
Stray-Dog Control in Cyprus: Primitive and Humane Methods

Kyriacos Polydorou

Kyriacos Polydorou is Director of the Department of Veterinary Services, Ministry of Agriculture and Natural Resources, Nicosia, Cyprus.

In Cyprus, a dog control scheme was started in 1971 within the context of an all-inclusive anti-echinococcosis campaign. At the time, it was estimated that there were more than 100,000 dogs in the island, almost all of which were strays (even many of those that were purportedly "owned"). These had been identified as infectious agents of echinococcosis in Cyprus (the average surgical incidence in humans, over the 30-year period prior to 1970, was 12.9/100,000). The destruction of stray dogs is accomplished by using guns that fire a syringe containing a euthanizing drug. In the past (prior to 1970), various inhumane methods used by dogcatchers or other individuals included hitting the dog on the head with a sharp tool, hanging the dog from a tree, poisoning it with baits, or shooting it with a hunting gun. Despite an initial negative reaction on the part of both the general public and dog owners, the organized destruction of stray dogs that started in 1971 was continued without interruption. At present, the dog population is under control, and all stray and unwanted dogs are euthanized. The Cyprus experience, in which the initiative for dog control was undertaken by the Department of Veterinary Services, can well serve as an example for many other countries.

Zusammenfassung

Im Jahre 1971 wurde auf Zypern ein Hundekontroll-Programm im Zusammenhang mit einer umfangreichen Anti-Echinokokkus Kampagne begonnen. Damals rechnete man mit einer Hundepopulation auf der Insel von schätzungsweise 100,000,

van denen die meisten streunende Hunde waren (obwohl einige van ihnen angeblich einen "Besitzer" hatten). Diese wurden als ansteckende Trager der Echinokokkose identifiziert (das durchschnittliche Vorkommen im Menschen wahrend einem Zeitraum van 30 Jahren var 1970 war 12.9/100,000). Die Vernichtung der streunenden Hunde erfolgt mittels eines Beschussgerats mit einer Spritze, die eine euthanasierende Drage enthalt. In der Vergangenheit (var 1970) wurden van Hundefangern und anderen Personen inhumane Methoden angewendet wie zum Beispiel Erschlagen mittels eines spitzen Gegenstands, Erhangen an einem Baum, Vergiften mittels Kader und Erschiessen mit einem Jagdgewehr. Trotz einer anfanglich negativen Reaktion seitens der breiten Oeffentlichkeit sowie van Hundebesitzern wurde die Vernichtung van streunenden Hunden, die im Jahre 1971 begann, ohne Unterbrechung fortgesetzt. Gegenwartig ist die Hundepopulation unter Kontrolle und alle streunenden und unerwunschten Hunde werden euthanasiert. Die Erfahrung van Zypern, wo die Initiative fur die Hundekontrolle vom Veterinardienst-Department herkam, kann sicherlich als Beispiel fur viele andere Lander dienen.

Background

In the past, and up until the 1960's, almost every dog on the island of Cyprus could be termed a stray. Even supposedly "owned" dogs might roam for days before their owners would bother to look for them. The dog population at that time was estimated at over 100,000. This population was, almost totally, comprised of mongrels that had resulted from haphazard breeding through the years. These dogs were "wilder" as compared with their present-day counterparts: they had very little contact with people, and most spent their days and nights roaming the outskirts of the towns or villages trying to secure food.

Food was obtained, in part, from scavenging at the local garbage dump or nearby abattoirs. Otherwise, these dogs - usually in packs but less often individually - raided easy-to-reach hen coops, most often at night. These raids were similar to those made by foxes, which were also plentiful at the time. In addition, it was not unusual to hear of attacks on small or large domestic animals by packs of "wild" dogs. This situation infuriated the island's farmers, who usually reacted violently toward any dog they happened

to find attacking their livestock. They would retaliate with any weapon available as, for example, an ax, a heavy iron rod, or a hunting gun. Such raids occurred more frequently when the animals were penned at some distance from the farmer's residence, but attacks on pens kept within the village were also a common event.

Thus, these dogs, guided by their natural instincts and without any restraints imposed upon them by civilization, roamed in the fields, reproduced prolifically, and exhibited aggressive behavior that was almost identical to that of completely wild dogs. Indeed, such was their reputation in some areas that people, and particularly children, were afraid to cross the open country at night, because of the danger from attacks by dogs.

In 1910, a Cruelty to Animals Law had been enacted in Cyprus, which provided for penalties that ranged from small fines to 6 months' imprisonment for persons found guilty of "unlawfully and maliciously killing, maiming, wounding or mutilating any animal" or "cruelly beating, kicking, over-riding, over-driving, over-loading, torturing, or terrifying any animal." However, little attention was paid to this law, primarily because the Cypriots,

in general, exhibited only apathy toward the problem of ill-treatment of animals, and very few people were willing to give evidence against a second person or inform the police about this kind of offense.

