GCPMA

The Alliance Quarterly
gcpma.com
2017 Spring Edition

SEMINAR INFO:

Angela Tucker
847-647-0010
atucker@smithereen.com

Production: Stellar Graphics
Design: Creative Originals

A Message from the President...

By Sara McGuire, President

"The World Turned Upside Down"

Current star date is February 17th 2017, it's 65°F outside, the nation has a new President and so does GCPMA! Sara McGuire, signing in here as GCPMA's new president and proudly its FIRST female president. I am truly honored and thrilled to have been elected to this position as part of this prestigious organization. I am impressed every day with how hard every one of you works either as a technician, manager, administrator, sales person, or owner to make this business better.

I believe strongly in mentors and GCPMA has afforded me with so many; the first and most important being David Harris-John. He hired me before I had even graduated and patiently waited for me finish the school year. It was blind luck that my first influencer was not only an industry leader but to be the most pest control passionate person I have ever met. It was impossible to not have his unbridled enthusiasm and love of this industry infect you. He was an incredible teacher and had a sixth sense for the art of pest control. David spent 7 years showing me the ropes and what pest control should really look and feel like. Over the 9 years I have been in this business I have met countless incredible people that are so talented, funny, and authentic. It often feels like even though we are all competitors there is a sense of family and unity that many other industries should envy.

If you want the sorted details about my past pull me aside at our March recertification seminar but for a brief glimpse, this is where I come from.

Like almost all of us, I fell into this industry by accident. In 2008 and I graduated with a Master's in Entomology from the University of Illinois and returned as a Chicago native. I started with Smithereen Pest Management as the Technical Director and Trainer. Within a month of starting I found myself at 1am, in a 3ft crawl space, wearing a hazmat suit and respirator, with rats running all around me. Grad school hadn't exactly "prepared" me for this but that night is burned in my memory forever as being so awesome and why I stuck with this often frustrating and challenging business almost a decade later. In 2015 I stepped up as Director of Operations at Smithereen and am so excited for the next decade

continued on Page 3...

INSIDE THIS ISSUE

Effective Routing:
How To Raise Revenues & Decrease Expenses

By Daniel S. Gordon, CPA

I am often asked how a company becomes more profitable. In this world of information overload, of internet marketing, handheld scanning devices, GPS tracking and hybrid vehicles, cell phone communications and profitability consultants, it would seem that there are many methods that a firm can become more profitable. Actually as a student of business and an observer of innovation, I can report to you that profit increases come down to two factors:

1. Increase Pricing
2. Lower Costs

That's it!! All these other ideas can only work to increase net profit margin if and only if they can achieve (1) and (2) above. So what tool in pest control is more powerful than any other in achieving this objective?

ROUTING!

Effective routing will Increase revenues and minimize your expenses. Let's look at quantitative methods for evaluating route optimization. Clearly we know that the single largest expense in pest control or any service business for that matter is labor. In pest control there are two methods of compensating our technicians. Some firms pay hourly (paying time and a half after 40 hours per week) and some firms pay a percentage of production (or a hybrid compensation plan that considers both hourly and percentage of production).

At the core of effective route management is fitting more work into less time. This can be done in two ways, first by being more efficient when performing the job (taking less time), or second, by reducing windshield time. By the way, I am in no way advocating sacrificing quality service by rushing through jobs. I am advocating better training in treatment techniques, better use of maps and mapping software and better management of what we offer our customers, and that is our great people.

You may be convinced that what I am advocating is true as it seems pretty intuitive, however, you may ask, how do we measure this efficiency, or better still how do we benchmark it as a key performance indicator and improve upon it?

Let's take a look at a couple of examples:

Example 1:

1. We have a technician who earns $15.00 per hour
2. Assume he can complete one job (with travel time) in an hour that produces $50.00
3. In this case our labor percentage is 30%. This means that for every $100.00 of revenue we have a $70.00 profit ignoring all other costs.
4. It also means that we've earned $35.00 profit in that hour ignoring all other costs.

Example 2:

1. We have a technician who earns $15.00 per hour
2. Assume he can complete two jobs (with travel time) in an hour that produces $50.00 each or $100.00 total
3. In this case our labor percentage is 15%. This means that for every $100.00 of revenue we have an $85.00 profit ignoring all other costs.
4. By fitting more work into less time we've increased our revenue (from $50.00 to $100.00) and decreased our labor cost from 30% to 15%.

Remember how to increase profit margins in the opening paragraph above? Well using this routing example, we've achieved both; we've increased revenue in total dollars and lowered our cost as a percentage of revenue.

So you may say to me, well that works where technicians are paid hourly, but our technicians are paid as a percent of production, so it really doesn't matter how long it takes for a technician to complete his work. I would say that's false as the longer that tech is on the road the more wear and tear on your vehicle as well as fuel costs among others but let's look at what can be gained from better routing using the same logic as example 1 and 2 above.

