# APPENDIX L

Water Supply Assessment and San Gabriel Valley Water Company Fire Flow and Will Serve Letters



# WATER SUPPLY ASSESSMENT FOR THE 11171 CHERRY AVENUE INDUSTRIAL PROJECT

# CITY OF FONTANA, CALIFORNIA

# PREPARED FOR

# FONTANA WATER COMPANY AUGUST 2023

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APPENDICES

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#### ABBREVIATIONS AND ACRONYMS

ADD Average Day Demand

AF Acre-Feet

AFY Acre-Feet per Year

CEQA California Environmental Quality Act

cfs Cubic feet per second

CPUC California Public Utilities Commission
CVWD Cucamonga Valley Water District
DLIS Delta Levees Investment Strategy

DWR California Department of Water Resources

DYYP Dry-Year Yield Program

Fontana Union Fontana Union Water Company

FWC Fontana Water Company gpcd Gallons per Capita per Day

gpd Gallons per Day gpm Gallons per Minute

IEUA Inland Empire Utilities Agency
LSLS Local Storage Limitation Solution

MDD Maximum Day Demand MGD Million Gallons per Day

MWD Metropolitan Water District of Southern California

PEIR Programmatic Environmental Impact Report

PHD Peak Hour Demand

Project Cherry Industrial Project

RBGC Rialto Basin Groundwater Council

SBVMWD San Bernardino Valley Municipal Water District

SCE Southern California Edison

sf Square Feet

SWP State Water Project

USBR United States Bureau of Reclamation
USGS United States Geological Survey
UWMP Urban Water Management Plan

WSA Water Supply Assessment

### 1.0 EXECUTIVE SUMMARY

Fontana Water Company (FWC) has prepared this Water Supply Assessment (WSA) for the proposed 29.6 acre industrial and commercial development known as the 11171 Cherry Avenue Industrial Project (the "Project"). The water demands for the proposed Project, located within FWC's service area, are included in this WSA.

The present and future water supplies available to FWC to provide water service to the Project are groundwater pumped from the Chino Basin, Lytle Basin, and Rialto Basin, surface water diversions from Lytle Creek, imported State Water Project (SWP) water from Inland Empire Utilities Agency (IEUA) and San Bernardino Valley Municipal Water District (SBVMWD), and recycled water.

The Chino Basin has enhanced reliability during drought and is FWC's most reliable source of water supply. The Chino Basin Watermaster and its technical staff ensure long-term reliability of water supplies from the Chino Basin. The Watermaster, under the direct supervision of the San Bernardino County Superior Court, manages basin water supplies, arranges for local and supplemental groundwater recharge and implements and administers the Chino Basin physical solution as prescribed in the governing Superior Court groundwater pumping rights adjudication (the "Chino Basin Judgment").

The Chino Basin Watermaster's groundwater management responsibilities are closely coordinated with IEUA's water management goals and implementation of strategies. IEUA's role as a regional water wholesaler includes delivery of supplemental, imported, untreated SWP water directly to water purveyors like FWC, delivery of water from the Metropolitan Water District of Southern California (MWD) to the Chino Basin Watermaster for groundwater recharge, exchange, groundwater banking, and conjunctive use programs, as well as delivery of recycled water. IEUA has also analyzed future water demands and water supplies within its service area, which includes most of FWC's service area, including the Project, and concluded that sufficient water supplies will be available for the next 20 years through 2045, including during single and multiple (five consecutive) dry years.

This WSA analyzes and evaluates FWC's historical water supplies, water rights, current Urban Water Management Plans (UWMPs) developed by FWC and IEUA, the Chino Basin

Optimum Basin Management Plan, and the historical and future availability of SWP water. Based on that analysis and evaluation, this WSA shows clearly that FWC's available water supplies will be sufficient to meet all of the water demands for the portion of the Project located withing FWC's service area for the next 20 years through 2045, including during single and multiple dry years (i.e. five consecutive dry years). It is anticipated construction of the Project will be completed by September 2025.

## 2.0 INTRODUCTION

#### PROJECT DESCRIPTION

The proposed Project is located at 11171 Cherry Avenue in the City of Fontana at the northeast corner of the intersection of the Jurupa Ave and Cherry Avenue, which is within the southwestern portion of Fontana Water Company's certificated service area as authorized by the California Public Utilities Commission (CPUC) (Figure 1). The proposed Project includes the development of 2 industrial warehouse and office buildings with a total of approximately 709,980 square feet (sf). The Project Site is located on an area of approximately 29.6 acres. The Project information used in this Water Supply Assessment (WSA) was based on a Project conceptual site plan prepared by HPA Architecture dated July 2022 (See Appendix A). The Project site is located within the following Assessor Parcel Numbers:

- 0236191140000
- 0236191250000

#### PURPOSE AND SCOPE OF ASSESSMENT

The Project is located within FWC's present CPUC certificated service area, as shown in Figure 1. FWC is ready, willing, and able to provide all necessary water utility service to meet all of the water supply needs of the entire Project.

The purpose of this WSA is to evaluate and confirm FWC's ability to provide all public utility water service to the Project. The reliability of future water supplies available to FWC is based on FWC's longstanding water rights and access to local groundwater, imported water, and surface water supplies as listed in Table 1 (Summary of FWC Water Rights). Also, this assessment is based on the Chino Basin Watermaster's and IEUA's water management goals and implementation strategies, such as the Optimum Basin Management Plan, supplemental imported water distribution programs, and the use of recycled water. This WSA evaluates all of FWC's available water supply sources and projected water demands within its service area, including the Project areas located within FWC's service area.

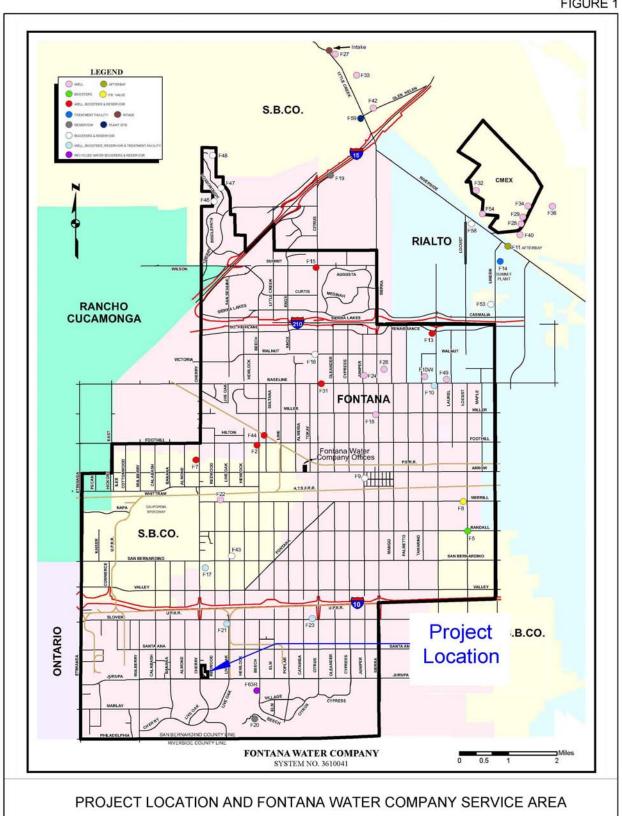


Table 1 Summary of FWC Water Rights And Allocations

Sources of Supply	Water Right / Allocation	Description
Lytle Creek (Surface Water)	- Lytle Judgments,	• Entitled to divert up to 3,480.78 miner's inches (~50,400 AFY) from Lytle Creek Region, including up to 2,500 miner's inches
Lytle Basin	(1897 McKinley Decree and January 28, 1924 Judgment)	<ul> <li>(~36,200 AFY) of combined surface and groundwater extractions to augment surface water diversions.</li> <li>Entitled to divert groundwater from Lytle Basin up to 1,300 miner's inches (~18,800 AFY).</li> </ul>
Chino Basin	Chino Basin Judgment, 1978	<ul> <li>Unrestricted pumping to provide water for beneficial use for FWC customers subject to existing appropriative rights, groundwater storage, leases, and replenishment through Watermaster.</li> <li>Safe yield of Chino Basin = 131,000 AFY (subject to change).</li> <li>11.659 percent share of the "Operating Safe Yield." (FWC and FUWC)</li> </ul>
Rialto Basin	1961 Rialto Basin Decree and 2021 Rialto Basin Groundwater Council	<ul> <li>Adjustable rights subject to curtailment based on the Key Wells</li> <li>Rialto Adjustable Rights = 5,564 AFY</li> <li>Fixed Rights = 370 AFY</li> <li>Fixed Rights - Standby Rialto Lease = 1,600 AFY</li> </ul>
IEUA	Imported Water	Allocation of 10,000 AFY Tier 1 Imported Water (subject to reduction)
SBVMWD	Imported Water	Agreement for 3,650 AFY of Tier 1 Imported Water (subject to reduction)

Note: AFY = Acre-Feet per Year

### **Water Supply Planning Provisions**

Population growth in the State of California (State) has resulted in increased demands on water systems. The State legislature has enacted laws to ensure that the increased demands are adequately addressed and that a firm source of water supply is available prior to approval of certain new developments. The regulations include California Water Code Division 6, Part 2.10, Sections 10910-10915 (Water Supply Planning to Support Existing and Planned Future Use) (California Water Code) which is briefly described below. The provisions of the California Water Code seek to promote more collaborative planning between local water suppliers and

cities and counties and require detailed information regarding water availability to be provided to city and county land use planners prior to approval of certain specified large land use development projects.

This WSA was prepared pursuant to the requirements of the California Water Code for the approach, required information, and criteria confirming that FWC has sufficient water supplies to meet the projected demands of the Project, in addition to existing and planned future The UWMP is a foundational document for compliance with the uses within its service area. California Water Code. The provisions of the California Water Code repeatedly identify the UWMP as a planning document that can be used by a water supplier to meet the standards set forth in both statutes. California Environmental Quality Act (CEQA) guidelines section 15083.5 contains similar provisions regarding consultation with water agencies for certain projects. FWC's 2020 UWMP (June 2021), Metropolitan Water District of Southern California's (MWD's) 2020 UWMP (June 2021), and IEUA's 2020 UWMP Update (June 2021) were prepared pursuant to California Water Code Division 6, Part 2.55, Section 10608 (Sustainable Water Use and Demand Reduction) and California Water Code Division 6, Part 2.6, Sections 10608-10656 (Urban Water Management Planning) and the Water Conservation Act of 2009 (also known as SB X7-7), describe future water demands and future availability of the water supply sources used by FWC and other retail water agencies operating within IEUA's service area. These UWMP documents were used to prepare this WSA.

This WSA includes specific Project water demand estimates and available sources of water supply. FWC will separately notify the Project developer of any specific water supply, storage, and booster pump system infrastructure facilities (Special Facilities) and/or water distribution system infrastructure facilities (Distribution Plant) that are required for FWC to provide water utility service to the Project, in accordance with Rule 15 Main Extensions. FWC owns easements and rights-of-way over the Project site for installation, operation, and maintenance of water facilities and related access to the Project site. Additionally, FWC owns existing pipelines adjacent to the proposed Project site, including a 12-inch diameter steel recycled water main, an 8-inch diameter plastic potable water main, and an 8-inch diameter steel

potable water main along Cherry Avenue, and a 16-inch diameter asbestos cement potable water main along Jurupa Avenue.

#### California Water Code (Sections 10910-10915)

Existing law requires every urban water supplier to identify, as part of its UWMP, the existing and planned sources of water available to the supplier. Existing law prohibits an urban water supplier that fails to prepare or submit its UWMP to the California Department of Water Resources (DWR) from receiving financial or drought assistance from the state until the plan is submitted.

The California Water Code requires an urban water supplier to include in its UWMP a description of all water supply projects and programs that may be undertaken to meet total projected water use over the next 20 years. The California Water Code<sup>1</sup> requires a city or county that determines a project is subject to CEQA to identify any public water system that may supply water for proposed developments and to request those public water systems to prepare a specific WSA, including for a proposed industrial development of more than 650,000 sf. If the water demands for the proposed developments have been accounted for in a recently adopted UWMP, the water supplier may incorporate information contained in that plan to satisfy certain requirements of a WSA. The California Water Code requires the assessment to include, along with other information, an identification of existing water supply entitlements, water rights, or water service contracts relevant to the identified water supply for the proposed project and the quantities of water received in prior years pursuant to those entitlements, rights, and contracts.

The California Water Code also requires the public water system, or the city or county, as applicable, to submit its plans for acquiring additional water supplies if that entity concludes that water supplies are, or will be, insufficient.

<sup>1</sup> https://leginfo.legislature.ca.gov/faces/codes displaySection.xhtml?lawCode=WAT&sectionNum=10912.

## 3.0 FWC'S HISTORICAL WATER SUPPLIES AND USES

#### HISTORICAL WATER SUPPLIES

FWC is a public utility water company subject to the regulatory jurisdiction of the CPUC. FWC provides public utility water service to most of the City of Fontana and to portions of the City of Rialto, the City of Rancho Cucamonga, and to adjoining unincorporated areas of San Bernardino County. FWC's CPUC certificated service area encompasses approximately 52 square miles bordered generally by the Riverside County line on the south, Etiwanda and Cherry Avenues on the west, Lytle Creek Wash and Linden Avenue on the east, and Highland and Summit Avenues on the north, as shown on Figure 1.

