



# Illegal Dumping in Contra Costa County<sup>1</sup>

EDUCATE ~ PREVENT ~ CLEAN-UP ~ ENFORCE

Background and Preliminary Recommendations

September 2018



# Illegal Dumping “Think Tank” County Interdepartmental Team

## TEAM MEMBERS

### **Environmental Health**

Kristian Lucas, Marilyn Underwood

### **District Attorney’s Office**

Stacey Grassini, Mike McLaughlin

### **Sheriff’s Office**

Brian Vanderlind, Paul O'Mary,  
Joseph Buford, John Lowden, Steve  
Borbely

### **Conservation & Development**

John Kopchik, Deidra Dingman,  
Joe Losado, David Brockbank,  
Jo-Anmarie Ricasata

### **Public Works**

Mike Carlson, Joe Yee, Chris Lau,  
Tim Jensen, Michelle Cordis

Interdepartmental team was formed to discuss the problem, share experiences, examine lessons learned from here and elsewhere and development preliminary recommendations on how to improve efforts to reduce illegal dumping.

# What is Illegal Dumping?

Illegal dumping is the act of disposing solid waste at a location that is not a permitted solid waste disposal facility. Illegal dumping poses significant social, environmental, and economic impacts to our county and community.



# Impacts of Illegal Dumping (1 of 4)

## 1. Community Blight – A Downward Spiral



# Impacts of Illegal Dumping (2 of 4)

## 2. Health Risks and Safety Hazards

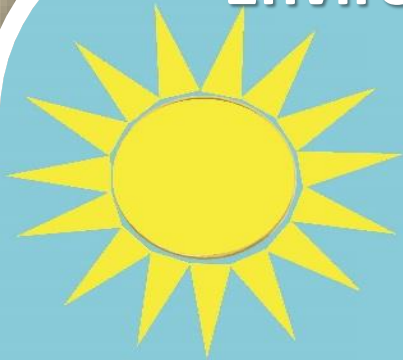
- ▶ **Hazardous Materials**
- ▶ **Pests**
- ▶ **Physical Hazards**
- ▶ **Contamination**



