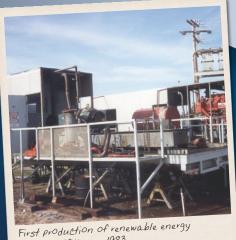
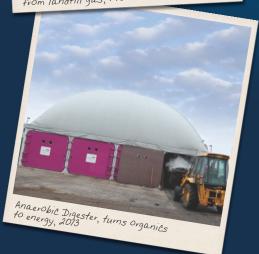


# **TURNING WASTE INTO RESOURCES**



from landfill gas, 1983





Monterey Regional Waste Management District

2016 ANNUAL REPORT

# A message from Tim Flanagan, General Manager









The year 2016 marks the 65th anniversary of the founding of the Monterey Regional Waste Management District. Our mission today, Turning Waste into Resources, reflects a theme that has guided our operations from the beginning.

The first order of business back in 1951 was to find a suitable site for a sanitary landfill. We're extremely fortunate that our Board of Directors had the vision to buy the large 475-acre parcel of land we have occupied since 1965.

I hope this report will help illuminate the history of our programs, while shining a light toward the future. From our early cardboard recycling in 1953, the first production of electricity from landfill gas in 1983, the establishment of the Last Chance Mercantile in 1991, to our Materials Recovery Facility that came on-line in 1996, the integrated facilities we operate today embody our mission and provide essential community infrastructure to reduce, reuse, recycle, and safely dispose of non-hazardous municipal solid waste.

As only the fourth general manager in the history of the District, I am grateful to the employees who carry out our mission, to our Board that provides sound fiscal oversight, and to the community we serve for their participation. On behalf of all District employees, thank you for your support.

tim Flanagan

# General Managers since inception

1973 – 1979 William (Bill) Parsons 1979 – 2004 David Myers

2004 - 2015 William Merry2015 - Present Timothy Flanagan

# Monterey Peninsula Landfill

Waste that has not been reduced, reused, or recycled is disposed of in the 315-acre Monterey Peninsula Landfill (MPL). At current disposal rates, the MPL has a life expectancy of 100 years, ensuring that the Greater Peninsula region has ample disposal capacity well into the future.

The MPL currently receives approximately 490,000 tons per year (about 1,300 tons per day) of municipal solid waste for disposal. The Solid Waste Facility Permit for the District operation states that the peak volume for incoming waste materials is 2,000 vehicle trips and 3,500 tons per day. Currently, the District is filling in its fifth landfill module since the MPL became operational in 1965. The 23-acre Module 5 went online in 2013 and has a total waste capacity of 5,000,000 tons.

The District is responsible for implementing environmental controls and monitoring activities at the site, as well as funding and overseeing design efforts and capital construction improvements to comply with regulatory requirements.

The MPL is projected to reach capacity in the year 2115. A number of factors affect the actual site life of the landfill:

- Variations in waste tonnage accepted, such as attracting or losing waste to other landfills due to tipping fee variation or accepting waste from other service areas.
- Variations in the rate of population growth on the Monterey Peninsula.
- Changes in waste generation rates, due to fluctuations in source reduction and recycling volumes.
- Strength of the economy affecting commercial and agricultural waste generation rates, as well as construction projects.

The 2017 planned expansion of the Materials Recovery Facility, along with new developments in recycling and diversion in the coming years, are anticipated to add additional life expectancy to the MPL disposal site.



Falconers become part of District's Bird Abatement Program 2011







# **6 Pounds Per Person Daily**

On average, 6 pounds of garbage was disposed, per capita, per day on the Monterey Peninsula in 2015, based on tons landfilled at the District after diversion.

# People - Employees









#### **General Manager**

Timothy Flanagan

#### Accounting

Lynette Mooneyham, Rosemary Perez, Charles Rees, Tina Reid

#### Administration

Becky Aguilar, Ida Gonzales, Peter Skinner

#### **Engineering**

Guy Petraborg, David Ramirez

#### **Household Hazardous Waste Collection Facility**

Abram Meza, Jimmy Perez, Josh Rivera

#### **Human Resources**

Sonia Martinez, Berta Torres

#### **Landfill Operations**

Oscar Bernardos, Scott Curry, Randy Evanger, Chauncey Hendley, Jonathan Houck, Victor Perez

#### Landfill Gas to Energy Facility

Gilberto Najera

#### **Last Chance Mercantile**

Amalia Beasley, Glen Evett, Yasher Garcia, Jessie Gonzales, Christina Harris, Nancy Novoa, Gigi Ortiz, Jeremy Price, Sandra Rubio, David Sawyer, David Solorio, Jeffrey Spence, Holly Yanez, Beatriz Zepeda

