



PROTOCOL FOR INDOOR/OUTDOOR POSITIONING

Positioning of wireless mobiles without GPS

Technological advantages

Operates both indoors and outdoors

Low power consumption

Proximity communication reduces the distance covered by the signal. Power requirements are thus limited.

Robust and light

Adapts to unexpected modifications in network topology.

Efficiency and autonomy

The positioning data are rapidly retrieved with a minimum of transmission duplication



Illustration of protocol: proximity positioning

Summary of the invention

Software protocol enabling proximity transmission of data for mobile objects requiring identification. This is done within a dynamic structure, by self-numbering of objects according to their position in the network and their distance from the data collection system. The position is determined by the proximity of numbers to an element which has already been located.

Potential applications

Machine to machine

Finding tools, screwdrivers, etc.

Tracking

People in buildings, animals, objects

Complementary information sheets

Sheet B 0817 - Long-range, low-consumption communication

Commercial advantages

Economic

Reduced power requirements

Low costs

Suitable for sensors with low power autonomy (Bluetooth low energy)

Fast implementation

Operates without GPS, without hardware.

Does not require new equipment.

Compatible with mobile telephones

*TRL 3
Patented invention available under licence*