

THEN



NOW



2022 ANNUAL REPORT  
**TURLOCK IRRIGATION DISTRICT**

TURLOCK IRRIGATION DISTRICT  
**135**  
YEARS

# THEN AND NOW, COMMITTED LEADERSHIP



Michelle Reimers  
General Manager,  
Turlock Irrigation District

## MESSAGE FROM THE GENERAL MANAGER

In our fast-paced world, it is rare that we give ourselves an opportunity to stop and reflect on the idea of what was “then” and how things are “now.” Most of the time we find ourselves needing to deal with the challenges of tomorrow. As I think about 2022, TID’s 135th anniversary as an irrigation district, I am reminded that the principles and priorities that our visionaries laid out for our customers then, still ring true now.

135 years ago, our community understood the need for reliable irrigation water in order for our communities to thrive. Now, our community of growers tend to the most vital farmland in the Nation. In 1923, TID entered the retail electric market and now serves electricity to customers within the 662-square miles service territory it is today. We have come a long way over the years. I’m pleased to take a moment now to reflect on a few highlights and the challenges our impressive team tackled throughout 2022.

This was a year worth pausing for, to recognize our ability to navigate through the third driest three-year period on record and surpassing our historic peak energy load without impacting service to our customers. I commend the talent and dedication of our team and Board of Directors, who addressed the challenges and opportunities of 2022 with the same ambition of those who established the District in 1887.

## BOARD OF DIRECTORS



Michael Frantz  
President  
Division 1



Charlie Fernandes  
Director  
Division 2



Joe Alamo  
Secretary  
Division 3



Rob Santos  
Director  
Division 4



Ron Macedo  
Vice President  
Division 5



THEN

NOW

Construction of Old Don Pedro Dam.

Don Pedro Life Extension Project upgrades.

# INVESTING IN OUR FUTURE



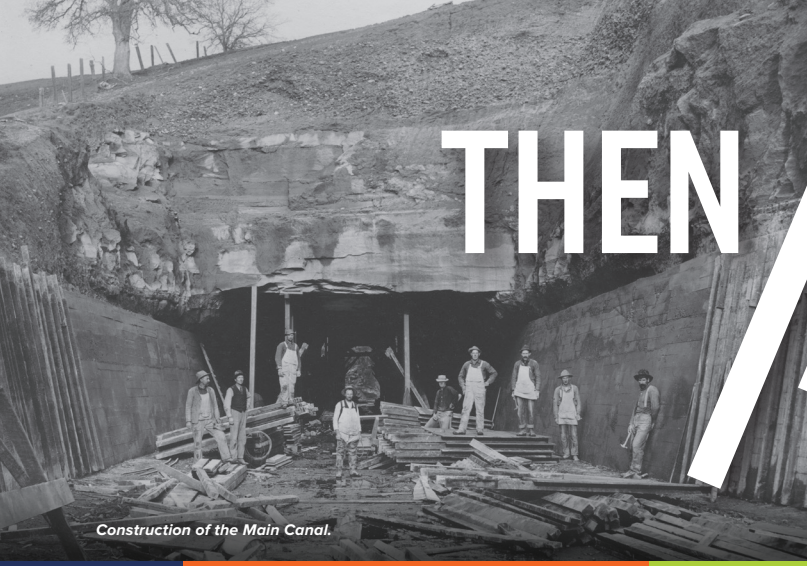
Replacement of the Turbine Shutoff Valve in Don Pedro Powerhouse.

Updates and upgrades to the **Don Pedro Project** are designed to maintain the integrity of Don Pedro and achieve an additional 50-year life expectancy. In 2022, the upgrades included essential value replacements and a crane rail extension project.

TID, with MID, filed a **water rights application** with the State Water Resources Control Board to capture unappropriated flood waters from the Tuolumne River. An initial analysis indicates that since 1998 there have been thirteen years when water would be available, averaging approximately 840,000 AF annually in additional water captured in each of those thirteen years.



View of a channel in the Tuolumne River.



Construction of the Main Canal.



Canal with automatized gate installed.

# THEN

# NOW

## IMPLEMENTING INNOVATION



Rendering of Project Nexus site with regulating reservoir.

**TID Introduced Project Nexus**, a first in the nation project, to demonstrate the proof of concept of installing solar panels over both narrow and wide-span canals. The innovative project will investigate the scalability for both TID's 250 miles of canals, as well as state-owned wide-span canals. In addition to the renewable energy generated by the panels, there is potential for reduction in both aquatic growth and evaporation in our canals. TID sees the potential value of the solar over canals project as an innovative solution to help maintain our 100-plus year-old irrigation system and meet our need for additional renewable power. To learn more, visit [TID.org/ProjectNexus](https://www.tid.org/ProjectNexus).