#### **Materials Recovery Facility**

Sergio Almanza, Clemente Alvarez, Javier Ayala, Fernando Becerrill, Maria Becerrill, Luis Cazares, Marco Corona, Dora Crescencio, Saulo Delgado, Antonio Diaz, Marino Dominguez, Armando Escareno, Jose Luis Felix, Andres Fernandez, Hortencia Fernandez, Jeaneva Fresquez, Kenneth Harder, Timothy Heinle, Froylan Hernandez, Israel Hernandez, Genaro Jaurrieta, Veronica Lepe, Daniel Lopez, Efrain Lopez, Leonardo Martinez, Sr., Leonardo Martinez, Jr., Sergio Morales, Delfino Nunez, Steven Padilla, Jose Reynoso, Ana Rivera, Eric Sanico, Maria Tavares, Francisco Ponce Torres, Baldo Trujillo, Eva Vasquez, Clementina Ventura, Clyde Walkup, Raul Zamudio

#### MRF Maintenance

Michael Alliman, Heriberto Carrasco, Eugenio Ortiz, David Reyes, David Wanzong

#### Public Education & Community Programs

Angela Goebel, Kimberle Herring, Jeff Lindenthal

#### Safety

Kathryn (Kacey) Christie, Leticia Yanez

#### Scales

Jessica Arreola, Sabrina Bailey, Gene Green, Jeannette Pagan, Juan Zepeda

#### **Equipment Maintenance Shop**

Victor Aguillon, Rodney Barber, Israel Mendoza, Ron Mooneyham, Frank Patague, Martin Renteria, George Sayre, Carl Selva, Jose Tavares

#### Site Operations

Kirk Bennett, Melesio Campa, John Easton, Ulysses Fregoso, Jose Luis Marquez, Alejandro Montejano, Beverly Morris, Michael Rivera, Lee Roach, Regina Santa Cruz, Jose Venegas

# People - 2016 Awards & New Hires

#### Jonathan Livingston Seagull Awards

NameReceivedBaldo TrujilloMay 2016Antonio DiazMay 2016Eric SanicoJune 2016Sten StrandbergJune 2016

#### 2016 Charlie Benson Awards

NameReceivedBaldo TrujilloAugust 2016Antonio DiazAugust 2016

#### 2016 Longevity Awards

3 year Lee R. Roach, Steven Padilla

5 year David Solorio, Kirk Bennett, Ida Gonzales

10 year Scott Curry, Melesio Campa, Jose Luis Felix, Eva Vasquez,

Jeff Lindenthal, Regina Santa Cruz, Sergio Almanza,

Dora Crescencio, David Sawyer, Sonia Martinez, Delfino Nunez,

Jose Tavares, Kimberle Herring, Josh Rivera, Holly Yanez,

Ron Mooneyham

15 year Armando Escareno, Frank Patague, Rosemary Perez, Nancy Novoa,

Jonathan Houck

Gigi Ortiz

Sandra Rubio

25 year Eric Sanico, Jeannette Pagan

New Hires	Date Of Hire	Position
Ana Rivera	January 4, 2016	MRF Laborer I
Yasher (Jerry) Garcia	January 16, 2016	Sales Clerk I
Oscar Bernardos	March 14, 2016	Heavy Equipment Operator
Ulysses Fregoso	March 10, 2016	Site Crew Laborer I
Maria Tavares	April 4, 2016	MRF Laborer I
Peter Skinner	July 1, 2016	Director of Administration
		& Finance
Michael Rivera	August 3, 2016	Site Operations &
		Facilities Manager
Kacey Christie	September 1, 2016	Safety & Risk Manager

September 1, 2016

September 1, 2016

2016 Promotions	Date Promoted	Promoted To
Jeremy Price	January 1, 2016	Associate Operator
John Easton	September 1, 2016	Site Maintenance Supervisor
Alex Montejano	October 1, 2016	Sr. Site Maintenance Worker
Victor Aguillon	November 16, 2016	<b>Equipment Shop Supervisor</b>



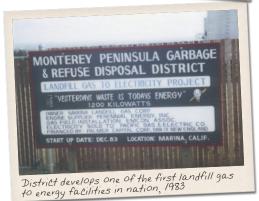






Sales Clerk I Sales Clerk I

# Early 1980's landfill gas collection system







# Landfill Gas Renewable Energy

#### Landfill Gas Renewable Energy Project

In 1983, long before the benefits of renewable energy and the negative effects of greenhouse gas emissions were realized, the District developed one of the first landfill gas-to-electricity energy plants in the nation. Methane and carbon dioxide gases are byproducts of the anaerobic decomposition of organic waste in the landfill. The District's landfill gas collection system of horizontal and vertical wells now extract more than 610 million cubic feet of gas per year (about 50% methane and 50% carbon dioxide) from refuse buried since the Monterey Peninsula Landfill opened in 1966.

