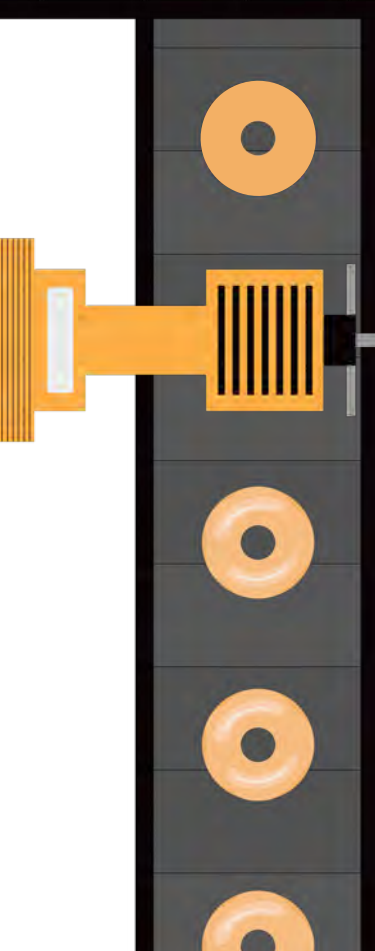




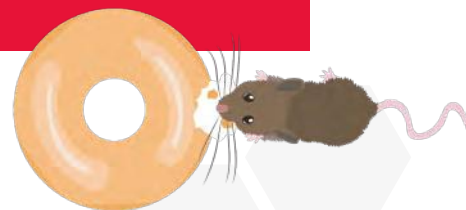
LESSONS IN PEST MANAGEMENT:

A STUDY GUIDE FOR IPM SUCCESS IN FOOD MANUFACTURING



Orkin Canada Academy: School's in Session

When it comes to pest management, you can never know too much. At Orkin Canada, we've seen it all: from facilities fastidiously documenting every fly to those letting rodents relax in the break room. That's why we're sharing the ultimate study guide of more than 50 facilities' best practices with you.





THE 5 PARTS OF A SUCCESSFUL IPM PROGRAM

No matter what you produce or where you produce it, the following principles will help lead you to pests management success:



KNOW THE PEST PRESSURES AND THEIR CAUSES

Take note of key culprits (including rodents, flies and cockroaches) and how they're likely to gain access.



TREAT ACCORDINGLY

Implement preventive measures first but know when and how best to apply targeted treatments to protect food safety and product integrity.



STAY SANITARY AND STRUCTURALLY SOUND

Sensitive areas (including drains and kitchens) should be cleaned daily, and there should be a written sanitation plan in place to ensure constant vigilance.



CREATE CONTINUITY THROUGH DOCUMENTATION

Capturing the entire process means you can refine and repeat for better results.



MAKE COMMUNICATION A CORNERSTONE

Our experience reveals that an open dialogue is key to effective pest management.

UNDER PRESSURE: PESTS THAT PLAGUE HIGH-PERFORMING FOOD FACILITIES

These pests are among the most common found in food processing facilities:



COCKROACHES (AMERICAN COCKROACH)

Who they are: While their colours and length may vary by species, these pests are known for their flat, oval-shaped bodies and six spiny legs.

Where they hide: Cockroaches are known to shelter in shelving, cram into cracks and crevices, relish the refuge of floors, drains and sewers and hide in equipment.

Why they're trouble: Known to spread disease-causing bacteria including Salmonella and E. coli, they're also quick breeders that are notoriously difficult to eliminate.



UNDER PRESSURE: PESTS THAT PLAGUE HIGH-PERFORMING FOOD FACILITIES (CONT.)



RODENTS (DEER MOUSE)

Who they are: Rats and mice, mammals of the order Rodentia, are known for their single pair of continuously growing incisors.

Where they hide: Rodents are highly versatile, living in nearly every climate and terrain. These creatures are most active at night and nest close to food sources when they can.

Why they're trouble: Rodents can cause significant damage to building infrastructure and electrical equipment. They're also capable of transmitting disease and contaminating food via their droppings and urine.



FLIES (FRUIT FLY)

Who they are: There are more than 16,000 fly species in North America, but they all share one unfavourable trait: the potential to carry and transmit bacteria.

Where they hide: Food processing facilities are likely to encounter fruit flies, which lay eggs near ripening fruit and vegetables, drain flies, which crawl along drains and clogged gutters, and filth flies (house flies and bottle flies), which are found near garbage.

Why they're trouble: Millions of microorganisms flourish in a single fly's gut – and another half-billion microorganisms can swarm over its body and legs. Each time a fly lands, it sloughs off thousands of these microbes, potentially causing serious illnesses like food poisoning and meningitis.



STORED PRODUCT PESTS (FLOUR BEETLE)

Who they are: Stored product pest is a generic term that describes beetles, weevils, moths and mites.

Where they hide: As the moniker suggests, these pests infest stored goods, particularly dried food products such as cereal, seeds, nuts, dried fruit and preserved meats.

Why they're trouble: These pests are capable of causing major damage to food supplies, resulting in lost products and profits.



ANTS (PAVEMENT ANT)

Who they are: Outnumbering humans 14,000 to 1, ants are the number one structural invaders on the planet.

Where they hide: Ants establish colonies in walls, lawns or under building foundations, but they are typically seen marching in lines near food sources.

Why they're trouble: Ants carry pathogens on their bodies, which spreads when they crawl in pantries and across surfaces. This means they're more than just nuisances – they're also food contaminators.



STOP RIGHT THERE: MANAGING COMMON ENTRY POINTS

Every facility is different, but all of them share common pest entry points. Keep a close eye on these potential threats to help avoid an infestation before it starts.



