21	17
William De Kriek (see listing under name of Gerrit Van Dam)		
Del Amo Dairy (see listing under name of Ed Haakma)		
Del Amo Estate Company	0	0
Joe De Marco and Concetta De Marco	1	1
Louis F. De Martini (see listing under name of Southern California Edison Company)		
Mary A. De Mello	16	13
John Den Hollander (see listing under name of James Dykstra)		
Department of Water and Power of The City of Los Angeles, by reason of charter provisions, has the management and control of water rights owned by the City of Los Angeles (see listing under name of City of Los Angeles)		
Ruth E. Dever (Orange County Nursery, Inc., tenant)	0	0
Andrew De Voss and Alice De Voss (Arthur De Voss and Arthur Atsma, tenants)	36	29
Agnes De Vries (Gerrit Anker, tenant)	16	13
Dick De Vries and Theresa De Vries	10	8
Gerrit De Vries and Claziena De Vries	18	14
Gerrit Deyager and Dena Deyager	0	0

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Name	Total Water Right	Allowed Pumping Allocation
Lloyd W. Dinkelspiel, Jr. (see listing under name of Florence Hellman Ehrman)		
District VII, Division of Highways of the State of California Department of Public Works (see listing under name of State of California)		
Dominguez Estate Company	0	0
Dominguez Seminary and Claretian Jr. Seminary	111	89
Dominguez Water Corporation	8,012	6,410
Peter Dotinga and Tena Dotinga (Dave Bajema, tenant)	9	7
Robert L. Dougherty	0	0
Downey Cemetery District	21	17
Downey Fertilizer Co. (see listing under name of Downey Land Company)		
Downey Land Company (Downey Fertilizer Co., tenant)	101	81
Downey Valley Water Company	87	70
Jim Drost	0	0
James Dykstra and Dora Dykstra (John Den Hollander, tenant)	6	5
John Dykstra and Wilma Dykstra	52	42
Cor Dyt and Andy Dyt	6	5
Eagle Picher Company	141	113
Gail H. Eagleton	67	54
Florence Hellman Ehrman; I. W. Hellman, Jr.; Frederick J. Hellman; Marco F. Hellman; Clarence E. Heller; Alfred Heller, Elizabeth Heller; Clarence E. Heller, Elinor R. Heller and Wells Fargo Bank, as co-executors of the Estate of Edward H. Heller, deceased; Lloyd W. Dinkelspiel, Jr., William H.		



	<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
3	Green and Wells Fargo Bank, as co-executors of the Estate of Lloyd W. Dinkelspiel, deceased; Wells Fargo Bank, as Trustee under the trust created by the Will of Florence H. Dinkelspiel, deceased. (Union Oil Company of California, Lessee as to 190 acre-feet of right and as to 152 acre-feet of allowed pumping allocation)	555	444
9	El Rancho Unified School District	69	55
10	Berton Elson (see listing under name of D. P. Winslow)		
11	John H. Emoto and Shizuko Emoto	0	0
12	Addie L. Enfield (see listing under name of James L. Stamps)		
14	John W. England and Consuello England (see listing under name of Jenkins Realty Mutual Water Co.)		
16	Emma Engler (Morris Weiss, tenant)	10	8
17	Anthony F. Escobar and Eva M. Escobar (Henry Kampen, tenant)	14	11
18	Excelsior Union High School District	381	305
19	Kenneth A. Farris and Wanda Farris	1	1
20	Federal Ice and Cold Storage Company	92	74
21	Fred Fekkes (see listing under name of Steve Stefani, Sr.)		
23	Julius Felsenthal and Mrs. Julius Felsenthal, aka Marga Felsenthal	1	1
24	Tony Fernandes (see listing under name of U. Stewart Jones)		
26	Joe C. Ferreira and Carolina Ferreira (Joe C. Ferreira and Joe C. Ferreira, Jr., operators of well facility)	37	30



	<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
1			
2			
3	Mary A. Ferreira (Joe Lucas, tenant)		
4	(see also listing under name of Jack Gonsalves)	1	1
5	John Feuz, Jr.	0	0
6	Fibreboard Paper Products Corporation	1,521	1,217
7	Abe Fien	0	0
8	Alfred Fikse, Jr. and Aggie Fikse	2	2
9	Henry Fikse and Jennie Fikse	4	4
10	Filtrol Corporation	570	456
11	The Firestone Tire & Rubber Co.	1,536	1,229
12	First Western Bank & Trust Co. (see listing under name of Mary Cordeiro)		
13	Clare Fisher	0	0
14			
15	Elizabeth Flesch, James Flesch, Margaret Flesch, Theodore Flesch, Ernest D. Roth and Eva Roth, doing business as Norwalk Mobile Lodge	18	14
16			
17	The Flintkote Company	2,567	2,054
18	Ford Motor Company	11	9
19	Robert G. Foreman (see listing under name of Lakewood Pipe Co.)		
20			
21	Guisseppi Franciosi and Alice Franciosi	2	2
22	Tony V. Freitas (see listing under name of Bank of America, etc.)		
23	S. Fujita	0	0
24	Jun Fukushima (see listing under name of Chige Kawaguchi)		
25			
26	Paul Fultheim and Helga Fultheim	5	4
27	Fumi Garden Farms, Inc. (see listing under name of Southern California Edison Company and also under name of George Yamamoto)		
28			



<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
Gabby Louise, Inc. (Arthur Gilbert & Associates, tenant)	58	46
Victor E. Gamboni and Barbara H. Gamboni (Jake J. Alewyn and Mrs. Jake J. Alewyn also known as Normalie May Alewyn, tenants as to 13 acre feet of water right and 10 acre feet of allowed pumping allocation)	27	22
Nick Gandolfo and Palmera Gandolfo	5	4
Freddie A. Garrett and Vivian Marie Garrett	6	5
Martha Gatz	15	12
General Dynamics Corporation	675	540
General Telephone Company of California	2	2
Alfred Giacomi and Jennie Giacomi	58	46
Arthur Gilbert & Associates (see listing under name of Gabby Louise Inc.)		
Mary Godinho	0	0
Pauline Godinho (Joe C. Godinho and John C. Godinho, Jr., doing business as Godinho Bros. Dairy, tenants)	31	25
Harry N. Goedhart, Henry Otto Goedhart, Hilbrand John Goedhart, John Goedhart, Otto Goedhart, Jr., Peter Goedhart, and Helen Goedhart Van Eik (Paramount Farms, tenant)	21	17
Reimer Goedhart	12	10
Golden Wool Company	223	178
Albert S. Gonsalves and Caroline D. Gonsalves	10	8
Frank A. Gonsalves (see listing under name of Bank of America National Trust and Savings Association, etc.; and also under name of Jake De Jong)		



	<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
1			
2			
3	Jack Gonsalves, Joe Lucas, Pete Koopmans,		
4	Manuel M. Souza, Sr., Manuel M. Souza,		
5	Jr., Frank M. Souza, Louie J. Souza,	55	44
6	and Mary A. Ferreira		
7	Jack Gonsalves and Mary Gonsalves	31	25
8	Joaquin Gonsalves and Elvira Gonsalves	27	22
9	Joe A. Gonsalves and Virginia Gonsalves	12	10
10	The B. F. Goodrich Company	519	415
11	The Goodyear Tire & Rubber Company	1,141	913
12	Eric Gorden and Hilde Gorden	2	2
13	Fern Ethyl Gordon as to an undivided		
14	1/2 interest; Fay G. Tawzer and		
15	Lawrence R. Tawzer, as to an undivided		
16	1/2 interest	17	14
17	Huntley L. Gordon (appearing by and		
18	through United California Bank, as		
19	Conservator of the Estate of		
20	Huntley L. Gordon)	41	33
21	Robert E. Gordon	5	4
22	Joe Gorzeman and Elsie Gorzeman	13	10
23	Florence M. Graham	7	6
24	Marie Granger	0	0
25	Great Western Malting Company	448	358
26	William H. Green (see listing under name		
27	of Florence Hellman Ehrman)		
28	Greene-Howard Petroleum Corporation (see		
29	listing under name of Hathaway Company)		
30	John H. Gremmius and Henry W. Gremmius		
31	dba Henry and John Gremmius	0	0
32	Leonard A. Grenier and Marie Louise		
33	Grenier (John Boere, Jr., tenant)	10	8
34	Florence Guerrero	2	2



	<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
1			
2			
3	Louis Guglielmana (see listing under		
4	name of Central Manufacturing		
	District, Inc.)		
5	George V. Gutierrez and Mrs. Socorro		
6	Gutierrez (see listing under name of		
	Associated Southern Investment Company)		
7	Salvatore Gutierrez (see listing under		
8	name of Southern California Edison		
	Company)		
9	H. J. S. Mutual Water Co.	63	50
10	H R M Land company (Harron, Rickard &		
11	McCone Company of Southern California		
	and Calavar Corporation, tenants)	3	3
12	Gerrit Haagsma and Mary Haagsma	10	8
13	Ed Haakma and Sjana Haakma (Del Amo Dairy,		
14	tenant; Ed Haakma and Pete Vander Kooi,		
	being partners of said Del Amo Dairy)	28	22
15	Verney Haas and Adelyne Haas	4	4
16	William H. Hadley and Grace Hadley	4	4
17	Henry C. Haflinger and Emily Haflinger	10	8
18	Clarence Theodore Halburg	3	3
19	Fred Hambarian	2	2
20	Henry Hamstra and Nelly Hamstra	33	26
21	Raymond Hansen and Mary Hansen	12	10
22	Earl Haringa; Evert Veenendaal and		
23	Gertrude Veenendaal	22	18
24	Antoine Harismendy and Claire Harismendy	0	0
25	Harron, Rickard & McCone Company of		
26	Southern California (see listing		
	under name of H R M Land Company)		
27	Jack D. Hastings	0	0
28	Kameko Hatanaka	9	7



	<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
1			
2			
3	Kazuo Hatanaka (Minoru Yoshijima, tenant)	10	8
4	Masakazu Hatanaka, Isao Hatanaka, and Kenichi Hatanaka	5	4
5	Mrs. Motoye Hatanaka	0	0
6			
7	Hathaway Company, Richard F. Hathaway, Julian I. Hathaway, and J. Elwood Hathaway (Greene-Howard Petroleum Corporation, tenant utilizing less than 1 acre foot per year)	70	56
8			
9			
10	Clarence E. Heller; Alfred Heller; Elizabeth Heller; Clarence E. Heller; Elinor R. Heller, as co-executors of the Estate of Edward H. Heller, deceased (see listing under name of Florence Hellman Ehrman)		
11			
12			
13	I. W. Hellman, Jr.; Frederick J. Hellman; Marco F. Hellman (see listing under name of Florence Hellman Ehrman)		
14			
15	Ralph Hicks	0	0
16	Alfred V. Highstreet and Evada V. Highstreet	10	8
17			
18	John Highstreet and Eileen M. Highstreet	9	7
19	Bob Hilarides and Maaike Hilarides (Frank Hilarides, tenant)	51	41
20	John Hilarides and Maria Hilarides	26	21
21	Hajime Hirashima (see listing under name of Masaru Uyeda)		
22			
23	Willis G. Hix	1	1
24	Henry H. Hoffman and Apolonia Hoffman	12	10
25	Dick Hofstra	0	0
26	Andrew V. Hohn and Mary G. Hohn	1	1
27	Kyle R. Holmes and Grace Ellen Holmes	20	16
28	Home Water Company	35	28



	<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
1			
2			
3	Manuel L. Homen	17	14
4	Mrs. Paul Y. Homer (see listing under name of Mrs. Paul Y. Homer (King).)		
5	Cornelis Hoogland and Alice Hoogland	15	12
6	Art Hop, Jr.	0	0
7	Art Hop, Sr. and Johanna Hop (G. A. Van Beek, tenant)	5	4
8	Andrew Hop, Jr. and Muriel Hop	33	26
9	Theodore R. Houseman and Leona M. Houseman	14	11
10	Humphries Investments Incorporated (see listing under name of Copp Equipment Company, Inc.)		
11	Albert Huyg and Marie Huyg	22	18
12	Hygenic Dairy Farms, Inc.	0	0
13	Pete W. Idsinga and Annie Idsinga	13	10
14	Miss Alice M. Imbert	1	1
15	Industrial Asphalt of California, Inc.	116	93
16	Inglewood Park Cemetery Association	285	228
17	International Carbonic, Inc. (see listing under name of P. T. Beeghly)		
18	Jugora Ishii and Mumeno Ishii (Ishii Brothers, tenant)	10	8
19	Robert J. Jamison and Betty Jamison	7	6
20	Jenkins Realty Mutual Water Co. (Clyde H. Jenkins, Minnie R. Jenkins, Mary Wilcox, Ruby F. Marchbank, Robert B. Marchbank, John W. England, and Consuello England, shareholders	10	8
21	John-Wade Co.	1	1
22	Henry S. Jones and Madelynne Jones	1	1
23			
24			
25			
26			
27			
28			



	<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
1			
2			
3	U. Stewart Jones and Dorothy E. Jones (Tony Fernandes, tenant)	1	1
4	Harold Jongsma and Mary N. Jongsma	65	52
5			
6	W. P. Jordan (see listing under name of Henry Van Ruiten)		
7	Dave Jorritsma and Elizabeth Jorritsma	27	22
8	Christine Joseph (see listing under name of Helen Wolfsberger)		
9			
10	Junior Water Co., Inc.	737	590
11	Kal Kan Foods, Inc.	120	96
12	Kalico, Inc.	4	4
13	Hagop Kalustian (11 acre feet of total water right attributable to well located at 6629 South Street, Lake- wood and reported to plaintiff under Producer No. 3925. 2 acre feet of total water right attributable to portion of property not sold to State of California formerly served by well located at 10755 Artesia Blvd., Artesia, the production of which well was reported to plaintiff under Producer No. 4030)	13	10
14			
15			
16			
17			
18			
19	Fritz Kampen and Clare Kampen	14	11
20	William Kamstra and Bertha Kamstra	35	28
21	Henry Kampen (see listing under name of Anthony Escobar)		
22			
23	L. Kauffman Company, Inc. (see listing under name of Lorraine K. Meyberg)		
24	Chige Kawaguchi and Masao Kawaguchi (Jun Fukushima, tenant)	4	4
25			
26	King Kelley Marmalade Co. (see listing under name of Roberta M. Magnusson)		
27	Mrs. Paul Y. Homer (King)	17	14
28	Jacob R. Kimm and Bonnie Kimm	36	29

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	<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
1			
2			
3	Mrs. Oraan Kinne (Nicholaas J. Moons, tenant)	11	9
4	Morris P. Kirk & Son, Inc.	77	62
5	Jake Knevelbaard and Anna Knevelbaard	50	40
6	Willie Knevelbaard and Joreen Knevelbaard	1	1
7	Simon Knorringa	12	10
8	John Koetsier, Jr.	0	0
9	Myron D. Kolstad (see listing under name of Frank Bouma)		
10	Yoshio Kono and Barbara Kono (see listing under name of George Mimaki)		
11			
12	Louis Koolhaas	13	10
13	Simon Koolhaas and Sophie Grace Koolhaas	9	7
14	Pete Koopmans (see listing under name of Jack Gonsalves)		
15	Nick P. Koot (see listing under name of Mary Myrndahl)		
16			
17	Kotake, Inc. (Masao Kotake, Seigo Kotake, William Kotake, dba Kotake Bros., tenants)	83	66
18	Masao Kotake	0	0
19	Walter G. Kruse and Mrs. Walter G. Kruse, aka Vera M. Kruse	11	9
20	Laguna-Maywood Mutual Water Company No. 1	1,604	1,283
21	La Habra Heights Mutual Water Company	3,044	2,435
22	La Hacienda Water Company	46	37
23	Lakewood Pipe Co., a partnership composed of Robert G. Foreman, Frank W. Tybus and June E. Tybus (Lakewood Pipe Service Co., tenant)	12	10
24			
25			
26			
27			
28			



	<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
1			
2			
3	P. Basil Lambros (see listing under name of Nicholas C. Contreas)		
4			
5	La Mirada Drive-in Theater (see listing under name of Cowlitz Amusements, Inc.)		
6	La Mirada Water Company	0	0
7	Calvin E. Langston and Edith Langston	1	1
8	S. M. Lanting and Alice Lanting	15	12
9	Henry Lautenbach and Nellie H. Lautenbach	16	13
10	Norman Lautrup, as Executor of the Estate of Nels Lautrup, deceased; and Minnie Margaret Lautrup	30	24
11			
12	Frank C. Leal and Lois L. Leal (D. V. Dairy, tenant)	15	12
13			
14	Eugene O. LeChasseur and Lillian P. LeChasseur (R. A. LeChasseur, tenant)	2	2
15	Lee Deane Products, Inc.	0	0
16	Harley Lee (see listing under name of Delbert G. Black)		
17			
18	Le Fiell Manufacturing Company	0	0
19	Armand Lescoulie (see listing under name of Southern California Edison Company)		
20	Liberty Vegetable Oil Company	14	11
21	Little Lake Cemetery District	17	14
22	Little Lake School District	0	0
23	Loma Floral Company (see listing under name of George Mimaki)		
24			
25	Melvin L. Long and Stella M. Long	2	2
26	Nick J. Loogman (see listing under name of William Smoorenburg)		
27	Frank Lorenz (see listing under name of Ralph Oosten)		
28			