The system that collects the landfill gas covers an area slightly under 85 acres. Currently, there are a total of 29 vertical wells and 23 horizontal collectors providing landfill gas to four engine generators. The average depth of the vertical wells is 100 feet and the average length of the horizontal collectors is 525 feet. The gas field is monitored weekly for dynamic changes due to seasonal and weather impacts. One design change that has been implemented is the use of chipped tires instead of drain rock along the horizontal collectors. This is done in part to demonstrate the District's ongoing commitment to find a beneficial reuse for materials, in this case, tires.

Today, the Landfill Gas Renewable Energy Project's four engine generators provide approximately 5 megawatts of electricity, meeting all of the District's own power needs and supplying enough surplus electricity to power about 4,000 homes. State and federal authorities classify the electricity generated by the project as renewable or "green" energy.

# **Powering the Community**

Over 9,000 tons of methane are captured in the landfill every year, which is equivalent to removing 33,760 vehicles from the road. The District converts this methane into energy to meet its power needs and provide enough surplus to power 4,000 homes.



# Organics to Energy AD Project

# **Anaerobic Digestion - Converting Organics** to Energy

The first dry fermentation anaerobic digester (AD) in California, and only the second in the US, became operational at the District in March 2013. The 5,000 ton per year pilot demonstration project, operating in partnership with Zero Waste Energy, is effectively processing a blend of commercially generated food scraps and mulch from yard waste to produce renewable energy and compost.

California law AB1826 is phasing in a ban on the landfill disposal of organics from commercial sources between now and 2020. For restaurants that subscribe to food scrap organics collection service, the anaerobic digestion program provides full compliance with the law.

The AD system processes 65-ton batches of food scraps, received from restaurants in Monterey and Santa Cruz Counties, mixed with mulch to provide carbon and porosity. During the 21-day anaerobic digestion process, methane gas is released and used as fuel in an engine generator to produce 100 kW of electricity an hour. This renewable energy is sold to the neighboring Monterey Regional Water Pollution Control Agency and supplements the solar and biogas energy they produce.

The "digestate" (organic mass) that is removed from the digester is then composted for 90-120 days to complete the decomposition process. The resulting compost is screened to remove contaminants or large wood pieces. The finished compost is then sold to orchards and vineyards.

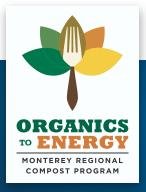
The success of the AD project is helping staff plan for the future of organics management at the District. Keeping organics out of the landfill with anaerobic digestion allows the energy value of the food scraps to be rapidly captured in an enclosed system and reduces greenhouse gas emissions.











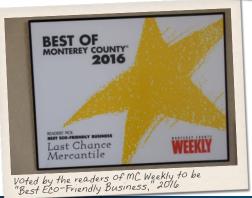
# **Local Restaurants Getting Greener**

The Greater Peninsula hospitality industry has been instrumental in expanding food scrap compost efforts. The next time you dine out ask if the restaurant is participating in the program. You can also look for the Organics to Energy logo on menus and websites and be sure to thank participating restaurants for diverting their organics to energy and compost!

# First Last Chance Store Opens in 1991, holding once per week sales







# Last Chance Mercantile

The Last Chance Mercantile (LCM) took root in 1991 by re-purposing an old building once used by a flower grower. Staff considered calling the program the Second Chance Mercantile but ultimately chose the Last Chance because anything that didn't sell was destined for the landfill. The Last Chance Mercantile name stuck and the first sales event was an auction held in 1991. This was followed by monthly flea markets which evolved into a part-time store, and eventually the five-day-per-week operation it is today.

Now 25 years later, the LCM has grown to include a staff of 12 that host a busy resale store with an eclectic and ever changing inventory, a convenient reusable goods drop-off area, a beverage container redemption center, electronic waste drop-off, and a bag-your-own landscape product area. In 2016, reuse was elevated to an art form with the establishment of the Artist in Residence program in partnership with the Visual & Public Art Department at CSUMB.

Reusable good donations are always welcome at the LCM. Local residents that wish to donate items but don't have the ability to deliver them to the store now have the option of contacting their hauler to utilize the Bulky Item Collection Program that is now available throughout the Monterey Peninsula and Monterey County areas. Contact your recycling and solid waste service collection provider for more information on a curbside pick-up.

Today, a trip out to the District isn't complete without a stop at the LCM. Over the years, the store has earned a reputation in the solid waste industry for its innovative approach to reuse while locally it is legendary as the place where one person's trash becomes another's treasure.