Example 3:

1. We have a technician who earns 25% of production.
2. Assume he can complete one job (with travel time) in an hour that produces $50.00
3. In this case our profit is $37.50 ($50.00 – (25% x $50.00) =$37.50) (ignoring all other costs).

Example 4:

1. We have a technician who earns 25% of production.
2. Assume he can complete two jobs (with travel time) in an hour that produces $50.00 each or $100.00 total
3. In this case our profit is $75.00 (($50.00x2) – (25% x $100.00)) (ignoring all other costs).

By fitting more work into one hour we have been able to increase our profit by $37.50 per hour from $37.50 to $75.00 dollars. In this case we've increased the revenue by $50.00 per hour while holding our labor expense constant as a percentage of revenue at 25%.

In the above examples we illustrated that fitting more work into less time makes a business more profitable. While the conclusion is pretty obvious, we actually put numbers to the calculation and proved it mathematically (an excellent tool for managers of pest control businesses). But from a managerial standpoint it becomes difficult to determine if your attempts to improve your routing is actually working.

Without some sort of metric or key performance indicator quantifying improvements in routing becomes difficult. This is because in reality the dollars per hour on all accounts is rarely the same. By the same token, the dollars per hour received on a particular account is really not an operational issue (unless the workmanship is not up to snuff), it is really a sales issue. Meaning the account may not have been sold correctly leading to lower dollars per hour. The efficiency with which your customers get serviced, that is an operational issue. By separating the two issues a manager can address issues with the correct department.

To determine how efficient we are, we need a method to measure routing efficiency. In my world of accounting, I measure the efficiency of my accountants and bookkeepers using a technique called "UTILIZATION." Lawyers, accountants and other professionals use this technique as well. However, it fits the pest control industry just as well or better. Here's how it works:

A utilization fraction or percentage is calculated by taking the following quotient:

$$\frac{\text{Total Technician Hours Spent at All Stops During the Time Period}}{\text{Total Technician Hours Clocked in (Paid Hours) During the Time Period}}$$

Example:

Let's say that your technician spent 30 hours at various jobs doing actual work for a one week period.

Let's also assume that according to his time card he was punched in and paid for 50 hours. His utilization would be 60%. (30hrs worked / 50 Hours clocked in). This means that he was producing revenue 60% of the time he was clocked in.

Let's assume your average dollar per hour on your accounts for the day is $75.00. With a 60% utilization, you're actually taking in $45.00 per hour. If your technician clocks in 8 hours for the day, he will produce $360.00 for the day ($75.00 x 60% x 8hrs).

Assume his utilization is 75% he will bring in $450 ($75.00 x 75% x 8hrs). If he is 40% utilized he will bring in $240 ($75 x 40% x 8hrs). These numbers are using the same $75.00 per hour but varying the utilization percentage.

Conclusion:

There are only two ways to increase profit margins - Price increases or cost savings. Any tools that can be employed to achieve either one may be a good investment. The most powerful tool in our PCO business to achieve both is efficient routing. There are many pieces of software on the market that can help with this. The method to judge the effectiveness of our efforts is by calculating utilization.

Daniel S. Gordon, CPA is the Managing Director at PCO Bookkeepers. Dan is also a regular columnist for NPMA's Pest World, PMP Magazine and PCT Magazine. For more information please send an email to info@pcobookkeepers.com or visit us on the web at www.PCObookkeepers.com

A Message from the President...

continued from Page 1...

to show what I can do not only for Smithereen but the industry and GCPMA.

GCPMA welcomed me with open arms from day 1 and I will do everything possible to ensure that it continues its righteous mission to serve you and the industry proudly.

It may feel like the world has turned upside down in these tumultuous times but one thing that will never change is the pride you can take in the incredibly necessary services you perform every day. GCPMA's goal is to be a beacon of information and your strongest advocate and supporter!

Have a great Spring everyone.

— Sara McGuire

The WILD Life

By Jane Peifer,
Ampest Exterminating & Wildlife Control

'Red Panda'

Looking back on the articles I've written for the Alliance Quarterly, I was surprised that I hadn't done a story on the infamous raccoon…. a.k.a. the masked bandit, ring-tailed bandit, trash panda, etc.

While doing some research, I found out the nickname "trash panda" was given to raccoons because they look similar to the Red Panda. I was so intrigued that I decided to write an article on it.

Red pandas were first described as belonging to the raccoon family in 1825, and that classification has been controversial ever since. They were placed in the raccoon family (Procyonidae) because of ecological characteristics and morphological similarities of the head, teeth, and ringed tail. Then, due to some similarities in the DNA, they were assigned to the bear family (Ursidae). However, most recent genetic research places red pandas into their own independent family: Ailuridae. Ailuridae is a family in the mammal order Carnivora. The family consists of the red panda (the sole living representative) and its extinct relatives.