# Impacts of Illegal Dumping (3 of 4)



## Environmental Impacts of Illegal Dumping



Parks and open space fouled by illegal dumping



Illegal dumping causes harm to wildlife and their habitat



Pollutants carried by smoke from dump fires



Waste ends up in streams and in the Bay

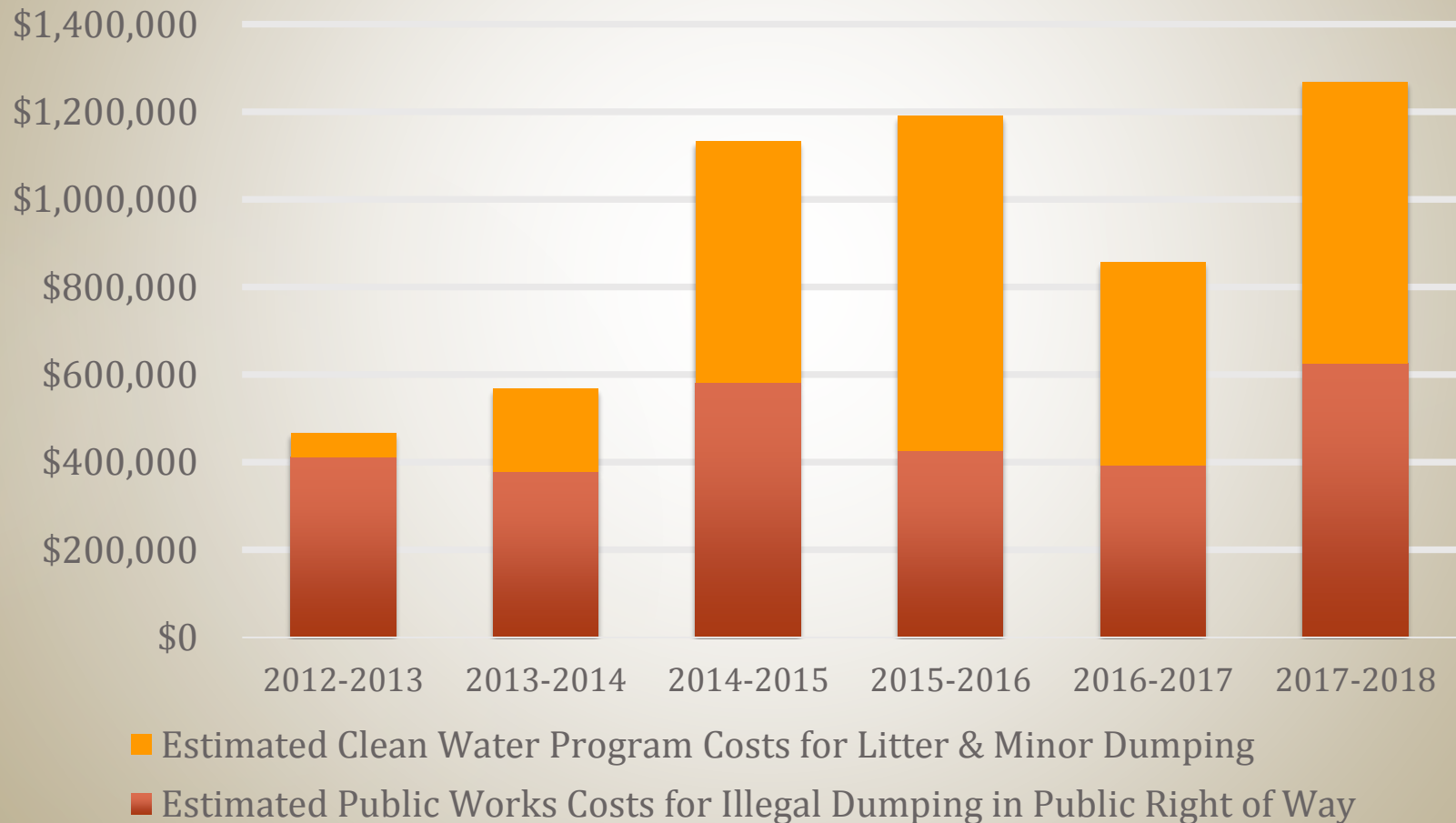


Flooding caused by debris/wastes that clog storm water management systems

# Impacts of Illegal Dumping (4 of 4)

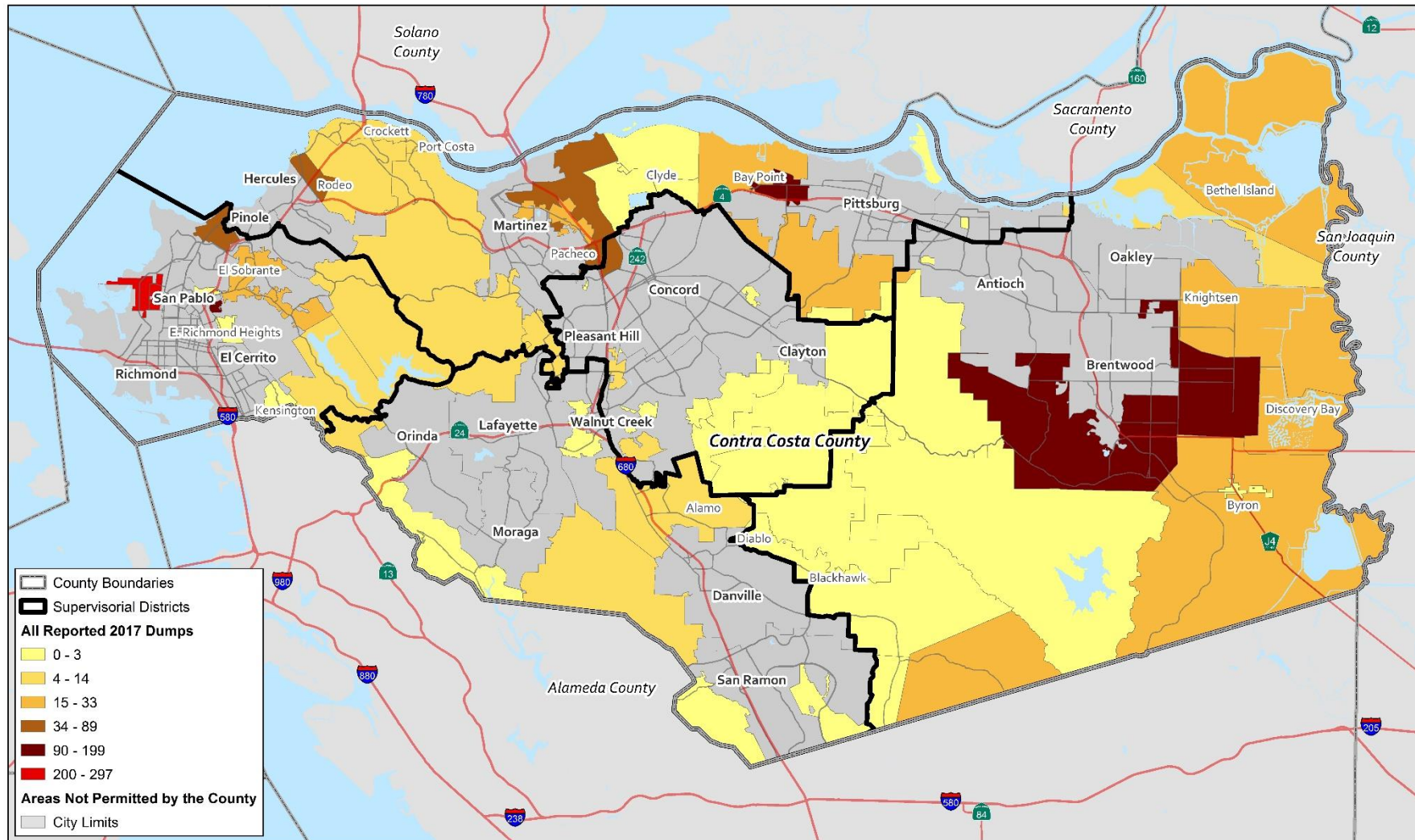


## Clean-up Costs for Dumping in the Right-of-Way\*



\* Does not include funding spent for creek clean-ups or franchise hauler efforts

# Where is this happening? Right-of-Way Dumping Reported in 2017



**County Boundaries**  
**Supervisorial Districts**  
**All Reported 2017 Dumps**  
 0 - 3  
 4 - 14  
 15 - 33  
 34 - 89  
 90 - 199  
 200 - 297  
**Areas Not Permitted by the County**  
 City Limits



\* Population numbers from 2010 Census Data \*

Map Created 10/16/2018  
 by Contra Costa County Department of  
 Conservation and Development, GIS Group  
 30 Muir Road, Martinez, CA 94553  
 97-50-41.701N 122-07-53.756W

This map was created by the Contra Costa County Department of Conservation and  
 Development using data from the Contra Costa County GIS Program. Some  
 location data primarily City Limits. In the event from the CA State Board of Equalization's  
 tax sale areas. While diligent to use this data the County assumes no responsibility for  
 its accuracy. This map contains copyrighted information and may not be altered. It may be  
 reproduced in its current form if the source is cited. Users of this map agree to hold and  
 accept the County of Contra Costa disclaimer of liability for geographic information.





# Who's the culprit?



## RESIDENTS

- ▶ Unpermitted Haulers
- ▶ Local residents, rental move outs and DIY home improvements, (notice to abate), mattress and appliance upgrades

## Top 5 Most Commonly Dumped Items:

1. Household Garbage
2. Furniture
3. Mattresses
4. Appliances
5. E-waste, Vehicles/Boats and Hazardous Wastes



# Who's the culprit?



## BUSINESSES

- ▶ Unpermitted Haulers
- ▶ Illegal Transfer Stations & Scrap Yards
- ▶ Some Automobile and Tire Repair Shops
- ▶ Some Landscapers and Contractors

## Items most commonly dumped

- ▶ Yard Waste
- ▶ Construction Debris
- ▶ Tires





# People Behaving Badly – Video Example

- ▶ CCC Watersheds (Alhambra Creek) – March 2018  
<http://www.kron4.com/features/people-behaving-badly/people-behaving-badly-the-trashing-of-bay-area-watersheds-in-contra-costa-county/1035744704>



# Why is this happening?



**“I didn’t know about free and easy alternatives.”**

Lack of public awareness of proper disposal options available

**Save Money**

Cost Avoidance

**Convenience**

Few or no local alternatives

**“I Hired The Wrong People.”**

Use of Unpermitted haulers (lack of public awareness of the issue,  
Lack of awareness of risk and consequences (impacts caused))

**“I Won’t Get Caught”**

- Low risk of getting penalized.
- If you do get caught then Low fines, minimal penalties
- Still better off paying a few fines, then paying to dispose properly every time.