# **Another Person's Treasure**

About 700 tons of household items and furniture were salvaged from the Materials Recovery Facility in 2015 and sold in the store for reuse, equivalent to the loads of about 70 garbage trucks.



# Materials Recovery Facility

The Materials Recovery Facility (MRF) opened in April 1996 in response to state law AB939, which required cities and counties to reduce their waste 50% by the year 2000. The \$9.6 million facility was designed to process construction and demolition debris, as well as to complement the recycling collected from homes and businesses. Over the last 20 years, the MRF has diverted more than 1.6 million tons of recyclable and reusable materials from landfill disposal.

The MRF diverts 50% of the incoming mixed waste through reuse and recycling. Unlike residential and commercial recycling programs that collect source separated materials only, the MRF annually processes more than 100,000 tons of mixed waste that arrives in debris boxes, dumpsters, pick-up trucks, and trailers. The MRF also receives source separated green waste and wood scraps, which are the raw materials for making compost and wood chips.

To keep up with new regulatory mandates and to continue to ensure compliance for member agencies, work will commence in 2017 on an \$18 million MRF Improvement Project. Construction of the facility will begin in February with completion by October 2017.

MRF improvements will help ensure that the District member agencies achieve the state's 75 percent diversion goal by 2020 and the ban on landfill disposal of commercial food scraps. The facility will also support local construction industry compliance with the 65% recycling requirement defined in the CalGreen building code that is effective January 1, 2017.











# **Diverting Resources from the Landfill**

District employees recovered 3,211 tons of scrap metal last year, enough to cast the Statue of Liberty 13 times.

# District opens one of the state's first household hazardous waste facilities, 1987







# Household Hazardous Waste

The District's household toxics collection program began in 1985 with waste screening to remove and properly manage hazardous waste found in mixed refuse. In 1986, the District began hosting periodic mobile collection events that were among the first to be held in California. In 1987, the District established the first permanent Household Hazardous Waste (HHW) facility in Monterey County to collect and manage hazardous materials.

The current HHW collection facility opened in 1996. Over the last 20 years, the program has seen continued growth in customer turn-ins and material tonnage collection, from 89,250 lbs of hazardous material turn-ins in 1991 to the 11,000 local residents that dropped off 530,000 lbs in fiscal year 2015-16.

Many of the materials turned in to the HHW collection program are still in good, usable condition. In 1991, the District created a hazardous material "drop and swap" reuse program at the Last Chance Mercantile which has been instrumental in keeping HHW processing and disposal costs low. Reusable items with hazardous ingredients available for free include: household cleaners, automotive products, latex and oil-based paints, stains, paint thinners and strippers. Instead of shipping them to a costly hazardous waste treatment or disposal facility, the usable products get a last chance for reuse.

Today, 64% of the materials turned in to the HHW collection program are either reused by customers, saving the expense of buying new products, or shipped to a recycler. In 2013, the District resumed offering an annual mobile collection event so residents that don't want to make the trip to the Marina facility can participate in the one-day collection event held at Monterey Peninsula College each June.

### Paint Us Resourceful

The District collected about 14,500 gallons of paint last year, enough to paint the White House exterior 48 times.



# Diversion

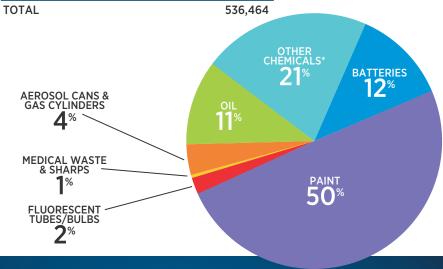
# Member Agency Diversion & Disposal Summary for FY 15-16

Jurisdiction	Carmel	Del Rey Oaks	Marina	Monterey County	Monterey	Pacific Grove	Pebble Beach	Sand City	Seaside	Combined
Tons Received at MRWMD	10,521	1,922	25,788	110,848	49,692	17,851	19,379	3,555	32,038	271,593
Tons Recycled at MRW	MD .									
Asphalt / Concrete	1,341	62	2,166	7,928	6,628	1,275	3,691	75	2,254	25,420
Greenwaste	2,026	253	2,616	15,798	4,190	3,438	4,907	147	3,425	36,801
MRF Diversion	1,498	208	3,832	15,858	4,827	2,315	2,623	475	3,323	34,960
Food Waste	74			9	581	176	307	46	110	1,303
<b>Total Tons Recycled</b>	4,939	522	8,615	39,594	16,226	7,205	11,528	744	9,112	98,485
at MRWMD	47%	27%	33%	36%	33%	40%	59%	21%	28%	36%
Recycling Tons Collect	ed by Hau	ılers								
Single-stream Recycling	g 1,884	318	2,257	7,599	7,127	2,450	1,563	426	3,431	27,056
<b>Total Tons Generated</b>	12,405	2,240	28,045	118,447	56,819	20,300	20,942	3,981	35,469	298,649
Total Tons Recycled	6,823	840	10,872	47,193	23,353	9,655	13,091	1,170	12,544	125,541
% Recycled	55%	38%	39%	40%	41%	48%	63%	29%	35%	42%
Tons Landfilled	5,582	1,400	17,173	71,254	33,466	10,646	7,851	2,811	22,926	173,108
% Landfilled	45%	62%	61%	60%	59%	52%	37%	71%	65%	58%