The red panda is slightly larger than a domestic cat with a bear-like body and thick russet fur. The belly and limbs are black, and there are white markings on the side of the head and above its small eyes. They weigh on average 11 pounds and have a life expectancy of 8-10 years.

The red panda lives in the Himalayas, Myanmar (Burma), Nepal and central China. These animals spend most of their lives in trees and even sleep aloft. When foraging, they are most active at night as well as in the early hours of dusk and dawn. Winters can be bitter cold where red pandas live, but they have everything they need to survive the cold. Their thick, furry coats hold in almost all of their body heat. When red pandas sleep, they wrap their bushy tails around their faces to keep them warm. Even the bottoms of their paws are covered in fur.

Red pandas are shy and solitary except when mating. The breeding season is from January through April and just like the giant panda the female is only fertile for one or two days a year. After a gestation period of 100 to 145 days, females will give birth to a litter of 1-4 cubs. Young red pandas remain in their nests for about 90 days, during which time their mother cares for them. Males take little or no interest in their offspring.

Red pandas have a taste for bamboo, primarily bamboo leaves and stalks in the spring, but they eat many other foods as well—fruit, acorns, roots, and eggs. Like giant pandas, they have an extended wrist bone that functions almost like a thumb and greatly aids their grip.

The red panda is on the endangered list. The loss of nesting trees and bamboo is causing a decline in red panda population across much of their range through deforestation, farming and agriculture. They are also threatened due to hunting and poaching mainly for their fur. There may be fewer than 2,500 adult red pandas living in the wild today.

If interested, you can help protect this threatened species and their habitat by adopting a Red Panda through the World Wildlife Fund (WWF)...I did!!
https://gifts.worldwildlife.org/gift-center/gifts/Species- Adoptions/Red-Panda

You're Invited:

RECERTIFICATION SEMINAR

Credits:
Illinois 3hrs & Indiana 2hrs, 7A 1hr 7B and 3hrs RT

Tuesday, March 28, 2017

Holiday Inn
5300 W. Touhy, Skokie, IL 60077

To Attend This Forum:
Email info@gcpma.com
Or Call Jim Anderson At
224-619-5682.

You Can Also Register And Pay Online At: gcpma.com

GREATER CHICAGO PEST MANAGEMENT ALLIANCE

Recertification Seminar

Credits: Illinois 3hrs & Indiana 2hrs, 7A 1hr 7B and 3hrs RT

Tuesday, March 28, 2017

Holiday Inn, 5300 W. Touhy, Skokie, IL 60077

Registration 7am to 8am with Continental Breakfast – Seminar 8am to 11:45am

SPEAKERS: **Angela Tucker**/Smithereen – IPM: The Basics
Harry Bryan/Nisus – Small Fly And Cockroach Control
Nate Peterson/Bayer – Perimeter Pest Management

For information email info@gcpma.com or call Jim Anderson 224-619-5682

Register and pay online at gcpma.com or return this application in an envelope to:
GCPMA, P.O. Box 601, Tinley Park, IL 60477 with check payable to GCPMA

Employees of GCPMA member companies ___ $55.00
Employees of GCPMA non-member companies ___ $75.00

Name: _____

IL Cert #052-_____ Expires:_____ IND Cert #_____ Expires:_____

Home Address (Optional):_____ City:_____ State:____ ZIP:_____

Company:_____

Business Address:_____ City:_____ State:____ ZIP:_____

Email:_____

Expelling Spiders

Overwintering Pests Get Inhabitants Hot

By Dr. Stuart Mitchell

Various birds, rodents, and insects are present without invitation or permission and therefore considered pests. This is Povolny's concept of Anthropobiocoenosis II, where organisms occupy interior habitats in direct contact with humans or are associated with the physical characteristics of the structure (for example ants, cockroaches, dust mites, termites, wood boring beetles and spiders).

In evolutionary biology, adaptive radiation is a process in which organisms diversify rapidly into a multitude of new forms, particularly when a change in the environment makes new resources available, creates new challenges, or opens new environmental niches. We build structures for spiders and other pests to perfectly exploit using millions of years of adaptive radiation.

With an integrated pest management approach using several control measures, spider activity is over; rather than *overwintering*.

During the warmer months, when spiders are active outdoors, a spider problem could result from a lighting problem. The blue light in outdoor lighting can attract insects, which attracts spiders that ultimately end up overwintering indoors without invitation. Change blue light fixtures to yellow; fewer insects means fewer spiders.

Negative building pressure pulls spiders into the structure during the warm months only to have the spiders become unwelcome guests in the cold months. A building should have positive pressure or air in-take should exceed air exhaust by greater than 10 percent. Additionally, manage interior excess moisture and relative humidify through crawlspace and basement clean-space, vent and dehumidifier systems.

