

E Series Laboratory pH Electrode

E201-BNC

General purpose pH electrode, suitable for measuring the aqueous solutions



| | |
|-----------------------|-----------------------|
| Range | 0...14 pH |
| Operating Temperature | 0...60°C/32...140°F |
| Reference | AgCl, single junction |
| Liquid Junction | Fiber |
| Body Type | Epoxy |
| Connector | BNC, 1 m cable |
| Dimensions | 120(L)×12(Ø)mm |

E202-BNC

Flat surface pH electrode, suitable for measuring the semisolid, gel and viscous samples



| | |
|-----------------------|-----------------------|
| Range | 0...14 pH |
| Operating Temperature | 0...60°C/32...140°F |
| Reference | AgCl, single junction |
| Liquid Junction | Teflon |
| Body Type | Epoxy |
| Connector | BNC, 1 m cable |
| Dimensions | 110(L)×12(Ø)mm |

E203-BNC

3-in-1 pH electrode with built-in temperature sensor, suitable for outdoor applications



| | |
|-----------------------|-----------------------|
| Range | 0...14 pH |
| Operating Temperature | 0...60°C/32...140°F |
| Reference | AgCl, single junction |
| Liquid Junction | Fiber |
| Body Type | Epoxy |
| Connector | BNC, 1 m cable |
| Dimensions | 120(L)×12(Ø)mm |

E204-BNC

Glass pH electrode, suitable for measuring the general and mildly corrosive solutions



| | |
|-----------------------|--------------------------|
| Range | 0...14 pH |
| Operating Temperature | 0...80°C/32...176°F |
| Reference | Ag/AgCl, single junction |
| Liquid Junction | Annular ceramic |
| Body Type | Glass |
| Connector | BNC, 1 m cable |
| Dimensions | 120(L)×12(Ø)mm |

E205-BNC

Glass pH electrode, suitable for piercing and measuring the soft solids



| | |
|-----------------------|--------------------------|
| Range | 0...14 pH |
| Operating Temperature | 0...80°C/32...176°F |
| Reference | Ag/AgCl, single junction |
| Liquid Junction | Frit ceramic |
| Body Type | Glass |
| Connector | BNC, 1 m cable |
| Dimensions | 120(L)×12(Ø)mm |

E206-BNC

Glass pH electrode, suitable for measuring the samples in test tubes



| | |
|-----------------------|-----------------------------|
| Range | 0...14 pH |
| Operating Temperature | 0...80°C/32...176°F |
| Reference | Ag/AgCl, single junction |
| Liquid Junction | Annular ceramic |
| Body Type | Glass |
| Connector | BNC, 1 m cable |
| Dimensions | 50(L)×12(Ø)mm, 80(L)×5(Ø)mm |

E207-BNC

Glass pH electrode, suitable for measuring non-aqueous solutions or organic solvents



| | |
|-----------------------|--------------------------|
| Range | 0...14 pH |
| Operating Temperature | 0...80°C/32...176°F |
| Reference | Ag/AgCl, double junction |
| Liquid Junction | Annular ceramic |
| Body Type | Glass |
| Connector | BNC, 1 m cable |
| Dimensions | 120(L)×12(Ø)mm |

E208-BNC

Glass pH electrode, suitable for measuring strong acid and strong alkaline solutions



| | |
|-----------------------|--------------------------|
| Range | 0...14 pH |
| Operating Temperature | 0...80°C/32...176°F |
| Reference | Ag/AgCl, single junction |
| Liquid Junction | Annular ceramic |
| Body Type | Glass |
| Connector | BNC, 1 m cable |
| Dimensions | 120(L)×12(Ø)mm |

E209-BNC

Glass pH electrode, suitable for measuring the solutions containing hydrofluoric acid



| | |
|-----------------------|--------------------------|
| Range | 0...12 pH |
| Operating Temperature | 0...80°C/32...176°F |
| Reference | Ag/AgCl, double junction |
| Liquid Junction | Frit ceramic |
| Body Type | Glass |
| Connector | BNC, 1 m cable |
| Dimensions | 120(L)×12(Ø)mm |

