

Eliot

The smart pipe that communicates its location

Every year in France thousands of underground assets—like water and gas lines— are damaged during digging work, simply because their exact location cannot be determined accurately. Today there is a solution. Ryb has developed Eliot, a smart piping system equipped with RFID chips capable of sending accurate location information down to the centimeter at depths of up to 1.5 meters. The chips also store information like the type of piping (water or gas), manufacturing date, serial number, and diameter.

Eliot, which was developed in conjunction with Leti, features RFID tags embedded in the piping material at regular intervals and a reading and detection device used above ground. RFID technology was originally developed for traceability applications. The technology had to be modified to detect and locate chips underground in a variety of conditions. Thanks to a patented antenna design, transmission (at 13.56 MHz) remains robust despite use in a wide range of conditions. The antenna design is patented. The RFID tags are also robust, and

can withstand the high temperatures of the extrusion process. Eliot is the world's first communicating piping system.

CONTACT
www.ryb.fr