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	<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
1			
2			
3	Los Angeles County Waterworks District No. 1 (Base Water Right 22)	113	90
4			
5	Los Angeles County Waterworks District No. 10	842	674
6			
7	Los Angeles County Waterworks District No. 16	412	330
8			
9	Los Angeles Paper Box and Board Mills	321	257
10			
11	Los Angeles Union Stockyards Company	0	0
12			
13	Los Nietos Tract 6192 Water Co.	49	39
14			
15	Alden Lourenco (see listing under name of A. C. Pinheiro)		
16			
17	Lowell Joint School District	0	0
18			
19	Joe Lucas (see listings under names of Mary A. Ferreira and Jack Gonsalves)		
20			
21	Luer Packing Co. (see listing under name of Sam Perricone)		
22			
23	Jake J. Luetto (Orange County Nursery, Inc., tenant)	13	10
24			
25	Lunday-Thagard Oil Co.	265	212
26			
27	Joe Luond (Frieda Roethlisberger, tenant as to portion of rights)	7	6
28			
29	John Luscher and Frieda Luscher	13	10
30			
31	Paul H. Lussman, Jr. and Ann Lussman, Siegfried Binggeli and Trina L. Binggeli (Paul's Dairy, tenant)	8	6
32			
33	Lynwood Gardens Mutual Water Company	205	164
34			
35	Lynwood Park Mutual Water Company	278	222
36			
37	Jerome D. Mack and Joyce Mack (see listing under name of D. S. Moss)		
38			
39	Roberta M. Magnusson (King Kelly Marmalade Co., tenant)	15	12
40			
41	Anthony Mancebo	0	0

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1	<u>Name</u>	<u>Total</u> <u>Water</u> <u>Right</u>	<u>Allowed</u> <u>Pumping</u> <u>Allocation</u>
2			
3	Robert B. Marchbank and Ruby F. Marchbank		
4	(see listing under name of Jenkins		
	Realty Mutual Water Co.)		
5	Harold Marcroft and Marjorie Marcroft		
6	(Noble G. Daniels, tenant)	7	6
7	Floyd G. Marcusson (see listing under		
	name of Sykes Realty Co.)		
8	Walter Marlowe and Edna Marlowe	1	1
9	Marshburn, Inc. (see listing under name		
	of Mel, Inc.)		
10	The Martin Bros. Container & Timber		
11	Products Corp.	7	6
12	Mary Martin	35	28
13	Antonio Mathias and Mary Mathias	16	13
14	Mausoleum Park, Inc. and Sun Holding		
	Corporation	4	4
15	Maywood Mutual Water Company No. 1	926	741
16	Maywood Mutual Water company No. 2	1,007	806
17	Maywood Mutual Water Company No. 3	1,407	1,126
18	Mel, Inc. (Marshburn, Inc., tenant)	67	54
19	G. Mellano	12	10
20	Wilbur Mellema and Mary Mellema (see		
21	listing under name of Elmo D. Murphy)		
22	Wilbur Mellema (see listing under name		
	of Morris Weiss)		
23	Memorial Parks, Inc.	42	34
24	Lyman B. Merrick and Gladys L. Merrick	17	24
25	Metropolitan State Hospital of the State		
26	of California Department of Mental		
27	Hygiene (see listing under name of		
	State of California)		
28	F. N. Metzger	0	0



	<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
1			
2			
3	Lorraine K. Meyberg (L. Kauffman Company, Inc., tenant)	81	65
4	Midland Park Water trust	71	57
5	Midway Gardens Mutual Association	59	47
6	Harry C. Miersma and Dorothy L. Miersma	12	10
7	Henry Miersma and Susan M. Miersma	7	6
8	Willis L. Miller	0	0
9			
10	George Mimaki, Mitsuko Mimaki, Yoshio Kono and Barbara Kono (Loma Floral Company, tenant)	2	2
11			
12	Ray Mitchell (see listing under name of Corporation of the Presiding Bishop of the Church of Jesus Christ of Latter Day Saints; and also listing under name of Frank Ruggieri)		
13			
14	Fumiko Mitsuuchi, aka Mary Mitsuuchi (Z. Van Spanje, tenant as to one acre foot)	14	11
15			
16	Yoneichi Miyasaki	0	0
17			
18	Glenn Miyoshi, Yosaku Miyoshi, Masayo Miyoshi, Haruo Miyoshi, and Masaru Miyoshi, dba Miyoshi Bros.	10	8
19	Jean Mocho and Michel Plaa	11	9
20	Modern Imperial Company	71	57
21	Montebello Land and Water Company	1,990	1,592
22	Monterey Acres Mutual Water Company	128	102
23	Nicholaas J. Moons (see listing under name of Mrs. Oraan Kinne)		
24			
25	Alexander Moore and Betty L. Moore	16	13
26	Neal Moore	0	0
27	Alyce Mooschekian	0	0
28	Reuben Mooschekian	15	12



	<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
1			
2			
3	William R. Morris	1	1
4	(see also listing under name of Associated Southern Investment Company)		
5	D. S. Moss, Lillian Moss, Jerome D. Mack, and Joyce Mack	5	4
6			
7	Mountain View Dairies, Inc.	68	54
8			
9	Kiyoshi Murakawa and Shizuko Murakawa	0	0
10			
11	Daisaku Murata, Fui Murata, Hatsuye Murata, Kenji Murata, Setsuko Murata, and Takeo Murata	15	12
12			
13	Kenji Murata (see listing under name of Southern California Edison Company)		
14			
15	Elmo D. Murphy and Evelene B. Murphy (Morris Weiss, Bessie Weiss, Wilbur Mellema, and Mary Mellema, tenants)	23	18
16			
17	Murphy Ranch Mutual water company	576	461
18			
19	Etta Murr	3	3
20			
21	R. B. Murray and Gladys J. Murray	0	0
22			
23	Tony G. Mussachia and Anna M. Mussachia	10	8
24			
25	Mary Myrndahl (Nick P. Koot, tenant)	11	9
26			
27	Sam Nakamura and Tokiko Nakamura	2	2
28			
29	Leo Nauta (see listing under name of John Osinga)		
30			
31	Pete Nauta (see listing under name of Jacob Vandenberg)		
32			
33	Fred C. Nelles School for Boys of the State of California Department of the Youth Authority (see listing under name of State of California)		
34			
35	Otelia Nelson and Robert Nelson (Shelter Superior Dairy, tenant)	14	11
36			
37	Simon S. Niekerk and Rose Niekerk (Niekerk Hay Company, tenant)	3	3
38			



	<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
3	Norris-Thermador Corporation	172	138
4	North Gate Gardens Water Co.	60	48
5	Norwalk-La Mirada City School District	360	288
6	Norwalk Mobile Lodge (see listing under name of Elizabeth Flesch)		
8	Mabel E. Nottingham (Leslie Nottingham, tenant)	25	20
9	William Offinga & Son, including Sidney Offinga (see listing under name of Henry Boer)		
11	Olive Lawn Memorial Park, Inc.	14	11
12	John Oord	0	0
13	Marinus Oosten and Anthonia Oosten	16	13
14	Ralph Oosten and Caroline Oosten (Frank Lorenz, tenant as to 13 acre feet of water right and 10 acre feet of allowed pumping allocation)	51	41
17	Orange County Nursery, Inc. (see also: listing under name of Ruth E. Dever; listing under name of Jake J. Luetto; and listing under name of Mary Ravera)	16	13
20	Orchard Dale County Water District (Base Water Right - 1,382)	1,384	1,107
21	Orchard Park Water Club, Inc.	50	40
22	Oriental Foods, Inc.	34	27
23	Orla Company (John D. Westra, tenant)	7	6
24	Viva Ormonde (see listing under name of Hank Van Dam)		
26	Pablo Oropeza and Aurelia G. Oropeza (Pablo Oropeza, Jr., tenant) (see also listing under name of Tarr and McComb Oil Company, Ltd.)		
28	John Osinga (Leo Nauta, tenant)	6	5

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<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
Manuel B. Ourique (see listing under name of John Borges)		
Owl Constructors	20	16
Pacific Electric Railway Company (Gerrit Van Leeuwen of 15405 Shoemaker Road, Norwalk, tenant as to 11 acre feet of right and 9 acre feet of allowed pumping allocation)	15	12
Packers Mutual Water Company	43	34
Edward G. Paddison and Grace M. Paddison	17	14
Paramount Farms (see listing under name of Harry N. Goedhart)		
Paramount County Water District	2,967	2,374
Paramount Unified School District	58	46
Park Water Company	24,592	19,674
W. J. Parsonson	0	0
Rudolph Pasma and Frances C. Pasma	10	8
Paul's Dairy (see listing under name of Paul H. Lussman, Jr.)		
Mrs. La Verne Payton	1	1
Peerless Land & Water Co., Inc.	1,232	986
J. C. Pereira, Jr. and Ezaura Pereira	34	27
Sam Perricone and Louis Romoff (Luer Packing Co., tenant)	107	86
Peterson Manufacturing Co., Inc.	73	58
Phelps Dodge Copper Products Corporation	390	312
Pico County Water District	3,741	2,993
Piedmont Heights Water Club	7	6
Lucille C. Pimental (Richard Pimental and Pimental Dairy, tenants)	16	13



<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
Joe Pine (see listing under name of A. C. Pinheiro)		
A. C. Pinheiro and Mary M. Pinheiro (Alden Lourenco, tenant as to 9 acre feet of water right and 7 acre feet of allowed pumping right; and Joe Pine, tenant as to 13 acre feet of water right and 10 acre feet of allowed pumping right)	128	102
Fred Pinto and Mary Pinto	5	4
Frank Pires (see listing under name of Frank Simas)		
Tony C. Pires and Laura C. Pires	31	25
Michel Plaa (see listing under name of Jean Mocho)		
Donald R. Plunkett	53	42
Pomering Tract Water Association	32	26
Clarence Pool	24	19
Garret Porte and Cecelia Porte	35	28
Veronica Postma	16	13
C. H. Powell	1	1
Powerine Oil Company	784	627
John Preem	0	0
Ralph Pylman and Ida Pylman	13	10
Quality Meat Packing Company	38	30
Ralphs Grocery Company	0	0
Arthur D. Ramsey and James A. Ramsey	5	4
Rancho Santa Gertrudes Mutual Water System	48	38
Mary Ravera (Orange County Nursery, Inc., tenant	39	31



	<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
1			
2			
3	Zelma Ravera	2	2
4	Rawlins Investment Corporation (Rockview Milk Farms, Inc., tenant)	66	53
5	Hal Rees	0	0
6	Reeves Tract Water Company	36	29
7	Clarence Reinalda	0	0
8	Reliance Dairy Farms	122	98
9	Research Building Corporation (Dr. Russell B. Clark, tenant)	11	9
10	Richfield Oil Corporation	71	57
11	Richland Farm Water Company	216	173
12	George Rietkerk and Cornelia Rietkerk	7	6
13	Rio Hondo Country Club (see listing under name of James L. Stamps)		
14	Erasmio Rios (see listing under name of Esther Salcido)		
15	Jesus Rios (see listing under name of Esther Salcido)		
16	Frank J. Rocha, Jr. and Elsie M. Rocha	13	10
17	Rockview Milk Farms, Inc. (see listing under name of Rawlins Investment Corporation)		
18	John Rodrigues, Emily S. Rodrigues, and John Rodrigues, Jr. (see also below)	5	4
19	John Rodrigues and John Rodrigues Jr.	1	1
20	Frieda Roethlisberger (see listing under name of Joe Luond)		
21	Patricia L. Davis Rogers, aka Patricia L. Davis	2	2
22	The Roman Catholic Archbishop of Los Angeles, a corporation sole	426	341
23			
24			
25			
26			
27			
28			



	<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
1			
2			
3	Gladys Marie Romberg (see listing under name of Bernard William Bootsma)		
4			
5	Alois M. Rombout	0	0
6	Louis Romoff (see listing under name of Sam Perricone)		
7	Elvira C. Rosales	3	3
8	Frank J. Ross	2	2
9	Ernest D. Roth and Eva Roth (see listing under name of Elizabeth Flesch)		
10			
11	Ed Roukema	0	0
12	Herbert N. Royden	31	25
13	Ruchti Brothers	31	25
14	Frank Ruggieri and Vada Ruggieri (see additional listing below)	1	1
15	Frank Ruggieri and Vada Ruggieri; David Seldeen and Fay Seldeen (Ray Mitchell, tenant)		
16		23	18
17	Thomas S. Ryan and Dorothy J. Ryan	19	15
18	Sam Rypkema and Tena Rypkema	8	6
19	St. John Bosco School	53	42
20	James H. Saito and Yoshino Saito	2	2
21	Esther Salcido and Jesus Rios (Erasmus Rios, tenant)		
22		3	3
23	San Gabriel Valley Water Company	6,828	5,462
24	Joe Santana and Palmira Santana	10	8
25	Sasaki Bros. Ranch, Inc.	32	26
26	Sativa L. A. County Water District	592	474
27	Ben Schilder, Jr. and Anna Schilder	28	22
28	Carl Schmid and Olga Schmid	18	14



	<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
1			
2			
3	Mrs. A. Schuur	0	0
4	John Schuurman and Isabel Schuurman (James Sieperda, tenant)	15	12
5			
6	David Seldeen and Fay Seldeen (see listing under name of Frank Ruggieri)		
7	Maurice I. Sessler	8	6
8	Chris Shaffer and Celia I. Shaffer	8	6
9	Shayman & Wharram, a partnership, consisting of John W. Shayman and Francis O. Wharram	2	2
10			
11	Shell Oil Company (see listing under name of Margaret F. Slusher)		
12			
13	Shelter Superior Dairy (see listing under name of Otelia Nelson)		
14	Tadao Shiba and Harume Shiba, Susumu Shiba, and Mitsuko Shiba	7	6
15			
16	Yahiko Shiozaki and Kiyoko Shiozaki; Ken Shiozaki and Grace Shiozaki	6	5
17	Shore-Plotkin Enterprises, Inc. (Shore-Calnevar, Inc., tenant)	0	0
18			
19	J. E. Siemon	15	12
20	James Sieperda (see listing under name of John Schuurman)		
21	Sierra Restaurant Corporation	0	0
22	Frank Simas and Mabel Simas (Frank Pires, tenant)	11	9
23			
24	Bennett E. Simmons and Alice Lorraine Simmons, George K. Simmons and Doris June Simmons (Bell Trailer City, tenant)	41	33
25			
26	Margaret F. Slusher (Shell Oil Company, tenant)	7	6
27	Lester W. Smith and Donald E. Smith (Lester W. Smith Dairy, tenant)	20	16
28			



	<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
1			
2			
3	Wirt Smith	14	11
4	William Smoorenburg and Nick J.		
5	Loogman (Smoorenburg & Loogman, a		
6	partnership of William Smoorenburg		
7	and Nick J. Loogman, operating well		
8	facility)	21	17
9	Leo Snozzi and Sylvia Snozzi	52	42
10	Socony Mobil Oil Company, Inc.	172	138
11	Somerset Mutual Water Company	2,744	2,195
12	South Montebello Irrigation District	1,238	990
13	Southern California Edison Company		
14	(Vernon Bacon; Chikami Bros. Farming,		
15	consisting of Jack Chikami and		
16	Shigeru Chikami; Louis F. De Martini;		
17	Armand Lescoulie; C. D. Webster; Kenji		
18	Murata; Glenn F. Spiller and Jean H.		
19	Spiller; George Yamamoto and Alice		
20	Yamamoto, conducting business as Fumi		
21	Garden Farms, Inc.; and Salvatore		
22	Gutierrez, tenants and licenses)	816	653
23	Southern California Water Company	18,937	15,150
24	Southern Service Company, Ltd.	81	65
25	Henrietta Southfield	4	4
26	John Southfield	0	0
27	Southwest Water Company	2,895	2,316
28	Manuel M. Souza, Sr.; Manuel M.		
29	Souza, Jr.; Frank M. Souza and		
30	Louie J. Souza (see listing under		
31	name of Jack Gonsalves)		
32	Nelson Souza and Mary Souza	12	10
33	Glenn F. Spiller and Jean H. Spiller	24	19
34	(see also listing under name of		
35	Southern California Edison company)		
36	Farah Sprague	3	3