FWC currently derives its water supply from 29 active groundwater production wells and a surface water treatment plant, the Summit Water Treatment Plant, and a portion of the City of Fontana's recycled water base entitlement from IEUA. The water supply is produced from groundwater wells in the Chino Basin, Rialto Basin, and Lytle Basin, and surface water from Lytle Creek. FWC also receives untreated SWP water from IEUA and SBVMWD which is treated at FWC's Summit Water Treatment Plant. The groundwater basins are shown on Figure 2. FWC receives well water, local surface water, imported water, or a combination of those sources at various points in its water distribution system. In addition, FWC has two emergency interconnections, with a total capacity of 3,000 gallons per minute (gpm), to receive water from Cucamonga Valley Water District (CVWD). Emergency interconnections are distribution system interconnections between water purveyors for use during critical situations where one system is temporarily unable to provide sufficient potable water to meet minimum health and/or fire protection needs. Emergency interconnections allow FWC to continue serving water during critical situations such as local water supply shortages as a result of earthquakes, fires, prolonged power outages, and droughts.

Table 1 summarizes FWC's water rights, most of which are held by Fontana Union Water Company (Fontana Union) and are subject to FWC's irrevocable right to utilize, pursuant to court-approved agreements with CVWD and Fontana Union of which FWC is a principal shareholder.

Historical annual water supplies utilized by FWC are summarized in Table 2. Annual water supplies from 2003 to 2022 ranged from 34,895 acre-feet (AF) in 2016 to 49,879 AF in 2007, with an average annual production of 42,428 AFY.

TABLE 2 HISTORICAL ANNUAL WATER SUPPLY PRODUCTION BY FWC (AFY)

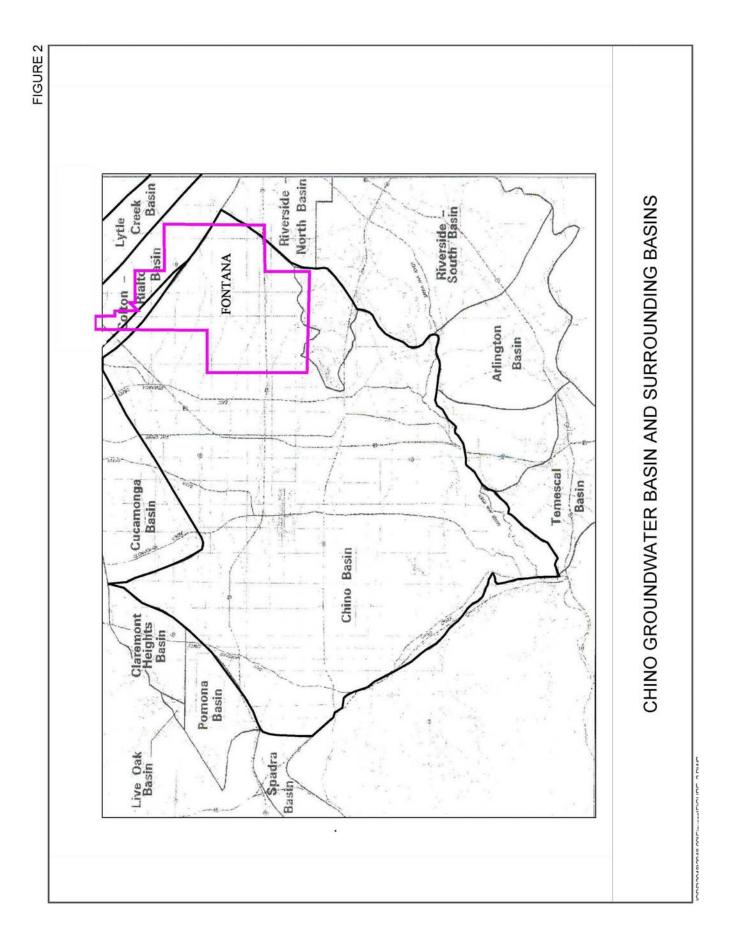
		(	Groundwate	er					
Year	Lytle Basin	Chino Basin	Rialto Basin	No- Man's Land	Subtotal	Imported Water	Lytle Creek	Recycled Water	Total
2003	6,029	22,110	9,321	3,783	41,243	2,040	3,502		46,785
2003	5,664	24,718	8,173	3,930	42,485	2,530	3,302 4,484		49,498
2004	11,424	18,499	7,252	3,550	40,726	520	6,352	 	47,597
2005	12,593	14,747	5,695	3,683	36,718	640	11,999		49,356
2007	15,021	19,622	7,325	3,930	45,899	0	3,980		49,330
2007	10,523	16,192	6,312	3,930 4,165	43,899 37,191	2,765	7,613		47,569
2008	7,789	-	8,480	4,103	,	,	5,390		-
	· ·	14,490		,	35,051	3,923	,		44,363
2010	7,073	9,921	7,782	4,421	29,197	1,099	11,473		41,769
2011	9,573	2,509	6,386	3,392	21,860	977	18,576		41,413
2012	12,604	13,305	6,306	3,875	36,090	1,086	5,616		42,791
2013	8,025	11,604	7,358	4,119	31,105	9,898	3,301		44,304
2014	5,530	13,784	7,347	4,103	30,764	9,784	1,951		42,498
2015	3,768	14,504	2,728	4,523	25,523	7,657	1,784		34,964
2016	2,649	16,299	2,563	4,341	25,852	7,617	1,419	7	34,895
2017	4,111	10,640	2,378	4,533	21,662	11,824	3,867	128	37,481
2018	5,148	10,796	2,679	4,069	22,692	12,961	2,298	163	38,113
2019	6,046	9,351	2,469	3,142	21,007	10,771	3,869	149	35,795
2020	6,423	11,859	2,538	2,633	23,453	10,027	5,966	387	39,831
2021	6,095	13.830	3,204	2,171	25,299	12,023	2,658	358	40,337
2022	6,587	14,774	3,336	2,263	26,960	10,028	1,962	377	39,328

Notes:

Sources:

FWC records

<sup>&</sup>quot;Imported Water" deliveries of SWP water to FWC began in 2002; "Recycled Water" deliveries began in 2016



The following describes FWC's sources of water supplies and water rights in more detail.

#### **Chino Basin**

The Chino Basin is FWC's largest and most reliable groundwater source. During the last 20 years, FWC's production from the Chino Basin ranged from approximately 2,509 AFY in 2011 to 24,718 AFY in 2004, as shown in Table 2. In most years, the Chino Basin accounted for a significant portion of FWC's total water supply.

The Chino Basin, in San Bernardino County, is the largest groundwater basin in the Upper Santa Ana River Watershed. The Chino Basin is bounded by the Rialto-Colton, Chino, San Jose, and Cucamonga faults, and by the Puente Hills and the San Gabriel Mountains. The total surface area of the basin is approximately 154,000 acres (240 square miles).

IEUA's "Addendum No. 2 to the Optimum Basin Management Plan" was prepared in February 2021 and addresses managed storage within the Chino Basin. Based on the Chino Basin Watermaster's findings, the Local Storage Limitation Solution (LSLS) was developed. From July 1, 2017 through June 30, 2021, the Safe Storage Capacity of the Chino Basin was 600,000 AF. The Safe Storage Capacity was increased to 700,000 AF through a June 2021 San Bernardino County Superior Court ruling on the LSLS. The Chino Basin currently has over 5,000,000 AF of water in storage, with an additional unused storage capacity, based on historical water levels in the Basin, of about 1,000,000 AF<sup>2</sup>. Over the past 20 years, total groundwater production from the Chino Basin has ranged from approximately 133,275 AFY to 188,910 AFY<sup>3</sup>. A majority of production is pumped for municipal and industrial purposes and the remaining production is pumped by agricultural producers.

The Chino Basin was adjudicated under the Chino Basin Judgment, entered on January 27, 1978 by the Superior Court for the County of San Bernardino. FWC is a party to the Chino Basin Judgment and is classified as an appropriator. The Chino Basin Judgment established an average Safe Yield in the Chino Basin of 131,000 AFY (July 1 to June 30), pursuant to the most recent Safe Yield reset effective in 2020. The Safe Yield is defined in the Chino Basin Judgment as "the long-term average annual quantity of ground water (excluding replenishment of stored water but including return flow to the Basin from use of replenishment or stored water) which

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<sup>&</sup>lt;sup>2</sup> Pursuant to the Chino Basin Watermaster's Optimum Basin Management Program Phase I Report, August 1999

<sup>&</sup>lt;sup>3</sup> Pursuant to the Chino Basin Watermaster "Fiscal Year 2021-22, 45th Annual Report", Appendix H

can be produced from the Chino Basin under conditions of a particular year without causing an undesirable result." The 1978 Chino Basin Judgment's allocation of the Safe Yield of the Chino Basin includes three separate Pools: the "Overlying Agricultural Pool", the "Overlying Non-Agricultural Pool", and the "Appropriative Pool." FWC's appropriative rights together with those of Fontana Union (of which FWC is a principal shareholder) currently amount to approximately 11.659 percent share of the Safe Yield. Appendix B provides the historical Chino Basin production by Pool presented in the Chino Basin Watermaster's "Fiscal Year 2021-22 Annual Report".

Appropriators who are parties to the Chino Basin Judgment, such as FWC, are authorized to produce groundwater in excess of their rights (Physical Solution). Appropriators pay assessments for such production to the Chino Basin Watermaster. The assessments are used to replenish the basin through imported surface water recharge. The Chino Basin Watermaster purchases water to replenish the Chino Basin from the MWD through IEUA or Three Valleys Municipal Water District. Additional supplemental sources of replenishment water come from recycled water and from increased recharge of local storm water capture. Reliability of water purchased from IEUA to replenish the Chino Basin is discussed in Section 4.

In addition, the Chino Basin Watermaster reallocates the unused portion of the Chino Basin safe yield from the Overlying Agricultural Pool to the Appropriative Pool members as a supplement to the Appropriative Pool share of Operating Safe Yield rights in any year. These transfers are permanent if agricultural land has been converted to non-agricultural use, or temporary if agricultural pool extractions are less than their share of the safe yield. From Fiscal Year 2002-03 to Fiscal Year 2021-22, the total portion of the annual Agricultural Pool available for reallocation to Appropriative Pool members<sup>4</sup> has ranged from 40,822 AF to 61,496 AF, with an annual average of 52,290 AF of which FWC received a portion. As agricultural production declines within the Chino Basin, the reallocation of water to the Appropriative Pool will increase.

#### **Lytle Creek Region**

FWC produces water from the Lytle Creek Region that consists of surface water from Lytle Creek and groundwater from Lytle Basin. The Lytle Creek Watershed is approximately

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<sup>&</sup>lt;sup>4</sup> Pursuant to the Chino Basin Watermaster "Fiscal Year 2021-22, 45th Annual Report", Appendix G

46.4 square miles. The area of the Lytle Basin is approximately 22.3 square miles. Lytle Creek is located in the Lytle Creek Watershed which originates in the vicinity of Mount San Antonio in the San Bernardino National Forest and includes the Upper Santa Ana River Basin located in San Bernardino County. Lytle Creek includes the North Fork Lytle Creek, Middle Fork Lytle Creek, and South Fork Lytle Creek, each flowing eastward. A portion of the water from Lytle Creek is diverted by Southern California Edison to generate electricity from two hydroelectric power plants in the Lytle Creek Region. Following the power generation, Lytle Creek water is diverted to FWC's Afterbay where it is shared with other water purveyors pursuant to long standing agreements. FWC's share is diverted to FWC's Summit Water Treatment Plant where it is treated for domestic water use within FWC's distribution system. In addition to Lytle Creek surface flows, FWC obtains water from the Grapeland Tunnel, which is a groundwater infiltration system with extensive collector lines in Lytle Creek Canyon tributaries and a large line running below the streambed of Lytle Creek. Water from the Grapeland Tunnel historically flowed through a large transmission pipeline directly into FWC's water system. Because water from the Grapeland Tunnel is under the influence of surface water, water from the Grapeland Tunnel is currently combined with the Lytle Creek stream flow in the Afterbay and then flows to the Summit Water Treatment Plant.

The 1897 McKinley Decree, which specifies surface water allocations, and the January 28, 1924 Judgment by the Superior Court for the County of San Bernardino, which confirms the McKinley Decree and specifies allowed groundwater diversions, allow Fontana Union Water Company and FWC to divert surface water and pump groundwater from the Lytle Creek Region up to a maximum of 3,480.78 miner's inches, or 69.6 cubic feet per second (cfs) (approximately 50,400 AFY). The amount includes up to 2,500 miner's inches, (approximately 36,200 AFY) of allowable combined surface and groundwater extractions to augment deficiencies in surface water diversions. FWC is allowed to extract and divert a combined 1,300 miner's inches, or 26 cfs (approximately 18,800 AFY) of groundwater from the Lytle Creek Region. The Lytle Basin is managed by the Lytle Creek Water Conservation Association which is made up of the successors to the parties of the 1897 McKinley Decree and the 1924 Judgment. FWC's diversion and production of water from the Lytle Creek Region can vary due to fluctuations in rainfall, snowpack and runoff, especially during dry years.

#### **Rialto Basin**

The Rialto Basin underlies a portion of the Upper Santa Ana Valley in southwestern San Bernardino County and northwestern Riverside County. The Rialto Basin is about 10 miles long and varies in width from about 3.5 miles in the northwestern part to about 1.5 miles in the southeastern part. The Rialto Basin is bounded by the San Gabriel Mountains on the northwest, the San Jacinto fault on the northeast, the Badlands on the southeast, and the Chino Basin on the southwest.

