How Safe Is The ORVP?

The ORVP is an extremely safe method of rabies control. If the vaccine is released from the bait and plastic sachet, it will not become established in the environment. The vaccine has been proven safe when given to almost 60 species of mammals and birds. It has also been proven safe when given at over 200x the recommended dose in raccoons. The vaccine, bait, and bonding agent are all non-toxic. Adverse affects if a human or domestic animal contacts the vaccine are not anticipated. In fact, the vaccine cannot cause rabies in humans or animals, even if it is ingested. However, as a precautionary measure, if a human or domestic animal is exposed to the vaccine, the Texas Department of State Health Services should be contacted. A domestic animal's rabies vaccination can be safely given even if the animal recently ate a vaccine/bait unit.



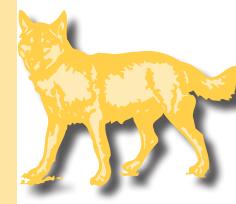
In addition to its safety, the ORVP provides long-range economic savings by reducing costs to the health care system (including fewer humans receiving postexposure rabies treatment and emergency room treatment). It also will reduce destruction of livestock and wildlife, laboratory testing of rabies suspect animals, postexposure rabies treatment in domestic animals, domestic animal deaths, and, most importantly, human deaths attributable to rabies.

Who Is Involved With The ORVP?

Many state and federal agencies have been involved in a cooperative effort to implement this project.



Oral Rabies Vaccination Program (ORVP)





Texas Department of State Health Services
Zoonosis Control
4/12 Stock No. 7-11

What Is The ORVP?

The Oral Rabies Vaccination Program (ORVP) is an innovative program that uses an oral rabies vaccine to control rabies in wildlife. The goals of the ORVP are to produce a zone of vaccinated coyotes as a barrier along the edge of the South Texas canine rabies epizootic (an epidemic in animals) and a zone of vaccinated gray foxes as a barrier along the edge of the West-Central Texas gray fox rabies epizootic. This 25-mile-wide barrier zone runs along the Rio Grande River and is intended to keep both rabies variants mentioned from

being reintroduced into Texas. Achievement of this massive project requires aerial distribution of oral vaccine/bait units. Twin engine planes are used for this mission. A recombinant vaccine is used. It is a vaccine that contains only noninfectious portions of the rabies virus. This vaccine is placed in two types of baits. The primary bait consists of a dose of the vaccine being placed in a plastic sachet, which is coated with fish-meal crumbles. The baits are brown, look like dirty ketchup packages from a fast food restaurant, and are 2" x

0.75" x 0.12" in size. The second type of bait has the plastic sachet inserted into the hollow center of a hard bait composed of fish meal that has been mixed with a bonding agent and sealed with wax. They are 1 $\frac{1}{4}$ " x 1 $\frac{1}{4}$ " x $\frac{3}{4}$ " in size. They are marked with a warning label in English that includes the Texas Department of State Health Services, Zoonosis Control's telephone number.

Why Was The ORVP Needed?

The canine rabies epizootic became established in South Texas during 1988

and rapidly expanded northward. The gray fox rabies epizootic in West-Central Texas, which also began in 1988, moved in multiple directions. There have been hundreds of rabid dogs, coyotes, and foxes included in the epizootics. There have also been human deaths due to canine rabies during this same time frame. Additionally, many people in the epizootic area have had to receive postexposure rabies treatment. This is because the canine variant of rabies virus, which was first found in coyotes, was readily spread to dogs and between dogs; humans are more likely to have contact with rabid pets than rabid wildlife.



When And Where Has The ORVP Been Conducted?

Prior to the ORVP in Texas, similar oral rabies vaccine programs for red foxes have been conducted with great success in Europe and Canada. The ORVP efforts along the eastern coast of the United States have been effective in combating raccoon rabies in limited areas.

In February of 1995, the first ORVP for coyotes was conducted in 18 counties. At that time, it was the largest single vaccine/



bait drop worldwide. The drop zone included a 40-mile-wide band that formed a west to east arch along the leading northern edge of the canine rabies epizootic. The ORVP for covotes continued to be conducted once a year over several years until the rabies problem was eliminated. Now the drop zone is a barrier along the southern boundary of the epizootic zone to prevent reintroduction of the canine variant into Texas. The vaccine/ bait drop will occur at the beginning of each year, as cool weather is needed to obtain maximum effectiveness. For instance, there are less available food sources for coyotes in cooler months, so they would be more likely to eat the vaccine/bait units. There are also fewer fire ants to eat the baits during that time of year. During the first year following the initial vaccine/bait drop in South Texas, the ORVP already achieved great success, which was confirmed through surveillance of rabies cases and statistical methods.

The first ORVP for gray foxes was conducted within the first two months of 1996. The drop zone included an extensive 25-mile-wide arch that encircled the epizootic area like a purse string. The area of distribution was reduced and pulled inward over the years until control of the epizootic was accomplished.