	<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
1			
2			
3	Herman F. Staat and Charlotte H. Staat	2	2
4	James L. Stamps, as to an undivided		
5	80% interest; Addie L. Enfield, as		
6	to an undivided 20% interest (Rio	443	354
7	Hondo Country Club, tenant)		
8	Standard Oil Company of California	118	94
9	J. F. Standley and Myrtle M. Standley	1	1
10	Star Dust Lands, Inc.	85	68
11	State of California (included herein are		
12	water rights of Fred C. Nelles School		
13	for Boys of the State of California		
14	Department of the Youth Authority;		
15	Metropolitan State Hospital of the		
16	State of California Department of		
17	Mental Hygiene; and District VII,		
18	Division of Highways of the State of		
19	California Department of Public Works)	757	606
20	Stauffer Chemical Company	181	145
21	John Steele and Clara D. Steele	4	4
22	Steve Stefani, Jr.	0	0
23	Steve Stefani, Sr., and Dora Stefani		
24	(Henry Baar and Fred Fekkes, tenants)	38	30
25	Andrew Stellingwerf	0	0
26	Henry Stellingwerf and Jeanette		
27	Stellingwerf	14	11
28	Henry Sterk and Betty S. Sterk	114	91
	V. C. Stiefel	3	3
	Sophia J. Stockmal and John F. Stockmal	3	3
	William Thomas Stover and Gertrude D.		
	Stover	3	3
	Louis Struikman and Alice Struikman (Louis		
	Struikman and Pete Struikman dba Louis		
	Struikman and Son, tenants as to 43 acre		
	feet of water right and 34 acre feet of		
	allowed pumping allocation; and Sidney		



	<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
1			
2			
3	Van Dyke, tenant as to 10 acre feet of		
4	water right and 8 acre feet of allowed		
	pumping allocation) (see also below)	53	42
5	Louis Struikman and Peter Struikman	3	3
6	Cornelius Struikmans and Ida Struikmans	9	7
7	Henry Struikmans and Nellie Struikmans	13	10
8	Henry Struikmans, Jr.	0	0
9	Suburban Mutual Water Co.	0	0
10	Suburban Water Systems	3,666	2,933
11	Kazuo Sumida	2	2
12	Sun Coast Development Company	0	0
13	Sun Holding Corporation (see listing		
14	under name of Mausoleum Park, Inc.)		
15	Sunnyside Mausoleum Company	60	48
16	Sunset Cemetery Association	26	21
17	E. A. Sutton and Ramona Sutton	39	31
18	Swift & Company	2,047	1,638
19	Roy Sybrandy and Anne Sybrandy	29	23
20	Sykes Realty Co., Floyd G. Marcusson		
	and Albert C. Sykes	2	2
21	Andy Sytsma and Dorothy Sytsma (Albert		
22	Sytsma and Robert Sytsma, doing		
	business as Sytsma Bros., tenants)	20	16
23	Tarr and McComb Oil Company, Ltd. (Pablo		
24	Oropeza, tenant)	86	69
25	Roy Tashima and Shigeo Tashima	1	1
26	Fay G. Tawzer and Lawrence R. Tawzer (see		
	listing under name of Fern Ethyl Gordon)		
27	Dorothy Taylor	0	0
28	Quentin D. Taylor	0	0

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<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
Carl Teixeira and Evelyn Teixeira	11	9
George S. Teixeira and Laura L. Teixeira	17	14
Harm Te Velde and Zwaantina Te Velde	253	202
Theo Hamm Brewing Co.	150	120
Thirty-Three Forty-Five East Forty-Fifth Street, Inc.	17	14
O. T. Thompson and Drusilla Thompson	20	16
Tract Number One Hundred and Eighty Water Company	1,526	1,221
Tract 349 Mutual Water Company	529	423
Fred Troost and Annie Troost	53	42
Frank W. Tybus and June E. Tybus (see listing under name of Lakewood Pipe Co.)		
Uehling Water Company, Inc.	846	677
Union Development Co., Inc.	12	10
Union Oil Company of California (see listing under name of Florence Hellman Ehrman)		
Union Pacific Railroad Company	656	525
Union Packing Company	100	80
United California Bank (see listing under name of Huntley L. Gordon)		
United Dairymen's Association	1	1
United States Gypsum Company	1,581	1,265
United States Rubber Company	820	656
United States Steel Corporation	176	141
Masaru Uyeda, Hajime Hirashima, and Tadashi Uyeda	12	10
G. A. Van Beek (see listing under name of Art Hop, Sr.)		



	<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
1			
2			
3	Bas Van Dam (see listing under name of Gertrude Van Dam)		
4			
5	Carrie Agnes Van Dam (see listing under name of Bernard William Bootsma)		
6	Cornelius A. Van Dam and Florence Van Dam	24	19
7			
8	Dick Van Dam, Jr.	0	0
9	Gerrit Van Dam and Grace Van Dam (William De Kriek, tenant)	13	10
10			
11	Gertrude Van Dam (Bas Van Dam, tenant as to 29 acre feet of water right and 23 acre feet of allowed pumping right; and Henry Van Dam, tenant as to 19 acre feet of water right and 15 acre feet of allowed pumping right)	48	38
12			
13	Hank Van Dam and Jessie Van Dam (Viva Ormonde, tenant)	22	18
14			
15	Henry Van Dam (see listing under name of Gertrude Van Dam)		
16			
17	Jacob Vandenberg and Anna Vandenberg (Pete Nauta, tenant)	8	6
18			
19	August Vandenburg, Ben W. Vandenburg, and Andrew W. Vandenburg (Jan Bokma, tenant)	6	5
20			
21	John Van Den Raadt	4	4
22			
23	M. Vander Dussen and Aletta C. Vander Dussen	12	10
24			
25	Sybrand Vander Dussen and Johanna Vander Dussen	23	18
26			
27	Helen Goedhart Van Eik (see listing under name of Harry N. Goedhart)		
28			
	Cornelius Vander Eyk, aka Case Vander Eyk, and Nelly Vander Eyk, aka Nellie Vander Eyk	7	6
	George Van Der Ham and Alice Van Der Ham	10	8



	<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
3	Huibert Vander Ham and Henrietta Vander Ham	33	26
5	Joe Vanderham and Cornelia Vanderham	13	10
6	John Vanderham and Nell M. Vanderham	20	16
7	Charlie Vander Kooi and Lena Mae Vander Kooi (see also listing under name of Michel Bordato)	13	10
9	Pete Vander Kooi (see listing under name of Ed Haakma)		
10	Bert Vander Laan and Stella Vander Laan	10	8
11	Matt Vander Sys and Johanna Vander Sys	13	10
12	Bill Vander Vegt and Henny Vander Vegt	18	14
13	George Vander Vegt and Houjke Vander Vegt	12	10
14	Harry J. Vander Wall and Marian E. Vander Wall	12	10
16	Bert Vande Vegte and Lillian Vande Vegte	1	1
17	Anthony Van Diest	0	0
18	Jennie Van Diest, as to undivided 1/3 interest; Ernest Van Diest and Rena Van Diest, as to undivided 1/3 interest; and Cornelius Van Diest and Anna Van Diest, as to undivided 1/3 interest. (Van Diest Dairy, tenant)	20	16
22	Katrena Van Diest and/or Margaret Van Diest	92	74
23	Henry W. Van Dyk (see listing under name of Henrietta Veenendaal)		
25	Wiechert Van Dyk and Jennie Van Dyk	13	10
26	Corty Van Dyke (see listing under name of Charles E. Adams)		
27	Sidney Van Dyke (see listing under name of Louis Struickman)		



1	<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
2			
3	William Van Foeken	0	0
4	Jake Van Haaster and Gerarda Van Haaster	0	0
5	Arie C. Van Leeuwen (see listing under name of Sam Bouman)		
6			
7	Gerrit Van Leeuwen of 15405 Shoemaker Road, Norwalk (see listing under name of Pacific Electric Railway Company)		
8			
9	Henry Van Leeuwen and Caroline P. Van Leeuwen; Gerrit Van Leeuwen of 5948 Lorelei Street, Bellflower, and Ellen Van Leeuwen	1	1
10			
11	Jake Van Leeuwen, Jr. and Cornelia J. Van Leeuwen (James C. Boogerd and Jake Van Leeuwen, Jr. dba Van Leeuwen & Boogerd, tenants)	9	7
12			
13			
14	Anthony R. Van Loon (see listing under name of Henry Van Ruiten)		
15	John Van Nierop and Lily E. Van Nierop	0	0
16			
17	Henry Van Ruiten and Mary A. Van Ruiten, as to undivided 1/2 interest; and Jake Van Ruiten and Jacoba Van Ruiten, as to undivided 1/2 interest (W. P. Jordan, Anthony R. Van Loon, and Jules Wesselink, tenants)	88	70
18			
19			
20	Pete Van Ruiten and Mary Van Ruiten (for purposes of clarification, this Mary Van Ruiten is also known as Mrs. Pete Van Ruiten and is not the same individual as sued herein as Mary A. Van Ruiten, who is also known as Mrs. Henry G. Van Ruiten)	38	30
21			
22			
23			
24	Z. Van Spanje (see listing under name of Fumiko Mitsuuchi)		
25			
26	Evert Veenendaal and Gertrude Veenendaal (see listing under name of Earl Haringa)		
27			
28	Henrietta Veenendaal (Henry W. Van Dyk, tenant)	10	8



	<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
1			
2			
3	Henry Veenendaal and Henrietta Veenendaal	8	6
4	Joe H. Veenendaal and Margie Veenendaal	34	27
5	John Veenendaal	0	0
6	Vehicle Maintenance & Painting Corporation (see listing under name of Nicholas		
7	C. Contreas)		
8	Salvador Velasco	16	13
9	Mike Veldhuis	0	0
10	Albert Veldhuizen and Helen Veldhuizen	23	18
11	Jack Verbree	0	0
12	Mrs. Klaasje Verburg (Leon Verburg		
13	to extent of interest under contract		
	to purchase)	12	10
14	John C. Verhoeven and Sadie Verhoeven	25	20
15	Joseph C. Vierra and Caroline Vierra		
16	(Joseph C. Vierra and William J.		
17	Vierra, doing business as Vierra &	13	10
	Vierra, tenants)		
18	Sieger Vierstra and Nellie G. Vierstra		
	(Jacob J. Bosma, tenant)	12	10
19	Virginia Country Club of Long Beach	340	272
20	Roy Visbeek	0	0
21	Louis Visser	9	7
22	Vista Hill Psychiatric Foundation	39	31
23	Louie Von Ah	0	0
24	Walnut Irrigation District	154	123
25	Walnut Park Mutual Water Co.	1,245	996
26	C. D. Webster	1	1
27	(see also listing under name of		
	Southern California Edison Company)		
28			



<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
Morris Weiss and Bessie Weiss (Wilbur Mellema, tenant) (also see listings under names of Elmo D. Murphy and Emma Engler)	20	16
Wells Fargo Bank as Executor of Estate of Edward H. Heller, Deceased, and as Executor of Estate of Lloyd W. Dinkelspiel, Deceased, and as Trustee under Trust created by the Will of Florence H. Dinkelspiel, Deceased (see listing under name of Florence Hellman Ehrman)		
Jules Wesselink (see listing under name of Henry Van Ruiten)		
West Gateway Mutual Water Co.	105	84
Henry Westra and Hilda Westra	40	32
John D. Westra (see listing under name of Orla Company)		
Francis O. Wharram (see listing under name of Shayman & Wharram)		
Whittier Union High School District	125	100
Arend Z. Wier	14	11
H. Wiersema, aka Harm Wiersema and Pearl Wiersema	16	13
William Wiersma and Elbra Wiersma	7	6
Richard Wigboly (see listing under name of Central Manufacturing District, Inc.)		
Mary Wilcox (see listing under name of Jenkins Realty Mutual Water Co.)		
Ralph P. Williams and Mary Williams	14	11
Wilshire Oil Company of California	1,795	1,436
Melvin L. Wilson and Marie Wilson	1	1
D. P. Winslow and Dorothy C. Winslow (Berton Elson, tenant)	15	12

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	<u>Name</u>	<u>Total Water Right</u>	<u>Allowed Pumping Allocation</u>
1			
2			
3	Helene K. Winters	1	1
4	Fred E. Wiseman and Grayce Anna Wiseman	2	2
5	Helen Wolfsberger and Christine Joseph	2	2
6	Volney Womack	0	0
7	Cho Shee Woo (Hong Woo and Ngorn Seung Woo, as agents of property for Cho 8 Shee Woo)	20	16
9	Gerrit Wybenga and Rena Wybenga	10	8
10	George Yamamoto and Alice Yamamoto, also known as Fumi Yamamoto (Fumi 11 Garden Farms, Inc., tenant) (see also listing under name of 12 Southern California Edison Company)	17	14
13	Paul N. Yokota and Miyo Yokota	4	4
14	Minoru Yoshijima (see listing under name of Kazuo Hatanaka)		
15	Frank Yoshioka	0	0
16	Maxine Young	3	3
17	Mrs. A. Zandvliet also known as Anna A. 18 Zandvliet	8	6
19	Arnold Zeilstra and Nellie Zeilstra	6	5
20	George Zivelonghi and Antonio Zivelonghi	121	97
21	Dick Zuidervaart and Janna Zuidervaart (Artesia Milling Company, tenant)	1	1
22	Andy Zylstra	0	0
23	Zylstra Bros. a partnership consisting 24 of Lammert Zylstra and William Zylstra (see listing under name of John H. Coito)		
25	John Zylstra and Leonard J. Zylstra, doing 26 business as The Zylstra Dairy	22	18
27	Leonard Zylstra (not the same person as 28 Leonard J. Zylstra)	0	0



1 4. Transition in Administrative Year - Application.

2 "Year" and "Administrative Year" as used throughout this judgment
3 shall mean the water year; provided that with the first fiscal
4 year (July 1 - June 30) commencing at least four months after the
5 "Amended Judgment" became final, and thereafter, said words shall
6 mean the fiscal year. Since this will provide a transitional
7 Administrative year of nine months, October 1 - June 30, ("short
8 year" hereafter), notwithstanding the finding and determinations
9 in the annual Watermaster report for the then last preceding
10 water year, the Allowed Pumping Allocations of the parties and
11 the quantity which Defendant City of Los Angeles is annually
12 permitted to extract from Central Basin for said short year shall
13 be based on three-quarters of the otherwise allowable quantity.
14 During said short year, because of hardships that might otherwise
15 result, any overextractions by a party shall be deemed pursuant
16 to paragraph 2, Subpart B of Part III of this judgment (p. 61),
17 and it shall be deemed that the Watermaster has made the
18 determination of unreasonable hardship to which reference is
19 therein made.

20 II. APPOINTMENT OF WATERMASTER; WATERMASTER ADMINI-
21 STRATION PROVISIONS. Department of Water Resources of the State
22 of California is hereby appointed Watermaster, for an indefinite
23 term, but subject to removal by the Court, to administer this
24 judgment and shall have the following powers, duties and
25 responsibilities:

26 1. Duties, Powers and Responsibilities of Watermaster.

27 In order to assist the Court in the administration and enforce-
28 ment of the provisions of this judgment and to keep the Court



1 fully advised in the premises, the Watermaster shall have the
2 following duties, powers and responsibilities in addition to
3 those before or hereafter provided in this judgment:

4 (a) Watermaster May Require Reports, Information and
5 Records. To require of parties the furnishing of such reports,
6 information and records as may be reasonably necessary to
7 determine compliance or lack of compliance by any party with the
8 provisions of this judgment.

9 (b) Requirement of Measuring Devices. To require all
10 parties or any reasonable classification of parties owning or
11 operating any facilities for the extraction of ground water from
12 Central Basin to install and maintain at all times in good
13 working order at such party's own expense, appropriate measuring
14 devices at such times and as often as may be reasonable under the
15 circumstances and to calibrate or test such devices.

16 (c) Inspections by Watermaster. To make inspections
17 of ground water production facilities and measuring devices at
18 such times and as often as may be reasonable under the circum-
19 stances and to calibrate or test such devices.

20 (d) Annual Report. The Watermaster shall prepare,
21 file with the Court and mail to each of the parties on or before
22 the 15th day of the fourth month following the end of the
23 preceding Administrative year, an annual report for such year,
24 the scope of which shall include but not be limited to the
25 following:

- 26 1. Ground Water Extractions
- 27 2. Exchange Pool Operation
- 28 3. Use of Imported Water



- 1 4. Violations of Judgment and Corrective Action Taken
- 2 5. Change of Ownership of Total Water Rights
- 3 6. Watermaster Administration Costs
- 4 7. Recommendations, if any.

