

# **Integrated Pest Control Is it the answer?**

**By André Swanepoel**

Insects and rodents are labeled as pests once they become unwanted in a particular environment which has sparked humanity's ongoing struggle in keeping these creatures at bay. The isles of products and choices of possible solutions available to consumers is evident of this struggle and can prove to be extremely confusing in terms of matching the best product suited to your needs. A marked increase in the awareness of environmentally friendly practices has raised more than a few eyebrows regarding the structure of pest control programmes, forcing practitioners to re-evaluate practices and products used. The answer may lie in widening the scope of the pest control programme and addressing the problem at the point of origin. Integrated Pest Management (IPM) is essentially a decision-making process that anticipates and prevents pest activity and infestation by combing several strategies that will support a long term solution. Components of an IPM programme may include training, proper waste management, structural repair, maintenance; biological & mechanical control techniques and pesticides application. A combination of two or more procedures may be the answer for the eradication of a pest problem, in some cases making the use of harsh and environmentally unfriendly products obsolete. An effective IPM system requires time and effort on the part of the service provider to inspect and monitor pest activity, implement proactive procedures and to make suggestions for eliminating points of entry and resting areas. The ultimate objective is to reduce existing problems or to deter potential pest infestations.

Pests rely on three basic aspects for their survival: Food, water and harborage. The fundamental principal of an EPM system rests on the modification of the habitat that the pests thrive in. Decreasing the availability of a suitable habitat and denying access into the premises is the starting point for the control of infestations. An IPM system does not necessarily eliminate the use of a pesticide but would rather include the use of a pesticide in terms of a broader strategy that relies on a combination of activities. An effective IPM programme will, however, reduce the amount of pesticides needed or in some cases entirely eliminate the use of it. There are six steps to a comprehensive Integrated Pest Management (IPM) system:

## **1. Inspection (on-going)**

Prior to the signing of a contract agreement it is vital to do a thorough inspection of the premises in question. It is of the utmost importance for a practitioner to verify exactly what they are dealing with before doing a quote. Costs surrounding staff required, equipment and consumables play a big role in the profitability of a contract and should therefore be carefully considered. This can only be done if the practitioner has all the information at their disposal. A large portion of the initial inspection is heavily reliant upon the information provided by the client. It is advisable to request a thorough brief from the client in terms of what is required and keeping the information on file for future reference. The process does not, however, stop here. Practitioners should have regular inspections of the site throughout the contract period specified in order to establish whether the target is being met and maintained.

## **2. Identifying pests and conducive conditions**

The correct identification of pests within an environment will save time and money in terms of applying the correct strategy from the word go. Identifying specific pests will lead to the correct prognoses in terms of effective habitat modification and effective product usage. In most cases a simple alteration in the environment is all that is needed to eradicate a problem. Maintaining an alteration in the environment becomes a vital aspect to the success of the programme.

## **3. Prevention**

Prevention is better than cure I hear you say, and truer words have never been spoken, making the treatment the source of origination crucial to any IPM system. A good starting point is to identify access points to the premises effectively. In most cases all alteration to the premises will be an adequate provision to make but will, however need the blessing of the client in terms of the expense. In certain cases simple and on-going maintenance of an area is needed to address the problem or support the alteration.

For any facility manager the disposing area presents the biggest headache in terms of pest infestation. Restaurants, cinemas and food processing areas still remain the usual culprits necessitating the need for a thorough and effective cleaning schedule which should aid the process. In a facility management scenario the situation is further complicated by the fact that each tenant is responsible for their own premises in terms of cleaning, sanitation and pest control. This puts the

contractor in a precarious position if the tenant's premises are not maintained, often leading to problems spreading to common areas. The best approach is to address the issue on a management level and to motivate the co-operation of the entire facility on the matter. In most cases frequent and thorough housekeeping will greatly aid in the implementation of a successful Integrated Pest Management System. On-going sanitation of facilities, particularly around food processing areas and bathroom facilities will go a long way in eradicating the harborage potential of a facility for pests.

#### **4. Customer consultation**

Regular meetings and communication with the client will ensure that everyone on the same page in terms of orchestrating timing and effectiveness of procedures, especially when different departments need to be utilized.

In a facility management environment a pest control technician should be able to identify sources of infestation within the facility, which should once again be addressed on a management level. A pest control operator's obligation lies with the client which places the responsibility of addressing third party involvement at the feet of the client.

#### **5. Procedure and application**

Once the necessary course of action has been identified a structured plan of action needs to be implemented for an effective IPM system. The compilation of a comprehensive procedure schedule becomes vital in guiding staff members in performing their duties in accordance within the agreement. The supervision of staff members, especially during the application of agricultural remedies is vital as public health and safety is of paramount importance.

#### **6. Evaluation and monitoring (on-going)**

No programs will be complete without regular evaluation of it, in terms of establishing effectiveness on the process. In the event of adjustments made to the process, it is advisable to monitor the adjustment in order to establish whether the change is effective. On-going training and evaluation of staff members is vital in maintaining standards and ensuring that the job at hand is performed at the level agreed upon.

#### **Pest control and HACCP**

HACCP (Hazard Analysis Critical Control Point) is an industry standard specifically focused around the safe and regulated food processing environment where food is produced and dispensed. In most cases the standard of the process is determined by the client.

The introduction of potentially toxic chemicals in a sensitive area such as the food processing area should not be taken lightly. Public health and the prevention of chemical contamination of food processing areas are of paramount importance to any pest control technician. This aspect once again reinforces the philosophy of using pest control chemicals as an absolute last resort.

It is important to distinguish the difference between a pest control technician and a HACCP compliant company. HACCP is a food industry standard and a pest control technician can merely comply with the standard when operating within the environment, which does not define what a pest control technician does.

South African legislation surrounding HACCP standards stretch as far as SABS terms and guidelines, with select companies such as Consulting Microbiological Laboratory (CML) offering microbiological testing and consulting services.

So how does the pest control technician fit into the picture, I hear you asking? Their role is simply that of adhering to the guidelines and complementing current activities within any environment.

Eradicating unwanted pests that could interfere with the safe production, packaging and distribution of food products will complement a HACCP programme if completed in compliance with HACCP standards.

In most cases the process is initiated by the client in question. An example would be retail stores advertising and building a reputation for having healthy and safe products on sale to their customers. In most cases, these outlets will have a well documented procedure in place, clearly specifying what is allowed. Heightened consumer awareness of health and safety is making these requirements part of everyday life. An Integrated Pest Management (IPM) system will go a long way in supporting and complimenting a comprehensive HACCP programme. A good IPM system is based on the foundation of good management practice, and it is therefore advisable for a pest control technician to familiarize themselves with the concept of a HACCP programme and what it entails.

#### **Training and quality control**

Ongoing training as a pest control operator is vital. Besides having to qualify in a Technikon course – one of which is offered by the Tshwane Technikon, the operator has to qualify in the Pest Control

**Service Industries Board requirements (PCSIB) and then register with the Department of Agriculture as a pest control operator. From there, the onus is on the company to provide ongoing, relevant training and updates.**

**The qualification of a pest control operator does not end with the awarding**