> "Spiders are defined as any of the Order Araneae (arachnids) having an abdomen usually un-segmented and constricted at the base, chelicerae modified into poison fangs, and two or more pairs of abdominal spinnerets for spinning threads of silk for various uses (as in making cocoons for eggs or webs to capture prey)."
>
> — Merriam-Webster

To keep spiders outdoors in the warm months and deny permission of indoor presence in the cold months, be sure window and door screens are serviceable as well as any cracks, crevices and gaps are properly excluded.

To deny harborage to uninvited overwintering spiders, reduce, or if possible, eliminate clutter. Organize stored materials in sealable plastic tubs. If cardboard boxes are necessary, be sure the opening ends are sealed with appropriate tape using the "H" pattern taping method (tape across the flaps and both ends).

Allow no "R and R" for overwintering spiders. Remove and reduce their numbers using a vacuum with a HEPA filter. Be sure to vacuum webbing, egg sacks, live spiders and dead insects and place the bag in a sealed container for disposal. For sticky situations with uninvited over-winterers, use appropriate glue traps to capture and monitor spider species and pressure.

To optimally deny invitation or permission of overwintering, both expel and expire spiders apply a coarse, low pressure residual material, such as to areas where these spiders hide, such as base-boards, corners, storage areas, closets, around water pipes, doors and windows, attics and eaves, cabinets, behind and under refrigerators, sinks, furnaces and stoves, the underside of shelves, drawers and similar areas. Pay particular attention to cracks and crevices. Lambda 9.7 CS Insecticide with EnduraCap™ Technology is a great option for this type of application.

Why Are We Kept In the Dark?

By Gary Pietrucha, President, Envirosafe Pest Management, Seated Member Governor's Advisory Council

Just as with the Chicago Bed Bug Ordinance, nobody from our industry was contacted or consulted regarding several proposed ordinances. Again, our opposition to these legislative attempts is the same as our opposition to HB5900 on a general ban of the neonicotinoids. My colleague Chris Haggerty of American Pest Control did some really in depth analysis of this bill, and his statement points to the danger of home rule in Illinois, which this bill alludes to. Here is Mr. Haggerty's response:

- **(a)** Beginning 9 months after the effective date of this Act, it shall be unlawful to apply any neonicotinoid insecticides on any public lands owned or maintained by Illinois.

  This language may indicate that they cannot be used on the inside of a public building as well as the outside. Surely, this is not what they meant. This would eliminate 3 of the top 4 insecticides for doing Bed bug work. Remember that public buildings would include University dorm rooms and prisons, as well as millions of square feet of office space (including yours).

  Of course, these insecticides are not only important for Bed bug work but many other types of infestations as well. At the very least, if eliminating these important materials from the inside of public buildings wasn't the intent, the language certainly needs to be addressed.

- **Section 45**. Authority of local government. Nothing in this Act shall be construed to prohibit or preempt the authority of a unit of local government in Illinois to regulate applications of neonicotinoid pesticides in a manner that is equivalent to, or more stringent than, the provisions contained in this Act.

In combination with

- **(B)** If upon the analysis or examination there appears to be a violation of provisions of this Act or regulations adopted thereunder, the Director shall cause notice to be given to the owner, operator or agent in charge and specify any administrative proceedings or criminal actions that are contemplated against such person.

- **(C)** In seeking the institution of criminal charges against a violator, the Director shall refer copies of findings or the results of analysis or both, to the prosecuting attorney for the county in which the violation occurred.

  I had thought that I understood that currently, the State of Illinois does not allow for local governments to adopt their own laws in regards to pesticides, except for Cook County. This opens the gates for a huge patchwork of different rules for each and every municipality. So, for example, Champaign-Urbana and the adjoining Savoy each have their own set of rules, a technician mistakenly does an application that is perfectly legal in two of the towns but is not in the town which he provided treatment, he along with owner or agent in charge (supervisor?), can be charged with criminal action. I'm sorry but this scares me. In addition, Your job will get infinitely more complicated with different rules in every governmental unit.

And finally, this

- This law lumps the way that our industry would use these products with the ag, lawn care, fruit production, and ornamentals, which would all use them quite differently. To be more specific, I would think other industries are much more apt to broadcast spray & / or treat directly on vegetation where pollinators go. With us, we are usually using in small amounts, usually target applications, sometimes below the soil (think Premise for termites), and is usually at the foundation of a building—all of which are not the most common areas for bees, butterflies and such to rest. Seems to be throwing the baby out with the bathwater.