E210-BNC

Glass pH electrode, suitable for measuring the high temperature solutions (<130°C)



| | |
|-----------------------|--------------------------|
| Range | 0...12 pH |
| Operating Temperature | 0...130°C/32...266°F |
| Reference | Ag/AgCl, double junction |
| Liquid Junction | Frit ceramic |
| Body Type | Glass |
| Connector | BNC, 1 m cable |
| Dimensions | 120(L)×12(Ø)mm |

E211-BNC

Glass pH electrode, suitable for measuring the pure water



| | |
|-----------------------|-----------------------|
| Range | 0...14 pH |
| Operating Temperature | 0...80°C/32...176°F |
| Reference | AgCl, single junction |
| Liquid Junction | Frit ceramic |
| Body Type | Glass |
| Connector | BNC, 1 m cable |
| Dimensions | 120(L)×12(Ø)mm |

E Series Laboratory ORP Electrode

E501

Plastic ORP electrode, suitable for measuring the liquids with strong redox potential



| | |
|-----------------------|---------------------|
| Sensor Type | Platinum pin |
| Operating Temperature | 0...60°C/32...140°F |
| Reference | Ag/AgCl |
| Liquid Junction | Teflon |
| Body Type | Epoxy |
| Connector | BNC, 1 m cable |
| Dimensions | 120(L)×12(Ø)mm |

E502

Plastic ORP electrode, suitable for measuring the liquids with weak redox potential



| | |
|-----------------------|---------------------|
| Sensor Type | Platinum band |
| Operating Temperature | 0...60°C/32...140°F |
| Reference | Ag/AgCl |
| Liquid Junction | Teflon |
| Body Type | Epoxy |
| Connector | BNC, 1 m cable |
| Dimensions | 120(L)×12(Ø)mm |

E504

Glass ORP electrode, suitable for measuring the mildly corrosive liquids



| | |
|-----------------------|---------------------|
| Sensor Type | Platinum band |
| Operating Temperature | 0...80°C/32...176°F |
| Reference | Ag/AgCl |
| Liquid Junction | Annular ceramic |
| Body Type | Glass |
| Connector | BNC, 1 m cable |
| Dimensions | 120(L)×12(Ø)mm |

IE-20T Industrial pH Electrode

Features

- General purpose pH electrode with a built-in temperature sensor
- 3/4 inch thread is easy to install



| | |
|-----------------------|---------------------|
| Range | 0...14 pH |
| Operating Temperature | 0...60°C/32...140°F |
| Reference | Ag/AgCl |
| Liquid Junction | Teflon |
| Body Type | PPS/PC |
| Cable Length | 5 m |
| Dimensions | 150(L)×29.5(Ø)mm |



P Series Glass pH Electrode

P11

Glass pH electrode, suitable for measuring the general and mildly corrosive solutions



| | |
|-----------------------|--------------------------|
| Range | 0...14 pH |
| Operating Temperature | 0...80°C/32...176°F |
| Reference | Ag/AgCl, single junction |
| Liquid Junction | Annular ceramic |
| Body Type | Glass |
| Connector | BNC, 1 m cable |
| Dimensions | 120(L)×12(Ø)mm |

P11-LiCl

Glass pH electrode, suitable for measuring the non-aqueous solutions



| | |
|-----------------------|-----------------------|
| Range | 0...14 pH |
| Operating Temperature | 0...80°C/32...176°F |
| Reference | AgCl, double junction |
| Liquid Junction | Annular ceramic |
| Body Type | Glass |
| Connector | BNC, 1 m cable |
| Dimensions | 120(L)×12(Ø)mm |

P11-HA

Glass pH electrode, suitable for measuring the high alkalinity solutions



| | |
|-----------------------|--------------------------|
| Range | 0...14 pH |
| Operating Temperature | 0...80°C/32...176°F |
| Reference | Ag/AgCl, single junction |
| Liquid Junction | Annular ceramic |
| Body Type | Glass |
| Connector | BNC, 1 m cable |
| Dimensions | 120(L)×12(Ø)mm |