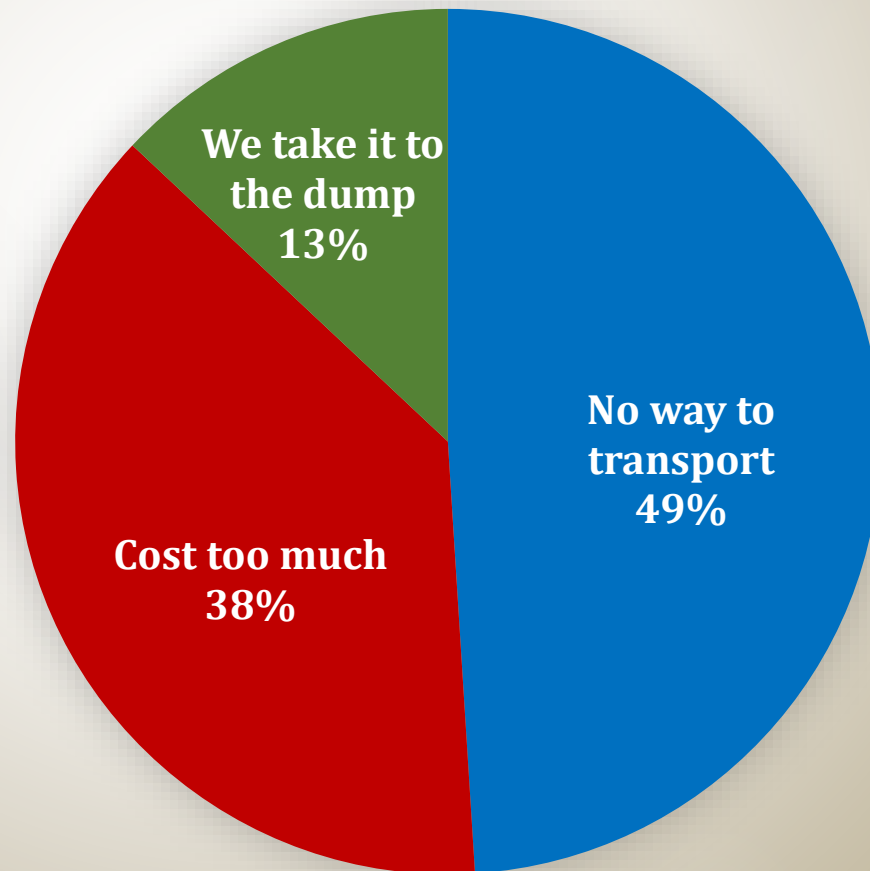
# Why is this happening?



Marin County conducted a public, in-person survey to gather public perception to help tailor outreach for its Illegal Dumping problem.

## Survey Question:

What would most likely prevent you from taking large items like mattresses and furniture to the dump?



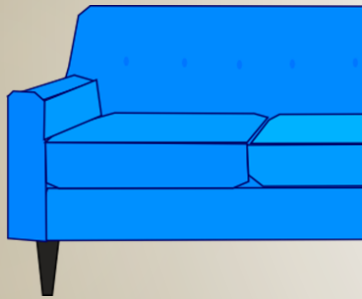
# Cost to Properly Dispose of 1 Cubic Yard



2 Twin Mattresses  
Cost of Disposal:  
\$50-\$68.50



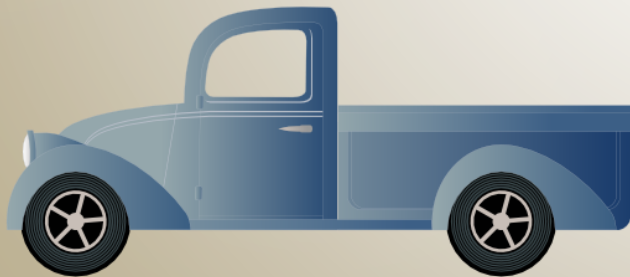
Construction Debris  
Cost of Disposal:  
\$31.10