5 (e) Annual Budget and Appeal Procedure in Relation
6 Thereto. The Watermaster shall annually prepare a tentative
7 budget for each Administrative year stating the anticipated
8 expense for administering the provisions of this judgment. The
9 Watermaster shall mail a copy of said tentative budget to each of
10 the parties hereto at least 60 days before the beginning of each
11 Administrative year. For the first Administrative year of
12 operation under this judgment, if the Watermaster is unable to
13 meet the above time requirement, the Watermaster shall mail said
14 copies as soon as possible. If any party hereto has any
15 objection to said tentative budget, it shall present the same in
16 writing to the Watermaster within 15 days after the date of
17 mailing of said tentative budget by the Watermaster. If no
18 objections are received within said period, the tentative budget
19 shall become the final budget. If objections are received, the
20 Watermaster shall, within 10 days thereafter, consider such
21 objections, prepare a final budget and mail a copy thereof to
22 each party hereto, together with a statement of the amount
23 assessed to each party. Any party may apply to the Court within
24 15 days after the mailing of such final budget for a revision
25 thereof based on specific objections thereto. The parties hereto
26 shall make the payments otherwise required of them to the
27 Watermaster even though such a request for revision has been
28 filed with the Court. Upon any revision by the Court the



1 Watermaster shall either remit to the parties their prorata
2 portions of any reduction in the budget, or credit their accounts
3 with respect to their budget assessments for the next ensuing
4 Administrative year, as the Court shall direct.

5 The amount to be assessed to each party shall be
6 determined as follows: If that portion of the final budget to be
7 assessed to the parties is equal to or less than \$20.00 per party
8 then the cost shall be equally apportioned among the parties. If
9 that portion of the final budget to be assessed to parties is
10 greater than \$20.00 per party then each party shall be assessed a
11 minimum of \$20.00. The amount of revenue expected to be received
12 through the foregoing minimum assessments shall be deducted from
13 that portion of the final budget to be assessed to the parties
14 and the balance shall be assessed to the parties having Allowed
15 Pumping Allocations, such balance being divided among them
16 proportionately in accordance with their respective Allowed
17 Pumping Allocations.

18 Payment of the assessment provided for herein, subject
19 to adjustment by the Court as provided, shall be made by each
20 such party prior to beginning of the Administrative year to which
21 the assessment relates, or within 40 days after the mailing of
22 the tentative budget, whichever is later. If such payment by any
23 party is not made on or before said date, the Watermaster shall
24 add a penalty of 5% thereof to such party's statement. Payment
25 required of any party hereunder may be enforced by execution
26 issued out of the Court, or as may be provided by order herein-
27 after made by the Court, or by other proceedings by the
28 Watermaster or by any party hereto on the Watermaster's behalf.



1 Any money unexpended at the end of any Administrative
2 year shall be applied to the budget of the next succeeding
3 Administrative year.

4 Notwithstanding the above, no part of the budget of the
5 Watermaster shall be assessed to the Plaintiff District or to any
6 party who has not extracted water from Central Basin for a period
7 of two successive Administrative years prior to the Administra-
8 tive year in which the tentative budget should be mailed by the
9 Watermaster under the provisions of this subparagraph (e).

10 (f) Rules. The Watermaster may adopt and amend
11 from time to time such rules as may be reasonably necessary to
12 carry out its duties, powers and responsibilities under the
13 provisions of this judgment. The rules shall be effective on
14 such date after the mailing thereof to the parties as is
15 specified by the Watermaster, but not sooner than 30 days after
16 such mailing.

17 2. Use of Facilities and Data Collected by Other
18 Governmental Agencies. The Watermaster is directed not to
19 duplicate the collection of data relative to conditions of the
20 Central Basin which is then being collected by one or more
21 governmental agencies, but where necessary the Watermaster may
22 collect supplemental data. Where it appears more economical to
23 do so, the Watermaster is directed to use such facilities of
24 other governmental agencies as are available to it under either
25 no cost or cost agreements with respect to the receipt of
26 reports, billings to parties, mailings to parties, and similar
27 matters.
28



1 3. Appeal from Watermaster Decisions Other Than With
2 Respect to Budget. Any party interested therein who has
3 objection to any rule, determination, order or finding made by
4 the Watermaster, may make objection thereto in writing delivered
5 to the Watermaster within 30 days after the date the Watermaster
6 mails written notice of the making of such rule, determination,
7 order or finding, and within 30 days after such delivery the
8 Watermaster shall consider said objection and shall amend or
9 affirm his rule, determination, order or finding and shall give
10 notice thereof to all parties. Any such party may file with the
11 Court within 30 days from the date of said notice any objection
12 to such rule, determination, order or finding of the Watermaster
13 and bring the same on for hearing before the Court at such time
14 as the Court may direct, after first having served said objection
15 upon all other parties. The Court may affirm, modify, amend or
16 overrule any such rule, determination, order or finding of the
17 Watermaster. The provisions of this paragraph shall not apply to
18 budgetary matters, as to which the appellate procedure has
19 heretofore been set forth. Any objection under this paragraph
20 shall not stay the rule, determination, order or finding of the
21 Watermaster. However, the Court, by ex parte order, may provide
22 for a stay thereof on application of any interested party on or
23 after the date that any such party delivers to the Watermaster
24 any written objection.

25 4. Effect of Non-Compliance by Watermaster With Time
26 Provisions. Failure of the Watermaster to perform any duty,
27 power or responsibility set forth in this judgment within the
28 time limitation herein set forth shall not deprive the



1 Watermaster of authority to subsequently discharge such duty,
2 power or responsibility, except to the extent that any such
3 failure by the Watermaster may have rendered some otherwise
4 required act by a party impossible.

5 III. PROVISIONS FOR PHYSICAL SOLUTION TO MEET THE WATER
6 REQUIREMENTS IN CENTRAL BASIN. In order to provide flexibility
7 to the injunction set forth in Part I of the judgment, and to
8 assist in a physical solution to meet water requirements in
9 Central Basin, the injunction so set forth is subject to the
10 following provisions.

11 A. Carryover of Portion of Allowed Pumping Allocation.

12 (1) Each party adjudged to have a Total Water
13 Right or water rights and who, during a particular
14 Administrative year, does not extract from Central Basin a
15 total quantity equal to such party's Allowed Pumping
16 Allocation for the particular Administrative year, less any
17 allocated subscriptions by such party to the Exchange Pool,
18 or plus any allocated requests by such party for purchase of
19 Exchange Pool water, is permitted to carry over (the "One
20 Year Carryover") from such Administrative year the right to
21 extract from Central Basin in the next succeeding
22 Administrative year so much of said total quantity as it did
23 not extract in the particular Administrative year, not to
24 exceed 20% of such party's Allowed Pumping Allocation, or 20
25 acre feet, whichever of said 20% or 20 acre feet is the
26 larger.

27 (2) Following the declaration of a Declared Water
28 Emergency and until the Declared Water Emergency ends either



1 by expiration or by resolution of the Board of Directors of
2 the Central and West Basin Water Replenishment District,
3 each party adjudged to have a Total Water Right or water
4 rights and who, during a particular Administrative year,
5 does not extract from Central Basin a total quantity equal
6 to such party's Allowed Pumping Allocation for the
7 particular Administrative year, less any allocated
8 subscriptions by such party to the Exchange Pool, or plus
9 any allocated requests by such party for purchase of
10 Exchange Pool water, is permitted to carry over (the
11 "Drought Carryover") from such Administrative year the right
12 to extract from Central Basin so much of said total quantity
13 as it did not extract during the period of the Declared
14 Water Emergency, to the extent such quantity exceeds the One
15 Year Carryover, not to exceed an additional 35% of such
16 party's Allowed Pumping Allocation, or additional 35 acre
17 feet, whichever of said 35% or 35 acre feet is the larger.
18 Carryover amounts shall first be allocated to the One Year
19 Carryover and any remaining carryover amount for that year
20 shall be allocated to the Drought Carryover.

21 (3) No further amounts shall be added to the
22 Drought Carryover following the end of the Declared Water
23 Emergency, provided however that in the event another
24 Declared Water Emergency is declared, additional Drought
25 Carryover may be added, to the extent such additional
26 Drought Carryover would not cause the total Drought
27 Carryover to exceed the limits set forth above.
28



1 (4) The Drought Carryover shall be supplemental
2 to and shall not affect any previous drought carryover
3 acquired by a party pursuant to previous order of the court.

4 B. When Over-extractions May be Permitted.

5 1. Underestimation of Requirements for Water. Any
6 party hereto having an Allowed Pumping Allocation and not in
7 violation of any provision of this judgment may extract in an
8 Administrative year an additional quantity of water not to
9 exceed: (a) 20% of such party's Allowed Pumping Allocation or 20
10 acre feet, whichever is greater, and (b) any amount in addition
11 thereto which may be approved in advance by the Watermaster.

12 2. Reductions in Allowed Pumping Allocations in
13 Succeeding Years to Compensate for Permissible Overextractions.

14 Any such party's Allowed Pumping Allocation for the following
15 Administrative year shall be reduced by the amount over-extracted
16 pursuant to paragraph 1 above, provided that if the Watermaster
17 determines that such reduction in the party's Allowed Pumping
18 Allocation in one Administrative year will impose upon such a
19 party an unreasonable hardship, the said reduction in said
20 party's Allowed Pumping Allocation shall be prorated over a
21 period of five (5) Administrative years succeeding that in which
22 the excessive extractions by the party occurred. Application for
23 such relief to the Watermaster must be made not later than the
24 40th day after the end of the Administrative year in which such
25 excessive pumping occurred. Watermaster shall grant such relief
26 if such over-extraction, or any portion thereof, occurred during
27 a period of Declared Water Emergency.
28



1 3. Reductions in Allowed Pumping Allocations for the
2 Next Succeeding Administrative Year to Compensate for
3 Overpumping. Whenever a party over-extracts in excess of 20% of
4 such party's Allowed Pumping Allocation, or 20 acre feet,
5 whichever is greater, and such excess has not been approved in
6 advance by the Watermaster, then such party's Allowed Pumping
7 Allocation for the following Administrative year shall be reduced
8 by an amount equivalent to its total over-extractions in the
9 particular Administrative year in which it occurred.

10 4. Reports of Certain Over-extractions to the Court.
11 Whenever a party over-extracts in excess of 20% of such party's
12 Allowed Pumping Allocation, or 20 acre feet, whichever is
13 greater, without having obtained prior approval of the
14 Watermaster, such shall constitute a violation of the judgment
15 and the Watermaster shall make a written report to the Court for
16 such action as the Court may deem necessary. Such party shall be
17 subject to such injunctive and other processes and action as the
18 Court might otherwise take with regard to any other violation of
19 such judgment.

20 5. Effect of Over-extractions on Rights. Any
21 party who over-extracts from Central Basin in any Administrative
22 year shall not acquire any additional rights by reason of such
23 over-extractions; nor, shall any required reductions in
24 extractions during any subsequent years reduce the Total Water
25 Right or water rights of any party to the extent said over-
26 extractions are in compliance with paragraph 1 above.

27 6. Pumping Under Agreement With Plaintiff During
28 Periods of Emergency. Plaintiff overlies Central Basin and



1 engages in activities of replenishing the ground waters thereof.
2 Plaintiff by resolution has appropriated for use during
3 emergencies the quantity of 17,000 acre feet of imported and
4 reclaimed water replenished by it into Central Basin, and
5 pursuant to such resolution Plaintiff reserves the right to use
6 or cause the use of such quantity during such emergency periods.

7 (a) Notwithstanding any other provision of this
8 judgment, parties who are water purveyors (including successors
9 in interest) are authorized to enter into agreements with
10 Plaintiff under which such water purveyors may exceed their
11 respective Allowed Pumping Allocations for the particular
12 administrative year when the following conditions are met:

13 (1) Plaintiff is in receipt of a resolution of the
14 Board of Directors of the Metropolitan Water District
15 of Southern California ("MWD") that there is an actual
16 or immediately threatened temporary shortage of MWD's
17 imported water supply compared to MWD's needs, or a
18 temporary inability to deliver MWD's imported water
19 supply throughout its area, which will be alleviated by
20 overpumping from Central Basin.

21 (2) The Board of Directors of both Plaintiff and
22 Central Basin Municipal Water District by resolutions
23 concur in the resolution of MWD's Board of Directors,
24 and the Board of Directors of Plaintiff finds in its
25 resolution that the average minimum elevation of water
26 surface among those wells in the Montebello Forebay of
27 the Central Basin designated as Los Angeles County
28 Flood Control District Wells Nos. 1601T, 1564P, 1615P,



1 and 1626L, is at least 43.7 feet above sea level. This
2 computation shall be based upon the most recent "static
3 readings" taken, which shall have been taken not more
4 than four weeks prior. Should any of the wells
5 designated above become destroyed or otherwise be in a
6 condition so that readings cannot be made, or the owner
7 prevent their use for such readings the Board of
8 Directors of the Plaintiff may, upon appropriate
9 engineering recommendation substitute such other well
10 or wells as it may deem appropriate.

11 (3) In said resolution, Plaintiff's Board of Directors
12 sets a public hearing, and notice of the time, place
13 and date thereof (which may be continued from time to
14 time without further notice) is given by First Class
15 Mail to the current designees of the parties, filed and
16 served in accordance with Part V, paragraph 3 of this
17 Judgment. Said notice shall be mailed at least five
18 (5) days before the scheduled hearing date.

19 (4) At said public hearing, parties (including succes-
20 sors in interest) are given full opportunity to be
21 heard, and at the conclusion thereof the Board of
22 Directors of Plaintiff by resolution decides to proceed
23 with agreements under this Part III-B.

24 (5) For purposes of this Part III-B, "water purveyors"
25 mean those parties (and successors in interest) which
26 sell water to the public whether regulated public
27 utilities, mutual water companies or public entities,
28 which have a connection or connections for the taking



1 of imported water of MWD, or access to imported water
2 of MWD through a connection, and which normally supply
3 part of their customer's needs with such imported
4 water.

5 (b) All such agreements shall be subject to the fol-
6 lowing requirements, and such others as Plaintiff's Board of
7 Directors shall require:

8 (1) They shall be of uniform content except as to
9 quantity involved, and any special provisions
10 considered necessary or desirable with respect to local
11 hydrological conditions or good hydrologic practice.

12 (2) They shall be offered to all water purveyors,
13 excepting those which Plaintiff's Board of Directors
14 determine should not over pump because such over
15 pumping would occur in undesirable proximity to a sea
16 water barrier project designed to forestall sea water
17 intrusion, or within or in undesirable proximity to an
18 area within Central Basin wherein groundwater levels
19 are at an elevation where over pumping is under all the
20 circumstances then undesirable.

21 (3) The maximum terms for the agreements shall be four
22 months, which agreements shall commence on the same
23 date and end on the same date (and which may be
24 executed at any time within the four month period),
25 unless an extension thereof is authorized by the Court,
26 under Part IV of this judgment.

27 (4) They shall contain provisions that the water
28 purveyor executing the agreement pay to the Plaintiff a



1 price in addition to the applicable replenishment
2 assessment determined on the following formula. The
3 normal price per acre-foot of Central Basin Municipal
4 Water District's (CBMWD) treated domestic and municipal
5 water, as "normal" price of such category of water is
6 defined in Part C, paragraph 10 (price to be paid for
7 Exchange Pool Water) as of the beginning of the
8 contract term less the deductions set forth in said
9 paragraph 10 for the administrative year in which the
10 contract term commences. The agreement shall provide
11 for adjustments in the first of said components for any
12 proportional period of the contract term during which
13 the CBMWD said normal price is changed, and if the
14 agreement straddles two administrative years, the said
15 deductions shall be adjusted for any proportionate
16 period of the contract term in which the amount thereof
17 or of either subcomponent changes for purposes of said
18 paragraph 10. Any price for a partial acre-foot shall
19 be computed prorata. Payments shall be due and payable
20 on the principle that over extractions under the
21 agreement are of the last water pumped in the fiscal
22 year, and shall be payable as the agreement shall
23 provide.

24 (5) They shall contain provisions that:

25 (a) All of such agreements (but not less than all)
26 shall be subject to termination by Plaintiff if, in the
27 Judgment of Plaintiff's Board of Directors, the
28 conditions or threatened conditions upon which they



1 were based have abated to the extent over extractions
2 are no longer considered necessary; and (b) that any
3 individual agreement or agreements may be terminated if
4 the Plaintiff's Board of Directors finds that adverse
5 hydrologic circumstances have developed as a result of
6 over extractions by any water purveyor or purveyors
7 which have executed said agreements, or for any other
8 reason that Plaintiff's Board of Directors finds good
9 and sufficient.

