

## Wayne County Report Submission for 2008-2009 NYS Community IPM Grant Program

**Title:** IPM Implementation and Education in our Community

**Project Leader(s):** Elizabeth Claypoole; Director CCE Wayne County

**Cooperator(s):** Laurie VanNostrand- Master Gardener Program Assistant for Cornell Cooperative Extension Wayne County; Master Gardeners Volunteers; Totco Inc.

**Abstract:** There is a substantial need for pest management education in Wayne County as demonstrated by the type of questions we receive from consumers on our gardening hotline each year and by the type of presentation requests we receive. Integrated Pest Management education fills a critical role in Wayne County providing the basis for less toxic pest management education.

The Master Gardener hotline receives several hundred calls each year from homeowners requesting insect/plant disease control recommendations and information on how to maintain healthy plants. Although we make recommendations for the least toxic controls these recommendations are only small parts of the overall IPM plan, that when understood and implemented, would help homeowners be proactive rather than reactive when trying to control landscape pests and maintain their home landscapes . In addition, we receive requests from schools, libraries and daycare centers for garden related youth education. By understanding and adopting IPM practices Wayne County consumers can reduce their reliance on pesticides resulting in decreased pesticide exposure to humans and decreased pesticides in the environment. In addition, IPM education can help our youth understand their role in protecting their environment.

To meet the need for IPM education in Wayne County, staff and Master Gardeners developed a comprehensive power point for adults entitled "IPM: How You Can Create a Healthier Environment", as well as a concise fact sheet to distribute to consumers. In addition a youth powerpoint, "IPM" was developed for middle school age youth along with 3 IPM kits targeting younger kids with hands on materials to enable them to experience IPM in a fun, understandable manner.

**Background and justification:** The Master Gardener gardening hotline receives several hundred calls each year from homeowners requesting insect/plant disease control recommendations and information on how to maintain healthy plants. Although we make recommendations for the least toxic controls these recommendations are only small parts of the overall IPM plan, that when understood and implemented, would help homeowners be proactive rather than reactive when trying to control landscape pests and maintain their home landscapes . Additionally, we get many requests for garden related presentations including information about landscape maintenance practices.

With a better understanding of IPM practices and related environmental impacts, homeowners will become more aware of their roles in environmental protection and the dangers of too much

pesticide exposure. In addition they will be able to decrease not only their exposure to pesticides but their families and pets as well while maintaining healthy landscapes around their homes.

Hotline calls and presentation requests show consumer interest in learning better solutions to maintain healthy plantings while decreasing pesticide use. This interest created an opportunity to educate consumers so they could gain a better understanding of IPM methods and implement them in their home landscapes. With a better understanding of IPM methods, homeowners could decrease pesticide use around their homes while decreasing their exposure to pesticides at the same time.

Youth groups, libraries and schools have expressed an interest in educational material and presentations that could be used to teach youth about environmental stewardship.

IPM education can be used to increase awareness of the dangers of pesticide overuse and the concept of protecting ourselves and our environment from too many pesticides. Introduction to IPM methods at a young age may help foster a better understanding and implementation of these practices when they become adults.

Wayne County Master Gardeners Create IPM education material in an effort to provide Wayne County consumers (adult and youth) with information about Integrated Pest Management (IPM) methods that can decrease human pesticide exposure while maintaining healthy home landscapes and encourage environmental stewardship in youth

### **Objectives:**

1. To develop an overview 'fact sheet' in conjunction with appropriate IPM staff, designed to introduce IPM practices and maintain environmental control. This fact sheet will act as a guide in overall IPM practices and will be used as an introduction to IPM at all trainings and community programs (for adults) presented by the Wayne County Master Gardeners.
2. To increase our community presentations from 20 (2008) to 30 in 2009 by developing and designing power point presentations designed to educate the public on proactive prevention & management techniques prior to planting and garden design, as well as garden maintenance.
3. To develop 10 hands-on teaching kits to supplement and enhance our children's presentations using power point, to be used at libraries, schools, daycare centers & other youth groups for children from 6-11 years of age. This will allow Master Gardeners to conduct outreach programs for children and lend the participating agency one of the Master Gardener kits (Beneficial bugs, Earthworms & Composting, What's in the Garden?) to be used to supplement our programs.
4. To develop a project evaluation checklist and corresponding documentation to accurately access the benefits of this program to the target community.