The **Upper Dawson Hydroelectric Project** is an example of TID's innovation and resourcefulness in maintaining our infrastructure. The project helps provide irrigation reliability to the District's Upper Main Canal system. The installed gates increase the flow capacity of the Dawson facility by 50% as compared to previous design capacities. The gates also reduce risk to the irrigation system that supplies water to 150,000 acres of some of the most valuable and productive farmland in the world.



Dawson Dam automated gates.



Construction of the Don Pedro Powerhouse.



Walnut Energy Center.

THEN

NOW

# ENSURING RELIABILITY AND SERVICE



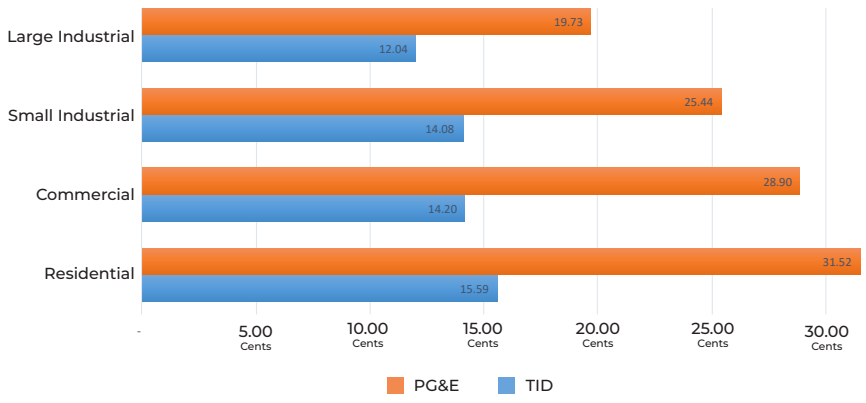
Almond 2 Power Plant.

During the September heat wave, TID Balancing Authority electric demand hit an **all-time high of 735 megawatts (MW)**. The previous all-time high was 692 MW in 2020. With the State potentially experiencing rolling blackouts, the experts at TID worked around the clock to coordinate resources to ensure reliable power for TID customers and provided resources to assist the state.

**MY TID**, an online portal for energy customers, was launched in April. The platform provides added value to customers through increased self-service capabilities, usage data, reporting and payment flexibility.



## 2022 TID RATE COMPARISON USING TID AVERAGE USAGE PER RATE CLASS





Home in TID's service territory.



Community event at TID Canal campus.

# THEN

# NOW

## DEVOTED TO OUR COMMUNITY

1,138 residential customers received rebates

42 non-residential customers received 3,547,484 kWh in rebate savings

972 fixtures replaced in Dusk to Dawn streetlights with LED's, saving 626,394 kWh

301 Electric Vehicle rebates issued

(residential and commercial)

4,630,428 total kilowatt hours saved

(residential and non-residential)

169 Electric Vehicle Charger rebates issued

(residential and commercial)



Customer Academy tour.



Celebration of Water & Power event.



EV chargers in Ceres.

TID offered customers an inside look at our history, operations, and future plans through the **Customer Academy** which launched in September. Participants, who applied to be part of the program, were presented with information from TID subject matter experts from across the District, giving TID an opportunity to strengthen the relationship between the District and the community through transparency and education.

TID invited customers, employees and their families to attend a **Celebration of Water & Power** recognizing Public Power Week, Water Professionals Appreciation Week, and Customer Service Week. Fifteen departments presented attendees with information on their role in supporting how TID provides the essential services of power and irrigation water to the communities we serve.

TID installed a 7.2 kW **ChargePoint Level 2 charger** at the Ceres Community Center. TID's board approved the installation and operation of ten Level 2 EV chargers throughout our service territory. TID will study the use of the public chargers to better understand customer behavior for the creation of potential rebate programs. TID used Low Carbon Fuel Standards (LCFS) dollars to fund this project. The intent of LCFS is to promote transportation electrification.



Workforce at Don Pedro Dam.








Workforce installing a Rubicon gate on the Highline Canal.

# THEN / NOW

## A DEDICATED WORKFORCE



The efforts of Team TID, the employee-founded, giveback organization, were recognized by two industry associations. Northwest Public Power Association (NWPPA) named Team TID as the recipient of the 2022 Paul J. Raver Community Service Award. Additionally, American Public Power Association (APPA) selected Team TID as the recipient of the 2022 Sue Kelly Community Service Award. Both awards recognized the **exceptional commitment TID employees have** to their communities.

- 
5,703 poles inspected  
147 poles replaced
46 poles painted to increase useful life of structures
- 
13,879 trees cut for vegetation management
- 
0.6 miles of underground cable replaced  
0.8 miles of conduit installed
- 
4,214 customers enrolled in CARES Rate Assistance program  
1,952 customers enrolled in Medical Rate Assistance program
- 
1,125 Construction and Maintenance jobs worked on during the irrigation season



TID Line Dept. working on power lines after a storm.