ROOF

Often overlooked, roofs are a common entry point for both birds and roof rats. Flat rooftops retain moisture, which creates breeding grounds for mosquitoes, fungus gnats and midges.



VENTILATION INTAKES

Bird's the word, and ventilation intakes are a favourite for perching, roosting and nesting.



WINDOWS & DOORS

Pests can fly through open doors and windows — or even be carried inside by employees.



DOCK PLATES

Dock plates are a favourite hideaway for pests, as there are often gaps surrounding dock plates that are built into the floor.



FLOOR DRAINS

Sewers are like a freeway system for cockroaches, and drains grant them open access into your building.



INCOMING/OUTGOING SHIPMENTS

Shipments are an essential element of business; however, they're also a probable entry point for pests.



HOW TO TREAT TREATMENT

Effective IPM plans use chemical treatments only sparingly and after sanitation, exclusion and other deficiencies have been addressed. Your pest management provider will work with you to determine the best solutions for your facility. There are three tiers of pest prevention equipment:

NON-CHEMICAL TOOLS

Non-chemical tools should be the first line of defense against pest threats. This may include:



Sticky traps



Fly lights



Air curtains



Door sweeps



Moisture control



LED lights



Landscape/habitat modification



Odour control



Rodent bait stations & traps



Sodium-vapour lights



Pheromone monitors



Sanitation



Caulking of cracks & crevices



Structural repair (exclusion)

REDUCED-RISK, TARGETED TREATMENTS

Once physical updates and sanitation procedures are in place, your technician may recommend a targeted treatment, often to cracks and crevices or via small bait placements.

CHEMICAL PRODUCTS

You should already have an approved pesticide list, and if necessary, your pest control technician will work closely with you to treat areas with the best and most effective products.



THE DIRTY TRUTH ABOUT KEEPING IT CLEAN

Proper sanitation is key to maintaining food safety. Without a thorough, well-documented sanitation plan in place, your facility will be at increased risk for pests, spoiled products and even foodborne illnesses.

STEPS TO SANITATION

It's time to grab your broom, microbial-based cleaner and soap. From washing hands to washing floors, below is your essential sanitation to-do list:

- Wash, sweep and/or vacuum processing areas regularly and immediately address spills.
- Clean machinery and equipment inside and outside.
- Remove garbage in a timely manner.
- Keep storage areas dry and organized.
- Rotate incoming ingredients and outgoing finished products, ensuring that the first products in are also the first products out.
- Clean and maintain locker and break rooms regularly.
- Wear personal protective equipment, including hair coverings, gloves and protective footwear.
- Store products on shelves off the floor. Maintain perimeter spaces in storage areas to ensure proper housekeeping and pest monitoring.
- Thoroughly wash hands with soap under warm-running, potable water.
- Install self-closing doors for all washroom facilities.
- Clearly identify and store food returned from retail outlets for proper disposal.
- And don't forget the outside! Keep the outside of your site clean and neat.

OPTIONAL (DEPENDENT ON YOUR FACILITY)

- Use a microbial-based cleanser for surface cleaning.
- Monitor temperatures when producing and/or storing foods.



WRITE THIS DOWN: DOCUMENTATION DILIGENCE

Your first meeting with a pest management provider will be full of information – and paperwork. These procedures and protocols are critical for ongoing facility monitoring and pest activity trend data. Here's what you can expect in the reports:



PROCEDURES

For all current or anticipated pest management activities, including inspections and audits.



FACILITY MAP

With pest management equipment listed (such as rodent stations).



PEST SIGHTING MEMOS

Which should include date, time, location, description and action taken every time a pest is seen within the facility.



TREND REPORTS

Which monitor specific pests over time to determine if activity is decreasing, stagnant or increasing.



TREATMENT RECORDS

Including name of product used, target pest, rate of application, time of application, location and amount of product used.

Each time your pest control technician visits, they'll update existing procedures, facility maps, treatment records and trend reports. But they also rely on you and your employees to provide accurate pest sighting logs.



BEST-IN-CLASS PEST CONTROL: HOW TO MAKE IT HAPPEN

IPM is an ongoing collaboration; think of it as one big group project. And like any successful group project, you'll need frequent team check-ins. Here's a timeline to follow:

DAILY

There should always be an open line of communication between your management team and the pest control provider. If something significant changes in your facility, such as alteration of a production line, the pest control technician should be made aware immediately.

WEEKLY

Have your pest control technician come out and service your facility. It's always preferable to speak with your technician face-to-face, discussing any new pest sightings, changes or concerns.

BI-YEARLY

Your pest control technician or the technician's manager should conduct service audits of the facility every six months, including a thorough inspection of the facility's exterior and interior and an analysis of pest trend data.

ANNUALLY

Your pest control technician should offer to conduct an educational IPM training, reviewing the current pest management program, areas for improvement and third-party audit standards.

ANNUALLY TO BIENNIALY

Your facility will likely undergo a third-party audit to ensure its compliance with vendor programs – and, of course, to continuously improve its food safety, quality and sanitation.

Here are just a few of the third-party audits you may encounter and their corresponding point scales:

- SQF: 100-point
- FSSC: Pass/fail
- BRC: A, B, C
- NSF/Cook & Thurber: 100-point
- AIB International: 200-point

If you're interested in learning how to better safeguard your food manufacturing facility with an effective IPM program, or would like a professional site inspection and recommended IPM plan with no obligation whatsoever, visit orkincanada.ca to learn more about our programs for the food safety industry or request a free consultation.