Under the December 22, 1961 Rialto Basin Court Decree, FWC, by virtue of its shareholdings in Fontana Union, is entitled to produce water from the Rialto Basin. Parties to the Rialto Basin Decree, including FWC, are authorized to pump from the Rialto Basin without limitation, except pumping during certain months in some water years can be affected by groundwater elevations measured between March and May for three specific "index" wells (Duncan Well, Willow Street Well, and Boyd Well). On February 3, 2021, Fontana Union Water Company, West Valley Water District, the City of Rialto, and the City of Colton entered into the Rialto Basin Groundwater Council (RBGC) Framework Agreement for the purpose of groundwater management and coordination in the Rialto Basin. The RBGC Framework Agreement incorporates the FWC production right from No Man's Land Basin into the Rialto Basin groundwater production limitations. FWC's water rights in the Rialto Basin are subject to the December 22, 1961 Rialto Basin Court Decree which are affected by the average water elevations in three index wells and other provisions among the RBGC Framework Agreement parties. The water rights allocation of Rialto Basin and No Man's Land groundwater to FWC are divided into adjustable rights and fixed rights. An additional discussion regarding FWC's water rights in the Rialto Basin and No Man's Land is provided in Section 5.0.

#### **Inland Empire Utilities Agency**

IEUA, originally known as Chino Basin Municipal Water District, was formed by popular vote of its residents in June 1950, to become a member agency of MWD for the purpose of importing supplemental water to augment local stream and groundwater supplies. Since its formation in 1950, IEUA has significantly expanded its services. These include production of recycled water, wholesaling of untreated imported water and recycled water supplies, sewage treatment, co-composting of manure and municipal biosolids, desalinization of groundwater

supplies and disposal of non-reclaimable industrial wastewater and brine. IEUA does not provide treated MWD water to retail water purveyors in its service area.

FWC is located within IEUA's service area. FWC has upgraded (including construction of conventional pretreatment facilities and capacity expansion) its existing surface water treatment plant (the Summit Water Treatment Plant) to treat SWP water from IEUA and SBVMWD, in addition to surface water from Lytle Creek. The 2008 Summit Water Treatment Plant upgrades increased the plant's capacity from 17 million gallons per day (MGD) to 29 MGD. FWC has the facilities and capacity to receive up to 40 cfs of untreated imported SWP water from IEUA and 14 cfs of untreated imported SWP water from SBVMWD. IEUA's water management goals and implementation strategies, such as its imported water distribution policy, groundwater banking, conjunctive use programs, and use of recycled water, enhances the reliability of water supplies utilized by FWC. The following discussion of water sources, future water demands, and future water supplies in IEUA's service area illustrates that sufficient water is available for FWC and the other purveyors within IEUA's service area in the future.

IEUA wholesales untreated SWP water and provides industrial/municipal wastewater collection and treatment services, and other related services for the western portion of San Bernardino County. IEUA's service area is located in the southwestern section of San Bernardino County. The 242-square mile service area, which encompasses the Chino Groundwater Basin, consists of a relatively flat alluvial valley from east to west which slopes downward from north to south at a one to two percent grade.

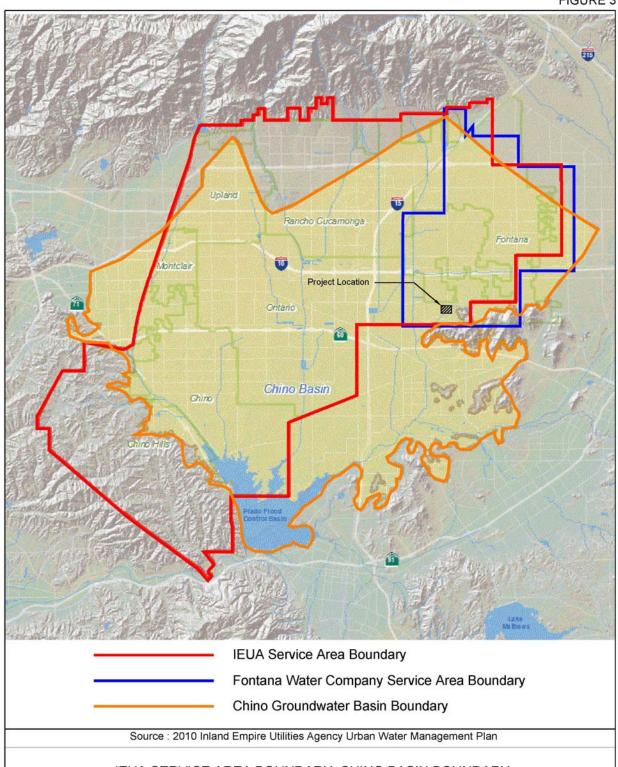
IEUA's service area includes the cities of Fontana, Chino, Chino Hills, Montclair, Pomona, Ontario, Rancho Cucamonga and Upland. According to IEUA's 2020 UWMP, approximately 906,000 people resided in IEUA's service area as of 2020. IEUA's service area, as shown in Figure 3, lies almost entirely within the Chino Groundwater Basin.

Water used in IEUA's service area comes from both local and imported sources. Local sources include local groundwater, surface water and, most recently, recycled water. IEUA purchases untreated imported SWP water from MWD for wholesale redistribution to local retail water purveyors within its service area, including FWC. The local retail water purveyors must first treat the imported MWD water before delivery to their potable water customers.

According to IEUA's 2020 UWMP, total local groundwater production by FWC and other local retail water agencies in IEUA's service area was approximately 92,834 AF in Fiscal Year 2019-20, which includes production from the Chino Basin as well as the other local groundwater sources shown in Figure 2.

FWC and a number of other retail water agencies in IEUA's service area that produce groundwater from the Chino Basin also obtain a portion of their water from local surface sources. The principal sources of surface water include Lytle Creek, San Antonio Canyon, Cucamonga Canyon, Day Creek, Deer Creek, and several smaller surface streams. According to IEUA's 2020 UWMP, annual production from all such local surface supplies was approximately 16,652 AF in Fiscal Year 2019-20.

Historical MWD deliveries to IEUA's service area are shown in Table 3. Full service imported water deliveries from MWD to IEUA over the past 20 years have ranged from approximately 31,713.8 AF of water in Fiscal Year 2015-16 to a peak of approximately 81,616 AF in Fiscal Year 2008-09. Additional imported water supplies from IEUA can be used for groundwater replenishment, thereby augmenting the annual yield and production from the Chino Basin.



IEUA SERVICE AREA BOUNDARY, CHINO BASIN BOUNDARY
FONTANA WATER COMPANY SERVICE AREA BOUNDARY, AND PROJECT AREA

Table 3 MWD Historical Water Purchases by IEUA <sup>1</sup> (AFY)

			Interruptible/Local		
Fiscal Year	Full Service	Agricultural	Projects	Storage <sup>2</sup>	Total
1990-91	20,015.9	26.2	28,071.0	4,011.70	52,124.80
1991-92	31,924.5	152.0	0.0	75,976.10	108,052.60
1992-93	34,032.2	94.4	0.0	51,554.10	85,680.70
1993-94	28,897.1			28,046.90	56,944.00
1994-95	36,967.8	8.5		1,579.50	38,555.80
1995-96	35,204.1	77.4		4,408.80	39,690.30
1996-97	44,728.2	118.8		5,058.70	49,905.70
1997-98	39,320.6	83.8		11,895.10	51,299.5
1998-99	41,599.5	76.4	100.3	8,414.1	50,190.3
1999-00	57,070.3	104.1	495.5	5,332.1	63,002.0
2000-01	57,735.6	45.1	3,841.8	11,742.5	73,365.0
2001-02	64,996.3	44.0	4,498.9	9,006.3	78,545.5
2002-03	60,082.5	43.3	5,637.2	13,449.9	79,212.9
2003-04	64,024.7	49.3	6,561.1	7,582.0	78,217.1
2004-05	54,841.4	56.4	5,653.0	42,259.4	102,810.2
2005-06	50,607.8	90.4	8,916.5	36,227.8	95,842.5
2006-07	52,869.1	89.7	11,331.2	24,759.1	89,049.1
2007-08	70,780.0	43.2	21,307.8	0.0	92,131.0
2008-09	81,615.9	3.0	24,664.2	0.0	106,283.1
2009-10	65,539.60		20,245.1	0.0	85,784.7
2010-11	51,134.4		20,646.1	9,650.6	81,431.1
2011-12	52,059.6		20,212.9	24,407.8	96,680.3
2012-13	59,050.9		25,435.0		84,485.9
2013-14	67,833.1		26,800.8		94,633.9
2014-15	58,907.7		23,734.6		82,642.3
2015-16	31,713.8		22,933.2		54,647.0
2016-17	47,848.4		25,390.7		73,239.1
2017-18	68,157.7		13,009.9		81,167.6
2018-19	63,870.4		13,244.6		77,115.0
2019-20	64,835.4		13,272.2		78,107.6
2020-21	71,347.3		17,409.8		88,757.1
2021-22	66,164.3		0.0		66,164.3

<sup>1)</sup> Source: Metropolitan Water District of Southern California, Operations Data. Data includes full service, agricultural, local project, and/or storage program sales.

<sup>2)</sup> Seasonal Storage Service Program and Cyclic Storage Account

Water recycling involves treatment of wastewater to create a high quality, safe source of water for landscape irrigation, industrial uses, and groundwater recharge. A recycled water marketing program was initiated by IEUA in 1999. Recycled water is a critical component of the Optimum Basin Management Plan developed by the Chino Basin Watermaster in 2000 to address water supply and quality issues in the Chino Basin. Recycled water has become an increasingly important source of renewable local water supply for the region. FWC has already taken steps in constructing a recycled water system and is providing direct use recycled water to customers in its service area who are able to use recycled water. In addition to direct use recycled water, FWC, under agreement, purchases a portion of the City of Fontana's recharged recycled water Base Entitlement to offset its Chino Basin production. Based on the IEUA's "Fiscal Year 2019-2020 Recycled Water Annual Report<sup>5</sup>," recycled water supplies from IEUA's facilities totaled approximately 56,388 AF in Fiscal Year 2019-20. The total recycled water demands in IEUA's service area in Fiscal Year 2019-20 were 30,495 AF, or approximately 54 percent of the available recycled water supply. The recycled water supply and demand from IEUA's facilities is expected to increase to 66,836 AF and 44,691 AF, respectively, by Fiscal Year 2044-45 (IEUA 2020 UWMP, Tables 2-3 and 3-3). Remaining future projected recycled water supplies will be used for groundwater recharge purposes and to meet Santa Ana River obligations.

The population within IEUA's service area is projected by the local retail water agencies (including FWC) to collectively increase from approximately 906,046 in 2020 to 1,119,568 people by the year 2045 (Table 4). This represents an increase of approximately 213,500 people over a 25-year period, an average annual growth rate of approximately 0.9 percent.

TABLE 4 CURRENT AND PROJECTED POPULATION IN IEUA'S SERVICE AREA 1

Year	2020	2025	2030	2035	2040	2045
Population	906,046	945,849	987,401	1,031,771	1,074,773	1,119,568

1) Source: IEUA 2020 UWMP (June 2021), Table 1-4

As a result of this projected regional population growth, water demand in IEUA's service area is expected to increase by approximately 33 percent over the 25-year period from 2020 to 2045. Table 5 presents the projected water demands for IEUA's service area. According to

<sup>&</sup>lt;sup>5</sup> https://www.ieua.org/read-our-reports/recycled-water-reports/

IEUA's 2020 UWMP, total annual water use is expected to increase from approximately 96,934 AF in Fiscal Year 2019-20 to approximately 128,756 AF in Fiscal Year 2044-45.

TABLE 5 CURRENT AND PROJECTED WATER DEMANDS IN IEUA'S SERVICE AREA 1 (AFY)

Year	2020	2025	2030	2035	2040	2045
Potable and Raw Water	66,438	77,416	79,630	81,974	84,021	84,065
Recycled Water (Direct Reuse and Groundwater Recharge)	30,496	39,300	41,297	42,162	44,191	44,691
Total Demand	96,934	116,716	120,927	124,136	128,212	128,756

1) Source: IEUA 2020 UWMP (June 2021), Table 2-4.

Projected water supplies within IEUA's service area include groundwater, surface water, recycled water, and untreated imported water purchased from MWD. Table 6 summarizes the total available supplies and water demands under a normal year.

TABLE 6 IEUA FUTURE WATER DEMAND/SUPPLY BALANCE IN NORMAL YEARS 1 (AFY)

Year	2025	2030	2035	2040	2045
Supply Totals	153,356	156,490	157,425	160,119	160,119
Demand Totals	116,716	120,927	124,136	128,212	128,756
Surplus	36,640	35,563	33,289	31,907	31,363

1) Source: IEUA 2020 UWMP (June 2021), Table 7-4

According to IEUA's 2020 UWMP, total supplies from the Chino Basin and adjacent groundwater basins are projected at 137,318 AFY through Fiscal Year 2044-45 for normal years, although the Chino Basin could accommodate much greater water production rates if necessary.

According to IEUA's 2020 UWMP, IEUA projected total supplies from surface water within its service area at approximately 10,089 AFY through Fiscal Year 2044-45 for normal years. Surface water flows are substantially greater in wet years and less during dry years.

According to IEUA's 2020 UWMP, the direct use of recycled water within IEUA's service area in Fiscal Year 2019-20 was approximately 30,496 AF. Recycled water use during normal years is expected to increase to approximately 44,691 AFY by Fiscal Year 2044-45. As part of an existing agreement with IEUA, the City of Fontana is entitled to approximately 12,000 AFY of tertiary treated recycled water. FWC has completed a project with the City of Fontana for the direct use of recycled water in the southern portion of FWC's service area known as the 1158 Zone. This project will provide up to approximately 2,000 AFY of recycled water within the City of Fontana to schools, parks, and commercial customers as part of a multi-phased program. FWC is looking to expand its direct use projects with the City of Fontana in the future. Additional discussion regarding recycled water, including FWC's agreements to provide recycled water to the California Speedway Corporation and California Steel Industries, is provided in Section 5.0.