# HISTORICAL OPERATING STATISTICS

(\$ In thousands)

	2022	2021	2020	2019	2018
<b>AVERAGE CUSTOMERS AT END OF PERIOD:</b>					
Residential	75,459	75,238	74,376	73,978	73,730
Commercial	7,493	7,469	7,386	7,320	7,282
Industrial	914	883	876	883	878
Other (1)	10,533	10,326	21,346	21,085	21,060
Total	94,399	93,916	103,984	103,266	102,950
<b>MWh SALES:</b>					
Residential	812,271	826,440	821,010	745,512	732,041
Commercial	141,083	141,141	134,617	134,018	132,867
Industrial	855,969	843,108	808,223	792,909	790,621
Other (1)	443,219	413,741	399,657	373,378	390,310
Total Retail	2,252,542	2,224,430	2,163,507	2,045,817	2,045,839
Interdepartmental meters	53,557	50,595	49,925	48,470	48,811
Wholesale Power	1,098,092	1,214,391	1,124,759	1,307,447	1,299,777
Total	3,404,191	3,489,416	3,338,191	3,401,734	3,394,427
<b>SOURCES OF MWh:</b>					
Generated by district	2,309,324	2,171,463	2,182,107	2,136,572	2,062,189
Purchased	1,169,589	1,404,758	1,244,995	1,341,973	1,410,460
Subtotal	3,478,913	3,576,221	3,427,102	3,478,545	3,472,649
System losses	74,722	86,805	88,909	76,811	78,222
Total	3,404,191	3,489,416	3,338,191	3,401,734	3,394,427
<b>ELECTRIC ENERGY REVENUES (IN THOUSANDS):</b>					
Residential	\$130,741	\$132,132	\$130,991	\$119,534	\$117,429
Commercial	20,122	19,993	19,186	19,039	18,886
Industrial	102,935	100,311	96,630	95,450	94,828
Other (1)	59,767	55,868	54,167	51,031	53,188
Power Supply Adjustment Recognized (Deferred)	775	(18,813)	(25,935)	(30,235)	(23,405)
Rate Stabilization Transfer	27,757	0	0	9,570	7,506
Total Retail Energy	342,097	289,491	275,039	264,389	268,432
Electric Service Charges	630	323	246	409	502
Other Electric Revenue	46	20	38	38	29
Electric Energy Retail	342,773	289,834	275,323	264,836	268,963
Wholesale Power	120,579	78,830	47,052	54,980	53,476
Total	\$463,352	\$368,664	\$322,375	\$319,816	\$322,439
<b>SYSTEM PEAK DEMAND (MW)</b>					
	594	562	571	537	526
<b>AVERAGE MWh SALES PER CUSTOMER</b>					
Residential	10.764	10.984	11.039	10.077	9.929
Commercial	18.829	18.897	18.226	18.308	18.246
Industrial	936.509	954.822	922.629	897.972	900.479
<b>AVERAGE REVENUE PER MWh</b>					
Residential	\$160.96	\$159.88	\$159.55	\$160.34	\$160.41
Commercial	\$142.63	\$141.65	\$142.52	\$142.06	\$142.14
Industrial	\$120.26	\$118.98	\$119.56	\$120.38	\$119.94
<b>AVERAGE COST OF POWER PER KWh FOR RETAIL LOAD (2)</b>					
	\$0.079	\$0.068	\$0.064	\$0.065	\$0.069

(1) Includes agricultural and municipal water pumping and street lighting. During 2021, street lighting accounts were consolidated as the District migrated to a new utility billing system, resulting in fewer reported customer accounts.

(2) Includes depletion and depreciation on generation assets, excludes debt service.



# HISTORICAL RESULTS OF OPERATIONS

(\$ in thousands)