# FY 2015/16 HHW Pounds of Materials Collected:

BATTERIES	64,116
FLUORESCENT TUBES/BULBS	12,072
MEDICAL WASTE & SHARPS	1,377
PAINT	268,565
AEROSOL CANS & GAS CYLINDERS	21,176
OIL	57,000
OTHER CHEMICALS*	112,158

\*Other chemicals include acids, antifreeze, bases, flammables, mercury, oxidizers, PCB's, and poisons.







# **Turning Yard Waste into Compost**

Based on Q1 2016 data, the average single-family home on the Monterey Peninsula is placing 20 pounds of yard waste in their organics cart every week, which is used to produce a compost used on organic agriculture.



# The first Peninsula Earth Day Celebration, Toro Park, 1972







El Puro, the Eco Super Hero, inspires students to be environmental stewards

# 2016 Public Education and

From participating in the first Earth Day event at Toro Park in 1990, to supporting "zero waste" at special events throughout the Monterey Peninsula today, Turning Waste into Resources is the central theme of the District's outreach and education program. Over the past year, several new initiatives have launched to broaden partnerships with other agencies to promote environmental stewardship.

The new Artist in Residence program, a collaborative partnership with CSUMB's Visual & Public Arts Department, is the first in the California State University system. The program's goal is to educate the public on the importance of repurposing and reusing discarded materials while stimulating conversation on environmental issues. The three selected student artists salvaged materials from District facilities and created paintings incorporating found materials, a Cypress tree made from scrap wood, and a multi-media installation. Their work was viewed by approximately 1,450 people during a week-long exhibit at the Last Chance Mercantile. A new crew of student artists will take up residency in January 2017.

The District's new school assembly program introduced a unique bilingual super hero, El Puro, El Luchador de Consecuencias. El Puro's message is "how even a little litter has large consequences to our communities, marine life, and Monterey Bay." The engaging assembly

"As a Visual and Public Art student, I am thrilled at the idea of being able to create art out of 'trash' and show the community that some of the things that they discard have far more artistic potential than they may have thought. This can bring light to the problem of excessive waste in the United States and the rest of the world."

- Ben Ward - CSUMB Student, 2016 Artist in Residence

# **Outreach Program**

meets core education standards, reviews the importance of the 3Rs, and connects students to their impact on the environment and marine ecology. The District partnered with Waste Management, Save the Whales, and the Stormwater Education Alliance to bring this assembly to over 2,000 students and educators in the District's service area.

# 2016 MRWMD Public Education / Outreach Activities

(Reflects October '15 - September '16)

51	Tours (School & Public)	1,137 Visitors
41	Student Presentations & Events	4,133 Attendees
	Student Eco-Literacy Newspapers Published (The Recycle Wrap)	6,300 Distributed
6	Compost & Greener Gardening Workshops	128 Attendees
20	Presentations & Event Attendees	2,067 Public Reached
	·	

25 Community Events Received Zero Waste Support\*

Obon Festival. West End Celebration

\*AT&T Golf Tournament, Agility on the Greens, Annual Winemakers Celebration, All Saints Fall Fest, Big Sur Marathon, Del Rey Oaks BBQ, Celebrating Military Children, Concourse de Elegance, Concorso Italiano, CUSD Staff Breakfast, CV Fiesta Kiwanis, CV Ranch Round Up, Del Monte Kennel Club Dog Show, Dog Agility Course, Ferrari Gathering and Fundraiser, Jazz Festival, Jewish Food Festival, Marina Earth Day, Marina Labor Day, Mazda Raceway Events, National Night Out, Washington Union School Fall Carnival, Monterey County Vintners & Growers Winemakers Celebration,









# **Turning Students into Stewards**

As a participant in the Organics to Energy program, Carmel Middle School collects and sends almost 1,200 pounds of food scraps and compostable service-ware to the District's Anaerobic Digestion facility every month.

