

## Reagents for Chemical Test Kits

Code	Description	Code	Description
<b>Acidity, methyl orange method</b>		<b>Calcium and magnesium (irrigation water), EDTA method</b>	
Range:	0 to 100 mg/L; 0 to 500 mg/L	Range:	> 0.0 mg/L
<b>Reagents</b>		<b>Reagents</b>	
HI 3820-100	Reagent kit for 110 tests (CaCO <sub>3</sub> )	HI 38081-100	Reagent kit for 100 tests (Ca and Mg)
<b>Acidity, olive oil, titration with hydroxide</b>		<b>Carbon dioxide, base titration method</b>	
Range:	0.00 to 1.00%	Range:	0.0 to 10.0 mg/L 0.0 to 50.0 mg/L 0 to 100 mg/L
<b>Reagents</b>		<b>Reagents</b>	
HI 3897	Reagent kit for 6 tests	HI 3818-100	Reagent kit for 110 tests (CO <sub>2</sub> )
HI 3897-010	Spare kit for 10 tests	<b>Chloride, absence/presence, silver nitrate titration method</b>	
<b>Acidity, total exchangeable, potassium chloride method</b>		Range:	1000 mg/L (ISO) 2000 mg/L (EPA)
Range:	0.0 to 2.5 meq/100 g	<b>Reagents</b>	
<b>Reagents</b>		HI 3898	Test kit for 100 tests (Cl <sup>-</sup> )
HI 38084-100	Reagent kit for 100 tests (total acidity exchangeable)	<b>Chloride, extended range, silver nitrate titration method</b>	
<b>Alkalinity, acid titration method</b>		Range:	500 to 10.000 mg/L 5.000 to 100.000 mg/L
Range:	0 to 100 mg/L 0 to 300 mg/L	<b>Reagents</b>	
<b>Reagents</b>		HI 38015-100	Reagent kit for 100 tests (Cl <sup>-</sup> )
HI 3811-100	Reagent kit for 110 tests (CaCO <sub>3</sub> )	<b>Chloride, mercury nitrate titration method</b>	
<b>Alkalinity, acid titration method</b>		Range:	0 to 100 mg/L 0 to 1000 mg/L
Range:	0 to 500 gpg	<b>Reagents</b>	
<b>Reagents</b>		HI 3815-100	Reagent kit for 100 tests (Cl <sup>-</sup> )
HI 38014-100	Reagent kit for 100 tests (CaCO <sub>3</sub> )	<b>Chlorine, free and total, LR / MR / HR, DPD colorimetric method</b>	
<b>Alkalinity, Phenolphthalein and total, phenolphthalein/bromine phenol blue</b>		Range:	0.00 to 0.70 mg/L 0.0 to 3.5 mg/L 0.0 to 10.0 mg/L
Range:	0.0 to 10.0 gpg 0.0 to 20.0 gpg	<b>Reagents</b>	
<b>Reagents</b>		HI 38020-200	Reagent kit for 200 tests (free and total chlorine)
HI 38013-100	Reagent kit for 200 tests	<b>Chlorine, free and total, LR / MR, DPD colorimetric method</b>	
<b>Ammonia (fresh water), Nessler colorimetric method</b>		Range:	0.00 to 0.70 mg/L 0.0 to 3.5 mg/L
Range:	0.0 to 2.5 mg/L	<b>Reagents</b>	
<b>Reagents</b>		HI 38017-200	Reagent kit for 200 tests (free and total chlorine)
HI 3824-025	Reagent kit for 25 tests (NH <sub>3</sub> -N fresh water)	<b>Chlorine, free, DPD colorimetric method</b>	
<b>Ammonia (fresh water), Nessler colorimetric method</b>		Range:	0.0 to 2.5 mg/L
Range:	0.0 to 3.0 mg/L	<b>Reagents</b>	
<b>Reagents</b>		HI 3831F-050	Reagent kit for 50 tests (free chlorine)
HI 38049-100	Reagent kit for 100 tests (NH <sub>3</sub> -N fresh water)	<b>Ascorbic Acid, iodometric method</b>	
<b>Ammonia (sea water), Nessler colorimetric method</b>		Range:	10 to 200 mg/L
Range:	0.0 to 2.5 mg/L	<b>Reagents</b>	
<b>Reagents</b>		HI 3850-100	Reagent kit for 100 tests (ascorbic acid)
HI 3826-025	Reagent kit for 25 tests (NH <sub>3</sub> -N sea water)	<b>Boron, boric acid method</b>	
<b>Calcium (irrigation water), turbidimetric method</b>		Range:	0.0 to 5.0 mg/L
Range:	0 to 125 mg/L 0 to 250 mg/L	<b>Reagents</b>	
<b>Reagents</b>		HI 38074-100	Reagent kit for 100 tests (B)
HI 38086-100	Reagent kit for 100 tests (Ca)	<b>Bromine, DPD colorimetric method</b>	



