



OUR WATER – OUR WORLD

Marin County Stormwater Pollution Prevention Program Our Water Our World Retail Partners Final Report

July 2018- June 2019

Contract #31900964 for Plant Harmony, Suzanne Bontempo

Program overview:

We currently are providing OWOW partnership services to 14 retail businesses.

Marin County OWOW retailer trainings:

- A total of 13 training were conducted, with 80 associates trained.
- Due to the over lap with last years contract extending into October, the combined total of trainings is 5 events over the annual budgeted amount. This reflects an increase in the number of trainees to 80.

OWOW Retailer training topics

Training topics included:

- Pesticides that are water pollutants of concern
- OWOW Store Partnership Program overview
- Where to dispose of HHW in Marin County
- How less toxic products work
- IPM techniques
- Beneficial Insect Identification
- Water Conservation
- Benefits of Mulch
- Water-wise plants
- Pests highlights: Rats & mice, aphids, ants, citrus leaf miner, snails and slugs, peach leaf curl and other fungal diseases, and how improving the overall health of the garden with compost and organic fertilizers/reduce over fertilizing with synthetic fertilizers as they increase pest problems.
- Invasive pest awareness: Asian Citrus Psyllid, Spotted Winged Drosophila, and Ligurian Leaf Hooper
- OWOW website and the 'Ask the Expert' feature, the UCIPM website, Yard Smart Marin website, Water Smart Plant program website, and the BIRC website
- UCIPM YouTube educational channel

Resources provided to trainees include:

- The Mac's Field Guide Good Garden Bugs of California
- Monthly Pest Calendar
- How to Apply Beneficial Nematodes
- How less toxic products work document
- OSH less toxic products list for the OSH store trainings
- Home Depot less toxic product list for the Home Depot Store trainings
- List of websites, books, and catalogs on a resource sheet
- Sheet Mulching instructions
- The DPR's 'How to read a pesticide label' handout

- Information on pest problem solving for the following pests: spider mites, lifecycle of grubs, whiteflies, spider mites, citrus leaf miner, Asian Citrus Psyllid, DPR's handout on bed bug management, and the UCIPM Quick Tips for gopher controls, UCIPM Quick Tip for Peach Leaf Curl
- 10 Most Wanted Bugs for Your Garden brochure
- OWOW pocket guides
- Yard Smart Marin information card
- Marin-Sonoma Vector Control Program

Additional materials focused on this year by OWOW:

- A one sheet handout that includes services offered by the Marin-Sonoma Vector Control Program
- A one sheet informational handout on 'Keeping Rats & Mice out'
- A one sheet informational handout on 'Rats in the Garden'
- Asian Citrus Psyllid Campaign fliers in the nursery, displayed in the aisle and stocked in the OWOW literature rack
- UCIPM DIY bed bug management
- Eco-herbicide recommendations

Extra educational materials:

I provided many of the OWOW retail partners additional educational materials to assist with pest identification, as this is what many were requesting since access to online research during business hours is limited to many associates.

Educational materials were:

- The UCIPM –ANR Pest Identifier and the Weed Identifier wheels
- UCIPM Pests of Landscape Trees and Shrubs
- UCIPM Pests of Gardens and Small Farms
- UCIPM Wildlife Pest Control around Gardens and Homes



Dan, the assistant store manager at Chase Ace with Wildlife Pest Control publication

List of OWOW Trainings provided:

Here is a detail of the 13 trainings we provided this year with 80 associates trained

Date	Store	Number Trained
7/13/18	Chase Ace	8
7/25/18	Goodman's Lumber	4
8/15/18	OSH San Rafael	6
8/17/18	Marin Ace	3
9/20/18	Fairfax Lumber	8
1/23/19	Building Supply	10
1/23/19	Sloat Novato	4
1/26/19	Sloat San Rafael	3
1/26/19	Chase Ace	9
3/5/19	Home Depot San Rafael	11
3/6/19	Goodman's Lumber	6
4/25/19	Marin Ace	2
6/13/19	Jackson's Hardware	7

Compilation of training feedback 2018/2019

Scheduling associate trainings for the retailer partners was a bit tricky once the extended rainy season arrived, scheduling trainings to correspond with the newly hired associates became a bit challenging I persisted and was able to schedule trainings over all.

The training are well received by the associates, as they see the value and appreciate the up to date education I provide to them. This year specifically, with the increase of rodent problems, I been able to education the associates on how to guide their customers through exclusion for prevention and then how to trap for success. With the abundance of fungal disease due to excessive rains, I have been able to provide education around pest identification, then how the eco-friendly fungicides work. The largest issue I experienced this year was with the publicity around Round Up. Each retailer was desperate for education on alternatives to Round Up, which I was able to provide a list of recommended eco-herbicides and IPM techniques for weed management.

In total, over last the 2018-19 fy, 13 trainings were conducted with 80 associates trained, 79 surveys were collected. The results from these surveys will follow below.



OWOW training at Building Supply Ace Hardware

Summary of Store OWOW Training Pre-Training Surveys

A total of 13 trainings were conducted, 80 associates were trained,
79 pre-training surveys were returned.
Here are the results of those surveys.