P13

Glass pH electrode, suitable for measuring the micro-volume samples



| | |
|-----------------------|--------------------------|
| Range | 0...14 pH |
| Operating Temperature | 0...100°C/32...212°F |
| Reference | Ag/AgCl, single junction |
| Liquid Junction | Frit Ceramic |
| Body Type | Glass |
| Connector | BNC, 1 m cable |
| Dimensions | 90(L)×4.3(Ø)mm |

P15

Glass pH electrode, suitable for measuring the low conductivity solutions



| | |
|-----------------------|--------------------------|
| Range | 0...11 pH |
| Operating Temperature | 0...50°C/32...122°F |
| Reference | Ag/AgCl, double junction |
| Liquid Junction | Annular ceramic |
| Body Type | Glass |
| Connector | BNC, 1 m cable |
| Dimensions | 120(L)×12(Ø)mm |

P16

Glass pH electrode, suitable for measuring the solutions with Tris buffer



| | |
|-----------------------|--------------------------|
| Range | 0...14 pH |
| Operating Temperature | 0...80°C/32...176°F |
| Reference | Ag/AgCl, double junction |
| Liquid Junction | Frit ceramic |
| Body Type | Glass |
| Connector | BNC, 1 m cable |
| Dimensions | 90(L)×6(Ø)mm |

P19

Glass pH electrode, suitable for piercing and measuring the semisolids and soft solids



| | |
|-----------------------|--------------------------|
| Range | 0...14 pH |
| Operating Temperature | 0...80°C/32...176°F |
| Reference | Ag/AgCl, single junction |
| Liquid Junction | Frit Ceramic |
| Body Type | Glass |
| Connector | BNC, 1 m cable |
| Dimensions | 40(L)×6(Ø)mm |

P21

Glass pH electrode, suitable for measuring the colloids



| | |
|-----------------------|--------------------------|
| Range | 0...14 pH |
| Operating Temperature | 0...100°C/32...212°F |
| Reference | Ag/AgCl, double junction |
| Liquid Junction | Glass sleeve |
| Body Type | Glass |
| Connector | BNC, 1 m cable |
| Dimensions | 120(L)×12(Ø)mm |

Electrode Selection Table

Accurate pH measurement depends on selecting the appropriate pH electrode. The chart below outlines the application range of each sensor for reference only.

| Model | P11 | P11-LiCl | P11-HA | P13 | P15 | P16 | P19 | P21 | E201 | E202 |
|-----------------------|-----|----------|--------|-----|-----|-----|-----|-----|------|------|
| Agar | • | | | | | | | | | |
| Beer | • | | | • | | | | | | |
| Cheese | | | | | | | • | | | • |
| Cosmetics | • | | | • | | | | | | |
| Creams | | | | | | | • | | | • |
| Dairy Products | • | | | | | | | | | |
| Dough | | | | | | | • | | | • |
| Fish Products | | | | | | | • | | | • |
| Field Use | | | | | | | | | • | • |
| High Alkaline Samples | | | • | | | | | | | |
| Low Ionic/Pure Water | | | | | • | | | | | |
| Meat | | | | | | | | | | • |
| Micro Samples | | | | • | | | | | | |
| Non-Aqueous Samples | | • | | | | | | | | |
| Ointments | | | | | | | • | | | • |
| Paper/Textiles | | | | | | | | | | • |
| Photographic | | | | | | | | | | |
| Printing Inks/Paint | | | | | | | | | | • |
| Semisolids | | | | | | | • | | | • |
| Soil | | | | | | | • | | | • |
| Test Tubes | | | | • | | | | | | |
| Tris Buffer | | | | | | • | | | | |
| Vegetables/Fruits | | | | | | | • | | | • |
| Viscose Samples | | | | | | | | • | | • |

Typical Samples and Applications