10 (c) Other matters applicable to such agreements and
11 over pumping thereunder are as follows, without need for express
12 provisions in the agreements;

13 (1) The quantity of over pumping permitted shall be
14 additional to that which the water purveyor could
15 otherwise over pump under this Judgment.

16 (2) The total quantity of permitted over pumping under
17 all said agreements during said four months shall not
18 exceed Seventeen thousand (17,000) acre feet, but the
19 individual water purveyor shall not be responsible or
20 affected by any violation of this requirement. That
21 total is additional to over extractions otherwise
22 permitted under this Judgment.

23 (3) Only one four month period may be utilized by
24 Plaintiff in entering into such agreements, as to any
25 one emergency or continuation thereof declared by MWD's
26 Board of Directors under paragraph 6(a).

27 (4) Plaintiff may utilize the ex parte provisions of
28 Part IV of this Judgment in lieu of the authority



1 contained herein (which ex parte provisions are not
2 limited as to time, nature of relief, or terms of any
3 agreements), but neither Plaintiff nor any other party
4 shall utilize both as to any one such emergency or
5 continuation thereof.

6 (5) If any party claims it is being damaged or
7 threatened with damage by the over extractions by any
8 party to such an agreement, the first party or the
9 Watermaster may seek appropriate action of the Court
10 for termination of any such agreement upon notice of
11 hearing to the party complaining, to the party to said
12 agreement, to the plaintiff, and to any parties who
13 have filed a request for special notice. Any
14 termination shall not affect the obligation of the
15 party to make payments under the agreement for over
16 extractions which did occur thereunder.

17 (6) Plaintiff shall maintain separate accounting of
18 the proceeds from payments made pursuant to agreements
19 entered into under this part. Said fund shall be
20 utilized solely for purposes of replenishment in
21 replacement of waters in Central Basin and West Basin.
22 Plaintiff shall as soon as practicable cause replenish-
23 ment in Central Basin by the amounts to be overproduced
24 pursuant to this Paragraph 6 commencing at Page 63,
25 whether through spreading, injection, or in lieu
26 agreements.

27 (7) Over extractions pursuant to the agreements shall
28 not be subject to the "make up" provisions of the



1 Judgment as amended, provided that if any party fails
2 to make payments as required by the agreement,
3 Plaintiff may require such "make up" under Paragraph 3,
4 Subpart B, Part III of the Judgment (Page 62).

5 (8) Water Purveyor under any such agreement may, and
6 is encouraged to enter into appropriate arrangements
7 with customers who have water rights in Central Basin
8 under or pursuant to this Judgment whereby the Water
9 Purveyor will be assisted in meeting the objectives of
10 the agreement.

11 (9) Nothing in this Paragraph 6 limits the exercise of
12 the reserved jurisdiction of the court except as
13 provided in subparagraph (c) (4) above.

14 7. Exemption for Extractors of Contaminated
15 Groundwater. Any party herein may petition the Replenishment
16 District for a Non-consumptive Water Use Permit as part of a
17 project to remedy or ameliorate groundwater contamination. If
18 the petition is granted as set forth in this part, the petitioner
19 may extract the groundwater as permitted hereinafter, without the
20 production counting against the petitioner's production rights.

21 (a) If the Board of the Replenishment District
22 determines by Resolution that there is a problem of groundwater
23 contamination that a proposed program will remedy or ameliorate,
24 an operator may make extractions of groundwater to remedy or
25 ameliorate that problem without the production counting against
26 the petitioner's production rights if the water is not applied to
27 beneficial surface use, its extractions are made in compliance
28 with all the terms and conditions of the Board Resolution, and



1 the Board has determined in the Resolution either of the
2 following:

3 (1) The groundwater to be extracted is unusable and
4 cannot be economically treated or blended for use with
5 other water.

6 (2) The proposed program involves extraction of usable
7 water in the same quantity as will be returned to the
8 underground without degradation of quality.

9 (b) The Resolution may provide those terms and
10 conditions the Board deems appropriate, including, but not
11 limited to, restrictions on the quantity of the extractions to be
12 so exempted, limitations on time, periodic reviews, requirement
13 of submission of test results from a Board-approved laboratory,
14 and any other relevant terms or conditions.

15 (c) Upon written notice to the operator involved, the
16 Board may rescind or modify its Resolution. The rescission or
17 modification of the Resolution shall apply to groundwater
18 extractions occurring more than ten days after the rescission or
19 modification. Notice of rescission or modification shall be
20 either mailed first class mail, postage prepaid, at least two
21 weeks prior to the meeting of the Board at which the rescission
22 or modification will be made to the address of record of the
23 operator or personally delivered two weeks prior to the meeting.

24 (d) The Board's decision to grant, deny, modify or
25 revoke a permit or to interrupt or stop a permitted project may
26 be appealed to this court within thirty days of the notice
27 thereof to the applicant and upon thirty days notice to the
28 designees of all parties herein.



1 (e) The Replenishment District shall monitor and
2 periodically inspect the project for compliance with the terms
3 and conditions for any permit issued pursuant to these
4 provisions.

5 (f) No party shall recover costs from any other party
6 herein ⁱⁿ ~~on~~ connection with ^{determinations} ~~determinators~~ made with respect to this
7 part.

8 C. Exchange Pool Provisions.

9 (1) Definitions.

10 For purposes of these Exchange Pool provisions, the
11 following words and terms have the following meanings:

12 (a) "Exchange Pool" is the arrangement hereinafter set
13 forth whereby certain of the parties, ("Exchangees") may,
14 notwithstanding the other provisions of the judgment, extract
15 additional water from Central Basin to meet their needs, and
16 certain other of the parties ("Exchangors"), reduce their
17 extractions below their Allowed Pumping Allocations in order to
18 permit such additional extractions by others.

19 (b) "Exchangor" is one who offers, voluntarily or
20 otherwise, pursuant to subsequent provisions, to reduce its
21 extractions below its Allowed Pumping Allocation in order to
22 permit such additional extractions by others.

23 (c) "Exchangee" is one who requests permission to
24 extract additional water from Central Basin.

25 (d) "Undue hardship" means unusual and severe economic
26 or operational hardship, other than that arising (i) by reason of
27 any differential in quality that might exist between water
28 extracted from Central Basin and water available for importation



1 or (ii) by reason of any difference in cost to a party in
2 subscribing to the Exchange Pool and reducing its extractions of
3 water from Central Basin in an equivalent amount as opposed to
4 extracting any such quantity itself.

5 2. Parties Who May Purchase Water Through the Exchange
6 Pool. Any party not having existing facilities for the taking of
7 imported water as of the beginning of any Administrative year,
8 and any party having such facilities as of the beginning of any
9 Administrative year who is unable, without undue hardship, to
10 obtain, take, and put to beneficial use, through its distribution
11 system or systems existing as of the beginning of the particular
12 Administrative year, imported water in a quantity which, when
13 added to its Allowed Pumping Allocation for that particular
14 Administrative year, will meet its estimated needs for that
15 particular Administrative year, may purchase water from the
16 Exchange Pool, subject to the limitations contained in this
17 Subpart C of this Part III (Subpart "C" hereinafter).

18 3. Procedure for Purchasing Exchange Pool Water. Not
19 later than the 40th day following the commencement of each
20 Administrative year, each such party desiring to purchase water
21 from the Exchange Pool shall file with the Watermaster a request
22 to so purchase, setting forth the amount of water in acre feet
23 that such party estimates that it will require during the then
24 current Administrative year in excess of the total of:

25 (a) Its Allowed Pumping Allocation for that particular
26 Administrative year; and

27 (b) The imported water, if any, which it estimates it
28 will be able, without undue hardship, to obtain, take and put to



1 beneficial use, through its distribution system or systems
2 existing as of the beginning of that particular Administrative
3 year.

4 Any party who as of the beginning of any Administrative
5 year has existing facilities for the taking of imported water and
6 who makes a request to purchase from the Exchange Pool must
7 provide with such request substantiating data and other proof
8 which, together with any further data and other proof requested
9 by the Watermaster, establishes that such party is unable without
10 undue hardship, to obtain, take and put to beneficial use through
11 its said distribution system or systems a sufficient quantity of
12 imported water which, when added to its said Allowed Pumping
13 Allocation for the particular Administrative year, will meet its
14 estimated needs. As to any such party, the Watermaster shall
15 make a determination whether the party has so established such
16 inability, which determination shall be subject to review by the
17 court under the procedure set forth in Part II of this judgment.
18 Any party making a request to purchase from the Exchange Pool
19 shall either furnish such substantiating data and other proof, or
20 a statement that such party had no existing facilities for the
21 taking of imported water as of the beginning of that
22 Administrative year, and in either event a statement of the basis
23 for the quantity requested to be purchased.

24 4. Subscriptions to Exchange Pool.

25 (a) Required Subscription. Each party having existing
26 facilities for the taking of imported water as of the beginning
27 of any Administrative year hereby subscribed to the Exchange Pool
28 for purposes of meeting Category (a) requests thereon, as more



1 particularly defined in paragraph 5 of this Subpart C, twenty
2 percent (20%) of its Allowed Pumping Allocation, or the quantity
3 of imported water which it is able, without undue hardship, to
4 obtain, take and put to beneficial use through its distribution
5 system or systems existing as of the beginning of the particular
6 Administrative year in addition to such party's own estimated
7 needs for imported water during that water year, whichever is the
8 lesser. A party's subscription under this subparagraph (a) and
9 subparagraph (b) of this paragraph 4 is sometimes hereinafter
10 referred to as a 'required subscription'.

11 (b) Report to Watermaster by Parties with Connections
12 and Unable to Subscribe 20%. Any party having existing
13 facilities for the taking of imported water and estimating that
14 it will be unable, without undue hardship, in that Administrative
15 year to obtain, take and put to beneficial use through its
16 distribution system or systems existing as of the beginning of
17 that Administrative year, sufficient imported water to further
18 reduce its extractions from the Central Basin by twenty percent
19 (20%) of its Allowed Pumping Allocation for purposes of providing
20 water to the Exchange Pool must furnish not later than the 40th
21 day following the commencement of such Administrative year sub-
22 stantiating data and other proof which, together with any further
23 data and other proof requested by the Watermaster, establishes
24 said inability or such party shall be deemed to have subscribed
25 twenty percent (20%) of its Allowed Pumping Allocation for the
26 purpose of providing water to the Exchange Pool. As to any such
27 party so contending such inability, the Watermaster shall make a
28 determination whether the party has so established such



1 inability, which determination shall be subject to review by the
2 Court under the procedure set forth in Part II of this judgment.

3 (c) Voluntary Subscriptions. Any party, whether or
4 not having facilities for the taking of imported water, who
5 desires to subscribe to the Exchange Pool a quantity or further
6 quantity of its Allowed Pumping Allocation, may so notify the
7 Watermaster in writing of the quantity of such offer on or prior
8 to the 40th day following the commencement of the particular
9 Administrative year. Such subscriptions are referred to
10 hereinafter as "voluntary subscriptions." Any Exchangor who
11 desires that any part of its otherwise required subscription not
12 needed to fill Category (a) requests shall be available for
13 Category (b) requests may so notify the Watermaster in writing on
14 or prior to said 40th day. If all of that Exchangor's otherwise
15 required subscription is not needed in order to fill Category (a)
16 requests, the remainder of such required subscription not so
17 used, or such part thereof as such Exchangor may designate, shall
18 be deemed to be a voluntary subscription.

19 5. Limitations on Purchases of Exchange Pool Water and
20 Allocation of Requests to Purchase Exchange Pool Water Among
21 Exchangors.

22 (a) Categories of Requests. Two categories of
23 Exchange Pool requests are established as follows:

24 (1) Category (a) requests. The quantity requested by
25 each Exchangee, whether or not that Exchangee has an Allowed
26 Pumping Allocation, which quantity is not in excess of 150% of
27 its Allowed Pumping Allocation, if any, or 100 acre feet,
28 whichever is greater. Requests or portions thereof within the



1 above criteria are sometimes hereinafter referred to as "Category
2 (a) requests."

3 (2) Category (b) requests. The quantity requested by
4 each Exchangee having an Allowed Pumping Allocation to the extent
5 the request is in excess of 150% of that Allowed Pumping Alloca-
6 tion or 100 acre feet, whichever is greater, and the quantity
7 requested by each Exchangee having no Allowed Pumping Allocation
8 to the extent the request is in excess of 100 acre feet.

9 Portions of requests within the above criteria are sometimes
10 hereinafter referred to as "Category (b) requests."

11 (b) Filling of Category (a) Requests. All Exchange
12 Pool subscriptions, required and voluntary, shall be available to
13 fill Category (a) requests. Category (a) requests shall be
14 filled first from voluntary subscriptions, and if voluntary
15 subscriptions should be insufficient to fill all Category (a)
16 requests required subscriptions shall be then utilized to fill
17 Category (a) requests. All Category (a) requests shall be first
18 filled before any Category (b) requests are filled.

19 (c) Filling of Category (b) Requests. To the extent
20 that voluntary subscriptions have not been utilized in filling
21 Category (a) requests, Category (b) requests shall be filled only
22 out of any remaining voluntary subscriptions. Required subscrip-
23 tions will then be utilized for the filling of any remaining
24 Category (b) requests.

25 (d) Allocation of Requests to Subscriptions When
26 Available Subscriptions Exceed Requests. In the event the
27 quantity of subscriptions available for any category of requests
28 exceeds those requests in that category, or exceeds the remainder



1 of those requests in that category, such requests shall be filled
2 out of such subscriptions proportionately in relation to the
3 quantity of each subscription.

4 (e) Allocation of Subscriptions to Category (b)
5 Requests in the Event of Shortage of Subscriptions. In the event
6 available subscriptions are insufficient to meet Category (b)
7 requests, available subscriptions shall be allocated to each
8 request in the proportion that the particular request bears to
9 the total requests of the particular category.

10 6. Additional Voluntary Subscriptions. If subscrip-
11 tions available to meet the requests of Exchangees are insuffi-
12 cient to meet all requests, additional voluntary subscriptions
13 may be solicited and received from parties by the Watermaster.
14 Such additional subscriptions shall be allocated first to
15 Category (a) requests to the extent unfilled, and next to
16 Category (b) requests to the extent unfilled. All allocations
17 are to be otherwise in the same manner as earlier provided in
18 paragraph 5 (a) through 5 (e) inclusive.

19 7. Effect if Category (a) Requests Exceed Available
20 Subscriptions, Both Required and Voluntary. In the event that
21 the quantity of subscriptions available to fill Category (a)
22 requests is less than the total quantity of such requests, the
23 Exchangees may, nonetheless, extract the full amount of their
24 Category (a) requests otherwise approved by the Watermaster as if
25 sufficient subscriptions were available. The amounts received by
26 the Watermaster on account of that portion of the approved
27 requests in excess of the total quantities available from
28 Exchangors shall either be paid by the Watermaster to Central &



1 West Basin Water Replenishment District in trust for the purpose
2 of purchasing imported water and spreading the same in Central
3 Basin for replenishment thereof, or credited to an account of
4 said Plaintiff District on the books of the Watermaster, at the
5 option of said Plaintiff District. Thereafter said Plaintiff
6 District may, at any time, withdraw said funds or any part
7 thereof so credited in trust for the aforesaid purpose, or may by
8 the 40th day of any Administrative year notify the Watermaster
9 that it desires all or any portion of said funds to be expended
10 by the Watermaster for the purchase of water available from
11 subscriptions by Exchangors in the event the total quantity of
12 such subscriptions exceeds the total quantity of approved
13 requests by parties to purchase Exchange Pool water. To the
14 extent that there is such an excess of available subscriptions
15 over requests and to the extent that the existing credit in favor
16 of Plaintiff District is sufficient to purchase such excess
17 quantity at the price established for Exchange Pool purchases
18 during that Administrative year, the account of the Plaintiff
19 District shall be debited and the money shall be paid to the
20 Exchangors in the same manner as if another party had made such
21 purchase as an Exchangee. The Plaintiff District shall not
22 extract any such Exchange Pool water so purchased.

23 8. Additional Pumping by Exchangees Pursuant to
24 Exchange Pool Provisions. An Exchangee may extract from Central
25 Basin in addition to its Allowed Pumping Allocation for a
26 particular Administrative year that quantity of water which it
27 has requested to purchase from the Exchange Pool during that
28 Administrative year and which has been allocated to it pursuant



1 to the provisions of paragraphs 5, 6 and 7. The first pumping by
2 an Exchangee in any Administrative year shall be deemed to be
3 pumping of the party's allocation of Exchange Pool water.

4 9. Reduction in Pumping by Exchangors. Each Exchangor
5 shall in each Administrative year reduce its extractions of water
6 from Central Basin below its Allowed Pumping Allocation for the
7 particular year in a quantity equal to the quantity of Exchange
8 Pool requests allocated to it pursuant to the provisions of
9 paragraphs 4, 5, 6 and 7 of this Subpart C.