Dogcatchers and the Primitive Destruction Methods Used in the Towns

During this period, there were a number of dogcatchers in operation. They used a somewhat grotesque contraption - a tricycle with a small pen (constructed of wood and wire) mounted on the back, into which dogs that were caught were placed and then carried away. The actual capture was accomplished using a net-trap (a long stick with a circular iron frame attached at one end, which held a net). The catcher had to approach the dog slowly and cautiously and, with one quick movement, trap it onto the ground within the net. He would then invert the net and let the dog literally hang in the trap while he twisted the top opening shut tightly, in order to make it impossible for the dog to escape. Later, he would venture to place his "catch" inside the small, wooden, wire-sided pen of his tricycle. The captive dog would usually try to escape, bite the wire or the wooden frame, and bark wildly, creating havoc throughout the neighborhood.

Partly because of the sheer difficulty of their work, the number of operating dogcatchers was very limited, and inadequate for handling the stray-dog problem. Also, these dogcatchers operated mainly within the towns, in order to alleviate the many problems caused by the presence of the dogs there, and to assuage the public apprehension that would inevitably arise from seeing these dogs in the streets or near houses.

The dogcatchers were looked down upon as an inferior caste of people, to be made fun of. They were despised,

even by the little children who stood by curiously while they were performing their job. Invariably, the dogcatchers were illiterate, even rude people; this fact may serve as a partial explanation as to why they were willing to accept that kind of job in the first place. They often kicked and hit the dogs they caught; in general, they were quite hard-hearted about the treatment of these animals. Watching them was truly a sad sight, and the well-being of the dog unfortunate enough to have been captured was given no consideration at all.

At the time, there were no other groups organized for the destruction of strays except for the dogcatchers who, because they were usually acting without any direct supervision, were able to utilize any methods they considered appropriate under the existing circumstances (given the amount of time available, the tools accessible for killing, etc.). Their methods of killing, like their methods of capture, were extremely rough and cruel. They included shooting (small shot), asphyxiation with diesel exhaust gases in a small, airtight compartment, and firing a captive-bolt pistol into the forehead of the dog. Further, from the time the dog was caught until the moment it was finally killed, it undoubtedly endured a long period of agony, since it was kept confined within the small wire-pen (often with several other dogs that were strange and sometimes hostile), before it was immobilized with a rope or a net, and then finally destroyed.

The Situation in the Rural Areas

In the rural areas, the large open expanses of the plains and the deep crevices in the hills provided a natural abode for dogs, where they could find a refuge from bad weather and breed, raise their puppies, and hide from humans.

People in villages usually kept two or three dogs, depending upon their needs,

i.e., the size of their sheep flock or the size of their house, which had to be guarded from thieves. Houses in villages were usually surrounded by a high stone wall. Within this enclosure, all of the farmer's animals were kept- chickens wandered about freely; one or two pigs occupied one corner; sheep and goats were penned at another corner; and there would likely be a couple of draft cows, mules, or asses as well.

Rough branches of a thorny bush were carefully and firmly placed on top of the stone wall, in order to make sure that no one could climb over it. The household's dogs would serve as an additional line of defense by barking wildly at any stranger. These dogs would usually be tethered, since they would otherwise be likely to attack the household's chickens or cause other problems. I have been told, by an eyewitness, of such a case, in which a dog that killed a chicken made its owner so furious (the dog had probably committed the same offense at least once before in the past) that he quickly fetched a rope and tied the dog at the neck, threw the rope over a tree limb, and pulled on the rope. The rope was secured so that the dog was hung from the tree; it eventually had convulsions and died. It was then left there to hang for another half an hour.

This story illustrates one very primitive and cruel way of destroying an unwanted dog. It also shows how the Cruelty to Animals Law was largely ignored by those responsible for its enforcement, as well as by the people who felt free to destroy a dog in such a cruel way.

Other methods used to control dog populations have included baits (pieces of lard impregnated with strychnine), which were thrown into places that were inaccessible to humans but where dogs were likely to hide, such as deep crevices and caves. Also, hunting guns sometimes were used by Forestry Department work-

ers and the police, but little was accomplished by destroying the animals. A small number of loose dogs that lived near the villages or forest resorts were killed, but the routine shooting of stray dogs was not part of these workers' usual duties, and the former population level of stray dogs was soon restored shortly after such shooting forays.

Dogs and Echinococcosis

Echinococcosis in dogs was mentioned in the *Archives* of the Ministry of Agriculture for the first time in 1928. This disease, it was later discovered, was very common among dogs (as many as 40 percent were infected), sheep (between 60 and 100 percent carried the hydatid cysts of the infection), goats (15 to 30 percent infected), cattle (50 to 60 percent infected), and pigs (30 to 50 percent infected). In humans as well, this disease was very common (the reported annual surgical incidence was 12.9/100,000), with a mortality of 2 to 4 percent. Thus, the incidence of this disease, when first discovered and then up until the 1960's, was sufficiently high to place Cyprus second in worldwide severity-at the time, only Uruguay reported a higher surgical incidence than Cyprus (Polydorou, 1980).