As a fellow advisory member, I agreed with this 100% along with my own concerns. For example, there are no neonicotinoids used in Australia, and there is still bee colony destruction. Also, as Structural Pest Control operators, how much impact do we have on the exterior, especially on plants that are exposed to pollinators. In addition, the bill stops short in its definition of pollinators. As we well know, there are many insects that are pollinators, so are they included? The bill can be a beneficial one if our industry could be consulted. But just as what is proposed in Chicago, think of the havoc caused by home rule giving the authority for every municipality in Illinois to determine HOW you perform pest management and WHAT you can use. It is a sobering reminder of just how important it is to be up to date on these things. I feel that the intent is sincere by these legislators, but the consequence of their actions is not studied thoroughly enough. An example is Oak Park introducing a bill that makes his district a "No Nuke Zone". To the general public, this seems like a great idea that shows concern for the environment. But to those at West Suburban Hospital, it means not being able to use radiation for the treatment of cancer, which most certainly was NOT the intent of the bill. Obviously, the broad spectrum statement didn't cover the consequences, or the benefits of nuclear energy. More to come after the State of Illinois Department of Public Health Governors Advisory Council meeting in April. This is an open meeting in Springfield and you are welcome to attend. It is very engaging and determines a lot of what we can or can't do. So get involved, and become a part of the GCPMA team.

The Hidden Costs Of Pests

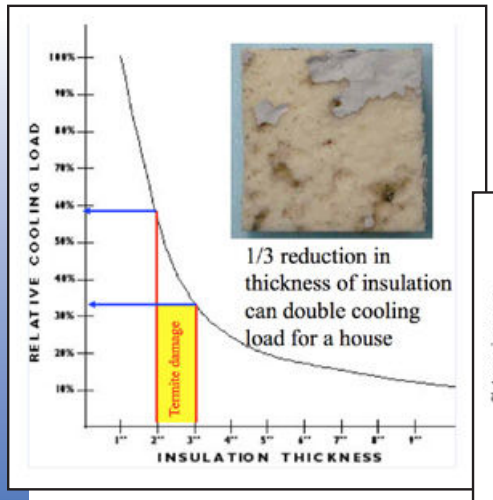
By Dr. Phil Koelher University of Florida

As we approach the colder months of the year and the landscape and structural pests slowly fade from our minds, perhaps it is time to consider some of the hidden effects and hidden costs associated with pests in and around human structures. You need to explain these hidden costs to your customers. These hidden costs are often forgotten when your customers consider the cost of pest control compared with their losses if they don't have your service.

Make sure your customers know about termites and their hidden costs. Damage from termites and wood boring beetles remains hidden until termites emerge as winged reproductive or beetles chew holes in the wood when they emerge as adults.

Depending on exactly how the termite infestation develops, and how attentive the property owner is to changes in the structure, some of the hidden costs can go on for a long time before the termite infestation is discovered. The extent of this occurred at the Womens club building in Jacksonville this past year. The museum was being renovated and they discovered the wooden bones of the structure were completely destroyed by Formosan termites. The museum that was renovating the building lost $7 million in structural damage that was hiddent from view, but determined by structural engineers to be structurally unsound. None of that damage was visible.

A few years ago we had a student working on damage to thermal insulation due to termite infestations. Some of this damage may occur much before the structural damage in a building is visible. Termites invade structures to consuming wood and other cellulose-based material, but in the process of finding and exploiting these materials, they may damage a lot more, such as insulation material. The loss of insulation properties alone can represent a significant hidden cost due to termite infestation. A 30% loss in the insulating capacity in a building can double the cooling load for a house, and that can represent a significant amount of money in warmer areas where we depend on cooling or structures for a great part of the year.



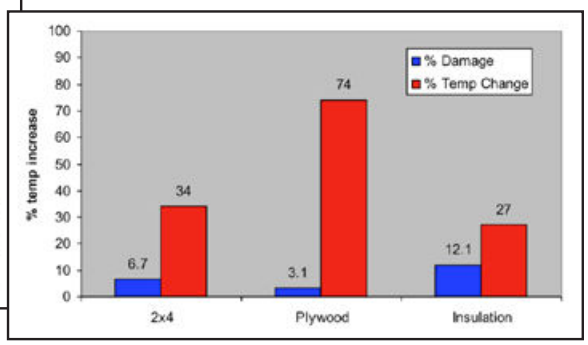
And it is not just the damage to the insulation component that damage the insulation capacity of the wood frame buildings. Our experiments showed that relatively low consumption of wood can change considerably the heat exchange allowed by wooden elements used in structures. For example, just a 7% consumption of 2X4 caused a 34% increase in the temperature passing through that piece of wood. A 3% consumption in plywood caused a >70% change in the temperature going across.

Another one those pests with hidden costs is the fire ant. There are many losses associated with fire ants that are unseen. Do your customers know that fire ants can tunnel under driveways and roads? That tunneling can undermine a driveway causing it to crack and settle unevenly. We have seen roads in subdivisions undermined by fire ants that are not controlled. In fact one hidden cost was to the state of Florida when it was building I-75 near Tampa. Construction of the interstate was held up for several years because fire ants undermined the road while a bridge was being built. The section that was already paved was undermined and had to be reconstructed because lack of road traffic allowed fire ants to tunnel under the road causing it to collapse and crack.