According to IEUA's 2020 UWMP, imported water supplied from the SWP and the Colorado River provided by IEUA are projected to be 98,928 AF through Fiscal Year 2044-45.

FWC supports and works closely with IEUA to implement a mix of water management strategies to meet the region's long-term needs. IEUA's water management goals are the following:

- Implement an effective conservation program that will maximize efficient water use and reuse in IEUA's service area;
- Continue development of a groundwater recovery program;
- Achieve maximum use of all available storm water;
- Achieve maximum reuse of all available recycled water; and
- Minimize dependence on imported water supplies.

As part of IEUA's water management goals, the Dry-Year Yield Program (DYYP) was developed jointly by the Chino Basin Watermaster, the IEUA, and MWD. The DYYP is a

groundwater storage and recovery program where supplemental water is stored in the Chino Basin during surplus years and could be recovered in-lieu of imported water from MWD through IEUA. The DYYP can store up to 100,000 AF with maximum replenishment of 25,000 AFY and maximum extraction of 33,000 AFY. The agreement that authorized the DYYP will expire in 2028. FWC participated in two voluntary withdrawals from the DYYP account in the last two fiscal years that resulted in a total withdrawal of 7,500 acre-feet of water.

The water demands and supplies for IEUA's service area were analyzed by IEUA to assess the region's ability to meet demands given a repeat of California's severe drought from 2011 to 2014. Table 7 and Table 8 present the supply-demand balance for single and multiple year drought scenarios for Fiscal Years 2024-25 and 2044-45. With the implementation of the local programs outlined above, the region is expected to meet 100 percent of its dry year demand.

TABLE 7 IEUA'S 2025 WATER SUPPLY AND DEMAND IN NORMAL, SINGLE DRY, AND MULTIPLE DRY YEARS 1 (AFY)

Demand	Normal	Single					
and Supply	Year	Dry Year	Dry Year Dry Year 1 2		Dry Year 3	Dry Year 4	Dry Year 5
Total							
Water							
Supply	153,356	153,329	153,329	153,329	153,329	153,329	153,329
Total							
Demand	116,716	118,899	120,206	120,206	120,206	120,206	120,206
Surplus	36,640	34,431	33,124	33,124	33,124	33,124	33,124

<sup>1)</sup> Source: IEUA 2020 UWMP (June 2021), Tables 7-4, 7-5, and 7-6

TABLE 8 IEUA'S 2045 WATER SUPPLY AND DEMAND IN NORMAL, SINGLE DRY, AND MULTIPLE DRY YEARS <sup>1</sup> (AFY)

Demand	Normal	Single		Multiple 1	Dry Years		
and Supply	Year	Dry Year	Dry Year 1	Dry Year 2	Dry Year 3	Dry Year 4	Dry Year 5
Total							
Water							
Supply	160,119	160,091	160,091	160,091	160,091	160,091	160,091
Total							
Demand	128,756	133,571	136,456	136,456	136,456	136,456	136,456
Surplus	31,363	26,519	23,635	23,635	23,635	23,635	23,635

<sup>1)</sup> Source: IEUA 2020 UWMP (June 2021), Tables 7-4, 7-5, and 7-6

#### San Bernardino Valley Municipal Water District

SBVMWD was formed in 1954. It is an independent SWP contractor and is not a member agency of MWD. The District's services include providing wholesale distribution of untreated imported SWP water, and wastewater, stormwater disposal, recreation, and fire protection services.

SBVMWD, which covers approximately 325 square miles in southwestern San Bernardino County, currently serves a population of approximately 715,900. SBVMWD's service area includes the eastern two-thirds of the San Bernardino Valley, the Crafton Hills, and a portion of the Yucaipa Valley, and includes all or portion of the cities and communities of San Bernardino, Colton, Fontana, Loma Linda, Redlands, Rialto, Bloomington, Highland, Grand Terrace, and Yucaipa.

Groundwater from the Colton, Rialto, Bunker Hill, Yucaipa, and San Timoteo Basins, is the principal local source of supply in SBVMWD's service area. Other sources of water supply include surface water from Lytle Creek, the Santa Ana River, and Mill Creek as well as imported SWP water.

SBVMWD's contract entitlement for SWP water was 1,677 AF in 1972, the initial year of deliveries, and increased to a maximum entitlement of 102,600 AF in 1991. The entitlement is the fifth largest of all SWP contractors.

FWC has the ability to purchase and use untreated imported water from SBVMWD. A portion of FWC's service area is within SBVMWD's service area. FWC did not receive any SWP water from SBVMWD from 2012 to 2021. However, in 2022, FWC received approximately 1,777 AF of SWP from SBVMWD. FWC projects receiving up to 3,650 AFY of imported untreated SWP water from SBVMWD in future years. FWC has upgraded its existing Summit Water Treatment Plant to treat approximately 29 MGD of Lytle Creek surface water and SWP water. The Summit Water Treatment Plant will treat the imported untreated SWP water from SBVMWD in addition to treating available Lytle Creek surface water and untreated SWP water from IEUA.

# 4.0 FWC'S FUTURE WATER DEMANDS WITH THE PROJECT

FWC's 2020 UWMP was completed and adopted in June 2021 and includes water demand projections for FWC's service area over the next twenty years (through 2045). Water demands projected in FWC's 2020 UWMP were calculated based on the urban per capita water use target developed per the Water Conservation Bill of 2009 (SB X7-7) and population projections within FWC's service area. Methodologies for calculating urban per capita water use were published by DWR in its February 2016 guidance document<sup>6</sup>. The methodology applied to FWC included an urban per capita water use reduction of 20 percent by 2020. DWR's guidance document was used by FWC to calculate a projected urban per capita water use target of 165 gallons per capita per day through 2045.

Projected water demands for the proposed Project include commercial, industrial and landscape irrigation demands. Based on the Project site map prepared by HPA Architecture, the proposed Project is estimated to include approximately 709,980 sf of combined warehouse and office building space and 142,683 sf of landscaping on a Project site of approximately 29.6 acres. The total Project water demand for the warehouse and office building space was estimated by multiplying the planned Project site area by a water use rate of 2,840 gallons per day (gpd) per acre derived from average recorded water use data for large industrial warehouse buildings within FWC's service area. The estimated water demand for the commercial and industrial area of the Project is approximately 51.8 AFY (or 709,980 sf x (1 acre / 43,560 sf) x 2,840 gpd per acre x (0.00112 AFY / 1 gpd)).

The Project landscape irrigation demand was estimated using a water budget calculator from DWR. The water budget calculator estimates the water use of a landscaped area based on the following components:

#### • Reference Evapotranspiration (ETo)

 ETo refers to the total amount of water lost through evaporation in the soil and transpiration of plants

<sup>&</sup>lt;sup>6</sup> California Department of Water Resources, Division of Statewide Integrated Water Management, Water Use and Efficiency Branch. *Methodologies for Calculating Baseline and Compliance Urban Per Capita Water Use.* February 2016.

o The average ETo in the vicinity of the Project site is approximately 60.77 inches per year<sup>7</sup>

#### • Plant Factor (PF)

- o The PF is a factor (generally from 0 to 1) for each type of irrigated plant and is based on the water requirements for the plant
- O Plants with a lower PF (0 to 0.3) require less water than plants with a higher PF (0.7 to 1.0). The PF for turf is approximately 0.78. The PF for medium water use trees, shrubs and groundcover is approximately 0.5. A PF of 0.6 has been estimated for the Project which is based on different landscaped areas consisting of turf, trees, shrubs and groundcover.

#### • <u>Irrigated Area (IA)</u>

o Based on the Project site map prepared by HPA Architecture (Appendix A), the irrigated area is approximately 142,683 square feet

## • Irrigation Efficiency (IE)

- o The IE is a factor (generally from 0 to 1) which represents irrigation efficiency.
- o Irrigation systems which are well designed and operated can have an efficiency range of 0.8 to 0.9. Irrigation systems which are poorly designed and operated may have efficiencies less than 0.5°. An irrigation efficiency of 0.7 (representing rotor and standard drip irrigation) has been estimated for the Project.

The estimated irrigation water demand at each potential site is then calculated based on the following formula:

Irrigation Water Demand =  $(ETo) \times (0.62) \times ([PF \times IA] / IE)$ 

<sup>&</sup>lt;sup>7</sup> Pursuant to the International Water Management Institute's "World Water & Climate Atlas" (http://wcatlas.iwmi.org)

<sup>8</sup>http://ucanr.edu/sites/UrbanHort/Water Use of Turfgrass and Landscape Plant Materials/SLIDE Simplified Irrigation Demand Estimation/

<sup>&</sup>lt;sup>9</sup> "A Guide to Estimating Irrigation Water Needs of Landscape Plantings in California", University of California Cooperative Extension California, DWR, August 2000

It should be noted 0.62 represents a factor used to convert units from "inches per year" to "gallons per square foot per year". The potential irrigation water demand is in units of "gallons per year". Based on the formula, the estimated irrigation water demand for the Project is approximately 4,607,935 gallons per year (or 60.77 inches x 0.62 x ([0.6 x 142,683 square feet] / 0.7)) or 14.1 AFY (or 4,607,935 gallons per year x (1 acre-foot / 325,851 gallons)).

The total estimated water demand for the portion of the proposed Project within FWC's service area, which includes commercial and industrial water demands (51.8 AFY) and landscape irrigation (14.1 AFY), is approximately 65.9 AFY. However, in order for FWC to provide 65.9 AFY to the Project site, FWC will need to produce water supplies which account for water losses within its water distribution system. Pursuant to Water Loss Audits<sup>10</sup> prepared by FWC (pursuant to the California Water Code), FWC's water system losses have averaged approximately 7.8 percent over the past five years (from calendar year 2017 to calendar year 2021). Accounting for this average water loss, FWC would need to produce approximately 71.5 AFY of potable water in order to supply 65.9 AFY to the Project site.

The historical water use at the Project site over the past 10 years has averaged approximately 1 AFY. For the purposes of this Water Supply Assessment, it is assumed that an average of 1 AFY has been incorporated in the water demand projections in FWC's 2020 UWMP. The proposed Project will replace the existing use at the Project site. As a result, the proposed Project will result in a net water demand increase of up to 70.5 AFY (or 71.5 AFY – 1 AFY) above the existing water demands at the Project site.

FWC's 2020 UWMP includes current and projected future water demands for its service area over the next 25 years. It is anticipated construction of the Project will be completed by September 2025). The additional water demands (70.5 AFY) for the proposed Project are incorporated within the existing and projected water demands (potable and recycled) presented in

FWC's adopted 2020 UWMP over a 20-year period and through 2045, as shown in Table 9. A further description regarding FWC's recycled water facilities, agreements, demands, and supplies is provided in Section 5.0

It should be noted, the projected water demands for the proposed "Goodman Industrial Park Fontana III Project", the "Southwest Fontana Logistics Center Project", the "Fontana Foothills Industrial Project", the "Sierra Business Center", the "Speedway Commerce Development Project", the "Speedway Commerce Center II Project", the "Duke-Cypress at Slover Industrial Project", and the "Westgate Specific Plan" (eight separate active/proposed projects located within FWC's service area) were also included in the overall water demands identified in FWC's 2020 UWMP. The overall projected water demands for FWC from FWC's 2020 UWMP, which incorporates the demands from the proposed Project and the eight separate active/proposed projects, are provided in Table 9.

TABLE 9 PROJECTED WATER DEMAND ESTIMATES (AFY)

YEAR	2025	2030	2035	2040	2045
Potable Water Demands <sup>1</sup>	44,593	45,409	46,665	47,942	48,943
Recycled Water Demands <sup>2</sup>	1,000	1,500	2,000	2,500	3,000
Total FWC Projected Water Demands <sup>2</sup>	45,593	46,909	48,665	50,442	51,943

#### Notes:

<sup>&</sup>lt;sup>1</sup> Water demands from the Cherry Industrial (Project) are assumed to be included in water demands identified from FWC's 2020 UWMP. It is anticipated water demands for the Project will begin after 2025.

<sup>&</sup>lt;sup>2</sup> Demand projections reported in FWC's 2020 UWMP, Table 4-4

#### **FWC'S FUTURE WATER SUPPLIES** 5.0

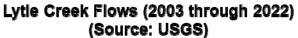
FWC's principal future water supplies available and documented in its 2020 UWMP are groundwater pumped from Chino Basin, Lytle Basin, and Rialto Basin, and surface water from Lytle Creek, recycled water, and imported water from SBVMWD and IEUA. The following describes the potential yield from these sources.

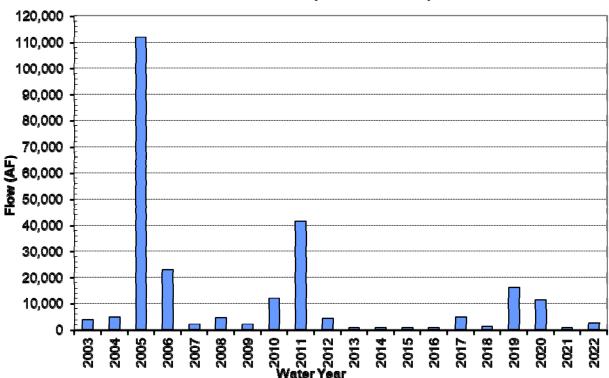
#### LYTLE CREEK

FWC is entitled to divert up to 3,480.78 miner's inches (approximately 50,400 AFY) from the Lytle Creek Region, including up to 2,500 miner's inches (approximately 36,200 AFY) of combined surface and groundwater extractions to augment surface water diversions. Annual Lytle Creek flows from 2003 to 2022 based on United States Geological Survey (USGS) data are shown in Figure 4. USGS data from a Lytle Creek gaging station<sup>11</sup> in the vicinity and upstream of FWC's diversion and intake facilities was used to determine the annual Lytle Creek flows. Based on USGS data, recent drought periods occurred from 1999 to 2004, 2007 to 2009, and 2012 to 2018. Pursuant to FWC's 2020 UWMP, and based on historical diversions during normal rainfall years, FWC's projected water supplies from Lytle Creek during normal rainfall years are estimated at approximately 4,860AFY over the next twenty years. FWC's 2020 UWMP estimates that Lytle Creek projected surface water supplies could be reduced by 83 percent (to 826 AFY) in single dry or multiple dry years.