# California Resource Recovery Association Pavitra Crimmel Reuse Award Last Chance Mercantile Reuse Program 2007 ICM Awarded the "Pavitra Crimmel Reuse Award" by CRRA, 2007







# **District Awards**

#### Year Award

- **"Steel Building of the Year"** from the Systems Builders Association for the new Materials Recovery Facility (MRF)
- 1998 "Best Solid Waste System in North America" by the Solid Waste Association of North America, "Best Place to Go Panning for Gold" from Monterey County Weekly Readers Poll for Last Chance Mercantile
- 1999 "Innovation in Government" from California Resource Recovery
  Association Award, "Trash Cutter Award" from the California
  Integrated Waste Management Board for best regional waste reduction
  program
- **2000** "Outstanding Public Agency of the Gold Rush Chapter Year" by the Solid Waste Association of North America
- **2003** "Landfill Methane Outreach Program Community Partner" Certificate from the U.S. Environmental Protection Agency
- 2007 "Pavitra Crimmel Reuse Award" by the California Resource Recovery
  Association, Adopt-A-Highway, "Volunteer of the Year" from Monterey
  County CalTrans, "Gold Excellence Award, Landfill Gas Utilization"
  from the Solid Waste Association of North America
- 2008 "Best Environmental Business" by the Monterey County Weekly Readers Poll, "Bronze Excellence Award, Household Hazardous" from the Waste Program Solid Waste Association of North America
- 2010 "Public/Private Economic Development Partnership Award -Green Award" from the Monterey County Business Council for partnership with Keith Day Company, Inc. for Food Scrap Compost Pilot Program, "Public/Private Economic Development Partnership Award -"Green Award" from the Monterey County Business Council for partnership with Don Chapin Company for Sand Plant and Recycling Facility
- "Clean Air Award, Technology Category" from Breathe California Central Coast to recognize the SmartFerm Anaerobic Digestion compost pilot and its ability to reduce organics from the landfill and reduce fugitive landfill emissions, "Dave Hardy Leadership in Organics Award" from the California Resource Recovery Association for the development and successful operation of the SmartFerm Anaerobic Digestion composting system, "Gold Excellence Award in Composting" from the Solid Waste Association of North America for the SmartFerm Anaerobic Digestion project, the first of its kind to be operational in California, "Innovative Program of the Year Award for a Large District" from the Solid Waste Association of North America, California Gold Rush Chapter for outstanding service and dedication to the solid waste industry
- **2015** "Best Eco-Friendly Business" for Last Chance Mercantile by Monterey County Weekly's Readers Poll
- 2016 "Best Eco-Friendly Business" for Last Chance Mercantile by Monterey County Weekly's Readers Poll, "Zero Waste Achievement Award" from the California Resource Recovery Association, Monterey County Fair Blue Ribbon for Garden Exhibit showing sustainable strategies like composting and sheet mulching

# Corporation Yard for Collection Company

#### **Collection Services Truck Yard Construction Project**

Construction was completed in 2016 for the Truck Yard Project, which is the new base of operations for GreenWaste Recovery (GWR) as they provide collection services to the Monterey Peninsula. Occupying an 11.6 acre site, the project includes an administration building, a vehicle maintenance building, truck wash facility, and truck fleet parking.

The \$12.5 million Truck Yard facility is projected to earn LEED Silver certification. Supporting the District's mission of "Turning Waste into Resources," 90% of the construction waste was diverted from landfill disposal and the building materials incorporated recycled content.



The District contracted with Trillium CNG<sup>™</sup> to build, own, and operate the compressed natural gas (CNG) fueling station to power GWR's CNG collection trucks. At the end of a 15-year term, Trillium CNG<sup>™</sup> will transfer ownership of the CNG fueling system to the District. The station includes time-fills (typically overnight) for up to 50 trucks, and fast-fills for two trucks at a time. The station has the flexibility to be expanded to fuel 100 trucks in the future if needed.

CNG is a cleaner fuel source than diesel and produces 22% less greenhouse gases. The station is initially using natural gas from PG&E to produce CNG. Later, the station will transition to use biogas produced onsite from the Monterey Peninsula Landfill or the SmartFerm Anaerobic Digester. The transition to biogas fuel is a part of the long-term strategy supporting the "Turning Waste into Resources" mission.













# **Driving Clean & Green**

Using CNG fuel, garbage and recycling trucks emit nearly eighty-percent (80%) fewer carbon monoxide emissions and offer greater fuel efficiencies than traditional diesel powered engines.

# **Financial Information**

#### Income

Source of Funds	FY 2013-14	FY 2014-15	FY 2015-16	Budgeted FY 2016-17
Disposal Fees	\$17,161,000	\$18,463,000	\$21,302,000	\$17,960,000
Material Sales	\$2,059,000	\$1,963,000	\$1,749,000	\$1,700,000
Landfill Gas Power	\$2,505,000	\$1,584,000	\$815,000	\$1,200,000
Other Revenue <sup>A</sup>	\$323,000	\$382,000	\$917,000	\$1,080,000
Total Income	\$22,048,000	\$22,392,000	\$24,783,000	\$21,940,000

A Income from investment earnings, rents/leases, operational services, CNG fuel sales, HHW fees, and finance charges.