**HI 3847**  
**Test Kit for Copper Analysis**

## Reagents for Chemical Test Kits

Code	Description
<b>Chlorine, free, LR / MR, DPD colorimetric method</b>	
Range:	0.00 to 0.70 mg/L 0.0 to 3.5 mg/L
Reagents	
HI 38018-200	Reagent kit for 200 tests (free chlorine)
<b>Chlorine, free, MR, DPD colorimetric method</b>	
Range:	0.0 to 3.5 mg/L
Reagents	
HI 3875-100	Reagent kit for 100 tests (free chlorine)
<b>Chlorine, total, DPD colorimetric method</b>	
Range:	0 to 2.5 mg/L
Reagents	
HI 3831T-050	Reagent kit for 50 tests
<b>Chlorine, total, extended range, iodometric method</b>	
Range:	10 to 200 mg/L
Reagents	
HI 38023-100	Reagent kit for 100 tests (total chlorine)
<b>Chlorine, total, HR, iodometric method</b>	
Range:	0.0 to 4.0 mg/L 0.0 to 20.0 mg/L
Reagents	
HI 38022-100	Reagent kit for 100 tests (total chlorine)
<b>Chlorine, total, LR / MR, DPD colorimetric method</b>	
Range:	0.00 to 0.70 mg/L 0.0 to 3.5 mg/L
Reagents	
HI 38019-200	Reagent kit for 200 tests (total chlorine)
<b>Chlorine, total, MR, DPD colorimetric method</b>	
Range:	0.0 to 3.5 mg/L
Reagents	
HI 38016-100	Reagent kit for 100 tests (total chlorine)
<b>Chromium VI, diphenylcarbohydrazide method</b>	
Range:	0.0 to 1.0 mg/L
Reagents	
HI 3846-100	Reagent kit for 100 tests (Cr VI LR)
<b>Chromium VI MR / HR, iodometric method</b>	
Range:	0 to 100 mg/L 100 to 1000 mg/L
Reagents	
HI 3845-100	Reagent kit for 100 tests (Cr VI HR)
<b>Copper HR, bicinchonate method</b>	
Range:	0.0 to 2.5 mg/L
Reagents	
HI 3847-100	Reagent kit for 100 tests (Cu HR)

Code	Description
<b>Copper LR / HR, bicinchonic acid</b>	
Range:	0.00 to 0.25 mg/L 0.0 to 6.0 mg/L
Reagents	
HI 38075-100	Reagent kit for 100 tests (Cu)
<b>Copper ULR, bicinchonate method</b>	
Range:	0.00 to 0.25 mg/L
Reagents	
HI 3856-100	Reagent kit for 100 tests (Cu LR)
<b>Cyanide, pyridine-pyrazolone method</b>	
Range:	0.00 to 0.30 mg/L
Reagents	
HI 3855-100	Reagent kit for 100 tests (CN <sup>-</sup> )
<b>Cyanuric Acid, turbidimetric method</b>	
Range:	10 to 100 mg/L
Reagents	
HI 3851-100	Reagent kit for 100 tests (cyanuric acid)
<b>Detergents, methylene blue method</b>	
Range:	0.00 to 1.30 mg/L
Reagents	
HI 3857-035	Reagent kit for 35 tests (ABS/LAS)
<b>Dissolved Oxygen, Winkler method</b>	
Range:	0.0 to 10.0 mg/L
Reagents	
HI 3810-100	Reagent kit for 110 tests (O <sub>2</sub> )
<b>Formaldehyde, acid titration method</b>	
Range:	0.00 to 1.00 % CH <sub>2</sub> O 0.0 to 10.0 % CH <sub>2</sub> O
Reagents	
HI 3838-100	Reagent kit for 110 tests (formaldehyde)
<b>Glycol, oxidation method</b>	
Range:	present/absent
Reagents	
HI 3859-025	Reagent kit for 25 tests (glycol)
<b>Hardness, total and calcium, EDTA titration method</b>	
Range:	0.0 to 20.0 gpg total Hardness (CaCO <sub>3</sub> ) 0.0 to 20.0 gpg Calcium (Ca)
Reagents	
HI 38035-200	Reagent kit for 200 tests
<b>Hardness, total, EDTA titration method</b>	
Range:	0.0 to 20.0 gpg 0.0 to 20.0 mg/L
Reagents	
HI 38034-200	Reagent kit for 200 tests (CaCO <sub>3</sub> )