Fire ants are also important for doing hidden damage to electronics. For instance they can short out electronics on cars, air conditioning units and well pumps. Less known is that they can short out electronics that regulate traffic signals. Traffic signals that are not working can cause car accidents., another hidden cost of pests. Let your customers know that ants are attracted to electricity and can damage their expensive electrical equipment.

Also, through the years working with these insects, our lab would receive phone calls from people asking where they could move to in order to get away from these pests. Some people just did not want to be bothered by these pests, but most of them just wanted a safe place to live with some family member that was diagnosed with a life-threatening allergy to these ants. In fact, recently, someone very close to us reacted badly to a fire ant sting and ended up having an unexpected trip to the Emergency Room.

Fire Ant Bites ??



In this case of a family considering moving due to an allergic reaction to an insect, there is a not-so-hidden cost to this pest. Moving a family requires finding new jobs, moving expenses, adapting to new schools, and many other things that come with a price tag. Moving away from fire ants in the US will force you to go North, which may actually represent a few savings

in cooling bills, but with certain increases in the heating costs, or to go into a drier climate (desert-like).

But even for those people that decide not to move, the cost of constant vigilance against fire ant bites and their consequences also add up. We all heard about absurd prices they are charging for "EpiPens" these days!

One can say that this is a pretty extreme example, and it probably is! But there are many other examples of hidden costs of pests that we do not necessarily take into consideration.

If we consider another common pest group, cockroaches, the hidden costs are also extremely important. We can start with the costs associated with cleaning and sanitation of cockroach infested properties. If you have ever entered a college student apartment filled with pizza boxes and leftover food everywhere, you can imagine what we are talking about. Cockroaches will really thrive in these locations, and then the preparation of these apartments for the next resident will certainly require more than a simple cleaning. Removing all the signs of a cockroach infestation will certainly cost some money.

However, it is the hidden health costs associated to cockroach allergies and cockroach-caused asthma that are the real damage. A study in inner city areas in New York City, Washington, DC, St. Louis, Baltimore, Chicago, Cleveland, and Detroit

Revealed more than 50% of bedrooms had high cockroach allergen levels and a resulting 37% of children were allergic to cockroach allergens. These children lost more school days and had more medical and hospital visits, and their caregivers had more nights of lost sleep, which result in lower productivity and other health costs. A study sponsored by the NIH (National Institutes of Health) confirmed that cockroach allergen is the primary contributor to childhood asthma in US inner-cities. Part of these hidden costs associated with health problems brought about by cockroaches are actually borne by the society at large through the cost of social programs and others.

In the area of lawn and ornamental pests, there are also many hidden costs. We can start with simple cleaning costs, for instance, associated with excessive dropped leaves, or removal of weed, but there are many others. Because L&O pests may also affect other economically important crops, some agronomic pests can find refugia in our yards and lawns. Also, important pests, such as the Asian citrus psyllid (Diaphorina citri) that transmits the bacterium that causes Citrus Greening, can find host plants in many urban yards. The hidden costs of these urban yards plants can be felt on the price of groceries we buy. Also, a lawn killed by chinch bugs cause allows fertilizer to run into a lake and cause eutrophication. Movement of fertilizer into water sources is greatly enhanced when a healthy is not maintained. Your customers can help protect the environment when the control lawn and ornamental pests.

Let us consider now the bed bug resurgence that has occurred in recent years. People well beyond the areas heavily affected by bed bug infestations were extremely worried about this pest. Despite the fact that no diseases are known to be transmitted by these insects, the public in general went into a bit of a panic mode as they contemplated the possibility of travelling somewhere and bringing bed bugs back home. The anguish that this simple thought caused, was certainly enough to prevent people from visiting certain areas, and limiting their travel plans. We certainly answered enough phone calls from people concerned with bed bug infestations. All that anguish probably translated into some cancelled travel plans, discarded luggage and other belongings, unnecessary bed bug control products (probably many of which would not have had any effect on a real infestation anyway!), and perhaps other hidden costs. All this, of course, comes on top of the real costs of controlling real infestations.

So, as we consider the hidden costs of urban pests, it is important to tell your customers about the hidden benefits of urban pest control. Whether these benefits are enjoyed by the pest management industry clients, or by the general public, they are part of the collective good that comes out of a well-managed urban pest management program. Pest management goes beyond killing pests. It is an insurance against the hidden costs that may not be tightly connected with the pest problem. Your customers should understand that when they are paying for a pest control service they are getting a lot of hidden benefits.

Wood Destroying Beetles:
A Growing Market

By Dr. Reid Ipser, Technical Director, Nisus Corporation

The market for wood destroying beetle preventative and remediation work is growing. The opportunities for work in the residential and commercial markets are increasing each year; however, it is a complicated market with many misunderstandings, particularly about beetle biology and behavior. Proper expectations are, on average, not well communicated to the customer. In fact, in 2016, I not only received more technical calls about WDB, but the majority of calls were homeowners asking questions about the process and the PMP! So, stay smart and focus when conducting beetle work.