½ Large Sofa  
Cost of Disposal:  
\$25-\$34.25



Yard Waste  
Cost of Disposal:  
\$29.03



-----Pickup Truck  
Loaded  
1 ft. Deep.  
Cost of Disposal:  
\$25-\$34.25



7 Large Trash Bags  
Cost of Disposal: \$31.77



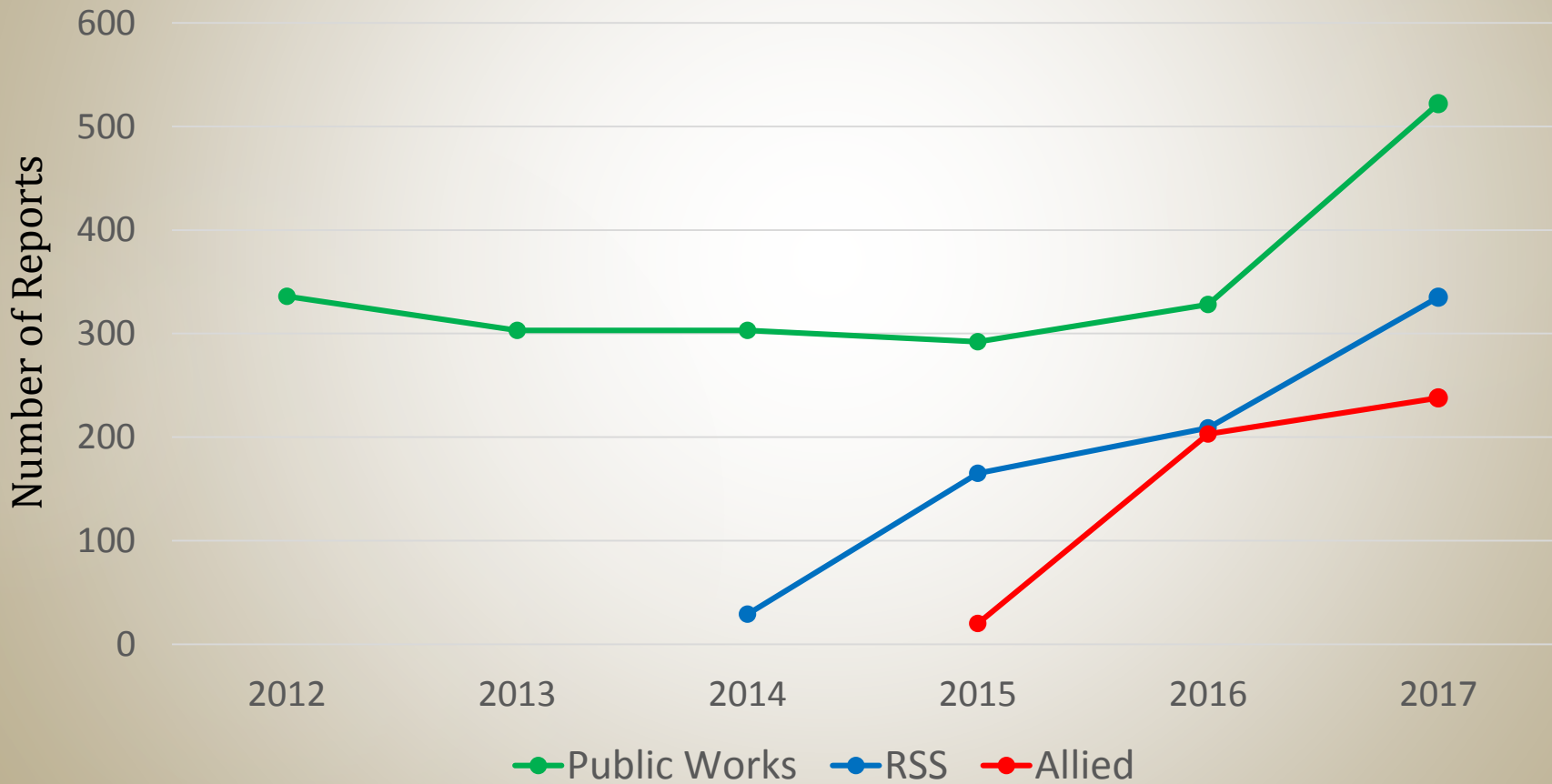
# Cost of Disposal vs. Fines

Item (yd <sup>3</sup> =Cubic Yards)	Average Cost of Proper Disposal	Fine Amount (and subsequent penalties)	Average Public Works Disposal Cost
Less than 1 yd <sup>3</sup> Non-Hazardous	\$31.77 (free pick-up maybe available)	\$250 – 1,000 (1 <sup>st</sup> offense) \$500 – 1,500 (2 <sup>nd</sup> offense) \$750 – 3,000 (3 <sup>rd</sup> offense) (double fines if tires)	Average disposal cost for 1 yd <sup>3</sup> of illegally dumped waste is \$258
1 Mattress	\$25-\$34.25 (free pick-up maybe available)		
<1 yd <sup>3</sup> Yard Waste	\$29.03 (free pick-up maybe available)		
More than 1 yd <sup>3</sup> Trash	\$63.54 (free pick-up maybe available)	\$1,000 – 3,000 (1 <sup>st</sup> offense) \$3,000 – 6,000 (2 <sup>nd</sup> offense) \$6,000 – 10,000 (3 <sup>rd</sup> offense)	
2 yd <sup>3</sup> Construction Debris	\$62.20	Plus Jail Time and/or Community Service if dumping Hazardous Material, or dumping near Waterways	



# Steadily Increasing...

## Reports of Illegal Dumping in the Right-of-Way Submitted for Clean Up

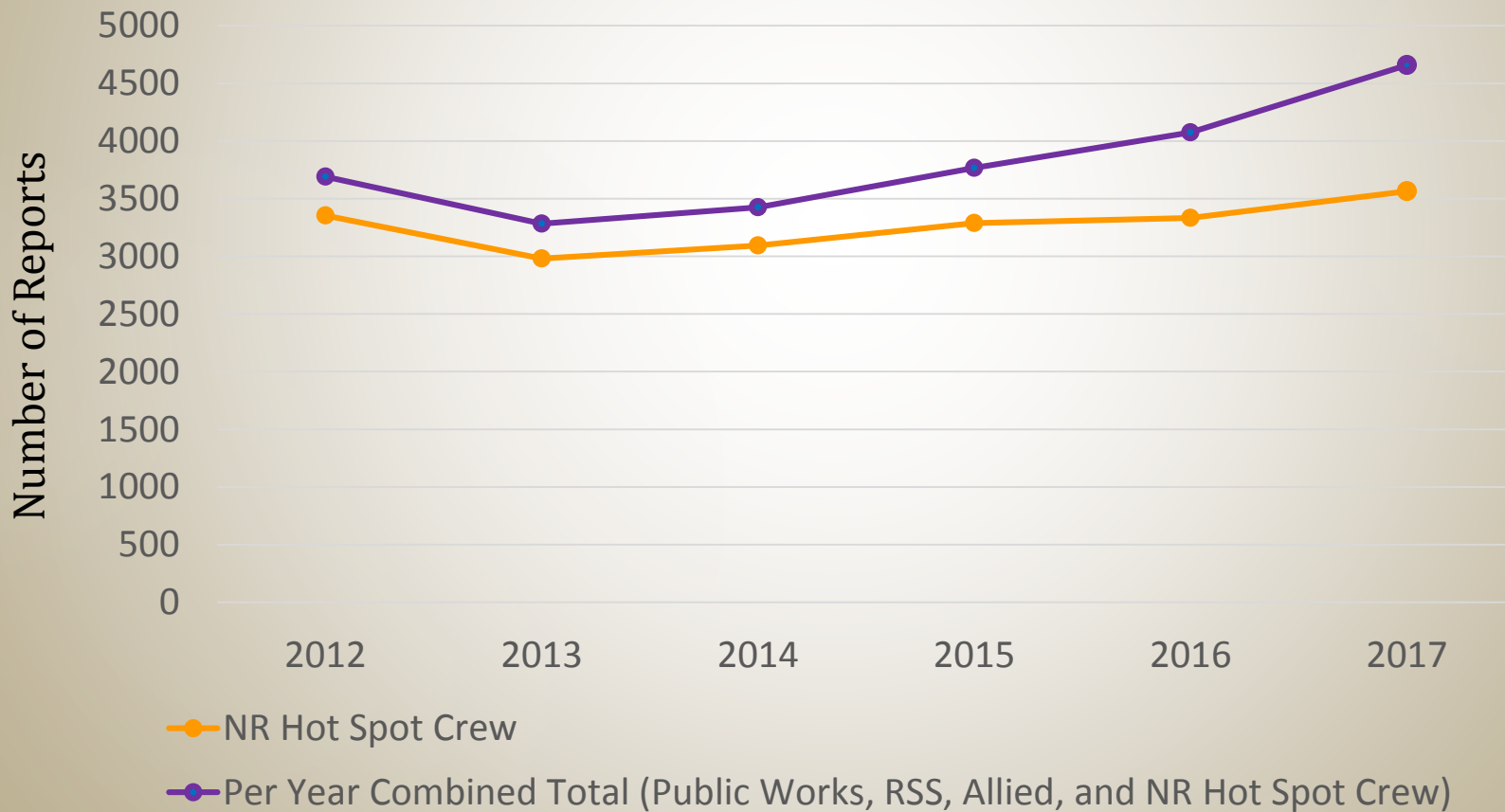






# Steadily Increasing...

## Reported Illegal Dumping Clean-ups in the Right-of-Way



# Sheriff leads effort in Bay Point

- ▶ Illegal dumping is so severe that at times it spills out onto the sidewalks and streets.
- ▶ Rodents take up homestead in abandoned mattresses, box springs, couches, household appliances etc. **Sitting piles cause the infestation spread to local residences.**
- ▶ More importantly, many **Bay Point youths walk to school and must walk around the trash piles or cross the street to avoid harm.**
- ▶ Recognizing the health hazards, the trash piles presents to the residents, and the blight it brings to the community, the **Office of the Sheriff** entered into an agreement with **Republic Services** that allows us to dispose of illegal dumping at the **Martinez Transfer Station** at **no cost.**
- ▶ In less than a year Bay Point Blight Program picked up over **13 tons of trash.**





