

ChemWell® 2910 Technical Specifications

- Typical throughput
- Typical reaction volume
- Dimensions

General
 up to 200 endpoint reactions per hour, up to 170 kinetic reactions per hour
 200µL or less
 36.25"(92.1cm) width, 18.75"(47.6cm) height, 21.5"(54.6cm) depth,
 Approximate weight 80 lbs (36Kg)

- Capabilities
- Pumps
- Probes
- Min. and Max. Volume
- Precision for volumes <5µL
- Precision for volumes >5µL
- Maximum number of specimens
- Maximum number of reagents

Reagent and Sampling Dispensing
 dilution, pre-dilution, dispensing single or multiple reagents
 two syringe pumps, sized 50µL and 2.5mL
 316 stainless steel for maximum reagent compatibility, level sensing
 2µL - 1.95mL
 <2.5% CV
 <1% CV
 96, (including calibrators and controls)
 typically 27 to 44 or more (you can program reagents to go in the sample rack; assorted replaceable racks and custom designed racks are available for various bottle sizes)

- Standard reagent rack
- Reaction vessel
- Instrument bottles

27
 standard micro wells, strips or plates
 2L wash with low volume warning sensor
 1L rinse (or second wash) with low volume warning sensor
 2L waste bottle with full sensor
 1L priming bottle
 drain bottle (not supplied)

- EIA mode
- Thermal control
- Reagent cooling

Incubating, timing and temperature control
 incubation timing is software controlled; set each row of 8 to time separately or time the whole plate together
 well, probe, and tubing; ambient or 37°C (other options also available)
 RCA, Reagent Cooling Accessory (optional) cools 12° to 15°C below ambient through peltier thermoelectric modules connected to an external controller

- Wash head
- Programs

Washing
 8-probe, automatic prime and rinse
 create and run user programmable protocols, aspirate, dispense, soak, mix

- Optical design

Reading
 reads bichromatic absorbance in 4 simultaneous channels,
 user selected monochromatic or bichromatic results
 8 position filter wheel: 340, 405, 450, 505, 545, 600, 630, 700 or custom
 long life, hard coat, ion assisted deposition, 10nm typical half bandpass
 -0.2 to 3.0A
 ± 1% or better, NIST traceable calibration

- Interference filters
- Linear Range
- Photometer Accuracy

- Format
- Supports
- Minimum system
- Recommended system

Software
 CD-ROM and internet upgrades
 Windows® 98, 2000, NT 4.0, or XP (Computer not supplied)
 Pentium®II/233 MHz, 64 MB RAM, VGA monitor, 100MB free drive space
 serial port or USB port with serial adapter
 Pentium®II/333 Mhz, 128MB RAM, Windows® 98 or higher, CD drive, SVGA monitor

- Calculation modes

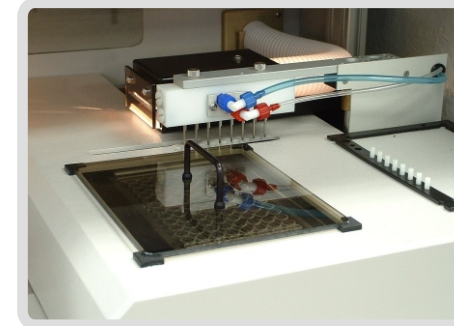
absorbance, single standard, factor, fixed time kinetics, kinetics by multipoint, kinetics by standard or factor, multipoint, linear regressions, log logit, polynomial, cubic spline, 4-parameter, cutoff by absorbance or standard, and more
 lamp, bottle volumes, filters, pressure, vacuum, mechanical function, and more
 store control data, print Levey Jennings or QC range plots

- Self monitoring modes
- QC options

Certifications
 NRTL Listed, CE Marked
 Awareness Technology is certified under ISO 13485:2003

ChemWell® 2910 Biochemistry and EIA

combined in one modern system



ChemWell® 2910

For the modern laboratory



An open system you can program for the reagent applications of your choice

ChemWell is a completely open system that is easy to program.

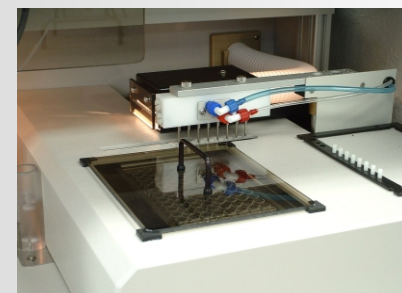
Set up assays, routine jobs, quality control, panels, even index calculations to suit your laboratory. A password system and log of changes protect your programs.

