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BIRD MANAGEMENT ON THE FARM AND AT THE PROCESSING PLANT

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Bird management, whether conducted on farms or at food processing plants, utilizes a rather limited number of techniques in conjunction with an intimate knowledge of pest avian behavior. The deployment of bird management techniques is dependent upon the complexity of pest induced environment and limitations imposed by human, moral, political, social and economic pressures.

The techniques usually prescribed to solve bird management problems, (Fitzwater, 1971; Palmer, 1970) are outlined as follows:

1. Cultural applications
   A) Exclusion by architectural design
   B) Crop alteration with resistant varieties
   C) Nest destruction

2. Repellents
   A) Acoustical - exploders, fireworks, sonics (Av-Alarm, etc.)
   B) Chemical - roost repellents, seed protectants, crop sprays, etc.
   C) Mechanical - electric fields, rods and wires
   D) Visual - lights, mirrors, raptore forms, etc.

3. Traps
   A) Mobile trailer traps
   B) Portable traps
   C) Snares

4. Shooting – fumigants

5. Toxicants
   A) Wetting agents, roost sprays
   B) Toxic perches
   C) Ingested materials

The successful specialist, in solving bird management problems, employs all these techniques — either individually or in combination. Seldom will reliance on only one method satisfactorily alleviate crop depredations, plant sanitation problems, or nuisance bird problems. In addition, all laws and regulations pertaining to bird control roust be adhered to.

Two examples related to in the slide presentation regarding the solution of bird pest problems are:

A. A raisin processing plant where Cedar Waxwings (*Bombycilla cedrorum*) were causing contamination to raisins undergoing processing. Most of the techniques mentioned previously were tried without success because of restrictions imposed by the working environment and the responsibility to protect “migratory birds.” Trapping was the successful technique finally employed. Up to 16,000 Waxwings were captured each year and transported twenty miles northward from the capture site, then released unharmed. In the five years that this program has been

conducted, there have been no adverse effects or complaints.

B. A large acreage farming operation raising 790 acres of figs, 1,000 acres of grapes. Acoustical repellents, traps and toxicants are all employed to solve bird depredations (Palmer, 1970). Four converted cotton trailer traps and four modified crow traps (Royal, 1969) are used as well as Av-Alarm and bird scare cannons. Strychnine-treated bait is exposed if depredations warrant its use. Captured birds are destroyed or used by government research agencies for experimentation. This program has been in effect since 1968.

These examples demonstrate the solutions of avian pest problems utilizing integrated techniques. Using proper techniques, keen observations and obeying laws are all involved in successful bird management.

As more knowledge is gained the need for mass killing of large numbers of birds is being reduced; however, roost sprays or other methods may be needed to reduce large bird concentration when public health is jeopardized. Avian pest management to reduce depredating bird losses in agriculture should not involve large scale poisoning operations. Control should be directed towards alleviating the problem with the least amount of impact on the offending species and any non-target species also inhabiting the same environment.

Literature cited

Fitzwater, William D. 1971. Animal Briefs, No's 6 through 23, Univ. Calif. Agric. Ext. Ser., Davis, California.

Palmer, T.K. 1970. The house finch and starling in relation to California's agriculture, (Proc. General Meeting Working Group on Granivorous Birds, IBP, Pt Section, Editors, Kendeigh, Pinowski - 1972) Warszaw, pp. 275-290.

Royal, W.C., Jr. 1969. Trapping house sparrows to protect experimental grain crops. USDI Wildlife Leaflet No. 484, 4pp.