**HI 3833**  
**Phosphate Test Kit**

## Reagents for Chemical Test Kits

Code	Description
<b>Hardness, total, EDTA titration method</b>	
Range:	0.0 to 30.0 mg/L 0 to 300 mg/L
Reagents	
HI 3812-100	Reagent kit for 100 test
<b>Hardness, total, EDTA method</b>	
Range:	0 to 30 gpg
Reagents	
HI 38033-100	Reagent kit for 100 test
<b>Hardness, total, EDTA method</b>	
Range:	0 to 3000 mg/L
Reagents	
HI 3840	Test kit for 50 tests (range 0 to 150 mg/L)
HI 3841	Test kit for 50 tests (range 40 to 500 mg/L)
HI 3842	Test kit for 50 tests (range 400 to 3000 mg/L)
<b>Hydrazine, p-dimethylaminobenzaldehyde method</b>	
Range:	0.00 to 1.00 mg/L (ppm)
Reagents	
HI 3849-100	Reagent kit for 100 tests (N <sub>2</sub> H <sub>4</sub> )
<b>Hydrogen Peroxide, iodometric method</b>	
Range:	0.00 to 2.00 mg/L 0.0 to 10.0 mg/L
Reagents	
HI 3844-100	Reagent kit for 100 tests (H <sub>2</sub> O <sub>2</sub> )
<b>Hydroxide, acid titration method</b>	
Range:	0.00 to 1.00 g/L 0.0 to 10.0 g/L
Reagents	
HI 3839-100	Reagent kit for 110 tests (OH <sup>-</sup> )
<b>Hypochlorite, iodometric method</b>	
Range:	50 to 150 g/L Cl <sub>2</sub>
Reagents	
HI 3843-100	Reagent kit for 100 tests (hypochlorite)
<b>Iodine, DPD colorimetric method</b>	
Range:	0.0 to 2.5 mg/L
Reagents	
HI 3832-050	Reagent kit for 50 tests (I <sub>2</sub> )
<b>Iodine, DPD colorimetric method</b>	
Range:	0 to 5 mg/L
Reagents	
HI 3879-100	Reagent kit for 100 tests (I <sub>2</sub> )
<b>Iron HR, phenanthroline colorimetric method</b>	
Range:	0.0 to 10.0 mg/L
Reagents	
HI 38041-100	Reagent kit for 100 tests (Fe)

Code	Description
<b>Iron LR, phenanthroline colorimetric method</b>	
Range:	0.00 to 1.00 mg/L
Reagents	
HI 38039-100	Reagent kit for 100 tests (Fe)
<b>Iron MR, phenanthroline colorimetric method</b>	
Range:	0.0 to 5.0 mg/L
Reagents	
HI 38040-100	Reagent kit for 100 tests (Fe)
<b>Iron, phenanthroline colorimetric method</b>	
Range:	0 to 5 mg/L
Reagents	
HI 3834-050	Reagent kit for 50 tests (Fe)
<b>Magnesium (irrigation water), EDTA method</b>	
Range:	0.0 to 24.0 mg/L 0.0 to 725.0 mg/L
Reagents	
HI 38079-100	Reagent kit for 100 tests (Mg irrigation water)
<b>Magnesium and Calcium (soil), method EDTA - see Calcium and Magnesium</b>	
<b>Manganese (irrigation water) HR, sodium periodate method</b>	
Range:	0.0 to 10.0 mg/L
Reagents	
HI 38072-100	Reagent kit for 100 tests (Mn HR)
<b>Manganese (LR), method sodium periodate</b>	
Range:	0.0 to 3.0 mg/L
Reagents	
HI 38042-100	Reagent kit for 100 tests (Mn LR)
<b>Nitrate (soil + irrigation), cadmium reduction method</b>	
Range:	0 to 60 mg/L (soil) 0 to 50 mg/L (irrigation water)
Reagents	
HI 38050-200	Reagent kit for 200 tests (NO <sub>3</sub> <sup>-</sup> -N)
<b>Nitrate, cadmium reduction method</b>	
Range:	0 to 50 mg/L
Reagents	
HI 3874-100	Reagent kit for 100 tests (NO <sub>3</sub> <sup>-</sup> -N)
<b>Nitrite, chromotropic acid method</b>	
Range:	0.00 to 0.50 mg/L
Reagents	
HI 38051-100	Reagent kit for 100 tests (NO <sub>2</sub> <sup>-</sup> -N)