10 10. Price to be Paid for Exchange Pool Water. The
11 price to be paid by Exchangees and to be paid to Exchangors per
12 acre foot for required and voluntary subscriptions of Exchangors
13 utilized to fill requests on the Exchange Pool by Exchangees
14 shall be the dollar amount computed as follows by the Watermaster
15 for each Administrative year. The "normal" price as of the
16 beginning of the Administrative year charged by Central Basin
17 Municipal Water District (CBMWD) for treated MWD (Metropolitan
18 Water District of Southern California) water used for domestic
19 and municipal purposes shall be determined, and if on that date
20 there are any changes scheduled during that Administrative year
21 in CBMWD's "normal" price for such category of water, the
22 weighted daily "normal" CBMWD price shall be determined and used
23 in lieu of the beginning such price; and there shall be deducted
24 from such beginning or weighted price, as the case may be, the
25 "incremental cost of pumping water in Central Basin" at the
26 beginning of the Administrative year and any then current rate or
27 rates, of assessments levied on the pumping of ground water in
28 Central Basin by Plaintiff District and any other governmental



1 agency. The "normal" price charged by CBMWD shall be the highest
2 price of CBMWD for normal service excluding any surcharge or
3 higher rate for emergency deliveries or otherwise failing to
4 comply with CBMWD rates and regulations relating to earlier
5 deliveries. The "incremental cost of pumping water in Central
6 Basin" as of the beginning of the Administrative year shall be
7 deemed to be the Southern California Edison Company Schedule No.
8 PA-1 rate per kilowatt-hour, including all adjustments and all
9 uniform authorized additions to the basic rate, multiplied by 560
10 kilowatt-hours per acre-foot, rounded to the nearest dollar
11 (which number of kilowatt-hours has been determined to represent
12 the average energy consumption to pump an acre-foot of water in
13 Central Basin). In applying said PA-1 rate the charge per
14 kilowatt-hour under the schedule shall be employed and if there
15 are any rate blocks then the last rate block shall be employed.
16 Should a change occur in Edison schedule designations, the
17 Watermaster shall employ that applicable to motors used for
18 pumping water by municipal utilities.

19 11. Carry-over of Exchange Pool Purchases by
20 Exchangees. An Exchangee who does not extract from Central Basin
21 in a particular Administrative year a quantity of water equal to
22 the total of (a) its Allowed Pumping Allocation for that
23 particular Administrative year, reduced by any authorized amount
24 of carry-over into the next succeeding Administrative year
25 pursuant to the provisions of Subpart A of Part III of this
26 judgment, and (b) the quantity that it purchased from the
27 Exchange Pool for that particular Administrative year, may carry
28 over into the next succeeding Administrative year the right to



1 extract from Central Basin a quantity equal to the difference
2 between said total and the quantity actually extracted in that
3 Administrative year, but not exceeding the quantity purchased
4 from the Exchange Pool for that Administrative year. Any such
5 carry-over shall be in addition to that provided in said Subpart
6 A of Part III.

7 If the 'Basinwide Average Exchange Pool Price' in
8 the next succeeding Administrative year exceeds the 'Exchange
9 Pool Price' in the previous Administrative year any such
10 Exchangee exercising such carry-over rights hereinabove provided
11 shall pay to the Watermaster, forthwith upon the determination of
12 the 'Exchange Pool Price' in said succeeding Administrative year,
13 and as a condition to such carry-over rights, an additional
14 amount determined by multiplying the number of acre feet of
15 carry-over by the difference in 'Exchange Pool Price' as between
16 the two Administrative years. Such additional payment shall be
17 miscellaneous income to the Watermaster which shall be applied by
18 him against that share of the Watermaster's budget to be paid by
19 the parties to this Agreement for the second Administrative year
20 succeeding that in which the Exchange Pool water was so
21 purchased.

22 12. Notification by Watermaster to Exchangors and
23 Exchangees of Exchange Pool Requests and Allocations Thereof and
24 Price of Exchange Pool Water. Not later than the 65th day after
25 the commencement of each Administrative year, the Watermaster
26 shall determine and notify all Exchangors and Exchangees of the
27 total of the allocated requests for Exchange Pool water and shall
28 provide a schedule divided into categories of requests showing



1 the quantity allocated to each Exchangee and a schedule of the
2 allocation of the total Exchange Pool requirements among the
3 Exchangors. Such notification shall also advise Exchangors and
4 Exchangees of the prices to be paid to Exchangors for
5 subscriptions utilized and the Exchange Pool Price for that
6 Administrative year as determined by the Watermaster. The
7 determinations of the Watermaster in this regard shall be subject
8 to review by the Court in accordance with the procedure set forth
9 in Part II of this judgment.

10 13. Payment by Exchangees. Each Exchangee shall, on
11 or prior to last day of the third month of each Administrative
12 year, pay to the Watermaster one-quarter of said price per acre-
13 foot multiplied by the number of acre feet of such party's
14 approved request and shall, on or before the last day of each of
15 the next succeeding three months, pay a like sum to the
16 Watermaster. Such amounts must be paid by each Exchangee
17 regardless of whether or not it in fact extracts or uses any of
18 the water it has requested to purchase from the Exchange Pool.

19 14. Payments to Exchangors. As soon as possible after
20 receipt of moneys from Exchangees, the Watermaster shall remit to
21 the Exchangors their prorata portions of the amount so received
22 in accordance with the provisions of paragraph 10 above.

23 15. Delinquent Payments. Any amounts not paid on or
24 prior to any due date above shall carry interest at the rate of
25 1% per month or any part of a month. Any amounts required to be
26 so paid may be enforced by the equitable powers of the Court,
27 including, but not limited to, the injunctive process of the
28 Court. In addition thereto, the Watermaster, as Trustee for the



1 Exchangors, may enforce such payment by any appropriate legal
2 action, and shall be entitled to recover as additional damages
3 reasonable attorneys' fees incurred in connection therewith. If
4 any Exchangee shall fail to make any payments required of it on
5 or before 30 days after the last payment is due, including any
6 accrued interest, said party shall thenceforward not be entitled
7 to purchase water from the Exchange Pool in any succeeding
8 Administrative year except upon order of the Court, upon such
9 conditions as the Court may impose.

10 IV. CONTINUING JURISDICTION OF THE COURT.

11 The Court hereby reserves continuing jurisdiction and
12 upon application of any interested party, or upon its own motion,
13 may review and redetermine the following matters and any matters
14 incident thereto:

15 (a) Its determination of the permissible level of
16 extractions from Central Basin in relation to achieving a
17 balanced basin and an economic utilization of Central Basin for
18 ground water storage, taking into account any then anticipated
19 artificial replenishment of Central Basin by governmental
20 agencies for the purpose of alleviating what would otherwise be
21 annual overdrafts upon Central Basin and all other relevant
22 factors.

23 (b) Whether in accordance with applicable law any
24 party has lost all or any portion of his rights to extract ground
25 water from Central Basin and, if so, to ratably adjust the
26 Allowed Pumping Allocations of the other parties and ratably
27 thereto any remaining Allowed Pumping Allocation of such party.
28



1 (c) To remove any Watermaster appointed from time to
2 time and appoint a new Watermaster; and to review and revise the
3 duties, powers and responsibilities of the Watermaster and to
4 make such other and further provisions and orders of the Court
5 that may be necessary or desirable for the adequate admini-
6 stration and enforcement of the judgment.

7 (d) To revise the price to be paid by Exchangees and
8 to Exchangors for Exchange Pool purchases and subscriptions.

9 (e) In case of emergency or necessity, to permit
10 extractions from Central Basin for such periods as the Court may
11 determine: (i) ratably in excess of the Allowed Pumping
12 Allocations of the parties; or (ii) on a non-ratable basis by
13 certain parties if either compensation or other equitable
14 adjustment for the benefit of the other parties is provided.
15 Such overextractions may be permitted not only for emergency and
16 necessity arising within Central Basin area, but to assist the
17 remainder of the areas within The Metropolitan Water District of
18 Southern California in the event of temporary shortage or
19 threatened temporary shortage of its imported water supply, or
20 temporary inability to deliver the same throughout its area, but
21 only if the court is reasonably satisfied that no party will be
22 irreparably damaged thereby. Increased energy cost for pumping
23 shall not be deemed irreparable damage. Provided, however, that
24 the provisions of this subparagraph will apply only if the
25 temporary shortage, threatened temporary shortage, or temporary
26 inability to deliver was either not reasonably avoidable by the
27 Metropolitan Water District, or if reasonably avoidable, good
28 reason existed for not taking the steps necessary to avoid it.



1 (f) To review actions of the Watermaster.

2 (g) To assist the remainder of the areas within The
3 Metropolitan Water District of Southern California within the
4 parameter set forth in subparagraph (e) above.

5 (h) To provide for such other matters as are not
6 contemplated by the judgment and which might occur in the future,
7 and which if not provided for would defeat any or all of the
8 purposes of this judgment to assure a balanced Central Basin
9 subject to the requirements of Central Basin Area for water
10 required for its needs, growth and development.

11 The exercise of such continuing jurisdiction shall be
12 after 30 days notice to the parties, with the exception of the
13 exercise of such continuing jurisdiction in relation to
14 subparagraphs (e) and (g) above, which may be ex parte, in which
15 event the matter shall be forthwith reviewed either upon the
16 Court's own motion or the motion of any party upon which 30 days
17 notice shall be so given. Within ten (10) days of obtaining any
18 ex parte order, the party so obtaining the same shall mail notice
19 thereof to the other parties. If any other party desires Court
20 review thereof, the party obtaining the ex parte order shall bear
21 the reasonable expenses of mailing notice of the proceedings, or
22 may in lieu thereof undertake the mailing. Any contrary or
23 modified decision upon such review shall not prejudice any party
24 who relied on said ex parte order.

25 V. GENERAL PROVISIONS.

26 1. Judgment Constitutes Inter Se Adjudication. This
27 judgment constitutes an inter se adjudication of the respective
28 rights of all parties, except as may be otherwise specifically



1 indicated in the listing of the rights of the parties at pages 12
2 through 52 of this judgment, or in Appendix "2" hereof.

3 2. Assignment, Transfer, Etc., of Rights. Subject to
4 the other provision of this judgment, and any rules and
5 regulations of the Watermaster requiring reports relative
6 thereto, nothing herein contained shall be deemed to prevent any
7 party hereto from assigning, transferring, licensing or leasing
8 all or any portion of such water rights as it may have with the
9 same force and effect as would otherwise be permissible under
10 applicable rules of law as exist from time to time.

11 3. Service Upon and Delivery to Parties of Various
12 Papers. Service of the judgment on those parties who have
13 executed that certain Stipulation and Agreement for Judgment or
14 who have filed a notice of election to be bound by the Exchange
15 Pool provisions shall be made by first class mail, postage
16 prepaid, addressed to the designee and at the address designated
17 for that purpose in the executed and filed Counterpart of the
18 Stipulation and Agreement for Judgment or in the executed and
19 filed "Notice of Election to be Bound by Exchange Pool
20 Provisions", as the case may be, or in any substitute designation
21 filed with the Court.

22 Each party who has not heretofore made such a
23 designation shall, within 30 days after the judgment shall have
24 been served upon that party, file with the Court, with proof of
25 service of a copy upon the Watermaster, a written designation of
26 the person to whom and the address at which all future notices,
27 determinations, requests, demands, objections, reports and other
28



1 papers and processes to be served upon that party or delivered to
2 that party are to be so served or delivered.

3 A later substitute designation filed and served in the
4 same manner by any party shall be effective from the date of
5 filing as to the then future notices, determinations, requests,
6 demands, objections, reports and other papers and processes to be
7 served upon or delivered to that party.

8 Delivery to or service upon any party by the
9 Watermaster, by any other party, or by the Court, or any item
10 required to be served upon or delivered to a party under or
11 pursuant to the judgment may be by deposit in the mail, first
12 class, postage prepaid, addressed to the designee and at the
13 address in the latest designation filed by that party.

14 4. Judgment Does Not Affect Rights, Powers, Etc., of
15 Plaintiff District. Nothing herein constitutes a determination
16 or adjudication which shall foreclose Plaintiff District from
17 exercising such rights, powers, privileges and prerogatives as it
18 may now have or may hereafter have by reason of provisions of
19 law.

20 5. Continuation of Order Under Interim Agreement. The
21 order of Court made pursuant to the "Stipulation and Interim
22 Agreement and Petition for Order" shall remain in effect through
23 the water year in which this judgment shall become final (subject
24 to the reserved jurisdiction of the Court).

25 6. Effect of: Extractions by Exchangees; Reductions
26 in Extractions. With regard to Exchange Pool purchases, the
27 first extractions by each Exchangee shall be deemed the
28 extractions of the quantities of water which that party is



1 entitled to extract pursuant to his allocation from the Exchange
2 Pool for that Administrative year. Each Exchangee shall be
3 deemed to have pumped his Exchange Pool request so allocated for
4 and on behalf of each Exchangor in proportion to each Exchangor's
5 subscription to the Exchange Pool which is utilized to meet
6 Exchange Pool requests. No Exchangor shall ever be deemed to
7 have relinquished or lost any of its rights determined in this
8 judgment by reason of allocated subscriptions to the Exchange
9 Pool. Each Exchangee shall be responsible as between Exchangors
10 and that Exchangee, for any tax or assessment upon the production
11 of ground water levied for replenishment purposes by the Central
12 and West Basin Water Replenishment District or by any other
13 governmental agency with respect to water extracted by such
14 Exchangee by reason of Exchange Pool allocations and purchases.
15 No Exchangor or Exchangee shall acquire any additional rights,
16 with respect to any party to this action, to extract waters from
17 Central Basin pursuant to Water Code Section 1005.1 by reason of
18 the obligations pursuant to and the operation of the Exchange
19 Pool.

20 7. Judgment Binding on Successors, Etc. This judgment
21 and all provisions thereof are applicable to and binding upon not
22 only the parties to this action, but as well to their respective
23 heirs, executors, administrators, successors, assigns, lessees,
24 licensees and to the agents, employees and attorneys in fact of
25 any such persons.

26 8. Costs. No party shall recover its costs herein as
27 against any other party.
28



Appendix G

Succession of Allowed Pumping Allocations

Following is page 69 of the 2010 Central Basin Watermaster Report. This shows the succession of water rights from the initial adjudication of 7954 AFY to the current 11, 183 AFY.



