AN EVALUATION OF CONTROLLED HUNTING FOR MANAGEMENT OF FERAL PIGEONS

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ABSTRACT

Pigeons (Columba livia) are a problem for municipal governments throughout most of the eastern United States. Toxicants, sterilants, trapping, and shooting are the principal control techniques. Due to a general public aversion to toxicants and to monetary constraints, a pigeon control program which utilized periodic hunting pressure was initiated in Stuttgart, Arkansas County, Arkansas. Guidelines for organization of controlled hunts are presented along with pigeon harvest rates and population trends. The city government and interested citizens consider the program to be successful and cost effective.

INTRODUCTION

Complaints of feral pigeons plague municipal authorities throughout the eastern United States. Pigeons benefit greatly from the waste and neglect of our society and their prolific and gregarious nature often conflicts with human interests. Pigeons typically roost in large concentrations around abandoned buildings, complex superstructures, and ornate architecture. Excretion from these birds often defaces store fronts, signs, sidewalks, statues, and awnings. Frequently, pigeons will roost and feed near grain elevators contaminating stored grain and causing substantial economic loss. Furthermore, free flying pigeons transmit over 40 diseases and can cause serious health problems to humans and domestic animals (Weber 1979).

In November of 1984, the Arkansas Animal Damage Control office was contacted by municipal authorities from Stuttgart, Arkansas County, Arkansas. Several nuisance pigeon complaints had been received and it was apparent that a control program was necessary to keep the pigeon population at a tolerable level. In addition, the city's economy is largely based around grain storage and processing; therefore, a control program would have positive economic implications.

Methods for pigeon control were discussed with Stuttgart city officials including toxicants, sterilants, trapping, and shooting. Toxicants were not considered due to a general public aversion to poisons and the potential for secondary and non-target mortalities. Sterilants were eliminated because of the large number of roost sites in town, questionable effectiveness, monetary constraints, and the need for immediate reduction of the population. Furthermore, an effective trapping program could not be initiated due to a lack of available personnel. Therefore, shooting appeared to be the only viable and effective alternative.

Municipalities are often hesitant to initiate a pigeon control program centered around shooting because of liabilities and public misunderstanding. Shooting can be an extremely cost effective method for pigeon control, but precautions must be taken to reduce the potential for damage, injury, and negative public relations.

METHODS

Controlled hunting has been used to control pigeon populations in Stuttgart, Arkansas for the past 3 years. Total cooperation was received in these efforts by the City of Stuttgart, the Grand Prairie Chapter of the National Wildlife Federation, the Arkansas Game and Fish Commission, and the USDA-APHIS, Animal Damage Control office in Stuttgart. The cooperative agreement is essential in producing effective control, and each faction presents expertise, manpower, and logistic support to the program.

Pigeon hunts were planned well in

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advance and approximately 25 hunters were selected to participate each year. Special care was taken to select only responsible and conscientious hunters. The one-day controlled hunts were scheduled from late-February to mid-March; a period when pigeons can be easily attracted to bait. This is also a low period in the pigeon reproductive cycle (Wofford and Elder 1967) and public relations problems associated with killing nesting birds were avoided.

Prior to the hunt, it was necessary to go before the Stuttgart City Council with a list of hunters and ask that the city ordinace prohibiting the use of firearms in the city limits be lifted during the one-day hunt. Newspaper articles after the city council meeting and on the day before the hunt were used to raise public awareness. Hunts in the downtown area were scheduled during the early morning hours (sunrise to 0800 hours) to avoid interference with the business of local vendors. During these hours the main downtown streets were blockaded by city police and traffic detoured. Shooting continued until 1030 hours at the grain elevators on the north side of town. Controlled hunts were always held on Saturdays when grain elevators were closed.

Pigeons were attracted to "huntable" areas by establishing bait sites 7-10 days prior to the hunt. Cracked and whole corn was placed on abandoned buildings and along railroad tracks up until the day of the hunt. In an effort to reduce incidental damage to buildings, hunters were restricted to using shotguns with shot no larger than $\#7\frac{1}{2}$. All shells were provided by hunters.