<sup>11</sup> https://waterdata.usgs.gov/nwis

FIGURE 4 HISTORICAL LYTLE CREEK FLOWS (2001-2020)





Source: USGS 11062000 (Lytle C NR Fontana CA) gauge station

#### LYTLE BASIN

FWC can pump and divert more than 18,800 AFY of groundwater from the Lytle Basin. The Lytle Basin is subject to changes in groundwater elevation depending on rainfall, snowpack, and stormwater runoff. This was demonstrated after the significant rainfall received during 1993 and 2010. In the months following a series of storms during those very wet years, basin static water levels increased as much as 200 feet in three months. However, basin static water levels could likewise decrease and thus affect groundwater production during sustained dry years. Pursuant to FWC's 2020 UWMP, and based on historical production during normal rainfall years, FWC's projected water supplies from the Lytle Basin during normal rainfall years and single dry are estimated at 6,390 AFY over the next twenty years. FWC's 2020 UWMP estimates that Lytle Basin projected groundwater supplies could be reduced by 35 percent (to 4,154 AFY) in multiple dry years.

#### CHINO BASIN

FWC's average annual production from the Chino Basin from 2001 to 2020 was approximately 14,824 AFY. During the most recent five years, FWC's annual production ranged from approximately 9,351 AFY to 16,299 AFY. According to IEUA's 2020 UWMP, total Chino Basin groundwater production in IEUA's service area in a normal year is estimated to be 109,813AFY through Fiscal Year 2044-45. The Chino Basin Judgment authorizes FWC to produce all the water it requires from the Chino Basin for beneficial use by FWC's customers, subject to replenishment requirements. With over 5,000,000 AF of water currently in storage, more than ample water is present in the Chino Basin to allow FWC to do so. FWC will construct additional wells and associated infrastructure in the Chino Basin to match additional water supply with additional water demands from growth in the number of customers. Because of groundwater contamination in the Chino Basin from nitrate and perchlorate, production of groundwater from affected wells may be interrupted until wellhead treatment or remedy is installed. FWC has the necessary technical and financial resources available to allow FWC to quickly respond to any such water quality incidents to assure continuity and reliability of water service. FWC's Wells F17B, F17C, F21B, and F23A, which pump from the Chino Basin, currently have perchlorate treatment equipment, which removes perchlorate from these sources. FWC plans to utilize best available treatment technologies to install additional treatment, install alternative technologies such as packers, and drill replacement wells as needed to meet its water supply needs.

#### RIALTO BASIN

On February 3, 2021, the Rialto Basin Groundwater Council Framework Agreement was signed by Fontana Union Water Company, West Valley Water District, the City of Rialto, and the City of Colton to incorporate the FWC production rights from No Man's Land Basin (previously unrestricted) into the Rialto Basin that is subject to curtailment. The RBGC Framework Agreement was created for the purposes of coordinating, developing, and implementing groundwater management activities that affect groundwater management and sustainability in the Rialto Basin. The agreement acknowledged FWC's production capabilities of 5,014 AFY from the No Man's Land Basin and incorporated them with the Rialto Basin production capacity limits in the 1961 Rialto Basin Court Decree.

FWC's water rights as allowed under the 1961 Decree and the RBGC Framework Agreement are listed below:

• Adjustable Rights: 5,564 AFY

• Fixed Rights: 370 AFY

• Fixed / Standby Rialto Lease: 1,600 AFY

• Combined Rights: 7,534 AFY (as of 2020 before adjustment)

Pursuant to the 1961 Decree and declining groundwater elevations in the three index wells in the Rialto Basin, FWC projects a 30 percent curtailment to its annual adjustable water rights by 2025. The curtailment is anticipated to decrease by 2 percent every five years thereafter (e.g., 28 percent curtailment in 2030) to reflect a coordinated plan to recharge the Rialto Basin. Groundwater production of approximately 5,865 AFY is estimated to be available to FWC from the Rialto Basin during normal, single-dry and multiple-dry years in 2025, and is expected to increase to 6,310 AFY by 2045.

#### RECYCLED WATER

Achieving maximum use of all available recycled water is one of FWC's and IEUA's water management goals. Recycled water is used for groundwater recharge and storage as well as direct use by customers who are equipped and able to use recycled water. As shown in Table 2, FWC began using recycled water supplies within its service area in 2016 (with a recycled water demand of 387 AF in 2020). FWC strongly supports the use of recycled water and will provide recycled water to its customers who are able to use it when it is made available. FWC has completed a project with the City of Fontana for the direct use of recycled water in the southern portion of FWC's service area known as the 1158 Zone. This project will provide up to approximately 2,000 AFY of recycled water within the City of Fontana to schools, parks, and commercial customers as part of a multi-phased program. As part of an existing agreement with IEUA, the City of Fontana is entitled to approximately 12,000 AFY of tertiary treated recycled water. FWC has designed and is constructing recycled water distribution system facilities in the 1158 Zone to meet those needs. Recycled water will be provided by IEUA's Regional Water Recycling Plant 4. In addition, facilities also will be required to distribute recycled water from IEUA to FWC's customers beyond the 1158 Zone. Those additional facilities will include

pipelines, booster stations and reservoirs. In 2015, FWC entered into separate agreements with IEUA, the California Speedway Corporation (Speedway), and California Steel Industries (CSI) in which FWC will deliver recycled water supplies from IEUA to the Speedway and CSI. FWC will deliver up to 450 AFY of recycled water to the Speedway and up to 550 AFY of recycled water to CSI over an initial term of 60 years. IEUA has constructed the recycled water transmission and distribution facilities to the Speedway and CSI.

IEUA's 2020 UWMP projected the total recycled water use (for direct use and groundwater recharge) within IEUA's service area at approximately 66,836 AFY by the year 2045. As shown in Table 10, IEUA projects having enough supply to meet the recycled water demand within IEUA's service area. The report also projected that IEUA would supply approximately 8,350 AFY of recycled water for distribution within the City of Fontana. The report identified potential recycled water uses irrigation of golf courses, landscaping, parks, and schools, agricultural uses, commercial car washes and laundries, industrial cooling towers, miscellaneous construction and dust control uses, and groundwater recharge. Pursuant to FWC's 2020 UWMP, FWC is projected to use approximately 1,000 AFY of recycled water within its service area by 2025, with a gradual increase to approximately 3,000 AFY of recycled water by 2045. FWC's increased future use of recycled water for landscape and agricultural irrigation (including potential landscaping for proposed developments such as the Project), construction, industrial cooling, and groundwater recharge use, will offset the need for potable water use within FWC's service area. In the future, the Project could be connected to IEUA's regional recycled water line if there are sufficient recycled water demands in the area.

TABLE 10 IEUA'S PROJECTED RECYCLED WATER SUPPLY AND DEMAND ESTIMATES (AFY)

YEAR	2025	2030	2035	2040	2045
Demands (Direct Use)	22,880	24,877	25,742	27,771	28,271
Demands (Groundwater Recharge)	16,420	16,420	16,420	16,420	16,420
Total IEUA Projected Recycled Water Demand <sup>1</sup>	39,300	41,297	42,162	44,191	44,691
Total IEUA Projected Recycled Water Supply <sup>2</sup>	60,073	63,207	64,142	66,836	66,836

### Notes:

<sup>&</sup>lt;sup>1</sup> Demand projections reported in IEUA's 2020 UWMP, Table 5-2

<sup>&</sup>lt;sup>1</sup> Supply projections reported in IEUA's 2020 UWMP, Table 4-6

### **IMPORTED WATER SUPPLIES**

As discussed previously, FWC can purchase untreated imported SWP water from SBVMWD and untreated imported water supplies from MWD (including Colorado River water, SWP water, water storage, and water transfers) through IEUA. According to FWC's 2020 UWMP, FWC conservatively estimates it will receive up to 15,000 AFY of SWP water from IEUA and up to 3,200 AFY of SWP water from SBVMWD over the next twenty years. FWC has the capacity to purchase additional imported SWP water from IEUA and SBVMWD if needed to meet current and future water demands reported in the FWC's 2020 UWMP. A discussion regarding the reliability of these imported water supply sources is provided below.

### COLORADO RIVER WATER

FWC can purchase untreated imported water supplies from MWD (including Colorado River water) through IEUA<sup>12</sup>. FWC has an additional existing standby connection with IEUA to receive untreated Colorado River Aqueduct water from MWD at its Plant F43, however, FWC is identifying ways to utilize this source in the future.

In addition to obtaining water from the SWP, MWD obtains water from the Colorado River. MWD owns and operates the Colorado River Aqueduct which conveys water from Lake Havasu on the Colorado River to water transmission pipelines and to Lake Matthews for storage. MWD's Colorado River water right includes a fourth and fifth priority under the 1931 Seven Party Agreement relating to California's share in the Colorado River water supply. In 1964 a United States Supreme Court decree (Arizona v. California) limited California to 4.4 million AF per year from the Colorado River plus any available surplus water. An amount of 550,000 AF was allotted to California under the fourth priority right and an amount of 662,000 AF was allotted to California under the fifth priority right. MWD can receive water under the fifth priority right when the United States Secretary of the Interior determines that there is a surplus of water or if Arizona or Nevada does not use all of their allocated water.

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<sup>&</sup>lt;sup>12</sup> FWC has an additional existing standby connection with IEUA to receive untreated Colorado River Aqueduct water from MWD at its Plant F43.

Under a 2007 agreement reached by the seven States of the Colorado River Basin, if Lake Mead's level drops to 1,075 feet, an official shortage would be declared. That declaration would trigger cuts in water deliveries to Arizona and Nevada. During 2019, the seven States of the Colorado River Basin developed two drought contingency plans: the Upper Basin Drought Contingency Plan (Upper Basin DCP) and the Lower Basin Drought Contingency Plan (Lower Basin DCP). The Upper Basin DCP is designed to: a) protect critical elevations at Lake Powell and help assure continued compliance with the 1922 Colorado River Compact, and b) authorize storage of conserved water in the Upper Basin that could help establish the foundation for a Demand Management Program that may be developed in the future. The Lower Basin DCP is designed to: a) require Arizona, California and Nevada to contribute additional water to Lake Mead storage at predetermined elevations, and b) create additional flexibility to incentivize additional voluntary conservation of water to be stored in Lake Mead. Under the Lower Basin DCP, the state of California is required to make the following annual DCP contribution based on projected January 1st Lake Mead elevations:

- Elevation above 1,040 feet and at or below 1,045 feet 200,000 AF
- Elevation above 1,035 feet and at or below 1,040 feet -250,000 AF
- Elevation above 1,030 feet and at or below 1,035 feet 300,000 AF
- Elevation at or below 1,030 feet 350,000 AF

On August 16, 2021, the USBR released the "Colorado River Basin August 2021 24-Month Study" used to set annual operations for Lake Powell and Lake Mead. Based on the results of the Study, the USBR declared the first federal water shortage declaration for the Colorado River Basin. In response to the continued drought conditions and the USBR declaration, MWD's Board of Directors declared a Water Supply Alert on August 17, 2021, calling for consumers and businesses to voluntarily reduce their water use and help preserve the region's storage reserves. A Water Supply Alert is the third of four escalating conditions in MWD's framework indicating the urgency of Southern California's need to save water. The action calls for water agencies to reduce their water demand through public awareness campaigns and by adopting local measures including increased outdoor water use efficiency,

prohibiting home car washing or filling of ornamental water features, and requiring that restaurants only serve water upon request. MWD's declaration seeks to avoid the need for more severe actions, including moving to the fourth and final stage in MWD's framework. In addition, while shortages in the Colorado River can potentially impact water supplies, MWD owns priority rights to the Colorado River and water supply will not be impacted in the immediate future. In August 2021, MWD indicated that its supplies from the Colorado River would not be impacted in 2022 and may be impacted in 2023 and more likely in 2024, if the drought continues<sup>13</sup>. As discussed previously, during a Member Agency coordination meeting in May 2022, MWD indicated that Colorado River supplies could be assumed to be sufficient and available for its Member Agencies during FY 2022-23. In addition, on August 16, 2022, MWD announced the Colorado River Basin States (including California) efforts to develop a plan to reduce Colorado River water demands by 2 to 4 million acre-feet.

On April 11, 2023, the USBR released a draft Supplemental Environmental Impact Statement (SEIS) with three alternatives (one with no action) to modify guidelines for the operations of Glen Canyon Dam and Hoover Dam to address historic drought, historically low reservoirs, and low runoff conditions in the Colorado River Basin. However, the Department of the Interior temporarily withdrew the draft SEIS during May 2023 so it could fully analyze the effects of the proposal under the National Environmental Quality Act. The USBR will publish an updated draft SEIS for public comment with an anticipated completion of the process later in 2023. The Department of the Interior also announced in May 2023 that an agreement had been met to reduce Colorado River water use (of at least 3 million acre-feet) over the next three years to prevent reservoirs from falling to critically low levels. In response, MWD indicated in May 2023 that the consensus alternative agreed to would produce needed short-term stability to the Colorado River system. In addition, MWD will continue to develop long-term, post-2026 solutions to the Colorado river.