CENTRAL BASIN

OCTOBER 2010

SUCCESSOR TO GREEN HILLS DEVELOPMENT CO	8.00	SUCCESSOR TO MODERN IMPERIAL CO	57.00
SOLD TO LAKEWOOD, CITY OF	-8.00	SUCCESSOR TO MOSS, D S & LILLIAN AND	
TOTAL	0.00	JEROME D & JOYCE MACK	4.00
SHORE-PLOTKIN ENTERPRISES, INC	0.00	SOLD TO HORSESHOE CATTLE CO	-4.00
(SHORE-CALNEVAR, INC-TENANT)		SOLD TO POWERINE OIL CO	-56.00
SHRINERS HOSPITALS FOR CRIPPLED CHILDREN AND THE		SOLD TO SOMERSET MUTUAL WATER CO	-1.00
LOS ANGELES SOCIETY FOR THE PREVENTION OF		TOTAL	0.00
CRUELTY TO ANIMALS		SMITH, REX M	
SUCCESSOR TO SLUSHER, MARGARET F	6.00	SUCCESSOR TO SMITH, MARGARET M	24.00
SOLD TO REDEVELOPMENT AGENCY OF THE CITY OF		SOLD TO AQUA CAPITAL MANAGEMENT LP	-24.00
SANTA FE SPRINGS	-6.00	TOTAL	0.00
TOTAL	0.00	SMITH, WIRT	11.00
SIEMON, J E	12.00	SOLD TO DUNN, L AND M	-11.00
SOLD TO REDEVELOPMENT AGENCY OF THE CITY		TOTAL	0.00
OF SANTA FE SPRINGS	-12.00	SMOORENBURG, WILLIAM, AND NICK J LOOGMAN	17.00
TOTAL	0.00	(SMOORENBURG AND LOOGMAN, A PARTNERSHIP	
SIEPERDA, JAMES		OF WILLIAM SMOORENBURG AND NICK J. LOOGMAN,	
(SEE LISTING UNDER SCHURMAN, JOHN AND ISABEL)		OPERATING WELL FACILITY)	
SIERRA RESTAURANT CORP	0.00	SOLD TO BENFID REALTY CO	-17.00
SIEVERS, ROBERT L AND BETTY		TOTAL	0.00
SUCCESSOR TO FELSENTHAL, JULIUS AND MARGA	1.00	SMURFIT-STONE CONTAINER ENTERPRISES, INC	
DEDICATED TO CERRITOS, CITY OF	-1.00	NAME CHANGED FROM JEFFERSON SMURFIT CORPORATION	
TOTAL	0.00	TRANSFERRED FROM JEFFERSON SMURFIT	
SIGNAL HILL, CITY OF	1340.00	CORPORATION	1058.00
SUCCESSOR TO ATCHISON, TOPEKA AND		SOLD IN PART TO AQUA CAPITAL MANAGEMENT LP	-1057.00
SANTA FE RAILWAY CO, THE	99.00	SOLD TO AQUA CAPITAL MANAGEMENT LP	-1.00
SUCCESSOR TO COAST WATER CO	470.00	TOTAL	0.00
SUCCESSOR TO PERK/LEWIS FOODS-DIV C H B FOODS	113.00	SNOW, JAMES M AND ESSIE M	
TOTAL	2022.00	SUCCESSOR IN PART TO PINHEIRO, A C AND MARY M	24.00
SIMAS, FRANK AND MABEL	9.00	DEDICATED TO CERRITOS, CITY OF	-24.00
(FRANK PIRES, TENANT)		TOTAL	0.00
SOLD TO LINWOOD HOMES, INC	-9.00	SNOZZI, LEO AND SYLVIA	42.00
TOTAL	0.00	SOLD TO KLUG, J.W, DEVELOPMENT CO, INC	-42.00
SIMMONS, ALICE L		TOTAL	0.00
(ALSO KNOWN AS SIMMONS, ALICE LORRAINE)		SOCONY MOBIL OIL CO, INC	138.00
(SEE LISTING UNDER SIMMONS SURVIVOR'S TRUST		(NOW KNOWN AS MOBIL OIL CORP)	
SIMMONS, BENNETT E & ALICE LORRAINE AND		TRANSFERRED TO MOBIL OIL CORP	-138.00
GEORGE K & DORIS JUNE SIMMONS	33.00	TOTAL	0.00
(BELL TRAILER CITY, TENANT)		SOMERSET LAND CO	
SOLD TO SIMMONS, BENNETT, E AND ALICE LORRAINE	-33.00	SUCCESSOR TO DE JONG, CORNELIUS AND GRACE	10.00
TOTAL	0.00	SUCCESSOR TO WESTERN INVESTMENT LTD CO	10.00
SIMMONS, BENNETT E AND ALICE LORRAINE		DEDICATED TO CERRITOS, CITY OF	-20.00
SUCCESSOR TO SIMMONS, BENNETT E & ALICE		TOTAL	0.00
LORRAINE AND GEORGE K & DORIS JUNE SIMMONS	33.00	SOMERSET MUTUAL WATER CO	2195.00
(NOW KNOWN AS SIMMONS SURVIVOR'S TRUST WITH		SUCCESSOR TO BEEGHLY, P T	1.00
ALICE L SIMMONS AS TRUSTEE)		SUCCESSOR TO CITRUS GROVE HEIGHTS WATER CO	222.00
TRANSFERRED TO SIMMONS SURVIVOR'S TRUST WITH		SUCCESSOR TO D-H INVESTORS	25.88
ALICE L SIMMONS AS TRUSTEE	-33.00	SUCCESSOR TO DYT, COR AND ANDY	5.00
TOTAL	0.00	SUCCESSOR TO SMITH, RALPH E, ET AL	1.00
SIMMONS REVOCABLE TRUST WITH ALICE L SIMMONS AS TRUSTEE		SUCCESSOR TO VANDENBERG, AUGUST, ET AL	5.00
(SEE LISTING UNDER SIMMONS SURVIVOR'S TRUST)		SOLD TO BELLFLOWER WATER CO	-2454.88
SIMMONS SURVIVOR'S TRUST WITH ALICE L SIMMONS AS		TOTAL	0.00
TRUSTEE		SOUTH GATE, CITY OF	7954.00
(FORMERLY KNOWN AS SIMMONS BENNETTE E AND ALICE		SUCCESSOR TO HON INDUSTRIES	1229.00
LORRAINE)		SUCCESSOR IN PART TO PARK WATER CO	2000.00
TRANSFERRED FROM SIMMONS, BENNETT E AND ALICE		TOTAL	11183.00
LORRAINE	33.00	SOUTH MONTEBELLO IRRIGATION DISTRICT	990.00
TOTAL	33.00	SUCCESSOR TO WESLOCK CO	27.00
SIMON, NORTON INC-MUSEUM OF ART		SUCCESSOR IN PART TO POWERINE OIL CO	251.00
SUCCESSOR TO RELUFF REALTY, INC	12.00	TOTAL	1268.00
SOLD TO PATRICIAN ASSOCIATES, INC AND MAJESTIC		SOUTHERN CALIFORNIA EDISON CO	653.00
REALTY CO	-12.00	(VERNON E BACON; CHIKAMI BROS FARMING,	
TOTAL	0.00	CONSISTING OF JACK CHIKAMI AND SIGERU CHIKAMI;	
SINCLAIR PAINT CO		LOUIS F DE MARTINI; ARMAND LESCOULIE;	
SUCCESSOR TO PHELPS DODGE BRASS CO	312.00	C D WEBSTER; KENJI MURATA; GLEN F AND	
SOLD TO COMMERCE HOTEL, LTD	-312.00	JEAN H SPILLER, GEORGE AND ALICE YAMAMOTO,	
TOTAL	0.00	CONDUCTING BUSINESS AS FUMI GARDEN FARMS, INC;	
SLUSHER, MARGARET F	6.00	AND SALVATORE GUTIERREZ, TENANTS AND LICENSEES)	
(SHELL OIL CO, TENANT)		SUCCESSOR TO ASSOCIATED SOUTHERN	
SOLD TO SHRINERS HOSPITALS FOR CRIPPLED		INVESTMENT CO	13.00
CHILDREN AND THE LOS ANGELES SOCIETY FOR		SUCCESSOR TO HATANAKA, MASAKAZU, ISAO, & KENICHI	4.00
THE PREVENTION OF CRUELTY TO ANIMALS	-6.00	TOTAL	670.00
TOTAL	0.00	SOUTHERN CALIFORNIA HOSPITAL, INC	
SMITH, CLIFFORD C		SUCCESSOR TO RUGGIERI, FRANK AND VADA	1.00
SUCCESSOR TO HORSESHOE CATTLE CO	1.00	SOLD TO SANTA FE SPRINGS, CITY OF	-1.00
(NOW KNOWN AS SMITH, MARGARET M)		TOTAL	0.00
TRANSFERRED TO SMITH, MARGARET M	-1.00	SOUTHERN CALIFORNIA WATER CO	15150.00
TOTAL	0.00	SOLD IN PART TO PARK WATER CO	-72.00
SMITH, LESTER W AND DONALD E	16.00	SUCCESSOR TO LOS ANGELES COUNTY WATERWORKS	
(LESTER W SMITH DAIRY, TENANT)		DISTRICT NO 1	90.00
SOLD TO ARDEN-MAYFAIR, INC	-16.00	SUCCESSOR TO LOS ANGELES COUNTY WATERWORKS	
TOTAL	0.00	DISTRICT NO 10	674.00
SMITH, MARGARET M		SUCCESSOR TO LOS ANGELES COUNTY WATERWORKS	
(FORMERLY KNOWN AS SMITH, CLIFFORD C)		DISTRICT NO 16	330.00
TRANSFERRED FROM SMITH, CLIFFORD C	1.00	SUCCESSOR IN PART TO PARK WATER CO	267.20
DISTRIBUTED FROM BONDED CATTLE CO	23.00	NAME CHANGE TO GOLDEN STATE WATER COMPANY	-16439.20
SOLD TO SMITH, REX M	-24.00	TOTAL	0.00
TOTAL	0.00	SOUTHERN PACIFIC INDUSTRIAL DEVELOPMENT CO	
SMITH, PECKHAM AND PECKHAM		(FORMERLY KNOWN AS SOUTHERN PACIFIC TRANS CO)	
SUCCESSOR TO AIRFLOOR CO OF CALIFORNIA	1.00	TRANSFERRED FROM SOUTHERN PACIFIC TRANS CO	132.00
SOLD TO SANTA FE SPRINGS, CITY OF	-1.00	SOLD IN PART TO CERRITOS, CITY OF	-20.00
TOTAL	0.00	SOLD IN PART TO SANTA FE SPRINGS, CITY OF	-74.00
SMITH, RALPH E, ET AL		SOLD IN PART TO SANTA FE SPRINGS, CITY OF	-38.00

Appendix H

Public Notices



Notice Sent to County of Los Angeles-March 3, 2011



City of South Gate

8650 CALIFORNIA AVENUE • SOUTH GATE, CA 90280-3075 • (323) 357-9657
FAX (323) 563-9572

March 3, 2011

Daryll Chenoweth
Los Angeles County Public Works
900 S. Fremont Avenue
Alhambra, CA 91803

Dear Mr. Chenoweth:

Subject: City of South Gate's 2010 Urban Water Management Plan

The City of South Gate will be reviewing and considering amendments and changes to its Urban Water Management Plan. We invite your agency's participation in this process.

The proposed revisions to the Plan will be available for public review in April and a public hearing is anticipated in May 2011. Los Angeles County will be provided notice of public hearing in which the Urban Water Management Plan update will be considered for adoption by the City Council.

We look forward to your participation in the development of City of South Gate's 2010 Urban Water Management Plan, and appreciate your involvement.

If you have any questions or need additional information please contact Mr. Kenneth Tang at ktang@sogate.org or (323) 563-9574.

Sincerely,



Mohammad Mostahkami, P.E.
Public Works Director / City Engineer

cc: Kenneth Tang



Los Angeles Wave

March 3, 2011

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**PRE-2054203#
HUNTINGTON PARK BULLETIN**

**CITY OF SOUTH GATE
NOTICE TO PUBLIC
UPDATE OF URBAN WATER MANAGEMENT
PLAN**

The City of South Gate is in the process of updating its Urban Water Management Plan. The plan is expected to be finalized and adopted by July 1, 2011. We encourage participation of all residents and businesses in this process. The proposed Plan will be available for public review in April 2011 and a public hearing is anticipated in May 2011.

If you have any questions or would like more information about the Plan, please contact Kenneth Tang, City of South Gate Senior Civil Engineer, at (323) 563-9574 or ktang@sogate.org.

THIS NOTICE IS GIVEN by the order of the City Clerk of said City and is dated this March 3, 2011.

3/3/11

**PRE-2052310#
SOUTH GATE PRESS**

**PUBLIC NOTICE
CITY OF SOUTH GATE
NOTICE OF JOINT PUBLIC HEARING
IN ACCORDANCE WITH STATE OF
CALIFORNIA HEALTH AND SAFETY CODE**

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Los Angeles Wave

March 10, 2011

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3/10/11

**PRE-2059268#
BELL/MAYWOOD INDUSTRIAL POST**

**CITY OF SOUTH GATE
NOTICE TO PUBLIC
UPDATE OF URBAN WATER MANAGEMENT
PLAN**

The City of South Gate is in the process of updating its Urban Water Management Plan. The plan is expected to be finalized and adopted by July 1, 2011. We encourage participation of all residents and businesses in this process. The proposed Plan will be available for public review in April 2011 and a public hearing is anticipated in May 2011.

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If you have any questions or would like more information about the Plan, please contact Kenneth Tang, City of South Gate Senior Civil Engineer, at (323) 563-9574 or ktang@sogate.org.

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THIS NOTICE IS GIVEN by the order of the City Clerk of said City and is dated this March 10, 2011.

Carmen Avalos, City Clerk

3/10/11

**PRE-2056702#
SOUTH GATE PRESS**

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NOTICE INVITING BIDS

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Notice Sent to County of Los Angeles-May 26, 2011
(similar letter sent to other agencies as listed in Section 1.2)



City of South Gate

8650 CALIFORNIA AVENUE • SOUTH GATE, CA 90280 • (323) 357-9657
FAX (323) 563-9572

MOHAMMAD MOSTAHKAMI, P.E.
DIRECTOR OF PUBLIC WORKS
CITY ENGINEER

May 26, 2011

Daryll Chenoweth
Los Angeles County Department of Public Works
900 S. Fremont Avenue
Alhambra, CA 91803

Subject: *City of South Gate's 2010 Urban Water Management Plan*

Dear Mr. Chenoweth:

The City of South Gate City Council will conduct a public hearing on the City's draft 2010 Urban Water Management Plan (UWMP) as required by the State Department of Water Resources (DWR) on June 14, 2011. A copy of the Notice of Public Hearing is enclosed.

The draft UWMP is available for review at the City Hall in the Public Work Department during regular business hours or on the City's website. Your participation is encouraged.

If you have any questions or need additional information please contact Mr. Kenneth Tang at ktang@sogate.org or (323) 563-9574.

Sincerely,

Mohammad Mostahkami, P.E.
Director of Public Works Director/City Engineer

MM/KT:lc
l-kt002
Enclosure(s)

cc: Kenneth Tang, Senior Civil Engineer



Public Hearing Notice-May 26, 2011 and June 2, 2011

Office of the
South Gate City Clerk

MAY 19 2011

CITY OF SOUTH GATE NOTICE OF PUBLIC HEARING

FILED

NOTICE IS HEREBY GIVEN that the City Council of the City of South Gate, California will conduct a public hearing for the purpose of receiving comments on the City's draft 2010 Urban Water Management Plan (UWMP) as required by the State Department of Water Resources (DWR), and the City's urban water use target for compliance with SBX7-7, also known as the Water Conservation Act of 2009. The UWMP presents the City's long-term plans for ensuring the reliability and quality of water resources for the City. The UWMP complies with California state law requiring urban water suppliers serving more than 3,000 acre feet per year or more than 3,000 customers to file plans with the DWR every five years in order to qualify for state grants and loans. The draft UWMP is available for review at the City Hall, Public Work Department during regular business hours or on the City's website.

DATE: June 14, 2011
TIME: 6:30 p.m.
LOCATION: COUNCIL CHAMBERS
SOUTH GATE CITY HALL
8650 CALIFORNIA AVENUE
SOUTH GATE, CA 90280

Public input is encouraged, appreciated, and will be considered during finalization of the 2010 UWMP. In addition to the public hearing, the City will accept written comments on the draft plan. Should you not be able to attend the meeting and would like to provide input, please contact Kenneth Tang, PE, Senior Civil Engineer, at (323) 563-9574, or by email at ktang@sogate.org. All written comments must be received by 5 p.m. on June 6, 2011.

NOTICE IS HEREBY GIVEN that any and all persons interested in the matter herein above set forth are privileged to attend said hearing and then and there testify or present evidence upon any matter relating thereto.

NOTICE IS HEREBY GIVEN by order of the City Clerk of said City and is dated May 19, 2011.



Carmen Avalos, City Clerk

Publication Date: Thursday, May 26, 2011 and Thursday, June 2, 2011

Account Number: 411-731-71-9559



Public Notices to Amended Urban Water Management Plan



Notice Sent to County of Los Angeles-June 10, 2014
(similar letter sent to other agencies as listed in Section 1.2)



City of South Gate

8650 CALIFORNIA AVENUE • SOUTH GATE, CA 90280 • (323) 357-9657
FAX (323) 563-9572

ARTURO CERVANTES, P.E.
DIRECTOR OF PUBLIC WORKS
CITY ENGINEER

June 10, 2014

Ms. Gail Farber
Los Angeles County Department of Public Works
900 S. Fremont Avenue
Alhambra, CA 91803

Subject: *Notice of Public Hearing – 2010 Urban Water Management Plan, amended February 3, 2014*

Dear Ms. Farber:

The City Council of the City of South Gate will conduct a public hearing to receive comments on the 2010 Urban Water Management Plan, amended February 3, 2014 (Revised Plan) pursuant to the coordination requirements of the Urban Water Management Planning Act. The hearing will be held on Tuesday, July 8, 2014 at 6:30 p.m. in Council Chambers, South Gate City Hall, located at 8650 California Avenue, South Gate, CA 90280.

The City Council adopted the 2010 Urban Water Management Plan (Plan) on June 14, 2011. Subsequently, the Plan was submitted to Department of Water Resources (DWR) for their review. Until recently, the City received comments from the DWR stating that the Demand Management Measures (DMMs) identified in the Plan were not completely described the implementation of the measures to comply with the Water Code. In response, the City deemed it necessary to revise the currently adopted Plan and consider adopting the Revised Plan to ensure DWR regulations are fully satisfied.