It's critically important to know what species you're dealing with before you determine what actions to take. So, as one travels down the great beetle highway the first question should be, "which beetle am I dealing with?" The two most common and damaging are beetles in the families Lyctidae and Anobiidae. Generally speaking, both these families cause the majority of the damage in the larval stage, whereby the larvae create narrow haphazard tunnels under the subcuticular surface. Adults emerge via exit holes and soon mate. Females lay eggs in the cracks on the wood surface, thus starting the life cycle again, which can be between 1-5 years.

While these beetles have a few things in common, there are some specifics that differentiate the two families. Lyctidae – true powder post beetles – attack only wood members from hardwood tree species. This strict preference narrows their locations to areas such as doors, window and doorframes, as well as some furniture and hardwood floors. In addition to hardwood tree species, they particularly like bamboo floors. Lyctid beetles tend to infest new wood members; in fact, they are the most common WDB in newly built homes, although they can infest older homes via remodeling. Usually the infestation is a result of contaminated wood that was improperly kiln dried or stored after drying. Furthermore, infested wood in homes is usually the result of contaminated wood prior to installation, a responsibility that usually falls on the builder. A classic example of this is beetle emergences from cabinetry six months after installation, as the beetle life cycle is usually one year.

Anobiid beetles pose a different situation, particularly in the Midwest. Areas of structures which lack a central heating or air conditioning system to reduce moisture levels below 12~14% can create favorable conditions that allow anobiid infestations to spread upward into the walls and building interior, thereby increasing the chance of infesting furniture. Anobiids also tend to infest damp wood and areas with poor ventilation, which explains their preference for crawl spaces and basements common in the more temperate areas in the US. Species of this family may attack both hardwood and softwood species. Thus, anobiids will also attack beams, sills, studs, joists and different types of subflooring. Pine species is very susceptible to attack. Their pathway for introduction is also greater than lyctid beetles. Anobiid beetles may be introduced through infested lumber, firewood and other outside elements. The furniture beetle, Anobium punctatum, is an exotic species from Europe that is common in imported furniture. Their life cycle can be as long as five years; however, in extreme conditions in the Midwest/Northeast areas, it can extend seven years. This can give the homeowner a huge panic attack because of the unknowns associated with variations in the beetles' life cycle biology and behavior.

These insects pose unique situations due to their biology and behavior. To the layman, they are relatively the same; however, their inherent biological differences lead to different control methods. Ultimately, the focus should be on wood preservation. By preserving the wood, one can protect wood members from attack from additional organisms (such as fungi) after beetle infestations.

Several control methods are available and many factors in addition to pest species determine which should be used.

Fumigation: Fumigation is expensive, disruptive and timely – particularly for large structural control. It puts burden on the homeowner, plus after treatment there is no residual protection nor preservation. Beetles may re-infest immediately afterwards. As a result, it is generally considered to be a last resort option. For individual pieces of furniture, it can be performed at lower costs and burden.

Synthetic Insecticide(s): Some synthetic insecticides are labeled for beetle control on bare wood. These products will kill adults and larva on contact, but do not preserve the wood.

Wood Preservation via use of Borates: Borates are the only products in the market that kill and prevent future beetle attacks, and preserve the wood from decay after infestations have been irradicated. Multiple formulations exist, and each must be applied to bare wood. Topcoats must be sanded off prior to treatment. Bora-Care® with Mold-Care® is the only product on the market that is a wood preservative and moldicide.

Home Rule Can Cause Problems For Our Industry

By Gary Pietrucha,
President, Envirosafe Pest Management
Seated Member Governor's Advisory Council

It is always amazing to me how ordinances kind of pop up out of nowhere. I was most recently presented with HB 0369. This was sponsored by Illinois Representative Jamie Andrade. Jamie is a longtime resident of the Irving Park neighborhood in Chicago, a DePaul University Grad, and is a member of the Democratic Party. Here is his proposed bill: HB0369 Creates the Bedbugs Disclosure to Employees Act. Requires an employer to notify employees if a person certified under the Structural Pest Control Act has determined the presence of bedbugs at the place of employment. Provides that such notification shall be made electronically via email or, if notice by email is not possible, the employer shall issue a written notification to each employee or post a written notification in a conspicuous place or places used or reserved for employee notices. Now after reviewing this with my fellow Advisory members and the head of the Illinois Department of Public Health Environmental Health Division, and after reviewing with the Executive Board and Board of Directors of GCPMA, our position is NOT to support this bill. The consequences could be dramatically bad, even though the intentions are probably good here. There are too many negatives that could come out of this legislation. For example, if there are bed bugs in the workplace, would employees be allowed to miss work with pay until the problem was resolved? Would the Employer be held responsible if Bed Bugs were brought to the home of the employee? What would be the fines for non disclosure? There are many negatives that can come out of this legislation. However, with Home Rule, Chicago COULD adopt this piece of legislation. Just as with the Chicago Bed Bug Ordinance, things would be different for anyone within the city limits.