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<sup>13</sup> https://www.latimes.com/california/story/2021-08-17/amid-worsening-drought-mwd-declares-water-supply-alert

### STATE WATER PROJECT

The SWP is a water storage and delivery system maintained and operated by DWR. MWD holds a long-term contract with DWR for SWP water. MWD currently has a contractual 'Table A' amount of 1,911,500 AFY of SWP water ('Table A' represents the proportion of available SWP water allocated and delivered to each SWP contractor). The delivery reliability of SWP water is discussed below.

The San Francisco Bay-Sacramento River Delta area (Bay-Delta) is a part of the SWP water delivery system. The reliability of the Bay-Delta to deliver water may be impacted by potential risks associated with endangered species, earthquakes, levee failure, and climate change. In order to mitigate these potential risks, State and federal resources and environmental protection agencies and a broad range of stakeholders are involved in a multiyear planning process to develop programs to greatly improve the capacity and reliability of the SWP and the environmental conditions of the Bay-Delta, including projects related to DWR's SWP conveyance capacity, water quality, and operation of the SWP.

The State of California enacted comprehensive legislation, including the Sacramento-San Joaquin Delta Reform Act of 2009 (California Water Code Division 35) which provided for an independent state agency, the Delta Stewardship Council. Pursuant to that act, the Delta Stewardship Council developed a comprehensive management plan that provides more reliable water supply for California and protects and enhances the Delta ecosystem (through development and implementation of a Delta Plan). The Delta Stewardship Council adopted a final Delta Plan in May 2013 which is the comprehensive long-term management plan for the Delta to improve statewide water supply reliability and to protect the Delta. Subsequently its 14 regulatory policies were approved by the Office of Administrative Law and became effective with legally-enforceable regulations on September 1, 2013. The Delta Stewardship Council also adopted a Programmatic Environmental impact Report (PEIR) on the Delta Plan in May 2013. The PEIR evaluates the potential impact of the Delta Plan and identifies mitigation measures. The Delta Plan was amended in February 2016, September 2016, April 2018, July 2019, and March 2020. The Delta Plan contains a set of 14 regulatory policies as well as 95 recommendations, which are non-regulatory but identify actions essential to increasing water supply reliability while

protecting, restoring, and enhancing the Delta ecosystem. In May 2020, the Delta Stewardship Council authorized the Ecosystem Amendment for environmental review under CEQA. As a result, a draft Program Environmental Impact Report (PEIR) was prepared and is undergoing a 64-day public review from September 27, 2021 to November 30, 2021. The Delta Stewardship Council is also currently considering an amendment to Chapter 7 (Delta Levees Investment Strategy, or DLIS). The DLIS is a multiyear project to update the Delta Plan's 2013 interim priorities for flood risk reduction and to guide the prioritization of Delta investments that reduce flood risk and better integrate Delta levees with other Delta actions and statewide flood control. The Delta Stewardship Council approved the DLIS priorities in 2018, however the amendment was rescinded in order to evaluate new levee geometry and hydraulic data. In August 2021, the Delta Stewardship Council directed staff to reinitiate the rulemaking process for DLIS. In August 2022, the Delta Stewardship Council approved an addendum to the Environmental Impact Report for the Delta Plan Amendment and began rulemaking with updated priorities.

In June 2013, a lawsuit was filed by the State Water Contractors and others seeking to overturn the Delta Stewardship Council's adoption of the Delta Plan, promulgation of related regulations, and certification of the above referenced PEIR. The litigation brought by the State Water Contractors and others claims that the Delta Stewardship Council exceeded its authority under the Sacramento-San Joaquin Delta Reform Act of 2009 and failed to analyze impacts under CEQA, particularly foreseeable impacts of the Delta Plan on water supplies around the state. In May 2016, the Superior Court upheld the Delta Stewardship Council on the vast majority of issues, including that the Council used best available science in developing the Delta Plan. The Court also ruled that the Delta Plan's regulations promote improved water quality, its flow recommendations promote conditions for species recovery, it promotes risk reduction strategies, and its conservation measures promote reduced reliance on the Delta. The Court, however, invalidated the entire Delta Plan because of what it identified as inadequacies in the following areas:

 The lack of enforceable, quantifiable targets for achieving reduced Delta reliance, reduced harm from invasive species, restoring more natural flows and increased water supply reliability, and • Inadequate "promotion" of conveyance options to improve the way water projects move water across the Delta.

In November and December 2016, the Delta Stewardship Council and other parties have appealed the Court's ruling, which means the invalidation of the Delta Plan was placed on hold. In April 2020, the Third District Court of Appeal (Appellate Court) sided with the Delta Stewardship Council on all remaining issues from the 2013 lawsuit, and found the alleged failure to have sufficient performance measures and to promote conveyance options were both moot because of subsequent amendments to the Delta Plan. In August 2020, the California Supreme Court declined a petition for review made by State Water Contractors in response to the Appellate Court decision. As a result, the central role of the Delta Stewardship Council in Delta water management and land use remains intact and is the governing law<sup>14</sup>.

Governor Jerry Brown announced the creation of the California EcoRestore program in April 2015, committing to restore more than 30,000 acres of Delta habitat, which will be implemented on an accelerated timeline independent of the proposed water conveyance facilities. This comprehensive suite of habitat restoration actions under the California EcoRestore program includes specific targets for floodplain, tidal and sub-tidal, managed wetlands, and fish passage improvements to benefit native fish species and a commitment to adaptive management.

DWR's "State Water Project Final Delivery Capability Report 2021" (2021 Report), dated September 2022, indicates that there is a 70 percent likelihood (72 percent in the 2019 Final State Water Project Delivery Capability Report) that more than 2,000 thousand acre-feet per year (taf/year) of Table A water will be delivered under current conditions. The 2021 Report incorporated future impacts on water deliveries as a result of climate change and potential limited pumping of the SWP to protect salmon, smelt, and other species in the Sacramento-San Joaquin Delta and Central Valley areas, including operational restrictions of the biological opinions issued by the U.S. Fish and Wildlife Service (USFWS) in December 2008 and the National Marine Fisheries Service (NMFS) in June 2009 governing the SWP and Central Valley

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 $<sup>\</sup>frac{14}{\text{https://www.deltacouncil.ca.gov/pdf/news-release/2020-08-12-supreme-court-upholds-delta-plan-affirms-council-authority-for-sustainable-management-of-the-delta.pdf}$ 

Project (a Federal water storage and conveyance facility) operations. In August 2016, the United States Bureau of Reclamation (USBR) and DWR requested reinitiating consultation with the USFWS and the NMFS on long-term operations of the Central Valley Project (CVP) and SWP due to new information and science on declining fish species populations. The USFWS and the NMFS released the "Biological Opinion for the Reinitiation of Consultation on the Coordinated Operations of the CVP and SWP", dated October 2019, included proposed CVP and SWP operations plans. In February 2020, the USBR approved a Record of Decision regarding modifications to long-term operations of the CVP. The USBR and DWR anticipate new Biological Opinions for the CVP and SWP. DWR will also be an applicant in the consultation and the California Department of Fish and Wildlife will facilitate the process of DWR updating their Incidental Take Permit for SWP operations. The 2021 Report also incorporated DWR operations as a result of the new Incidental Take Permit (ITP) issued by the California Department of Fish and Wildlife to DWR in March 2020. The ITP covers fish species (including the Delta smelt, Longfin smelt, winter-run Chinook salmon and spring-run Chinook salmon) which are subject to incidental take through long-term operation of the SWP.

In April and May of 2019, Governor Gavin Newsom announced a new approach for Delta water conveyance through a single tunnel alternative (to improve delivery reliability) and released Executive Order 10-19 directing state agencies to assess new planning for the single tunnel project (Delta Conveyance Project). DWR subsequently withdrew all project approvals and permit applications for the previously proposed twin tunnels project under the California WaterFix and Bay Delta Conservation Plan (BDCP). DWR released a "Notice of Preparation of Environmental Impact Report for the Delta Conveyance Project" in January 2020 to start planning for the Delta Conveyance Project. DWR also released a scoping summary report in July 2020. In July 2022, DWR released a Draft Environmental Impact Report with a public review period from July 2022 through December 2022. DWR is in the process of reviewing and responding to substantive comments received on the Draft Environmental Impact Report. DWR plans to issue a Final Environmental Impact Report in late 2023. The proposed Delta Conveyance Project evaluates eight conveyance alternatives in addition to the proposed project consisting of the following new Delta facilities:

- Two new 3,000 cfs intake facilities in the north Delta to divert water, for a total capacity of 6,000 cfs
- One below ground tunnel to convey that water from the new intakes following the Eastern Alignment, ending at the existing Bethany Reservoir on the California Aqueduct
- A new pumping plant that connects the tunnel directly to the Bethany Reservoir

In early 2021, DWR reduced the allocation of supplies delivered on the SWP to 5 percent, and again in 2022. However, due to recent wet conditions, DWR recently increased the SWP allocation to 100 percent on April 20, 2023.

### **Imported Water from MWD**

As discussed previously, MWD's Board of Directors declared a Water Supply Alert on August 17, 2021, calling for consumers and businesses to voluntarily reduce their water use and help preserve the region's storage reserves. On November 9, 2021, MWD previously adopted a resolution declaring a Regional Drought Emergency and called upon its Member Agencies to reduce use of SWP supplies. MWD's Member Agencies which depend on the SWP include the Los Angeles Department of Water and Power, Calleguas Municipal Water District, Las Virgenes Municipal Water District, Upper San Gabriel Valley Municipal Water District, Three Valleys Municipal Water District, and IEUA. MWD requested these six agencies to implement actions they deem necessary under their Water Shortage Contingency Plans, including enforcing restrictions limiting outdoor water days and lowering the amount of water allowed under a firsttier price. MWD's resolution also provides MWD's General Manager with authority to take actions needed to address the regional drought emergency, including the following: enhance local water production, recycling, conservation, and storage; purchase, transfer, and exchange water supplies; procure equipment, materials, services, and supplies; and provide media buying and placement services for a water awareness and conservation advertising campaign. MWD also expanded several water saving programs including increased rebates for turf removal and providing additional funding for rebate programs for water-efficient toilets and devices.

In April 2022, MWD executed an Emergency Water Conservation Program (EWCP) to adopt a framework to reduce non-essential water use and preserve available supply for the greatest public benefit in SWP-dependent areas, including IEUA. As part of the EWCP, MWD seeked SWP water offered by DWR for "human health and safety purposes" to reduce any potential water supply and demand gaps for its member agencies. On March 14, 2023, after recent winter storms helped alleviate shortage conditions, MWD removed the emergency restrictions which limited outdoor watering to one day a week or required compliance with volumetric limits. Pursuant to Executive Order N-5-23 issued on March 24, 2023 by California Governor Newsom, the requirement for urban water supplies to implement Level 2 of their WSCPs was removed.

MWD has been working on near and long term projects and programs to help alleviate the drought and impact on the SWP system. MWD adjusted its distribution system operations in January 2021 to minimize SWP use and draw heavily on the Colorado River and stored supplies. MWD has increased pumping on the Colorado River Aqueduct to the total capacity of eight pumps. MWD initiated a "reverse-cyclic" program in February 2022 to defer deliveries to allow member agencies to purchase water in Calendar Year 2022 for delivery in a future wet year. In addition, per MWD's presentation on May 12, 2022, MWD projected sufficient Colorado River water supplies would be available during FY 2022-23 to meet treated imported water demands. On August 16, 2022, MWD announced the Colorado River Basin States (including California) efforts to develop a plan to reduce Colorado River water demands by 2 to 4 million acre-feet. As discussed above, the Department of the Interior announced in May 2023 that an agreement had been met to reduce Colorado River water use (of at least 3 million acre-feet) over the next three years to prevent reservoirs from falling to critically low levels. In response, MWD indicated that the consensus alternative agreed to would produce needed short-term stability to the Colorado River system, however MWD would continue to develop long-term, post-2026 solutions. MWD is currently developing the Pure Water Southern California project to provide up to 150 MGD (approximately 168,000 AFY) of advanced treated wastewater from Los Angeles County Sanitation District's (LACSD's) Joint Water Pollution Control Plant in Carson, California (Carson Plant)<sup>15</sup>. The Pure Water Southern California project would deliver purified water from

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<sup>15</sup> https://www.mwdh2o.com/building-local-supplies/pure-water-southern-california/

the Carson Plant through up to 60 miles of transmission pipelines to groundwater basins within MWD's service area beginning in 2032. These deliveries would help restore water levels in the Main Basin and reduce the need for imported water. In September 2022, MWD announced it would be receiving \$130 million in State funding for water supply projects, including \$80 million for the Pure Water Southern California project. MWD will continue to explore additional engineering and infrastructure improvements to improve the resiliency and flexibility of its regional water-delivery system. MWD is also investing in drought-proof, climate change-resilient water supplies, including recycled water.

### **Imported Water from SBVMWD**

Based on recent agreements, FWC projects receiving up to 3,650 AFY of imported water supplies from SBVMWD in normal years. This quantity is subject to reduction based on availability. FWC expects to receive greater quantities of SWP water from SBVMWD as population and water use increase in the SBVMWD portion of FWC's service area.

The delivery reliability of SWP water from SBVMWD is similar to the previous discussion of SWP deliveries above. SBVMWD currently has a contractual 'Table A' amount of 102,600 AFY of SWP water. FWC's 2020 UWMP conservatively projects that it will receive up to 3,200 AFY of SWP water from SBVMWD in the next twenty years. Supplies from SBVMWD could be reduced by up to 95 percent in single dry years and up to 78 percent during multiple dry years. SBVMWD anticipates storage of SWP water during normal and wet years for use, along with direct deliveries, during dry years. Imported water provided by SBVMWD will be treated at FWC's Summit Water Treatment Plant, which is discussed in the following section on imported water from IEUA, or directly delivered to CEMEX for use in its daily aggregate operations.

