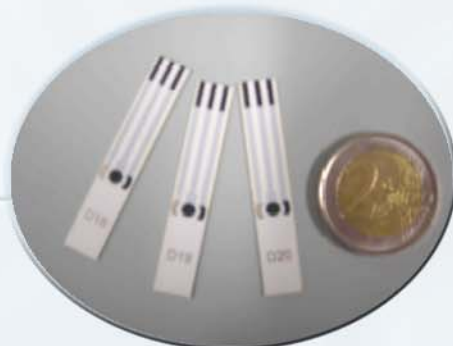




## Sensors “G-Sensor”



### PRODUCT DESCRIPTION

The sensors of the “G-Sensors” line are three electrode electrochemical cells with a graphite working electrode, suitable for a wide range of analytical applications. Each electrode is produced by screen-printing technology and constitutes of a circular graphite working electrode (3 mm diameter), a silver pseudoreference electrode and a graphite counter electrode. The miniaturized electrode dimensions consent the use of these devices with small sample volumes while their low cost permit disposable use.

The special planar shape permit the use of the sensors as “drop-on” devices, avoiding the waste of reagents and samples. In order to adopt the sensors for any requested applications, the graphite can be modified, and through direct adsorption or through chemical binding a wide range of biomolecules can be linked to the electrode surface. These modifications may be carried out by Ecobioservices upon request.

### TECHNICAL SPECIFICATIONS

Dimensions: 0.8 x 4.5 cm

Working electrode dimensions: 7.06 mm<sup>2</sup>

Thickness: 450 μm

Connection system: Standard connector 2.54 mm pitch (upon request)

Coefficient of variation (CV) (n = 10): 5 %

### APPLICATIONS

1. Measurement with graphite based sensors (for example glassy-carbon or carbon-paste)
2. Preparation of modified sensors (membranes, electrochemical mediators)
3. Development of biosensors for environmental, alimentary or clinical applications (enzymatic biosensors, DNA based biosensors, immunosensors).

### APPLICATION ADVICES

The silver pseudoreference electrode shows higher stability in the presence of chloride ions. Hence, it is recommended that measurements are carried out in solutions with a chloride ion concentration of at least 10 mM.