This brings me to legislation introduced by Ald Raymond Lopez of the 15th Ward in Chicago, who's statement went as follows: Poisonous chemicals that can "decimate the population" of bees, butterflies and other pollinators would essentially be banned in Chicago under a crackdown proposed by a rookie alderman. Ald. Ray Lopez (15th) is taking aim at neonicotinoids. Lopez introduced an ordinance last week that would prohibit "any person, organization and/or community garden operator" from using an insecticide classified as a neonicotinoid. The only exceptions would be veterinarians, farmers and certified pesticide applicators. Neonicotinoids include imidacloprid, nithiazine, acetmiprid, clothianidin, dinotefuran, thiacloprid and thiamethoxam. These insecticides are water soluble, so they can be sprayed on plants or applied to the soil. They are more toxic to insects than to mammals and birds. Pesticides containing neonicotinoids are not used on city property. But the products are widely used by landscapers, farmers and homeowners. Many flea powders for cats and dogs also contain a neonicotinoid. . . . . Lopez said the only people disputing scientific studies on the negative impact of neonicotinoids "are those making a profit off them." Fifty years ago, the same forces were "dragging their feet over DDT," he said. . . . . "There are plenty of other less harmful options for consumers who want to control pests. Chicago can be a national leader on this issue." That final statement pissed me off. We have always championed safety and, as an industry, spent the most amount of money and research to protect the environment and the safety of our clients. I intend to speak to Dr. Cort Lohff, head of the Chicago Health Department and possible Ald Lopez about this proposed ordinance. Also, if you have the time, it is imperative that you familiarize yourself with the State of Illinois Structural Pest Control Act, which will sunset December 31, 2019. The last time this happened (2009), I was President of GCPMA and the entire State was unaware of the bill sun setting, so we were operating under FIFRA until finally, in August, Chris Haggerty and I, along with a lot of work by IPCA lawyers and our lobbyist in Springfield, got the bill attached to another bill covered by the IDPH and put it in place safely for a decade. There have been minor changes since that time, but read the "ACT". It is very important!!!!

2017 Illinois Department of Public Health Pest Control Exam Calendar

Skokie - March 28
- All Testing – 9:00 AM

Holiday Inn, 5300 W. Touhy (W. of I-94)

Des Plaines - May 4
- General Standards Exam Only – 9:00 AM • All Other Testing – 1:00 AM

Illinois Central Management Systems, 9511 W Harrison St, Room LL-11

Des Plaines - August 3
- General Standards Exam Only – 9:00 AM • All Other Testing – 1:00 AM

Illinois Central Management Systems, 9511 W Harrison St, Room LL-11

Tinley Park - September 19
- All Other Testing – 9:00 AM • General Standards Exam Only – 1:00 PM

Holiday Inn Convention Center, 18451 Convention Center Dr

Des Plaines - December 12
- General Standards Exam Only – 9:00 AM • All Other Testing – 1:00 AM

Illinois Central Management Systems, 9511 W Harrison St, Room LL-11

To Enroll: http://dph.illinois.gov/topics-services/environmental-health-protection/structural-pest-control

2017 Pesticide Safety Education Program University of Illinois Extension

Matteson - April 4 - 5
- General Standards
- Turf
- Ornamental
- Mosquito
- Rights-of-way

Matteson Holiday Inn, 500 Holiday Plaza Drive, I57 and Rt. 30

Alsip - April 11 - 12
- General Standards
- Turf
- Ornamental
- Mosquito
- Rights-of-way

Doubletree Hotel, 5000 W. 127th Street

Des Plaines - May 2 - 3
- General Standards
- Turf
- Mosquito
- Rights-of-way

Oakton Community College, 1600 E Golf Rd. Room 1604

Streamwood - May 18
- Testing Only

The Seville, 700 S. Barrington Rd.

To Enroll: http//web.extension.illinois.edu/cpt

** All state pesticide certification and licensing exams and associated materials are only provided in English.*

Greater Chicago Pest Management Alliance
PO Box 601
Tinley Park, IL 60477

☆ SAVE THE DATE ☆ SAVE THE DATE ☆

— Tuesday, June 20, 2017 —
Itasca Holiday Inn, Itasca - 3 CEUs

— Wednesday, June 21, 2017 —
White Pines Golf Outing, Bensenville, IL

— Wednesday, September 20, 2017 —
Meeting of the Minds, Tinley Park, IL - 6 CEUs

Mark Your Calendars! More Information To Come!