# **Expenditures**

Use of Funds	FY 2013-14	FY 2014-15	FY 2015-16	Budgeted FY 2016-17
Operating Expenses <sup>B</sup>	\$16,290,000	\$16,845,000	\$18,142,000	\$18,258,000
Acquisition of Fixed Assets (not funded with Bond Proceeds)	\$2,293,000	\$9,470,000	\$2,206,000	\$4,175,000°
Debt Reduction (Principal)/Cost of Bond Issuance	\$228,000	\$449,000	\$895,000	\$1,080,000
Total Expenditures	\$18,811,000	\$26,764,000	\$21,243,000	\$23,513,000

B Non-cash expenses such as amortization/depreciation and closure/post closure expenses are not included.

improvements, as noted in Footnote C above, and to stabilize fees.

D The 1998 Revenue Bonds were paid off during FY 2012 2013 and in FY 2014 2015 Revenue Bonds (\$31.1 million) were issued.

Cash Reserve	June 30, 2016
Total Cash and Cash Equivalents Restricted Cash and Cash Equivalents	\$21,115,000
Environmental Impairment Fund	\$(1,000,000)
·	
Landfill Closure and Post Closure Care Costs	\$(1,359,000)
Bond Reserve Fund	\$(2,350,000)
	\$(4,709,000)
Total Cash and Cash Equivalents available for operations and capital projects	\$16,406,000
Bond Proceeds Designated for funding Community Infrastructure Improvements	\$(6,251,000)
Total Unrestricted Cash and Cash Equivalents	\$10,155,000
Unrestricted cash reserves are maintained to pre-fund routine capital	

<sup>&</sup>lt;sup>C</sup> The Acquisition of Fixed Assets contains the design and construction of the Power Distribution to the Material Recovery Facility (\$0.8 million)replacement of a 836G Compactor (\$1.2 million), domestic waster and waste system upgrades (\$0.5 million), capital equipment repairs (\$0.5 million) and Walking Floor Trailers and Semi Trucks (\$0.5 million).

# **Board Highlights**

# **Board of Directors**

Our nine-member Board includes a representative from each of the municipalities within the District boundaries, one to represent unincorporated Monterey County within the District, and a "director-at-large" representing the Pebble Beach Community Services District. Board Members are appointed for four-year terms.



Dennis Allion, Chair (since July 2013) Del Rey Oaks Appointed February 2011



lan Oglesby, Vice Chair (since July 2014) Seaside Appointed January 2009



Gary Bales Pacific Grove Appointed April 1969



David Pendergrass Sand City Appointed July 1999



Leo Laska, Pebble Beach Appointed January 2004



Libby Downey Monterey Appointed January 2007



Jane Parker Monterey County Appointed January 2009



Bruce Delgado Marina Appointed February 2009



Carrie Theis Carmel-by-the-Sea Appointed January 2015



Rob Wellington Legal Counsel Appointed August 1973

At the Artist in Residence opening in May, it was inspiring to see the creative energy the students applied to reusing items that would have gone to the landfill. The District staff applies this same effort in turning waste into resources, while providing sustainable opportunities for the community to reduce, reuse and recycle.

Dennis Allion, Board Chair

# **Board Highlights**



#### November 2015

Approved participation in the California Used Mattress Recycling Program to provide free residential mattress recycling and a reduced charge of \$5 each for commercial deliveries.

### December 2015

Presented Carmel Unified School District with a resolution of appreciation for their environmental stewardship and becoming first in the nation to become a NOAA Ocean Guardian School District.

FY 2013/14 annual audit was reviewed and accepted with a "clean" opinion and no audit adjustments.

# January 2016

Received Organics to Energy anaerobic digestion update, including SmartFerm Demonstration Project, in operation since 2013, which processes more than 5,000 tons of organic waste per year and produces approximately 50,000 kilowatts per hour of electricity per month, and is used for the Monterey Regional Water Pollution Control Agency.

### February 2016

Director Leo Laska was reappointed to the Board of Directors as a member-at-large representing the Pebble Beach Community Services District (PBCSD). PBCSD has been a member-at-large since January 1996.

A new organization structure was approved, which established a Leadership Team to include the General Manager, a Director of Finance & Administration, a Director of Operations, a Director of Engineering & Compliance, and a Director of Communications & Sustainability, all responsible for business strategy and program management.