	2022	2021	2020	2019	2018
<b>OPERATING REVENUES:</b>					
Electric energy - Retail	\$342,773	\$289,834	\$275,323	\$264,836	\$268,963
Electric energy - Wholesale	120,579	78,830	47,052	54,980	53,476
Wholesale Gas	8,888	5,237	2,005	3,600	4,311
Irrigation	14,711	15,138	13,213	13,314	13,201
Other	577	1,913	4,383	6,237	4,315
Total Operating Revenue	487,528	390,952	341,976	342,967	344,266
<b>OPERATING EXPENSES:</b>					
Power Supply:					
Purchased Power	107,226	80,532	58,027	50,537	54,718
Generation and Fuel	150,159	105,616	83,200	93,607	95,612
Total Power Supply	257,385	186,148	141,227	144,144	150,330
Other Electric O&M	34,620	25,144	25,415	26,008	28,032
Irrigation O&M	17,004	13,708	13,996	14,126	14,281
Public Benefits	5,371	4,384	5,119	4,732	4,722
Administration and General	36,485	29,608	27,431	26,687	25,612
Depreciation and amortization	67,687	69,159	65,276	65,793	65,001
Total Operating Expenses	418,552	328,151	278,464	281,490	287,978
<b>OPERATING INCOME</b>	68,976	62,801	63,512	61,477	56,288
<b>OTHER INCOME (EXPENSE):</b>					
Interest/Derivative (loss)gain	2,112	3,078	7,243	6,723	4,049
Miscellaneous	15,756	11,978	10,407	10,278	14,099
Total Other Income	17,868	15,056	17,650	17,001	18,148
<b>INTEREST EXPENSE</b>					
Long Term Debt	35,604	36,831	44,544	48,334	49,845
<b>NET INCOME (LOSS)</b>	51,240	41,026	36,618	30,144	24,591
<b>NET POSITION:</b>					
BEGINNING OF YEAR	492,782	451,756	415,138	384,994	360,403
END OF YEAR	\$544,022	\$492,782	\$451,756	\$415,138	\$384,994
<b>DEBT SERVICE COVERAGE - REVENUE BONDS/COP'S</b>	2.47x	4.22x	3.76x	3.54x	2.93x

(2) Government Accounting Standards Board (GASB) Statement No. 75, Accounting and Financial Reporting for Postemployment Benefits Other Than Pensions, was adopted in 2018 and as a result beginning of year Net Position was restated as of January 1, 2018

# 2022 A YEAR IN REVIEW



## WATER YEAR

**Third driest** 3-year period on record

**27 inches** available water per parcel

**65.8%** precipitation compared to average year

**1,057,824 acre-feet** of water in storage at Don Pedro storage at the end of the water year



## POWER

**9 days** of above 100 degree temperatures

**735 BA** peak load

**40 MW** over previous record in 2020



## CUSTOMER SERVICE

**\$1,029,306.47** LIHEAP dollars received by eligible customers

**875,258** total payments processed (all methods)

**149,799** total number of calls answered



## ENGAGEMENT

**22 Water & Power Podcast episodes**  
4,299 downloads

**1,960 Media mentions**

**1,813 new social media followers**  
681,000 impressions

### TID QUICK FACTS

Number of Employees:

**458**

Electrical Service Area:

**662 miles<sup>2</sup>**

Electric Population Served:

**240,000**

Electric Service Customer Breakdown:

**72% Residential**

**20% Other**

Includes agricultural and municipal water pumping and street lighting

**7% Commercial**

**1% Industrial**

Irrigation Service Area:

**307 miles<sup>2</sup>**

Irrigation Accounts:

**4,700**

Miles of Gravity-Fed Canals:

**250 miles**

Irrigated Acres:

**146,791 acres**

## TID MISSION

TID will provide reliable and competitively priced water and electric service, while being good stewards of our resources and providing a high level of customer satisfaction.

## VISION

TID's reputation will be as a trusted partner, innovative leader, and model of sustainability in enhancing the quality of life for our community, through embracing our core values at every level of our organization.

## CORE VALUES

**Reliability.** TID plans, builds and maintains its water and electric systems to reliably serve its customers.

**Affordability.** TID provides stable, competitive rates for its customers.

**Stewardship.** TID provides leadership by sustainably managing the resources entrusted to us.

**Safety.** TID ensures a safe environment for employees and customers.

**Quality Workforce.** TID attracts and retains highly-skilled and experienced team members.

**Customer Focus.** TID is committed to building strong and lasting relationships with our customers and community through engagement, transparency, accountability and trust.

**Local Control.** Decisions made by local people to address local needs are essential to TID's continued success.

**Visionary.** TID proactively balances near-term decision making with the long-term well-being of its customers.

## TID OVERVIEW

Established in 1887, the Turlock Irrigation District (TID) was the first irrigation district in the state. Today it is one of only four irrigation districts in California that also provides electric retail energy directly to homes, farms and businesses. Organized under the Wright Act, the District operates under the provisions of the California Water Code as a special district. TID delivers irrigation water through 250 miles of a gravity-fed canal system that irrigates approximately 150,000 acres of farmland.

In addition, TID owns and operates an integrated and diverse electric generation, transmission and distribution system that serves a population of approximately 240,000 within a 662 square-mile area. TID is one of eight Balancing Authorities in California and operates independently within the Western United States power grid. A Balancing Authority must ensure customers' usage and resources are matched on a moment-by-moment basis. TID is governed by a five-member, locally elected Board of Directors.



**WATER & POWER**

*Serving Central California since 1887*