### HI 3895

#### Complete Test Kit for Soil Analysis



## Reagents for Chemical Test Kits

Code	Description	Code	Description
Nitrite, chromotropic acid method		Phosphate, ascorbic acid method	
Range:	0.0 to 1.0 mg/L	Range:	0.00 to 1.00 mg/L
Reagents			0.0 to 5.0 mg/L
HI 3873-100	Reagent kit for 100 tests (NO <sub>2</sub> <sup>-</sup> -N)		0 to 50 mg/L
Ozone, DPD method		Reagents	
Range:	0.0 to 2.3 mg/L	HI 38061-100	Reagent kit for 100 tests (PO <sub>4</sub> <sup>3-</sup> orthophosphate)
Reagents		Phosphorus (soil), colorimetric method	
HI 38054-100	Reagent kit for 100 tests (O <sub>3</sub> )	Range:	0.0 to 130.0 mg/L
pH, pH indicator method		Reagents	
Range:	4.0 to 6.5 pH	HI 38073-100	Reagent kit for 100 tests (phosphorus)
Reagents		Potassium (soil), turbidimetric method	
HI 3880-010	Reagent kit for 100 tests (4.0-6.5 pH, reag. Cl <sub>2</sub> )	Range:	0 to 50 mg/L
HI 3880-100	Reagent kit for 100 tests (4.0-6.5 pH)		50 to 250 mg/L
pH, pH indicator method		Reagents	
Range:	6.0 to 8.5 pH	HI 38082-100	Reagent kit for 100 tests (potassium)
Reagents		Salinity, mercuric nitrate titration method	
HI 3881-010	Reagent kit for 100 tests (6.0-8.5 pH, Cl <sub>2</sub> reag.)	Range:	0.0 to 40.0 g/Kg
HI 3881-100	Reagent kit for 100 tests (6.0-8.5 pH)	Reagents	
pH, pH indicator method		HI 3835-100	Reagent kit for 110 tests (salinity)
Range:	3.0 to 5.0 pH	SAR, EDTA titration method	
Reagents		Range:	> 0.0 meq/L
HI 3882-10	Reagent kit for 200 tests (3.0-5.0 pH)	Reagents	
pH, pH indicator method		HI 38078-100	Reagent kit for 100 tests (S.A.R)
Range:	7.5 to 10.0 pH	Silica HR, Heteropoly Blue method	
Reagents		Range:	0 to 40 mg/L
HI 3886-010	Reagent kit for 100 tests (7.5-10.0 pH, Cl <sub>2</sub> reag.)		0 to 800 mg/L
HI 3886-100	Reagent kit for 100 tests (7.5-10.0 pH)	Reagents	
pH, pH indicator method		HI 38067-100	Reagent kit for 100 tests (SiO <sub>2</sub> )
Range:	4.0 to 10.0 pH	Silica LR, Heteropoly Blue method	
Reagents		Range:	0.00 to 1.00 mg/L
HI 38058-100	Reagent kit for 300 tests (4.0-10.0 pH)	Reagents	
pH, pH indicator method		HI 38066-100	Reagent kit for 100 tests (SiO <sub>2</sub> )
Range:	4.0 to 8.0 pH	Sodium, exchangeable (EES) and gypsum requirement (GR), calcium sulphate method	
HI 3881-5	Test kit for 200 tests	Range:	0.00 to 56.40 meq/100 g soil (EES)
Phenol, aminoantipyrine method			0.0 to 213.0 metric ton/ha (GR)
Range:	0.00 to 1.00 mg/L	Reagents	
	0.5 to 5.0 mg/L	HI 38083-100	Reagent kit for 100 tests (EES and GR)
Reagents			
HI 3864-100	Reagent kit for 100 tests (phenol)		
Phosphate (irrigation water), ascorbic acid method			
Range:	0.0 to 5.0 mg/L		
Reagents			
HI 38077-100	Reagent kit for 100 tests (PO <sub>4</sub> <sup>3-</sup> orthophosphate)		
Phosphate, ascorbic acid method			
Range:	0 to 5 mg/L		
Reagents			
HI 3833-050	Reagent kit for 50 tests (PO <sub>4</sub> <sup>3-</sup> orthophosphate)		