Choose from a large selection of monitoring and reporting styles.

Precise pipetting of low volume specimens, elimination of carry over, and careful control of temperature are all essential for reliable results.

ChemWell can make pre-dilutions, however this is seldom necessary since a high level of precision is achieved even with a 2uL sample. Carry over is eliminated without the need for disposable pipet tips. A unique wash cup assures cleaning inside and out. In addition, extra washes may be programmed for any particularly sensitive assay. With a completely open system you can program additional wash volume, or increase the number of washes, or even direct the probe to pick up and dispense a probe cleaning solution after each specimen.

ChemWell can process EIA at ambient temperature or 37C. An incubator is provided for biochemistry wells to assure precise kinetic reactions. The probe is also temperature-controlled to deliver 37C reagents. An optional reagent cooling accessory (RCA) is available to protect reagents from ambient heat. Removable racks can be refrigerated, pre-loaded and ready for the next use.



Connect With Us



200 tests per hour
No carry-over
Liquid-sensing probe tip

8-well wash head
level-sensing wash, rinse, and waste bottles
LIS

STAT
QC tracking
self-monitoring
reflex testing
open system

Reaction volume < 250uL
No custom disposables
IAD filters

220 or 110 VAC input
safety shields
removable racks

easy to maintain
makes automatic service reports
low cost lamps

Edit standard curves
self-monitoring mechanics and optics

ChemWell is truly two instruments in one.

Set up a full or partial plate of enzyme immuno assays (EIA) and program ChemWell to automatically make dilutions, dispense reagents, incubate, wash, read, and prepare final reports. Alternately, you can program ChemWell as either a batch analyzer or a continuous loading random-access analyzer for performing clinical biochemistry tests.

ChemWell uses standard off-the shelf microwells for all reactions.

Uncoated microwells make low volume sample cups for biochemistry. They can also be washed for re-use. Performing biochemistry assays in microwells offers many advantages. Among them are increased throughput and decreased cost per test. ChemWell reads vertically using 4 optical channels and 8 wavelengths.

Name/ID	Assay	Time Left	Absorbance	Concentration	Interpreta
patient #1	CHOLESTEROL	Complete	0.1700 Abs	207 mg/dL	High
patient #1	GLUCOSE	Complete	0.3250 Abs	211 mg/dL	High
patient #1	Triglycerides	Complete	0.1098 Abs	141.4	High
patient #2	CHOLESTEROL	Complete	0.1280 Abs	156 mg/dL	High
patient #2	GLUCOSE	Complete	0.1582 Abs	103 mg/dL	
patient #2	Triglycerides	Complete	0.0726 Abs	93.5	
patient #3	CHOLESTEROL	Complete	0.1900 Abs	232 mg/dL	High
patient #3	GLUCOSE	Complete	0.5189 Abs	337 mg/dL	High
patient #3	Triglycerides	Complete	0.1979 Abs	254.8	High
patient #4	CHOLESTEROL	Complete	0.1739 Abs	212 mg/dL	High
patient #4	GLUCOSE	Complete	0.3400 Abs	220 mg/dL	High
patient #4	Triglycerides	Complete	0.0959 Abs	123.5	High
patient #5	CHOLESTEROL	Complete	0.1315 Abs	160 mg/dL	High
patient #5	GLUCOSE	Complete	0.1585 Abs	103 mg/dL	
patient #5	Triglycerides	Complete	0.0736 Abs	94.8	
patient #6	CHOLESTEROL	Complete	0.1866 Abs	228 mg/dL	High
patient #6	GLUCOSE	0 min +			
patient #6	Triglycerides	1 min +			
patient #7	CHOLESTEROL	Complete	0.1776 Abs	217 mg/dL	High
patient #7	GLUCOSE	0 min +			
patient #7	Triglycerides	1 min +			
patient #8	CHOLESTEROL	Complete	0.1289 Abs	157 mg/dL	High
patient #8	GLUCOSE	0 min +			
patient #8	Triglycerides	1 min +			

1. Choose either the chemistry or the EIA mode.
2. Load reagents, samples, and micro-wells.
3. Select assays and reports you want to see.

THE REST IS AUTOMATIC

ChemWell® 2910

For the modern laboratory