Survey Question	Yes	No	Don't Know
When water enters a <u>storm drain</u>, does it go to a treatment plant before it reaches a creek?	10%	71%	19%
When water enters a <u>sanitary sewer</u> from a house drain, like your sink or toilet, are pesticides removed at the sewage treatment plant before the treated water reaches a creek or bay?	25%	44%	31%
Is it more effective to treat an ant infestation with a bait station rather than a spray?	66%	15%	19%
Where is your local household hazardous waste collection facility located?	47% knew the location	16% answered incorrectly	37% did not know or left it blank
Which sentence best describes Integrated Pest Management (IPM) <ul style="list-style-type: none"> a. IPM only uses pesticides: 3% b. IPM uses pest identification, trapping, beneficial insects, and pesticides (only when needed): 85% c. IPM does not rely on identifying pests/disease before treating: 11% > Left blank or did not know: 1% 			
Which of these is the most effective IPM method for managing aphids? <ul style="list-style-type: none"> a. Apply fast acting fertilizers: 12% b. Spray insecticidal soap and/or prevent ants from vegetation with tanglefoot or bait station: 66% c. Use products with pyrethroids: 22% > Left blank or did not know: 0% 			

Summary of Store OWOW Training Post-Training Surveys

A total of 13 trainings were conducted, 80 associates were trained,
79 post-training surveys were returned.
Here are the results of those surveys.

Survey Question	Yes	No	Don't Know
When water enters a <u>storm drain</u>, does it go to a treatment plant before it reaches a creek?	1%	99%	0%
When water enters a <u>sanitary sewer</u> from a house drain, like your sink or toilet, are pesticides removed at the sewage treatment plant before the treated water reaches a creek or bay?	1%	98%	1%
Is it more effective to treat an ant infestation with a bait station rather than a spray?	96%	3%	1%
Where is your local household hazardous waste collection facility located?	88% knew the location	3% answered incorrectly	9% did not know or left it blank
Which sentence best describes Integrated Pest Management (IPM) a. IPM only uses pesticides: 0% b. IPM uses pest identification, trapping, beneficial insects, and pesticides (only when needed): 100% c. IPM does not rely on identifying pests/disease before treating: 0% > Left blank or did not know: 0%			
Which of these is the most effective IPM method for managing aphids? a. Apply fast acting fertilizers: 0% b. Spray insecticidal soap and/or prevent ants from vegetation with tanglefoot or bait station: 98% c. Use products with pyrethroids: 2% > Left blank or did not know: 0%			

Summary of End of Training Evaluation Form

A total of 13 trainings were conducted, 80 associates were trained,
79 evaluations were returned.

Here are the results of those evaluations.

	Disagree	Neutral	Agree	Left Blank
I learned at least one eco-friendly pest management method today			96%	4%
The training will help me recommend and/or sell eco-friendly products			96%	4%
I can comfortably share what I learned with customers and/or co-workers		5%	91%	4%
I can easily use the Our Water – Our World shelf tags and fact sheets to inform customers about less-toxic pest management		7%	89%	4%
Printed resource materials from this training were...	Too much	Just Right 89%	Not enough 2%	9%

What part of the training was most helpful?

All was helpful: 27%	Information on HHW locations: 1%
Pest problem solving: 22%	Water quality and pyrethroid pesticides: 4%
Product information/how they work: 38%	Group size: 1%
IPM methods: 2%	Knowledgeable instructor: 2%
The folders: 1%	Left blank: 2%

What part of the training could be improved?

Nothing/everything was good: 78%	How to assist customers with their pest problems: 3%
More time for the training: 8%	Samples of pests/pest damage: 3%
Information on HHW locations: 1%	Left blank: 7%

Additional comments:

“I feel like I can give more accurate information to our customers now” – Building Supply
 “Training was in total very helpful” – Sloat Garden Center, Novato
 “Pyrethrum vs Pyrethroid training was helpful” – Chase Ace
 “Learning about how the pesticides work was very helpful” – Home Depot San Rafael

Summary of outreach events 2018-2019

The following is the detailed list of 9 outreach events conducted, reaching 400 people

Date	Store	Number reached
10/27/18	Marin Ace	32
2/19/19	Sloat Vendor Event	85
3/30/19	Home Depot San Rafael	56
4/7/19	Chase Ace	37
4/13/19	Marin Ace	35
4/27/19	Home Depot San Rafael	48
5/5/19	Sloat Garden, Novato	32
6/5/19	Goodman's Lumber	35
6/22/19	Chase Ace	40

The tabling events over all had lower than average attendance. Even the Sloat Vendor Event, which easily has over 150 attendees, fell short this year. One consideration is that a number of peak spring season weekends were effected by late spring rains, making the numbers of customers less than expected.

During these outreach tabling events, I am actively helping customers in the aisle, answering their pest questions, and guiding each to a less toxic solution. This guidance is making changes with purchasing decisions. By educating the consumer, I am able to guide each towards less toxic pesticides and products. The customers are asking for alternatives in may cases, knowing that they have a choice that is less toxic and effective.