### HI 3855 Cyanide Test Kit



## Reagents for Chemical Test Kits

Code	Description
<b>Soil analysis, Ned (N), ascorbic acid (P), tetraphenylborate (K), pH indicators (pH)</b>	
Range:	Nitrogen (N): trace, low, medium, high Phosphorus (P): trace, low, medium, high Potassium (K): trace, low, medium, high pH: 4 to 9 pH
<b>Reagents</b>	
HI 3895-010	Reagent kit for 10 tests (N, P, K, pH)
HI 3896-025	Reagent kit for 25 tests (N, P, K, pH)
<b>Sulphate, barium chloride method</b>	
Range:	20 to 100 mg/L
<b>Reagents</b>	
HI 38000-10	Reagent kit for 100 tests (SO <sub>4</sub> <sup>2-</sup> )
<b>Sulphate LR/HR, barium chloride method</b>	
Range:	100 to 1000 mg/L 1000 to 10000 mg/L
<b>Reagents</b>	
HI 38001-10	Reagent kit for 200 tests (SO <sub>4</sub> <sup>2-</sup> )
<b>Sulphite, iodometric titration method</b>	
Range:	0 to 20 mg/L 0 to 200 mg/L
<b>Reagents</b>	
HI 3822-100	Reagent kit for 100 tests (Na <sub>2</sub> SO <sub>3</sub> )
<b>Zinc, extended range, zincon method</b>	
Range:	0.0 to 4.0 mg/L 0.0 to 20.0 mg/L
<b>Reagents</b>	
HI 38076-100	Reagent kit for 100 tests (Zn)
<b>Zinc, zincon method</b>	
Range:	0.0 to 3.0 mg/L
<b>Reagents</b>	
HI 3854-100	Reagent kit for 100 tests (Zn)

## Accessories for Analysis

Accessories	
HI 3824-99	Ammonia color cube
HI 3830-99	Bromine color cube
HI 3831-99	Chlorine color cube
HI 3832-99	Iodine color cube
HI 3833-99	Phosphate color cube
HI 3834-99	Iron color cube
HI 731340	200 µL automatic pipet
HI 731341	1000 µL automatic pipet
HI 731342	2000 µL automatic pipet
HI 731350	Tip for 200 µL automatic pipet (25 pcs)
HI 731351	Tip for 1000 µL automatic pipet (25 pcs)
HI 731352	Tip for 2000 µL automatic pipet (25 pcs)
HI 740032P	Cap for 20 mL beaker (10 pcs)
HI 740034P	Cap for 50 mL beaker (10 pcs)
HI 740036P	Plastic Beaker, 50 mL (10 pcs)
HI 740037P	Plastic Beaker, 20 mL (10 pcs)
HI 740041	60 mL glass BOD bottle
HI 740048P	Plastic bottle, 120 mL (10 pcs)
HI 740049P	Cap for 120 mL plastic bottle (10 pcs)
HI 740132P	Dosing spoon (10 pcs)
HI 740142P	Graduated syringe (10 pcs)
HI 740144P	Tip for graduated syringe (10 pcs)
HI 740196P	Plastic vials (5 pcs)
HI 740220	25 mL glass test tube with cap, (2 pcs)
Demi-02	Bottle for 2 L of demineralized water
Demi-05	Bottle for 5 L of demineralized water
Demi-10	Bottle for 10 L of demineralized water

### Demi-02, Demi-05 and Demi-10 Bottles for Demineralized Water