# Case Study–Alameda County

## Education, Eradication & Enforcement Road Map

- ▶ Convened an Illegal Dumping Working Group to address illegal dumping as a regional problem.
  - ▶ Participants include Alameda County DA's office, Sheriff, Public Works, Environmental Health, City of Oakland, Community Based Organizations, Representatives from Federal and State offices.
- ▶ Coordinated presentations/discussions with City of Vallejo, City of San Jose, California Product Stewardship Council, Mattress Recycling Council
- ▶ Met with members of Bay Area legislative delegation i.e. Asm. Bonta, Asm. Quirk, Senator Skinner and Sen. Wieckowski to work with Alameda County to create a California legislative road map to discuss:
  - ▶ Increase in fines/penalties for dumping illegally,
  - ▶ Identify financial resources to sustain impact programs
  - ▶ Joint press conference w/Mayor of Oakland – announced Adopt an Illegal Dumping Hot Spot Pilot
  - ▶ Invite other regional jurisdictions i.e. Contra Costa to join forces to combat illegal dumping. (illegal dumping knows no boundary campaign)

# Case Study: City of Vallejo

City recently launched a multi-pronged program which is proving to be effective in helping combat illegal dumping. Although still early in its implementation, City has already had 4 successful prosecutions.

- ▶ Comprehensive Public Outreach Campaign including door hangers, website and hot spot letters with messaging about
  - ▶ resources for proper disposal
  - ▶ launch of criminal enforcement program
  - ▶ penalty if prosecuted for illegal dumping
  - ▶ hotline and website/app to reporting dumping
  - ▶ what evidence needed for successful prosecution
  - ▶ tips to protect your property from dumping
- ▶ Strengthened City Ordinance
- ▶ Dedicated Enforcement Personnel
- ▶ High-definition surveillance cameras with 24-hour monitoring service
- ▶ Limiting Access to Hot Spots using Temporary Road Closures





# Case Study: Butte County

## Comprehensive Unlawful Dumping Program

- ▶ Key Program Elements:
  - ▶ Adopted County Ordinance in January 2005.
  - ▶ Hired a **Code Enforcement Officer** was to administer program.
  - ▶ Established program to **seize vehicles** used to dump illegally.
  - ▶ Launched **Illegal Dumping Hotline** too report illegal dumping.
  - ▶ Multi-media **public education campaign**
  - ▶ Developed **GIS database** developed in house to track dumping hot spots
  - ▶ Maintain in-house **case tracking database** to manage and track cases
- ▶ By December 2006, Butte County experienced a huge decrease in “Reported Illegal Dumping Cases with Evidence”

# Case Study: City of San Jose

## Innovative Multilingual Outreach with Dual Messaging – Junk Pickup Program & Reporting Dumping



**It's easy & FREE to get rid of your junk**

CITY OF SAN JOSE  
CAPITAL OF SILICON VALLEY  
Environmental Services

Make appointment • Set out • We'll pick up

[SJenvironment.org/junkpickup](http://SJenvironment.org/junkpickup)

Help keep our neighborhood clean!  
Report illegal dumping: Download  or call 408-535-3500  
City of San José residents only



**Report illegal dumping**

Reporte arrojamientos ilegales  
Báo cáo việc đổ rác bất hợp pháp

**408-535-3500**

**Got evidence?**  
Send photos & videos of dumpers to:  
¿Tiene pruebas? Envíe fotos y videos de los vertedores a:  
Có bằng chứng không? Gửi hình chụp và phim video về những người đổ rác cho:  
[reportdumpers@sanjoseca.gov](mailto:reportdumpers@sanjoseca.gov)

- ▶ “You’ve been selected to receive a **FREE** large item removal!”
- ▶ The City of San Jose spends \$87 each time someone improperly disposes a large item. Do it the right way for **FREE**.