This disease, because of its extremely serious repercussions, in both economic terms and in human suffering, therefore became a subject of intense concern for a long period. However, little success was achieved until 1970, when the Department of Veterinary Services proposed an all-inclusive eradication scheme, which was subsequently approved by the government.

Organized (Humane) Dog Destruction

In 1971, the campaign for the control of echinococcosis was initiated, and top priority was given to the destruction

of all stray and unwanted dogs. However, at the same time, the indiscriminate reproduction of all dogs had to be stopped; also, owned dogs would have to be registered and legislation passed that would provide for some restraint on the dogs' movements. The actual legislation stipulated that owned dogs had to be registered with the local village council or town municipality and restrained to the owner's premises. It was also required that all owned dogs be examined for echinococcosis (Polydorou, 1976).

The massive destruction required by the new program had to be organized such that it would have long-lasting effectiveness and prevent any regression toward previous population levels.

Factors such as the total area of the island, its topography, and the distribution and location of the villages, as well as the particular type of dog problem prevailing in a given area, were all considered. The destruction teams (there were about 20 teams in all) were each made up of two employees from the Department of Veterinary Services. They traveled in vehicles capable of moving over rough land and were thus able to pursue dogs into the open areas. These teams stayed at one of the 19 veterinary stations that are situated all over the island.

Special guns, which fired a syringe filled with a euthanizing drug, were used. The gun was fired at the dog from a distance of about 20 to 30 m. Upon contact, the syringe injected the drug into the dog's musculature; within about 30 seconds, the dog collapsed and died from respiratory paralysis. Short-range pistols (5 to 10 m) were also acquired for use in inhabited areas. The use of these weapons necessitated special training and a license from the police. In all, about 50 such weapons (40 guns and 10 pistols) were used.

The dog cadavers were burned on the spot if it was convenient (i.e., in the open country), or they were collected

and carried to the incinerator of the nearest veterinary station (i.e., in the towns and villages).

In 1971, a total of 27,552 dogs were destroyed on the island, that is, about 75 dogs per day; in 1972, the total declined to 15,318, or 42 per day. From 1971 to 1981, 72,262 dogs were exterminated or, on average, about 6,569 per year. By the end of 1981, dog population statistics were as follows: 10,009 male and 6,801 female (of which 2,332 were spayed); the total, therefore, was 16,810.

Spaying of Bitches

Spaying of female dogs was used to reduce the dog population further. The Veterinary Services Department provided a free spaying service at its veterinary stations, as well as free transport to and from the stations. Many dog owners had their bitches spayed, since these were the dogs that had caused many of their problems. A continuing public relations effort persuaded even more people to do the same. Apart from other advantages, the higher license fee for unspayed bitches (\$20) compared with the fee for spayed females and male dogs (\$2.50) provided a strong indirect incentive for spaying. In 1981, about 35 percent of the total female population had been spayed. At present, all unspayed bitches are checked at regular intervals (whether they are in litter or not), to determine whether the owners have plans for the puppies. If the puppies are not wanted, they are euthanized by the Service.

Reaction of the Public

At the beginning, most people were pleased at seeing a substantial reduction in the huge numbers of stray dogs that had formerly been found almost everywhere. Undoubtedly, the elimination of such dogs put an end to many problems. When, however, the destruction teams

started to make persistent visits to the towns and villages, some problems arose. Those who owned dogs that were permitted to roam about the neighborhood soon found that the destruction teams weren't making any exceptions. In their work of eliminating strays. These owners then began to react negatively to the dog elimination campaign and blamed the Veterinary Service for indiscriminate dog destruction, which they claimed took place even within the perimeter of the owners' property. The SPCA, and the Farmers' and Hunters' Associations, also registered their complaints, usually via the press. Despite this response, the Veterinary Service continued to proceed with its work, without interruption. At the same time, an intensive educational program was carried out, through group lectures, house-to-house visits, and individual contacts. Thus, firm purpose, coupled with persuasion, succeeded in making those directly concerned, as well as the general public, begin to comprehend the responsibilities entailed in dog ownership.

Discussion

Dog control means more than the elimination of strays; it also means preventing uncontrolled reproduction. Responsible ownership is another crucial factor, as is the dog owners' cooperation with the Veterinary Services. Toward this end, an intensive public relations program, carried out through the press,

radio, and television, as well as the education of key individuals (especially dog owners), is very important.

The Veterinary Service is usually the only veterinary resource to be found in a developing country, since private practice is likely to be still in its infancy, or altogether nonexistent. These services must therefore shoulder most of the responsibility for dealing with the problem of dog control, so they ought to constitute one of the decisive factors in resolving it. For example, in Cyprus, the Veterinary Service, despite its initial difficulties, has implemented a successful dog control scheme in a context that might seem particularly aversive, *i.e.*, persistent action was maintained in spite of the strongly negative initial reaction from some dog owners (which, after all, was only to be expected). Euthanasia "expertise" was used in Cyprus in employing methods that were introduced from abroad, and we therefore believe that our experience can well serve as an example for many other developing countries.

References

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