The Revised Plan is available for review at City Hall in the Public Works Department during regular business hours, which are from 7:30 a.m. to 6 p.m., or can be downloaded from the following link:

<https://www.dropbox.com/sh/727e15kmbhc7qjq/sZZbvV14Km>

Your participation is appreciated. If you have any questions or need additional information, please contact Kenneth Tang, P.E., Senior Civil Engineer, at ktang@sogate.org or (323) 563-9514.

Sincerely,

Arturo Cervantes, P.E.
Director of Public Works/City Engineer

cc: Nisha Patel, P.E., Assistant City Engineer
Kenneth Tang, P.E., Senior Civil Engineer



Public Hearing Notice-June 19, 2014 and June 26, 2014

Office of the
South Gate City Clerk

JUN 12 2014

FILED

CITY OF SOUTH GATE NOTICE OF PUBLIC HEARING

NOTICE IS HEREBY GIVEN that the City Council of the City of South Gate, California will conduct a public hearing for the purpose of receiving comments on the City's 2010 Urban Water Management Plan, amended February 3, 2014 (Revised Plan) pursuant to the coordination requirements of the Urban Water Management Planning Act. The City Council adopted the 2010 Urban Water Management Plan (Plan) on June 14, 2011. Subsequently, the Plan was submitted to Department of Water Resources (DWR) for their review. Until recently, the City received comments from the DWR stating that the Demand Management Measures (DMMs) identified in the Plan were not completely described the implementation of the measures to comply with the Water Code. In response, the City deemed it necessary to revise the currently adopted Plan and consider adopting the Revised Plan to ensure DWR regulations are fully satisfied.

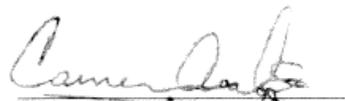
The Revised Plan is available for review at the City Hall, Public Work Department during regular business hours.

DATE: July 8, 2014
TIME: 6:30 p.m.
LOCATION: COUNCIL CHAMBERS
SOUTH GATE CITY HALL
8650 CALIFORNIA AVENUE
SOUTH GATE, CA 90280

Public input is encouraged, appreciated, and the City will accept written comments on the Revised Plan. Should you not be able to attend the meeting and would like to provide input, please contact Kenneth Tang, P.E., Senior Civil Engineer, at (323) 563-9574, or by email at ktang@sogate.org. All written comments must be received by 6:30 p.m. on July 8, 2014.

NOTICE IS HEREBY GIVEN that any and all persons interested in the matter herein above set forth are privileged to attend said hearing and then and there testify or present evidence upon any matter relating thereto.

NOTICE IS HEREBY GIVEN by order of the City Clerk of said City and is dated June 12, 2014.


Carmen Avalos, City Clerk

Publication Date: June 19, 2014 and June 26, 2014

Account Number: 411-731-71-9559



Appendix I

Public Comments and Responses

The following comments were received in response to the City of South Gate 2010 Urban Water Management Plan Public Draft, published May 26, 2011. Comments are numbered for ease of reference, and responses to comments are in **blue**. Comments and edits concerning minor and easily corrected grammar, usage and style issues were addressed by revisions to the Plan itself and are not reproduced below.



Appendix J

California Department of Water Resources UWMP Review Sheets



Table I-2 Urban Water Management Plan checklist, organized by subject

No.	UWMP requirement ^a	Calif. Water Code reference	Additional clarification	UWMP location
PLAN PREPARATION				
4	Coordinate the preparation of its plan with other appropriate agencies in the area, including other water suppliers that share a common source, water management agencies, and relevant public agencies, to the extent practicable.	10620(d)(2)		Section 1.2
6	Notify, at least 60 days prior to the public hearing on the plan required by Section 10642, any city or county within which the supplier provides water that the urban water supplier will be reviewing the plan and considering amendments or changes to the plan. Any city or county receiving the notice may be consulted and provide comments.	10621(b)		Section 1.2
7	Provide supporting documentation that the UWMP or any amendments to, or changes in, have been adopted as described in Section 10640 et seq.	10621(c)		Section 1.4
54	Provide supporting documentation that the urban water management plan has been or will be provided to any city or county within which it provides water, no later than 60 days after the submission of this urban water management plan.	10635(b)		Section 1.4
55	Provide supporting documentation that the water supplier has encouraged active involvement of diverse social, cultural, and economic elements of the population within the service area prior to and during the preparation of the plan.	10642		Section 1.3
56	Provide supporting documentation that the urban water supplier made the plan available for public inspection and held a public hearing about the plan. For public agencies, the hearing notice is to be provided pursuant to Section 6066 of the Government Code. The water supplier is to provide the time and place of the hearing to any city or county within which the supplier provides water. Privately-owned water suppliers shall provide an equivalent notice within its service area.	10642		Section 1.3
57	Provide supporting documentation that the plan has been adopted as prepared or modified.	10642		Appendix C
58	Provide supporting documentation as to how the water supplier plans to implement its plan.	10643		Appendix C



No.	UWMP requirement ^a	Calif. Water Code reference	Additional clarification	UWMP location
59	Provide supporting documentation that, in addition to submittal to DWR, the urban water supplier has submitted this UWMP to the California State Library and any city or county within which the supplier provides water supplies a copy of its plan no later than 30 days after adoption. This also includes amendments or changes.	10644(a)		Section 1.4
60	Provide supporting documentation that, not later than 30 days after filing a copy of its plan with the department, the urban water supplier has or will make the plan available for public review during normal business hours	10645		Section 1.4
SYSTEM DESCRIPTION				
8	Describe the water supplier service area.	10631(a)		Section 2.1.7
9	Describe the climate and other demographic factors of the service area of the supplier	10631(a)		Section 2.1.3
10	Indicate the current population of the service area	10631(a)	Provide the most recent population data possible. Use the method described in "Baseline Daily Per Capita Water Use." See Section M.	Section 2.1.4
11	Provide population projections for 2015, 2020, 2025, and 2030, based on data from State, regional, or local service area population projections.	10631(a)	2035 and 2040 can also be provided to support consistency with Water Supply Assessments and Written Verification of Water Supply documents.	Section 2.1.4
12	Describe other demographic factors affecting the supplier's water management planning.	10631(a)		Section 2.1.5
SYSTEM DEMANDS				
1	Provide baseline daily per capita water use, urban water use target, interim urban water use target, and compliance daily per capita water use, along with the bases for determining those estimates, including references to supporting data.	10608.20(e)		Section 3.2
2	<i>Wholesalers:</i> Include an assessment of present and proposed future measures, programs, and policies to help achieve the water use reductions. <i>Retailers:</i> Conduct at least one public hearing that includes general discussion of the urban retail water supplier's implementation plan for complying with the Water Conservation Bill of 2009.	10608.36 10608.26(a)	Retailers and wholesalers have slightly different requirements	Section 3.1



No.	UWMP requirement ^a	Calif. Water Code reference	Additional clarification	UWMP location
3	Report progress in meeting urban water use targets using the standardized form.	10608.40		Section 3.3
25	Quantify past, current, and projected water use, identifying the uses among water use sectors, for the following: (A) single-family residential, (B) multifamily, (C) commercial, (D) industrial, (E) institutional and governmental, (F) landscape, (G) sales to other agencies, (H) saline water intrusion barriers, groundwater recharge, conjunctive use, and (I) agriculture.	10631(e)(1)	Consider 'past' to be 2005, present to be 2010, and projected to be 2015, 2020, 2025, and 2030. Provide numbers for each category for each of these years.	Section 3.3
33	Provide documentation that either the retail agency provided the wholesale agency with water use projections for at least 20 years, if the UWMP agency is a retail agency, OR, if a wholesale agency, it provided its urban retail customers with future planned and existing water source available to it from the wholesale agency during the required water-year types	10631(k)	Average year, single dry year, multiple dry years for 2015, 2020, 2025, and 2030.	Section 3.4
34	Include projected water use for single-family and multifamily residential housing needed for lower income households, as identified in the housing element of any city, county, or city and county in the service area of the supplier.	10631.1(a)		Section 3.5
SYSTEM SUPPLIES				
13	Identify and quantify the existing and planned sources of water available for 2015, 2020, 2025, and 2030.	10631(b)	The 'existing' water sources should be for the same year as the "current population" in line 10. 2035 and 2040 can also be provided.	Section 4.1
14	Indicate whether groundwater is an existing or planned source of water available to the supplier. If yes, then complete 15 through 21 of the UWMP Checklist. If no, then indicate "not applicable" in lines 15 through 21 under the UWMP location column.	10631(b)	Source classifications are: surface water, groundwater, recycled water, storm water, desalinated sea water, desalinated brackish groundwater, and other.	Section 4.1
15	Indicate whether a groundwater management plan been adopted by the water supplier or if there is any other specific authorization for groundwater management. Include a copy of the plan or authorization.	10631(b)(1)		Section 4.1
16	Describe the groundwater basin.	10631(b)(2)		Section 4.2.3



No.	UWMP requirement ^a	Calif. Water Code reference	Additional clarification	UWMP location
17	Indicate whether the groundwater basin is adjudicated? Include a copy of the court order or decree.	10631(b)(2)		Appendix F
18	Describe the amount of groundwater the urban water supplier has the legal right to pump under the order or decree. If the basin is not adjudicated, indicate "not applicable" in the UWMP location column.	10631(b)(2)		Appendix F
19	For groundwater basins that are not adjudicated, provide information as to whether DWR has identified the basin or basins as overdrafted or has projected that the basin will become overdrafted if present management conditions continue, in the most current official departmental bulletin that characterizes the condition of the groundwater basin, and a detailed description of the efforts being undertaken by the urban water supplier to eliminate the long-term overdraft condition. If the basin is adjudicated, indicate "not applicable" in the UWMP location column.	10631(b)(2)		Not applicable
20	Provide a detailed description and analysis of the location, amount, and sufficiency of groundwater pumped by the urban water supplier for the past five years	10631(b)(3)		Section 4.1.3
21	Provide a detailed description and analysis of the amount and location of groundwater that is projected to be pumped.	10631(b)(4)	Provide projections for 2015, 2020, 2025, and 2030.	Section 4.1.3
24	Describe the opportunities for exchanges or transfers of water on a short-term or long-term basis.	10631(d)		Section 4.4.3
30	Include a detailed description of all water supply projects and programs that may be undertaken by the water supplier to address water supply reliability in average, single-dry, and multiple-dry years, excluding demand management programs addressed in (f)(1). Include specific projects, describe water supply impacts, and provide a timeline for each project.	10631(h)		Section 4.4.2
31	Describe desalinated water project opportunities for long-term supply, including, but not limited to, ocean water, brackish water, and groundwater.	10631(i)		Section 4.4.4
44	Provide information on recycled water and its potential for use as a water source in the service area of the urban water supplier. Coordinate with local water, wastewater, groundwater, and planning agencies that operate within the supplier's service area.	10633		Section 7.0



No.	UWMP requirement ^a	Calif. Water Code reference	Additional clarification	UWMP location
45	Describe the wastewater collection and treatment systems in the supplier's service area, including a quantification of the amount of wastewater collected and treated and the methods of wastewater disposal.	10633(a)		Section 7.2
46	Describe the quantity of treated wastewater that meets recycled water standards, is being discharged, and is otherwise available for use in a recycled water project.	10633(b)		Section 4.4.5
47	Describe the recycled water currently being used in the supplier's service area, including, but not limited to, the type, place, and quantity of use.	10633(c)		Section 4.4.5
48	Describe and quantify the potential uses of recycled water, including, but not limited to, agricultural irrigation, landscape irrigation, wildlife habitat enhancement, wetlands, industrial reuse, groundwater recharge, indirect potable reuse, and other appropriate uses, and a determination with regard to the technical and economic feasibility of serving those uses.	10633(d)		Section 4.4.5
49	The projected use of recycled water within the supplier's service area at the end of 5, 10, 15, and 20 years, and a description of the actual use of recycled water in comparison to uses previously projected.	10633(e)		Section 4.4.5
50	Describe the actions, including financial incentives, which may be taken to encourage the use of recycled water, and the projected results of these actions in terms of acre-feet of recycled water used per year.	10633(f)		Section 4.4.5
51	Provide a plan for optimizing the use of recycled water in the supplier's service area, including actions to facilitate the installation of dual distribution systems, to promote recirculating uses, to facilitate the increased use of treated wastewater that meets recycled water standards, and to overcome any obstacles to achieving that increased use.	10633(g)		Section 4.4.5
WATER SHORTAGE RELIABILITY AND WATER SHORTAGE CONTINGENCY PLANNING ^b				
5	Describe water management tools and options to maximize resources and minimize the need to import water from other regions.	10620(f)		Section 5.0
22	Describe the reliability of the water supply and vulnerability to seasonal or climatic shortage and provide data for (A) an average water year, (B) a single dry water year, and (C) multiple dry water years.	10631(c)(1)		Section 5.4



No.	UWMP requirement ^a	Calif. Water Code reference	Additional clarification	UWMP location
23	For any water source that may not be available at a consistent level of use - given specific legal, environmental, water quality, or climatic factors - describe plans to supplement or replace that source with alternative sources or water demand management measures, to the extent practicable.	10631(c)(2)		Section 5.0
35	Provide an urban water shortage contingency analysis that specifies stages of action, including up to a 50-percent water supply reduction, and an outline of specific water supply conditions at each stage	10632(a)		Section 5.5.1
36	Provide an estimate of the minimum water supply available during each of the next three water years based on the driest three-year historic sequence for the agency's water supply.	10632(b)		Section 5.4
37	Identify actions to be undertaken by the urban water supplier to prepare for, and implement during, a catastrophic interruption of water supplies including, but not limited to, a regional power outage, an earthquake, or other disaster.	10632(c)		Section 5.5
38	Identify additional, mandatory prohibitions against specific water use practices during water shortages, including, but not limited to, prohibiting the use of potable water for street cleaning.	10632(d)		Section 5.5.3
39	Specify consumption reduction methods in the most restrictive stages. Each urban water supplier may use any type of consumption reduction methods in its water shortage contingency analysis that would reduce water use, are appropriate for its area, and have the ability to achieve a water use reduction consistent with up to a 50 percent reduction in water supply.	10632(e)		Section 5.5.4
40	Indicated penalties or charges for excessive use, where applicable.	10632(f)		Section 5.5.2
41	Provide an analysis of the impacts of each of the actions and conditions described in subdivisions (a) to (f), inclusive, on the revenues and expenditures of the urban water supplier, and proposed measures to overcome those impacts, such as the development of reserves and rate adjustments.	10632(g)		
42	Provide a draft water shortage contingency resolution or ordinance.	10632(h)		Section 5.5.5
43	Indicate a mechanism for determining actual reductions in water use pursuant to the urban water shortage contingency analysis.	10632(i)		Section 5.5.3



No.	UWMP requirement ^a	Calif. Water Code reference	Additional clarification	UWMP location
52	Provide information, to the extent practicable, relating to the quality of existing sources of water available to the supplier over the same five-year increments, and the manner in which water quality affects water management strategies and supply reliability	10634	For years 2010, 2015, 2020, 2025, and 2030	Section 5.3
53	Assess the water supply reliability during normal, dry, and multiple dry water years by comparing the total water supply sources available to the water supplier with the total projected water use over the next 20 years, in five-year increments, for a normal water year, a single dry water year, and multiple dry water years. Base the assessment on the information compiled under Section 10631, including available data from state, regional, or local agency population projections within the service area of the urban water supplier.	10635(a)		Section 5.3
DEMAND MANAGEMENT MEASURES				
26	Describe how each water demand management measures is being implemented or scheduled for implementation. Use the list provided.	10631(f)(1)	Discuss each DMM, even if it is not currently or planned for implementation. Provide any appropriate schedules.	Section 6.3
27	Describe the methods the supplier uses to evaluate the effectiveness of DMMs implemented or described in the UWMP.	10631(f)(3)		Section 6.2
28	Provide an estimate, if available, of existing conservation savings on water use within the supplier's service area, and the effect of the savings on the ability to further reduce demand.	10631(f)(4)		Section 6.4
29	Evaluate each water demand management measure that is not currently being implemented or scheduled for implementation. The evaluation should include economic and non-economic factors, cost-benefit analysis, available funding, and the water suppliers' legal authority to implement the work.	10631(g)	See 10631(g) for additional wording.	Section 6.3
32	Include the annual reports submitted to meet the Section 6.2 requirements, if a member of the CUWCC and signer of the December 10, 2008 MOU.	10631(j)	Signers of the MOU that submit the annual reports are deemed compliant with Items 28 and 29.	Not applicable, South Gate is not a member

a The UWMP Requirement descriptions are general summaries of what is provided in the legislation. Urban water suppliers should review the exact legislative wording prior to submitting its UWMP.

b The Subject classification is provided for clarification only. It is aligned with the organization presented in Part I of this guidebook. A water supplier is free to address the UWMP Requirement anywhere with its UWMP, but is urged to provide clarification to DWR to facilitate review.