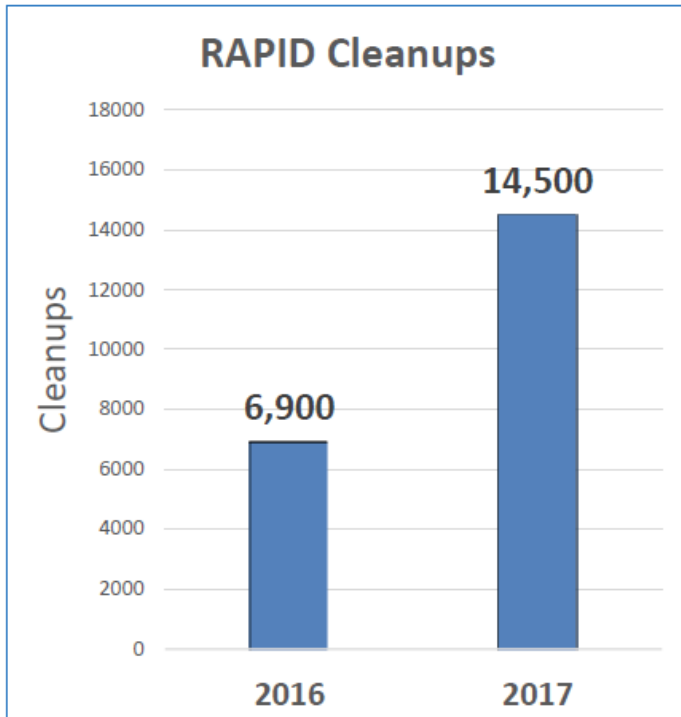


# Case Study: City of San Jose

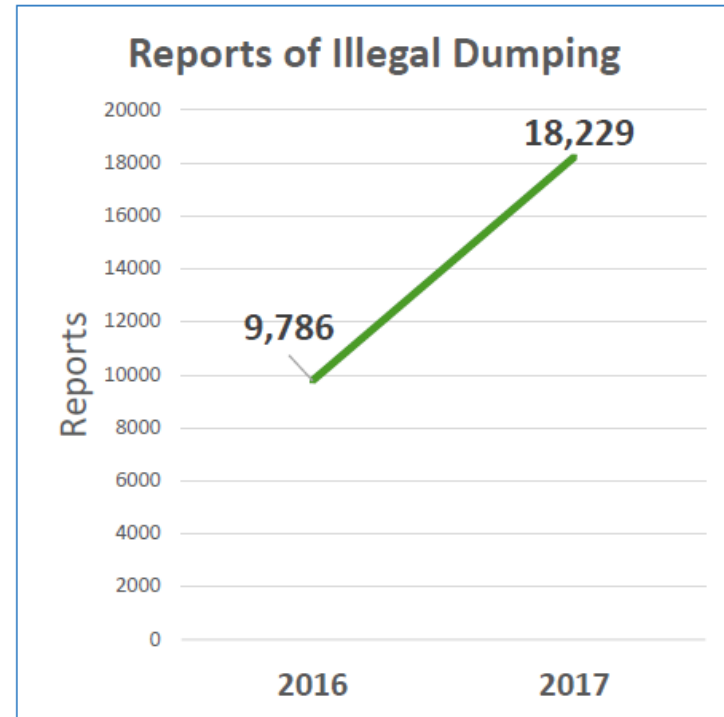
## Junk Pickup Program

Fiscal Year	SFD large item collection	MFD large item collection	Tonnage collected
14-15	\$30/collection	Pilot: free collections	1,464
15-16	Pilot: 1 free collection	Free collections	2,606
16-17	2 free collections	Free collections	4,725
17-18	Unlimited free collections	Free collections	5,200 (estimate)
<b>total</b>			<b>13,995</b>

# How do we measure program success?



210% increase



186% increase

**Example: City of San Jose**



# Key Observations

- 1) Dumping is driven by the perception that it is much cheaper to dump illegally than legally.
  - ▶ Lack of awareness about bulky waste pick-up
  - ▶ Lack of fear about being caught
  - ▶ Lack of fear about cost to be paid if one is caught



# Key Observations

## 2) Broken window theory applies to Illegal Dumping

- ▶ Piles of illegally dumped waste sometimes act as magnets for more dumping
  - ▶ Suggests alternative course of action to would be dumpers rather than proper disposal
  - ▶ Perception that it's a safe place to dump (can get away with it)



# Key Observations

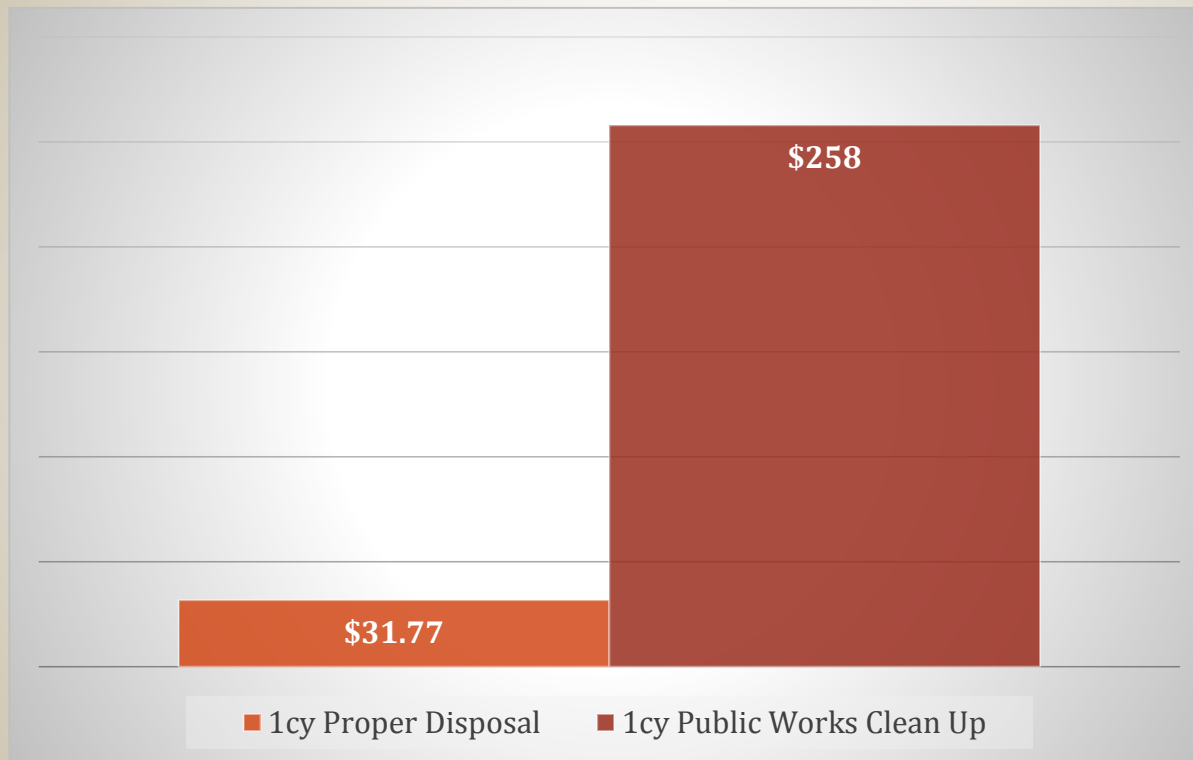
## 3) Enabling theory also applies to illegal dumping

- ▶ Hot Spot Crew patrols North Richmond EVERY WEEKDAY removing illegally dumped waste from roadways, **chronic localized dumping continues with no end in sight.**
  - ▶ More is then dumped overnight, often found in spots that were cleaned up earlier that day
  - ▶ Of the nearly 1,300 addresses found in waste illegally dumped in North Richmond over a five year period, about 84% were local addresses, *meaning close enough to see how quickly dumping gets removed.*
- ▶ **Break the Enabling Cycle** - Clean-up programs need to be complimented by education and enforcement, such as gathering and tracking identifying evidence to counter this perception and enforce consequences.



# Key Observations

## 4) The True Cost of Illegal Dumping



Much more expensive for public to clean-up and dispose of materials *after* they are illegally dumped than it would be if those items were be disposed of through proper channels.

# Key Observations

5) Identifying, charging and prosecuting perpetrators of illegal dumping is complicated and time-consuming and, under current conditions, can sometimes provide a low-return on investment.