### **Imported Water from IEUA**

In June 2021, IEUA's Board of Directors approved its 2020 Urban Water Management Plan and Water Shortage Contingency Plan to plan for and address future water shortages. IEUA's Water Shortage Contingency Plan details key shortage response actions and communication protocols that can be implemented to ensure reliable water supplies are available during various levels of water shortage, including shortages of up to and greater than 50 percent. In December 2021, IEUA's Board of Directors took action and activated IEUA's Water Shortage Contingency Plan at Level 2 (up to a 20 percent shortage), with a focus on reducing the use of SWP supplies in the region. In May 2022, IEUA's Board of Directors activated IEUA's Water Shortage Contingency Plan at Level 3 (up to a 30 percent shortage). IEUA is currently following Path 2 outlined previously in MWD's Emergency Water Conservation Program.

IEUA is also currently planning and developing the Chino Basin Program to provide up to 15,000 AFY of advanced treated wastewater for storage in the Chino Basin. The Chino Basin Program would provide the stored groundwater to a SWP contractor to forgo imported SWP deliveries. The deliveries of stored groundwater would help enhance the reliability of water supplies within IEUA's service area, including during emergencies or extended drought periods. Operations of the Chino Basin Program are anticipated to begin in 2028.

FWC's upgraded Summit Water Treatment Plant can treat imported water from IEUA and SBVMWD and local surface water from Lytle Creek. The Summit Water Treatment Plant, which has a capacity of up to 29 MGD, includes a 40 cfs connection with IEUA to receive untreated SWP water. FWC's 2020 UWMP conservatively assumed that FWC will receive up to approximately 15,000 AFY of SWP water from IEUA in the next twenty years. Imported water supplies will allow FWC flexibility in managing its water supply sources both short and long term, as well as in normal and dry years. Also, the upgraded Summit Water Treatment Plant allows FWC to treat and maximize the use of SWP supplies and turbid Lytle Creek storm water flows that could not be used in the past.

### WATER SUPPLY SUMMARY

Based on the above discussion of the available water supply sources, FWC's water supply-demand balance in normal, single dry, and multiple dry years during the next twenty years are summarized in Tables 11, 12, and 13, respectively.

The Chino Basin is an important source of groundwater for FWC now and will continue to be in the future. In addition, the Chino Basin Watermaster's Optimum Basin Management Program (the Chino Basin Watermaster updated the "Optimum Basin Management Program Report" in January 2020), including a Storage Management Plan, will greatly increase the Chino Basin's reliability and safe yield through recharge of imported water, additional local storm water, and recycled water. FWC currently has a total pumping capacity from the Chino Basin of approximately 35,000 gpm. At the present time FWC has five inactive wells in the Chino Basin (with a total pumping capacity of approximately 9,500 gpm or 15,300 AFY) which cannot be used because of high levels of perchlorate and nitrate contamination.

FWC is planning to restore most, if not all, of the lost pumping capacity in the Chino Basin through construction of additional wells or installing wellhead treatment or alternative remedies (e.g. packers) on existing wells in the near future. FWC is also planning to replace existing aging and poor producing wells, which will result in a net increase in production over existing capacity. Additional well capacity will provide emergency water supply in case of interruptions of water service due to migration of contamination, loss of power, physical damage to electrical power supply equipment, or failure of a water transmission pipeline.

FWC strongly supports the use of recycled water and will provide recycled water to its customers who are able to use it when it is made available. In addition to direct use of recycled water, FWC, under agreement, purchases a portion of the City of Fontana's recharged recycled water Base Entitlement to offset its Chino Basin production. FWC's increased future use of recycled water for landscape and agricultural irrigation (including potential landscaping for proposed developments such as the Project), construction, industrial cooling, and groundwater recharge use, will partially offset the need for potable water use within FWC's service area.

Tables 11, 12, and 13 show that the water supplies available to FWC will be sufficient to meet all present and future water supply requirements of the Project within FWC's service area for the next twenty years (through 2045), including during single and multiple dry years.

TABLE 11 FWC'S FUTURE WATER SUPPLIES IN NORMAL YEARS (AFY)

	Year	2025	2030	2035	2040	2045
Demands fr	om 2020 UWMP <sup>1</sup>	45,593	46,909	48,665	50,442	51,943
Potable `	Water Demand	44,593	45,409	46,665	47,942	48,943
Recycled	Water Demand	1,000	1,500	2,000	2,500	3,000
	Projected Water emands <sup>1</sup>	45,593	46,909	48,665	50,442	51,943
	Surface Water	4,860	4,860	4,860	4,860	4,860
	Lytle Basin	6,390	6,390	6,390	6,390	6,390
	Chino Basin	9,278	9,983	11,128	12,293	13,183
	Rialto Basin	5,865	5,976	6,087	6,199	6,310
Water Supplies <sup>2</sup>	Recycled Water	1,000	1,500	2,000	2,500	3,000
	Imported Water from SBVMWD	3,200	3,200	3,200	3,200	3,200
	Imported Water from IEUA	15,000	15,000	15,000	15,000	15,000
	Total	45,593	46,909	48,665	50,442	51,943

### **Notes:**

<sup>1)</sup> Demand projections reported in adopted FWC 2020 UWMP, Table 4-4. Water demands from the portion of the Westgate Specific Plan Amendment Project (Project) within FWC's service area are assumed to be included.

<sup>2)</sup> Water supplies projection reported in adopted FWC 2020 UWMP, Table 6-12

TABLE 12 COMPARISON OF FWC 2025 WATER SUPPLY AND DEMAND IN NORMAL, SINGLE DRY, AND MULTIPLE DRY YEARS (AFY) FOR THE PROJECT

			Single	Multiple Dry Years <sup>2</sup>					
Deman	d and Supply	Normal Year	Dry Year	Dry Year 1	Dry Year 2			Dry Year 5	
	nds from 2020 UWMP <sup>1</sup>	45,593	34,006	42,886	41,415	34,074	34,006	36,526	
Potable	Water Demand	44,593	33,006	41,886	40,415	33,074	33,006	35,526	
Recycled	l Water Demand	1,000	1,000	1,000	1,000	1,000	1,000	1,000	
	WC Projected er Demands	45,593	34,006	42,886	41,415	34,074	34,006	36,526	
	Surface Water	4,860	826	826	826	826	826	826	
	Lytle Basin	6,390	6,390	4,154	4,154	4,154	4,154	4,154	
	Chino Basin	9,278	4,765	15,210	13,738	6,397	6,329	8,849	
	Rialto Basin	5,865	5,865	5,865	5,865	5,865	5,865	5,865	
Water Supplies <sup>3</sup>	Recycled Water	1,000	1,000	1,000	1,000	1,000	1,000	1,000	
	Imported Water from SBVMWD	3,200	160	832	832	832	832	832	
	Imported Water from IEUA	15,000	15,000	15,000	15,000	15,000	15,000	15,000	
	Total	45,593	34,006	42,887	41,415	31,770	34,006	36,526	

### **Notes:**

<sup>1)</sup> Demand projections reported in adopted FWC 2020 UWMP, Table 7-4, Table 7-5, and Table 7-6. Water demands from the portion of the Westgate Specific Plan Amendment Project (Project) within FWC's service area are assumed to be included.

<sup>2)</sup> Single Dry Year and Multiple Dry Year projections are based on percentage of the Dry Year Demand compared to the Total Normal Year Demand multiplied by the Normal Demand for each Project. Projected water demands are assumed to be included in water demands identified from FWC's 2020 UWMP.

<sup>3)</sup> Supply projections reported in adopted FWC 2020 UWMP, Table 6-2.

TABLE 13 COMPARISON OF FWC'S 2045 WATER SUPPLY AND DEMAND IN NORMAL, SINGLE DRY, AND MULTIPLE DRY YEARS (AFY) FOR THE PROJECT

			Single	Multiple Dry Years <sup>2</sup>					
Deman	d and Supply	Normal Year	Dry Year	Dry Year 1	Dry Year 2			Dry Year 5	
	nds from 2020 JWMP <sup>1</sup>	51,943	38,742	48,859	47,183	38,819	38,742	41,613	
Potable	Water Demand	48,943	35,742	45,859	44,183	35,819	35,742	38,613	
Recycled	Water Demand	3,000	3,000	3,000	3,000	3,000	3,000	3,000	
	WC Projected er Demands	51,943	38,742	48,859	47,183	38,819	38,742	41,613	
	Surface Water	4,860	826	826	826	826	826	826	
	Lytle Basin	6,390	6,390	4,154	4,154	4,154	4,154	4,154	
	Chino Basin	13,183	7,056	18,865	17,189	8,825	8,748	11,620	
	Rialto Basin	6,310	6,310	6,310	6,310	6,310	6,310	6,310	
Water Supplies <sup>3</sup>	Recycled Water	3,000	3,000	3,000	3,000	3,000	3,000	3,000	
	Imported Water from SBVMWD	3,200	160	704	704	704	704	704	
	Imported Water from IEUA	15,000	15,000	15,000	15,000	15,000	15,000	15,000	
	Total	51,943	38,742	48,859	47,183	38,819	38,742	41,613	

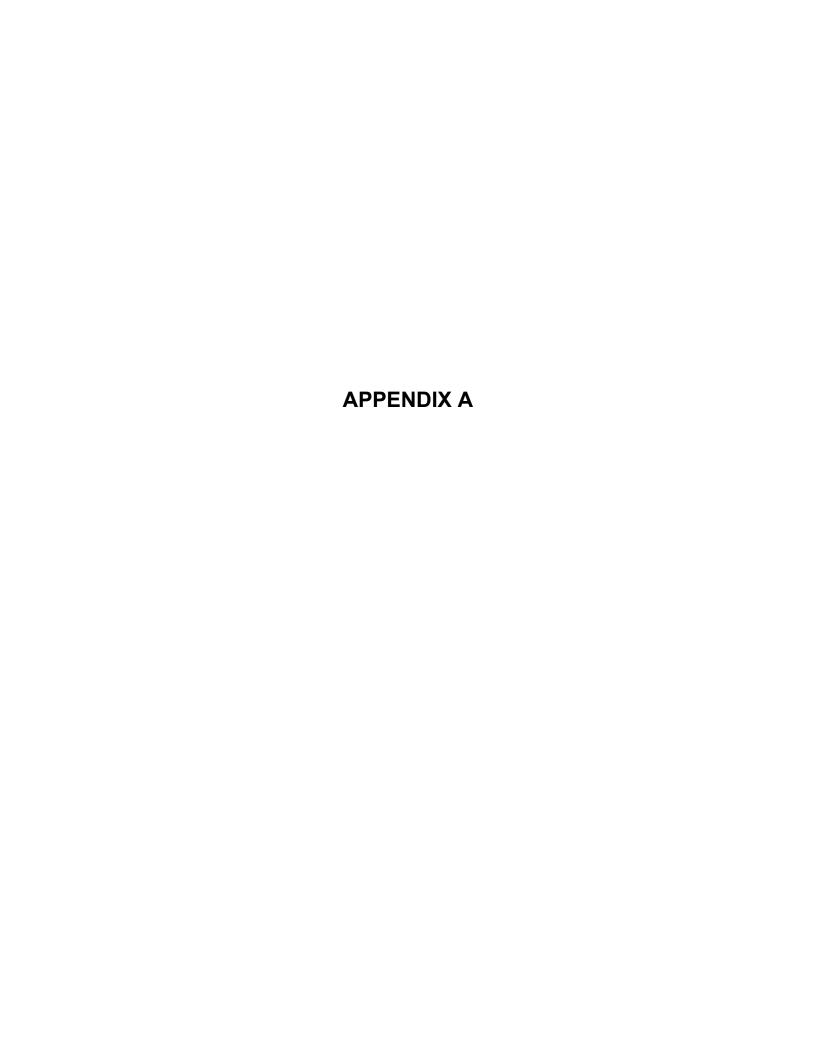
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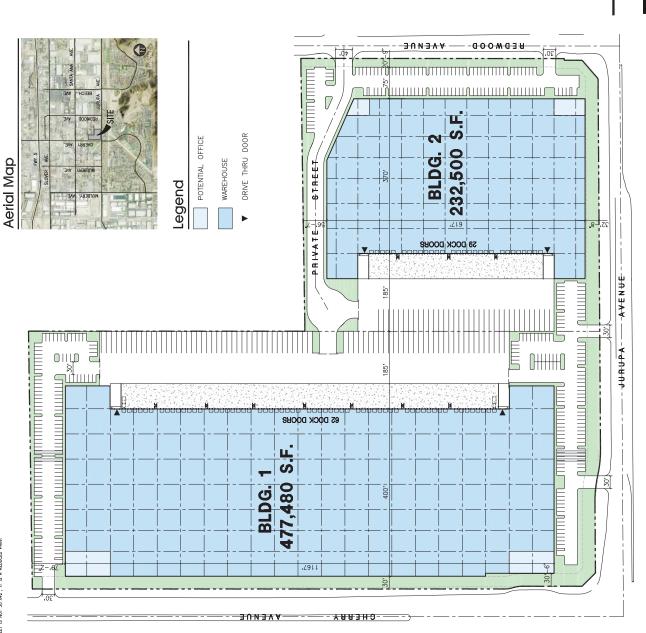
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<sup>1)</sup> Demand projections reported in adopted FWC 2020 UWMP, Table 7-4, Table 7-5, and Table 7-6. Water demands from the portion of the Westgate Specific Plan Amendment Project (Project) within FWC's service area are assumed to be included.