I have displayed Yard Smart Marin materials, also plant material on the tables that will attract beneficial insects, so that people can learn how to reduce pesticides with natural enemies. I display Water Smart Plant program materials and water-wise gardening tips & techniques. I also display OWOW & UCIPM website information, as well as seasonal pest issues, and the Marin Sonoma Vector Control 'Fight the Bite' handout. I also display the '10 Most Wanted Good Bugs in the Garden' brochure, the OWOW less toxic pocket guide, information on Asian Citrus Psyllid, Gophers, and OWOW fact sheets.



Sloat Vendor Event

Total number of OWOW program store Mentoring and Maintenance visits for the 2018-19 fiscal year: 99

Ace Building Supply Center, Pt Reyes Station: 6
Ace Fairfax Lumber and Nursery, Fairfax: 5
Marin Ace, San Rafael: 7
Chase Ace, San Rafael: 7
Pini Ace Hardware, Novato: 4
Bayside Garden Center, Belvedere: 1 (closed 12/31/18)
Goodman's Building Supply, Mill Valley: 7
Jackson's Hardware, San Rafael: 7
Orchard Supply Hardware, San Rafael: 3 (closed 10/31/18)
Sloat Garden Center, Kentfield: 10
Sloat Garden Center, E. Blithedale, Mill Valley: 7
Sloat Garden Center, Miller Ave, Mill Valley: 7
Sloat Garden Center, Novato: 7
Sloat Garden Center, San Rafael: 4
The Home Depot, San Rafael: 9
Toby's Feed Barn, Pt Reyes Station: 3
United Market, San Rafael: 5

Store Mentoring and Maintenance Activity:

- Stocking fact sheets
- Updating and replacing shelf talkers
- Ask associates what the frequently asked pests issues are
- Ask associates if there are any new or unusual pest issues
- Focus on the pest of the month calendar
- Highlight regional invasive pests
- Distribute the quarterly UCIPM Retailer Newsletter
- Bring timely articles on seasonal pests from UCIPM blog and from BIRC publications
- Remind associates how to access the 'Ask the Expert' feature on the OWOW website
- Provide recourses for pest identification, such as the publications from UCIPM & ANR
- Show associates how to use the UCIPM website
- Guide customers to less toxic pest solutions
- Talk with buyers about new eco-friendly products on the retail market
- Talk with associates about the current pest issues and IPM methods for the pest
- Explain to associates how the less toxic products work and how to use them
- Make employees aware of additional pest identification support services, such as the Marin County Agricultural Extension Department in Novato
- Follow up with the pest questions associates have by emails & phone call
- Provide information on the beneficial insects, where to buy them, how to use them, how to invite them to the gardens
- Schedule trainings and events with managers

Pesticide reduction and increase in self-space and sales of eco-friendly products:

This has been a dynamic year with the awareness and growth of eco-friendly pesticides. Each retail partner has seen an increase in sales and can report that their customers are asking for less toxic products more than before.

- As shared in my May-June work summary report, Chase Ace has decided to remove Round Up from their shelves. What once was a bay of traditional herbicides is not stocked with more than 50% eco-herbicides. This is an amazing success.
- Fairfax Ace has been in the process of selling through their traditional herbicides and replacing with eco-herbicides.
- Jackson's is reducing the traditional herbicides they sell and now sells no less than 5 eco-herbicide products.
- Pini Ace has been transitioning to reduce the number of traditional pesticides and is focused on bringing in as many eco-friendly pesticides as they can, including the eco-herbicides.
- The Home Depots had an increase in eco-friendly pesticides sales, up to 35% with some categories,

Over all challenge for the year:

This was my first year as the OWOW program coordinator so I experienced huge learning curves each month as new responsibilities came up. The main take away I see is that we need more IPM Advocates to assist with OWOW throughout the greater SF Bay Area. I also see that the OWOW website has the potential to be a vital tool for the consumer, the retailer the vendors, the IPM Advocates, the agencies that sponsor the IPM Advocates and beyond.

Another topic that has come up quite a bit is around fire safety and landscapes. Not directly an OWOW issue, though encouraging people to move their HHW off site to a HHW facility has been my #1 campaign this year. I have had many people in Marin County, both the retail associates and the consumers, ask me about

- 'Fire safe' landscapes
- Supporting pollinators in fire risk areas
- Contradicting information on assorted Marin Co websites about what plants are 'fire safe'

This is another hot topic (no pun intended) that I am unable to offer support. I have join a handful of local meetings, that host Fire Department representative, local beekeepers, Marin County residence, and city officials. I see that this is a complicated issue, one that is quite emotional for the homeowners, and not exactly straight clear-cut. I will continue to join meeting so that I can offer some support to those who are concerned.

Program Recommendations for 2019/2020:

I do see the need for more resource materials to be provided to the retailers. The new UCIPM Vegetable Pest ID Cards for the retail partners would be a terrific resource to provide. These cards would help associates to answer pest questions, pests that we see on backyard food crops. The cost is \$20 each pack.

Thank you so much for allowing me to provide OWOW services for this contract. I appreciate the opportunity to work in Marin County with your retailers. Thank you!