- ▶ -Difficult for public to report
- Difficult to positively ID without dedicated investigation
- ▶ -Existing penalties do not provide adequate deterrent



# Key Observations

6) Dumping problem has a tendency to pop-up somewhere else rather than ceasing all together

- ▶ Cameras in one area push dumping to another
- ▶ Problem often resurfaces in cleaned-up areas
- ▶ One agency's success can push the problem elsewhere

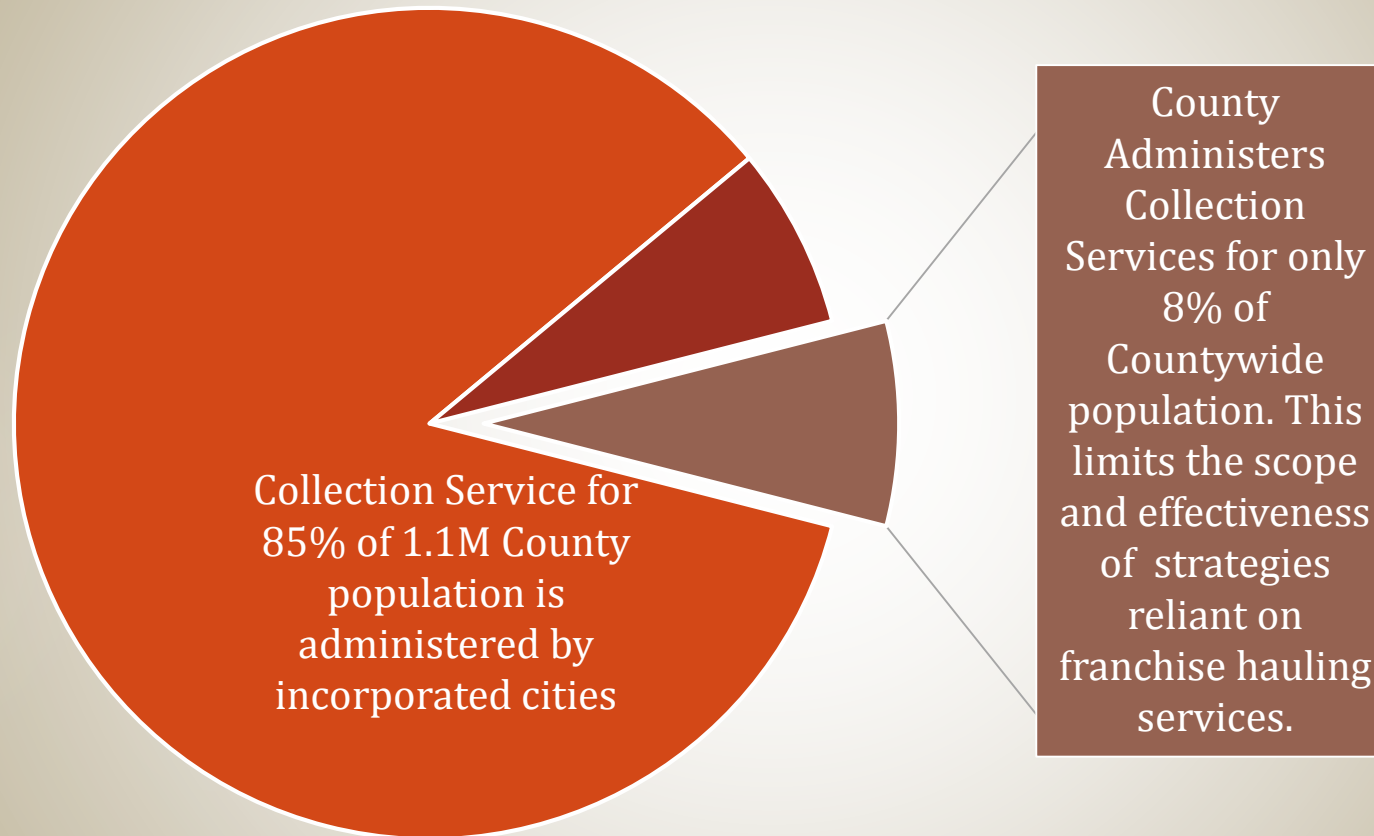


# Key Observations

- 7) Broad, consistently implemented, multi-pronged strategy is key to long-term progress
  - ▶ For individual mechanisms to be successful, strategies must be consistently implemented as part of a joint interdepartmental approach; no weak links.



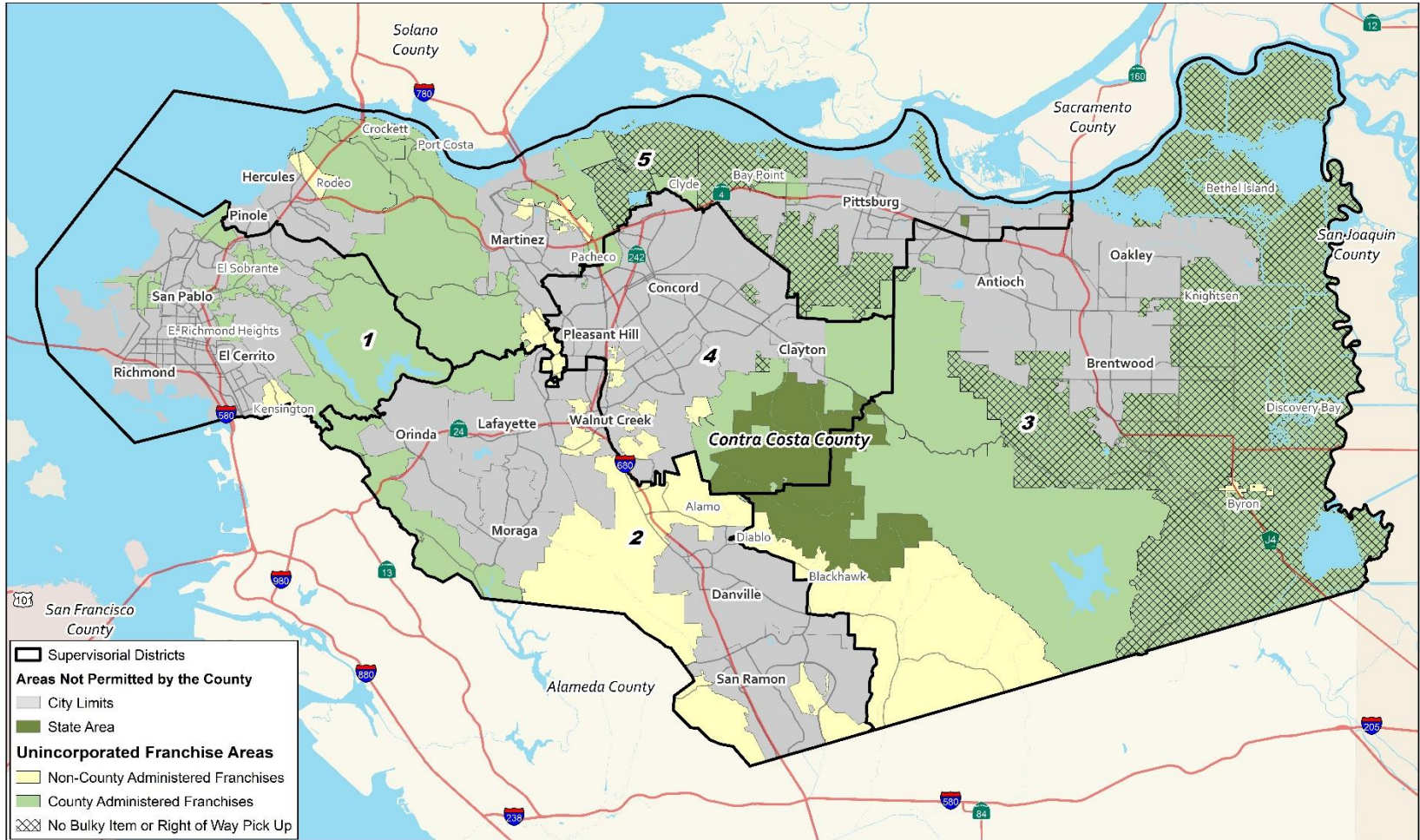
# Countywide Collection Service Authority by Population