<sup>2)</sup> Single Dry Year and Multiple Dry Year projections are based on percentage of the Dry Year Demand compared to the Total Normal Year Demand multiplied by the Normal Demand for each Project. Projected water demands are assumed to be included in water demands identified from FWC's 2020 UWMP.

<sup>3)</sup> Supply projections reported in adopted FWC 2020 UWMP, Table 6-2.





# Note: This is a conceptual plan, it is based on preliminary information which is not fully verified and may be incomplete. It is meant as a comparative aid in examining alternate development strategies and any quantities indicated are subject to revision as more reliable information becomes available.

### <u>Tabulation</u>

CAUTION: IF THIS SHEET IS NOT 30"X42", IT IS A REDUCED PRINT

	BLDG. 1	BLDG. 2	TOTAL	68
SITE AREA				
in s.f.	831,316	458,473	1,289,789 s.f.	s.f.
in acres	19.1	10.5	29.6 ac	ac
BUILDING AREA				
Office - 1st floor	3,500	3,500	7,000 s.f.	s.f.
Warehouse	473,980	229,000	702,980 s.f.	s.f.
TOTAL	477,480	232,500	709,980 s.f.	s.f.
COVERAGE	57.4%	50.7%	92.0%	
AUTO PARKING REQUIRED				
High Cube:				
office: 1/250 s.f. (f exceed 10% GFA)	n/a	n/a	n/a	n/a stalls
Whse: 1st 20K @ 1/1,000 s.f.	20	20	40	40 stalls
2nd 20K @ 1/2,000 s.f.	10	10	20	20 stalls
above 40K @ 1/5,000 s.f.	88	39	127	127 stalls
TOTAL	118	69	187	187 stalls
AUTO PARKING PROVIDED				
Standard (9' x 19')	230	135	365	365 stalls
TRAILER PARKING PROVIDED				
Trailer (12' x 52')	75	35	109	109 stalls
MAXIMUM BUILDING HEIGHT ALLOWED				
Height - 60°				
MAXIMUM FLOOR AREA RATIO				
FAR55				
ZONING ORDINANCE FOR CITY				
Zoning Designation - Southwest Industrial Park /	al Park/			
Jurupa North Research & Development District (JND)	District (JND)			
LANDSCAPE REQUIREMENT				
Percentage - 15% (excluding areas covered by buildings, structures,	ered by build	ngs, structur	, 69	
or areas used for approved outisde storage, loading etc.)	age, loading	etc.)		
LANDSCAPE PROVIDED				
Percentage -	31.0%	24.9%	24.6%	
in s.f.	85,171	57,512	142,683 s.f.	S.f.
SETBACKS				
Jurupa Ave 30' (front), 20' (side)				
Cherry Ave 30' (front), 20' (side)				
Redwood Ave 20'				
Interior side / rear - none				



Conceptual Site Plan

## 11171 Cherry Avenue

City of Fontana, CA

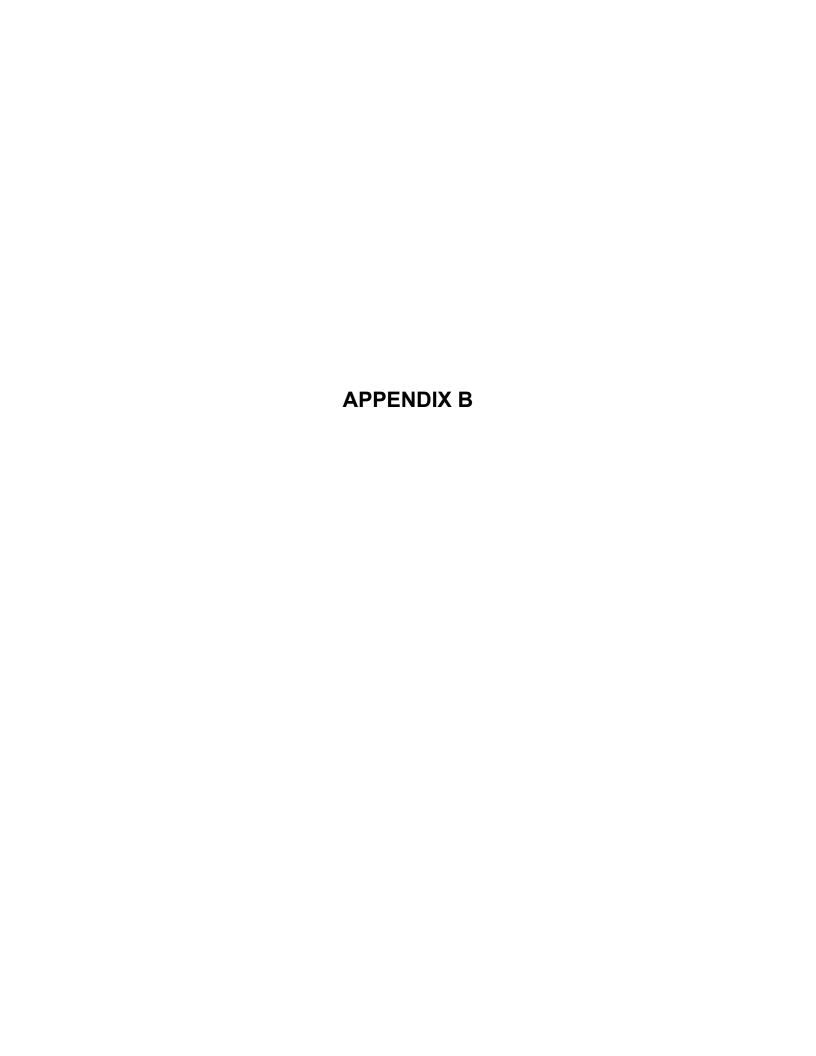


18831 Bardeen Ave. - Ste. #100 Irvine, CA 92612 (949) 863-1770 www.hparchs.com



July 20, 2022 / Job #21533

Scheme 1



### HISTORY OF TOTAL ANNUAL GROUNDWATER PRODUCTION FROM THE CHINO BASIN (ACRE-FEET)\*

Production Year	Appropriative Pool <sup>13</sup>	Agricultural Pool <sup>13</sup>	Non-Agricultural Pool <sup>13</sup>	Chino Basin Desalters <sup>14</sup>	Department of Toxic Substances Control <sup>15</sup>	Total Production <sup>16</sup>
77-78	62,408	91,714	10,102 <sup>1</sup>	-	-	164,224
78-79	61,372	81,479	7,263	-	-	150,114
79-80	65,371	70,050	7,541	-	-	142,961
80-81	71,443	67,726	5,777	-	-	144,945
81-82	66,844	64,032	5,801	-	-	136,676
82-83	63,557	56,858	2,448	-	-	122,864
83-84	70,544	60,076	3,258	-	-	133,877
84-85	76,903	54,248	2,446	-	-	133,598
85-86	80,885	50,611	3,255	-	-	134,751
86-87	84,662	57,964	2,696	-	-	145,322
87-88	91,579 <sup>2</sup>	55,949	3,018	-	-	150,545
88-89	93,617 <sup>3</sup>	45,683	3,692	-	-	142,992
89-90	101,344 <sup>4</sup>	47,358	4,927	-	-	153,629
90-91	86,513 <sup>5</sup>	47,011	5,479	-	-	139,003
91-92	91,736 <sup>6</sup>	43,456	4,900	-	-	140,092
92-93	86,584 7	44,300	5,226	-	-	136,110
93-94	80,934 8	44,492	4,322	_	45	129,793
94-95	93,608 9	55,415	4,091	_	45	153,159
95-96	103,729 10	43,639	3,240	_	60	150,668
96-97	112,205	44,923	3,779	_	76	160,983
97-98	99,810 11	43,370	3,274 <sup>12</sup>	-	83	146,537
98-99	111,048	47,792	3,274	-	81	162,655
99-00	128,892	44,242	5,605	-	82	178,821
00-01	116,204	39,285	5,991	7,989	100	169,570
01-02	123,531	38,196	4,150	9,458	81	175,416
02-03	121,748	35,168	3,979	10,439	79	171,413
03-04	125.320	38,192	2,057	10,605	79	176,253
04-05	118,030	31,505	2,246	9,854	81	161,715
05-06	107,249	30,253	2,641	16,542	80	156,765
06-07	119,438	29,653	3,251	27,077	79	179,498
07-08	120,650	23,539	3,421	30,121	81	177,813
08-09	134,119	23,277	2,420	29,012	83	188,910
09-10	117,299	21,043	2,039	28,857	85	169,323
10-11	99,172	21,030	1,986	29,043	87	151,319
11-12	93,615	22,319 17	3,162	28,411	89	147,595
12-13	109,294	23,718 <sup>17</sup>	3,686	27,098	87	163,883
13-14	113,976	21,796 <sup>17</sup>	3,834	29,282	85	168,973
14-15	97,842	17,118 <sup>17</sup>	3,371	30,022	84	148,436
15-16	100,297	17,109 <sup>17</sup>	2,670	28,191	85	148,352
16-17	93,699	17,715 <sup>17</sup>	3,636	28,284	104	143,438
17-18	88,740	18,827	2,919	30,088	83	140,656
18-19	83,280	15,478	3,204	31,233	80	133,275
					72	
19-20	95,418	15,722	2,350	35,630		149,190
20-21	105,040	14,929	2,795	40,156	77	162,998
21-22	107,529	14,077	1,767	40,566	82	164,021

<sup>\*\*</sup> Total Production adjusted from prior annual reports to include previously omitted production from wells that have become non-active over time.

**Appendix** H-1

<sup>&</sup>lt;sup>1</sup> Includes 3,945 AF of mined water pumped by Edison as agent for IEUA.

<sup>&</sup>lt;sup>2</sup> Does not include 7,674.3 AF exchanged with MWDSC. <sup>3</sup> Does not include 6,423.6 AF exchanged with MWDSC.

<sup>&</sup>lt;sup>4</sup> Does not include 16,377.1 AF exchanged with MWDSC. <sup>5</sup> Does not include 14,929.1 AF exchanged with MWDSC.

Does not include 12,202.4 AF exchanged with MWDSC.
 Does not include 13,657.3 AF exchanged with MWDSC.
 Does not include 20,194.7 AF exchanged with MWDSC.

Does not include 4,221.9 AF exchanged with MWDSC.
 Does not include 6,167.2 AF exchanged with MWDSC.

<sup>&</sup>lt;sup>11</sup> Does not include 4,275.4 AF exchanged with MWDSC.

<sup>&</sup>lt;sup>12</sup> Does not include 216.5 AF exchanged with MWDSC.

<sup>&</sup>lt;sup>13</sup> Represents total physical production by Pools, not assessed production.

<sup>&</sup>lt;sup>14</sup> Production by the Chino Basin Desalters is not considered assessable production: Desalter replenishment obligation accounting is shown in the Assessment Package.

<sup>&</sup>lt;sup>15</sup> Production by DTSC is accounted separately, by agreement, such that the production is not assessed by Watermaster.

<sup>&</sup>lt;sup>16</sup> Total reflects physical production by pumpers and does not account for any adjustments or exchanges that are made in the Assessment Packages.

<sup>&</sup>lt;sup>17</sup> Total Agricultural Pool production revised due to incorrect multiplier used on an irrigation well meter.

### SANT GARBIRIUBIL WALLUBRY WAYNER COMURANNY

April 20, 2023

Ms. Kimberly Chandler Huitt-Zollars, Inc. 3990 Concours Streets, Suite 330 Ontario, CA 91764

Subject: 11171 Cherry Avenue

Fontana, CA

Dear Ms. Chandler:

In response to your request, we are furnishing herewith fire flow information based upon the results of a flow test conducted near the subject location. The results are as follows:

Static Water Pressure	75	PSI
Pitot Reading	38	PSI
Observed Flow	2649	<b>GPM</b>
Residual Water Pressure	50	PSI

Please be reminded that the flow information listed above indicates the capability of the water system at the time the test was made. Since the capacity of the water system may vary as a result of many factors, including changes in demand placed on the water system by our customers, we recommend that you give adequate consideration to these variations when performing your analysis.

If you need any additional information or have questions, please call me on my direct line (909) 201-7348 or via e-mail at kguzman@sgvwater.com.

Very truly yours,

Karolina Guzman

Karolina Guzman

Assistant Engineering Manager

### SAN GABRIBIL VALLUBY WAYNER COMPANY

April 20, 2023

Ms. Kimberly Chandler Huitt-Zollars, Inc. 3990 Concours Street, Suite 330 Ontario, CA 91764

Subject: 11171 Cherry Avenue

Fontana, CA

Dear Ms. Chandler:

San Gabriel Valley Water Company ("San Gabriel") is a public utility regulated by the State of California Public Utilities Commission (the "Commission"). The subject property is located entirely within San Gabriel's service area as authorized by the Commission, and San Gabriel has sufficient water resources available to supply water service to the property.

Please contact the fire department and obtain and provide us with the fire department's written fire flow requirements for your property as soon as possible. That information will enable us to determine if existing water distribution facilities are adequate or if new facilities must be designed and installed to provide water service to your property. Before San Gabriel can install such facilities or commence water service, you will need to complete the appropriate applications, agreements, and necessary financial arrangements in accordance with San Gabriel's tariff schedules and rules filed with and approved by the Commission.

If you need any additional information or have questions, please call me on my direct line (909) 201-7348 or via e-mail at kguzman@sgvwater.com .

Very truly yours,

Karolina Guzman

Karolina Guzman

**Assistant Engineering Manager** 

KG:jih

