



SECTION 2 AQUEOUS STANDARDS

Aqueous Standards

Aqueous standards in diagnostics are reference solutions used to calibrate and validate diagnostic assays, ensuring accurate measurement of analytes in biological fluids such as blood, urine, and saliva. These standards consist of known concentrations of target molecules dissolved in water, closely mimicking the physiological environment.

By using aqueous standards, laboratories can calibrate instruments and establish a baseline for comparison with patient samples. This allows for precise detection and quantification of biomarkers, essential for diagnosing diseases and monitoring health conditions. Aqueous standards are especially important in ensuring consistency across different diagnostic platforms and laboratories. They help identify any variation or drift in instrument performance over time and confirm that the reagents used in tests are functioning properly. In clinical diagnostics, the use of well-prepared aqueous standards ensures that test results are reliable and reproducible, which is critical for making informed medical decisions, particularly in areas such as metabolic monitoring, hormone assays, and infection diagnostics.

The Fortress Aqueous Standards are available in a liquid stable format for convenience and ease-of-use, with a long shelf life, and are traceable to reference standard material.



Lyophilised



Liquid Frozen



Liquid Stable



100% Human Serum



Assayed Target Values Provided

Aqueous Standards

- Liquid stable (ready-to-use).
- Long shelf life.
- Traceable to reference standard material.

Description	Method	Size	Cat No.	Type
Albumin	45 g/L (4.5g/dL)	10 x 5 ml	BXCSTD01	LS
Calcium	Referenced against NIST 909b (2.5mmol/L 10mg/dL)	10 x 5 ml	BXCSTD02	LS
Chloride	Referenced against NIST 909b (75mmol/L)	10 x 5 ml	BXCSTD03	LS
Chloride	Referenced against NIST 909b (100mmol/L)	10 x 5 ml	BXCSTD04	LS
Cholesterol	Referenced against NIST 909b (5.17mmol/L 200mg/dL)	10 x 5 ml	BXCSTD05	LS
Creatinine	Referenced against NIST 909b (177 µmol/L 2 mg/dL)	10 x 5 ml	BXCSTD06	LS
Creatine/Glucose/Urea Standard	Referenced against NIST 965a / 909b (5.55 mmol/L 100mg/dL / 177 µmol/L / 8.33mmol/L)	10 x 5 ml	BXCSTD24	LS
Glucose	Referenced against NIST 965a (5.55 mmol/L 100mg/dL)	10 x 5 ml	BXCSTD07	LS
Glucose-Fructose Standard		5 x 1 ml	BXCSTD26	LS
Haemoglobin Standard	For Drabkin's Method (18g/dL)	5 x 10 ml	BXCSTD08	LS
Haemoglobin Standard Set	For Drabkin's Method (8, 10, 12, 15 & 18g/dL)	5 x 1 x 10 ml	BXCSTD09	LS
Iron	35.8 µmol/L (0.2 mg/dL)	10 x 5 ml	BXCSTD10	LS
Iron	107.4 µmol/L (0.6 mg/dL)	10 x 5 ml	BXCSTD11	LS
Lactate	4.44mmol/L (40mg/dL)	10 x 5 ml	BXCSTD12	LS
Magnesium	Referenced against NIST 909b (1.0 mmol/l2.43mg/dL)	10 x 5 ml	BXCSTD13	LS
Phosphorus	1.61 mmol/L (5 mg/dL)	10 x 5 ml	BXCSTD14	LS
Potassium	Referenced against NIST 909b (0.5 mmol/L)	10 x 5 ml	BXCSTD15	LS
Potassium	Referenced against NIST 909b (5 mmol/L)	10 x 5 ml	BXCSTD16	LS
Pyruvate	2 mmol/L	10 x 5 ml	BXCSTD17	LS
Sodium	Referenced against NIST 909b (150.0 mmol/L 150 mEq/L)	10 x 5 ml	BXCSTD18	LS
Total Protein	Referenced against NIST 927d (60g/L (6.0 g/dL)	10 x 5 ml	BXCSTD19	LS
Triglycerides	Referenced against NIST 909b (2.28 mmol/L 200mg/dL)	10 x 5 ml	BXCSTD20	LS
Urea	Referenced against NIST 909b (8.33 mmol/L 50mg/dL)	10 x 5 ml	BXCSTD21	LS
Uric Acid	Referenced against NIST 909b (595 µmol/L 10mg/dL)	10 x 5 ml	BXCSTD22	LS
Urinary Copper Standard	Referenced against NIST-SE 3114 (1.6mol/L)	10 x 5 ml	BXCSTD25	LS
Urinary/CSF Protein Standard	Referenced against NIST 927d (1g/L)	10 x 5ml	BXCSTD23	LS