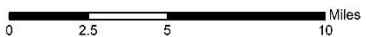
■ Incorporated Cities   ■ Non-County Franchises   ■ County Administered Franchise



# Authority for Solid Waste Collection in the Unincorporated County



- Supervisorial Districts
- Areas Not Permitted by the County**
- City Limits
- State Area
- Unincorporated Franchise Areas**
- Non-County Administered Franchises
- County Administered Franchises
- No Bulky Item or Right of Way Pick Up



\* Population numbers from 2010 Census Data \*

Map Created 2/22/2019  
 by Contra Costa County Department of  
 Conservation and Development, GIS Group  
 50 Main Road, Martinez, CA 94553  
 37.69-41.701N 122.07-03.750W

This map was created by the Contra Costa County Department of Conservation and  
 Development and all data from the Contra Costa County GIS Program. Some  
 users will, however, be required to use the data for the County purposes to be used for  
 the purposes. This map is not intended for use in any other way and is not to be  
 reproduced in any other state if the source is other. Users of this map agree to read and  
 accept the Contra Costa County disclaimer of liability by not going to its information.



Illegal Dumping in Contra Costa County - October 2018

# 4 Prong Approach to Reduce Illegal Dumping



# Highlights of 4 Prong Approach: **Educate**



## 5. PUBLIC OUTREACH CAMPAIGN

Create public outreach campaign(s) with different messaging:

- ▶ Educate people about proper disposal options
- ▶ Provide guidance about reporting dumping - what is needed from witnesses and desired type(s) of evidence
- ▶ Publicize enforcement successes

Outreach to be deployed using these various methods.

**\$10,000**  
*(production costs, not staff)*

# Highlights of 4 Prong Approach: **Prevent**



## **12,13 & 19. MANDATORY GARBAGE SERVICE**

- ▶ Expand current complaint based enforcement to proactive enforcement using franchise hauler provided lists.
- ▶ Implement lien process provided for in County Code to provide for recovery of costs resulting from forced starts.
- ▶ Explore amending the County's Mandatory Subscription Ordinance (Chapter 418-6) to allow for placement of tax liens to reimburse hauler for providing mandated services without County having to incur the expense first.

***\$58,000***

## **25. FREE MATTRESS RECYCLING**

- ▶ Secure commitment(s) to establish free local recycling drop-off sites for mattresses and box springs through participation in the statewide Bye Bye Mattress program

***To be determined***



## **34 & 35. RIGHT-OF-WAY CLEAN-UP**

- ▶ **On-call Right-of-Way Debris Removal by Franchise Haulers:** Increase area (currently in place for three of the County's four Franchises) and potential scope/frequency.

*Increase rates*

- ▶ **On-call Right-of-Way Debris Removal by Public Works:** Dumping in creeks, roadways outside County Franchise Areas where hauler provides on-call removal service and hazardous waste or oversized items not serviced by the Franchisees. Potential for increasing removal frequency within the existing budget is dependent upon reducing the area Public Works is responsible for (limit to areas outside County Franchise authority).

*Existing budget (if 34)*

# Highlights of 4 Prong Approach: **Enforce**



## **45. LAW ENFORCEMENT INVESTIGATORS**

- ▶ Dedicate two law enforcement deputies to investigating dumping crimes.

**\$566,000**

## **46. SURVEILLANCE CAMERAS**

- ▶ Wireless high definition, license plate reader surveillance cameras with night vision, infrared & solar powered. Remote-controlled to zoom and capture evidence – Place at key entry ways or at/near hot spots.  
*PILOT: Initial six month pilot of surveillance monitoring service for five rental cameras.*

**\$50,000**



# 4 Prong Approach: Strategy Summary

## (14) Existing + (42) Recommended Strategies = 56 Total

- ▶ 21 covered by existing county budget,
- ▶ 2 funded by grants
- ▶ 6 require rate increases
- ▶ 6 to be determined (future phase)
- ▶ 7 require allocation of new funding

**Estimated Annual Cost for Existing Strategies = \$1,827,000**

**New Funding Needed to Implement Recommended = \$944,000**

<b>Educate</b> (5 Strategies) = 2 Existing + 3 Recommended (Expand -2 & New -1)	<b>\$10,000</b>
<b>Prevent</b> (22 Strategies) = 6 Existing + 16 Recommended (Expand-7 & New-9)	<b>\$168,000</b>
<b>Clean Up</b> (13 Strategies) = 5 Existing + 8 Recommended (Expand- 6 & New -2)	<b>\$150,000</b>
<b>Enforce</b> (15 Strategies) = 1 Existing + 14 Recommended (Expand-3 & New-11)	<b>\$616,000</b>
<b>Other</b> (1 Strategy) = 1 Recommended (New)	<b>\$0</b>



## Next Steps

1. Gather initial feedback and guidance from Board of Supervisors on preliminary recommendations and potential strategies to better address illegal dumping.
2. Seek input from neighboring jurisdictions, other public agencies, franchise haulers and other stakeholders about the preliminary presentation and recommendations.
3. Report to Board of Supervisors in 2019 for Board consideration of recommendations.