On the day of the hunt, all hunters were required to sign in and then given a briefing on the regulations. Efforts were made to strategically distribute hunters to maximize the harvest. Hunters were placed on top of buildings and grain elevators as well as in the streets. Downed birds were retrieved whenever possible and assistance in collecting dead birds was provided by the Boy Scouts. These birds were dressed and consumed at a "wild game" dinner sponsored by the Grand Prairie Chapter of the National Wildlife Federation. Throughout the year, pigeon "trouble areas" are alleviated by use of pellet rifles. These rifles, which shoot at velocities of approximately 1000 fps, are effective at controlling local populations and can be discharged in most city limits without violating local ordinances.

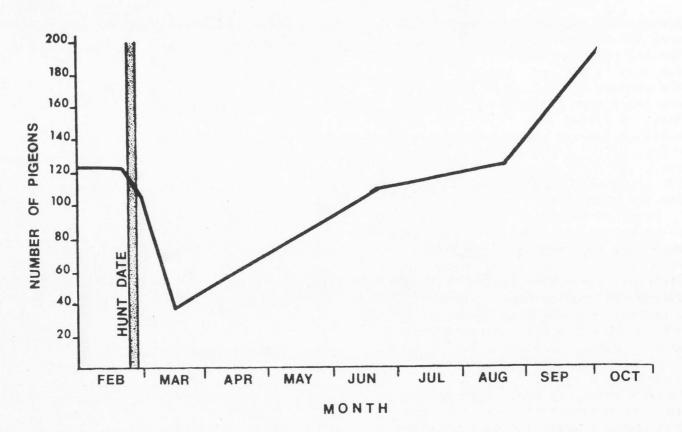
In 1987, a drive route was established to index the pigeon population in Stuttgart and to evaluate the pigeon control program. Surveys were conducted 2 weeks prior to and 2 weeks after the hunt date, with bimonthly routes conducted thereafter. Counts were made on 3 consecutive days and weekly averages compiled.

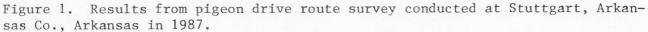
RESULTS AND DISCUSSION

In 1985, more than 3,000 pigeons were harvested during the controlled hunt at Stuttgart. For the past 2 years approximately 500 - 700 pigeons were removed. Tolerable pigeon populations within the city limits are considered to be from 1,500 - 2,000 birds. Prior to our control measures, Stuttgart's pigeon population was estimated at 5,000 birds and 2 hunts (late February and early March) were necessary to obtain tolerable levels. Since then only one hunt/year, plus natural mortality, has maintained the pigeon population at approximately 2,000 birds.

Indices tabluated from survey data showed that pigeon numbers dropped following the hunt date (Fig. 1), but steadily climbed to pre-hunt numbers by July. Figure 1 indicates that an artificial mortality factor is necessary to keep populations below the nuisance level and controlled hunting is effectively providing that control.

To this date, we have not had any reports of injuries or damage resulting from the controlled hunts at Stuttgart. We believe that through careful selection of hunters, proper public relations, and utilization of harvested birds, much of the negative feedback associated with pigeon shooting can be avoided. Furthermore, we have yet to meet any strong objections to the program from residents of the city. Much





effort is placed on notifying residents of the hunt date and special safety precautions. We also make it clear that our goal is not to completely eradicate pigeons, but that we are attempting to keep their numbers low to avoid economic and health problems.

City officials have been extremely pleased with the results of the program and nuisance pigeon complaints are declining. However, the most appealing part of the program is centered around the fact that the city's only cost for the control is the time and manpower associated with blocking traffic during the 2 hours of hunting in the downtown area. Such costs are far below those encountered with other control measures and is extremely attractive to municipalities which are faced with financial constraints.

LITERATURE CITED

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