#### March 2016

Received a presentation on Community Choice Aggregation that would create local oversight for energy purchasing and pricing, and allows the community to determine what type of energy mix best serves their needs. Information is available at www.montereybaycca.org.

Approved an RFQ/RFP for the construction and site work required for the installation of the new equipment for the Materials Recovery Facility Improvement Project.

### April 2016

Received a report on the performance of the new franchise collection contracts with GreenWaste Recovery and the July 2016 rate adjustment process.

A Power Purchase Agreement for sale of landfill gasgenerated renewable power to the Monterey Regional Water Pollution Control Agency is approved for use in the operation of their new Groundwater Replenishment Project.

# **Board Highlights**

#### April 2016

Approved a contract for the District to provide contract management services to member agencies who have franchise agreements with GreenWaste Recovery to include analysis of: quarterly reports, franchise fee payments, and annual rate adjustment application. Each participating agency will reimburse the District for their share of the annual cost.

#### May 2016

Approved a response to Salinas Valley Recycles (SVR) who requested information to assist with their Long Term Needs Environmental Impact Study. The Board suggested that an Adhoc Committee of both boards meet for further discussion to include the Countywide Integrated Solid Waste Management Study.

#### June 2016

Amended salary schedules for employee bargaining units was approved. Operating Engineers receive a 3% cost of living adjustment and the management unit will receive a 2.7% adjustment, effective 7/1/16.

AB1817 was signed by the Governor on 6/10/16.
AB1817 amended Section 49123 of the PRC, established in 1951, to allow payment to Board members of \$100 per day up to a maximum of six days per month for meetings of the Board to align with other local and State governmental agencies and will become effective 1/1/17.

### **July 2016**

Presented a resolution of appreciation to former employee James Bogan commending him for his outstanding service to the Veteran's Association and to all veterans in the local community. Final budget for Fiscal Year 2016/17 approved which shows an operating loss of \$128,000 and a net loss of \$1,063,000; projects \$21,610,000 in revenues (with no increase to the landfill tipping fee), operating expenses of \$21,738,000, and non-operating expenses of \$935,000. Capital outlay is projected at \$7,575,000.

The Board approved a sewer connection agreement with the Monterey Regional Water Pollution Control Agency that will serve the new Truck Yard and District facilities.

The one day Household Hazardous Waste (HHW) Event at Monterey Peninsula College in June attracted 552 turn-ins and 49,940 pounds of HHW. Funds are budgeted to hold another one day HHW event in 2017.

### September 2016

Approved a Right of Entry Agreement with GreenWaste Recovery pending finalization of lease for Truck Yard and Administration Facility.

Authorized \$1,150,153 purchase of Caterpillar 836K compactor for landfill operations.



# **Hours of Operation**

Landfill Disposal Site Monday - Friday, 7:00 a.m. - 4:00 p.m. Saturday, 8:00 a.m. - 4:00 p.m.

Last Chance Mercantile Tuesday - Saturday, 9:00 a.m. - 4:00 p.m. **Closed Monday** 

**Buy Back Center** Tuesday - Friday, 9:00 a.m. - 4:00 p.m. Saturday, 9:00 a.m. - 3:00 p.m. Closed Monday

Household Hazardous Waste Collection Tuesday - Saturday, 9:00 a.m. - 4:00 p.m. Closed Monday

Administration Building Monday - Friday, 8:00 a.m. - 4:00 p.m.



The District covers a total of 853 square miles. District jurisdictional boundaries include the cities of Carmel-by-the-Sea, Del Rey Oaks, Marina, Monterey, Pacific Grove, Sand City, Seaside, and the unincorporated areas of Big Sur, Carmel Highlands, Carmel Valley, Castroville, Corral De Tierra, Laguna Seca, Moss Landing, Pebble Beach, San Benancio, and Toro Park. The population currently served is approximately 170,000.

# Mission Statement

Our mission is to Turn Waste Into Resources in the most cost effective and environmentally sound manner to benefit the community.









### Monterey Regional Waste Management District

14201 Del Monte Blvd., Marina, CA 93933 831-384-5313 (tel) 831-384-3567 (fax) www.mrwmd.org www.keepmonterevcountyclean.org

Monterey Regional Waste Management District saved the following resources by using 1,200 pounds of Reincarnation Matte, made with 100% recycled fiber and 100% post-consumer waste, processed chlorine free, designated Ancient Forest FriendlyTM and manufactured with electricity that is offset with Green-e® certified renewable energy certificates.: 12 fully grown trees, 5,609 gallons of water, 6 Million BTUs of energy, 376 pounds of solid waste, and 1,035 pounds of greenhouse gases. Calculations based on research by Environmental Defense Fund and other members of the Paper Task Force. www.newleafpaper.com









