## NEEL Sp. z o.o.

Infrastructure

Animal Protection Devices UOZ-1 - a proven method to prevent wildlife-train collisions

The UOZ-1 Animal Protection Devices are an original Polish idea to prevent collisions between trains and wild animals. The devices are installed along the railway line in places with the greatest risk of collision. Shortly before the arrival of the train, the devices emit specially selected sounds, which are recordings of alarm screams of birds and other animals, the voices of predators (dogs barking, wolves howling) and the sounds of animals fighting for their lives. The emission of aforementioned sounds affecting the self-preservation instinct ends when the train passes. Animals such as roe deer, red deer, wild boar and moose react instinctively by withdrawing from the track area into the forest. The devices are silent between train runs, and animals can freely cross the tracks. As a result, the barrier effect of the railway line is minimized.

## **SCIENTIFIC CONFIRMATION OF EFFECTIVENESS**

The first devices installed at the E20 railway line have been in operation for nearly 20 years. Several years after their launch, a long-term, comprehensive monitoring of their operation began, carried out by a team of scientists f rom the Faculty of Forestry of the Warsaw University of Life Sciences (SGGW).

The study results confirm the high efficiency of the devices' operation. The research used, inter alia, round-the-clock observations from video cameras. The collected recordings show how animals of different species behave alongside the tracks and how they react to warning sequences. When nothing bothers them, they freely use the green area along the tracks as pasture, wander along them or cross to the other side. When the train is about to arrive and the UOZ-1 devices start warning, the animals look around searching for dangers, and after a while they retreat from the open space and hide among the trees. Studies have also shown that, despite the passage of many years, animals have not got used to the repetitive sounds.



## **Dane teleadresowe**

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