## **Procedures:**

1. An IPM fact sheet “Understanding IPM and Implementing IPM at Home” was developed by Wayne Co. staff and Master Gardener Volunteers and approved by IPM staff. Copies of this fact sheet have been distributed at Master Gardener presentations for adults in Wayne County.
2. Wayne County staff and Master Gardeners created an informative IPM PowerPoint presentation, “IPM: How you Can Create a Healthier Environment” for adults and a powerpoint presentation for youth entitled “IPM”. In addition, we increased community presentations from 20 in 2008 to 46 in 2009.
3. 10 IPM youth kits on 3 topics with corresponding pledge for participants to sign were developed. Kits are currently in circulation.
4. An IPM survey and pledge was developed to correspond with the adult IPM powerpoint and fact sheet. IPM youth surveys including an IPM pledge were developed for each IPM youth kit and youth powerpoint.

## **Results and discussion:**

Environmental Advocates of New York report that overall, non-agricultural pesticide use is greater than agricultural use statewide. Although pesticides are conventionally thought of as chiefly an agricultural issue, and the United States Environmental Protection Agency (EPA) estimates that 77% of the nation’s total pesticide use is agricultural, this pattern does not hold true for New York State. Non-agricultural use predominates over agricultural use on a statewide basis due to the overwhelming total amount of pesticides reported in urban and suburban areas for controlling indoor pests and lawn care.

Thirty to forty years ago, lawn and ornamental plant pesticide applications were virtually unknown – everyone's yard was organic. Research shows that approximately  $\frac{3}{4}$  of American households now use pesticides and many are seemingly unaware of the negative effects on human health and the quality of air and water. Advertising and easy availability of pesticides tends to promote usage. Many Americans tend to perceive a low risk and high benefit from pesticide use. It is perceived as an “easy fix” to create a beautiful lawn, and get rid of weeds and unwanted pests. Source: Environmental Advocates of New York and United States Environmental Protection Agency (EPA)

Wayne County consumers are no exception and that is why IPM education is needed. When implemented, IPM practices can impact on how consumers manage pests in and around their homes while decreasing pesticide usage. Introduction to IPM methods at a young age may help increase environmental awareness in youth and foster implementation of IPM methods when they become adults.

In an effort to educate Wayne County consumers about IPM we have increased presentations from 20 in 2008 to 46 in 2009 receiving over 80 signed pledges to adopt IPM methods. IPM fact sheets have been dispensed to over 150 consumers. All youth kits are in circulation with surveys

collected as they are returned. Additionally, articles about IPM presentations have appeared in 3 local papers, the IPM ppts and fact sheet have been requested by and sent to Yates County CCE and we have already been contacted by schools, daycare facilities and scout groups for IPM presentations and to borrow kits during 2010.

**Project location(s):** Wayne County

**Samples of resources developed:** Please see enclosed:

IPM adult fact sheet “Understanding IPM and Implementing IPM at Home”

IPM powerpoints (on CD) “IPM: How you Can Create a Healthier Environment” for adults and “IPM” for youth

IPM 5 surveys: IPM ppt adult, IPM ppt youth, IPM kits (3 topics: Ladybugs, Earthworms/Composting and What’s in the Garden)

Youth Kit Documents: Kit Contents, Kit Label (name and number), warning label, liability statement

Pictures: youth kits (Ladybugs, Earthworms/Composting and What’s in the Garden) and youth using kits

Thank you from Ontario Public Library