CS-2500 Hemostasis System

Excel with confidence





Transform care delivery through optimized clinical operations

Siemens Healthineers has a proven record of providing hemostasis solutions that help busy labs to automate processes

In recent years, the CS family of systems has streamlined pre-analytical sample quality checks using PSI® technology to help labs manage unsuitable samples prior to analysis and provide reliable results on the first run. This feature is especially important because pre-analytical errors and unsuitable samples account for up to 70% of mistakes in the lab.¹ In approximately 15% of such instances, these errors have a significant impact on patient care.²

An estimated 9–15% of diagnostic errors have an impact on patient care. Many of these errors are due to the inappropriate collection, handling, or processing of samples referred for testing.²

Siemens Healthineers is pleased to take hemostasis testing to the next level with CS-2500 System, built on proven PSI technology employed in the CS family of systems.

Diagnostic errors in the lab





CS-2500 System's smartly designed technologies include assay-based pre-analytical sample-quality checks using PSI technology, automated mixing studies, integrated platelet aggregation testing,* and clot waveform analysis (CWA)† for improved efficiency and reliable first-run results.

Designed to increase operational efficiency and streamline workflow, CS-2500 System uses advanced technology that enables labs to:

- Improve the quality of test results.
- Reduce the need for repeat testing.
- Achieve cost-effective method consolidation.
- Simplify operations and increase diagnostic confidence.

The trusted hemostasis partner you can count on.

Let's go beyond hemostasis testing—today, tomorrow, and in the future.

Siemens Healthineers is one of the world's largest providers of hemostasis solutions. With a scalable and intregrated portfolio, backed by a dedicated team, we're committed to fulfilling your current and future laboratory requirements in hemostasis and beyond.

^{*}The products/features are not commercially available in all countries. Due to regulatory reasons, their future availability cannot be guaranteed. Please contact your local Siemens Healthineers organization for further details. In the U.S., platelet aggregation testing is for research use only. Not for use in diagnostic procedures. †Research use only.

Excel with assay-based pre-analytical checks that improve sample management for consistent results

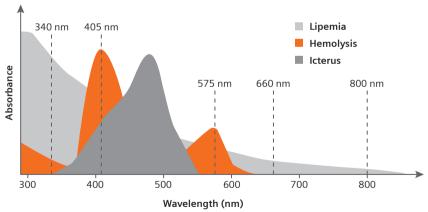
CS-2500 System helps mid-volume labs achieve improved first-run reliability by identifying and automatically managing potentially problematic test samples prior to analysis. Simultaneous multiwavelength analysis and proven PSI technologies—including assay-based hemolysis, icterus, and lipemia interference (HIL), sample-volume checks for up to five different primary tube types, and clog detection—minimize repeat testing and manual reviews.

- Assay-based pre-analytical sample-quality checks using PSI technology for HIL interference provide reliable results on the first run.
- Simultaneous multiwavelength scanning of clotting reactions at 340, 405, 575, 660, and 800 nm helps to reduce the effects of interfering substances by automatically selecting optimal wavelengths.
- 10 flexible reaction detectors enable high-capacity performance for a variety of test profiles to maximize lab productivity.

Pre-analytical interferences associated with diagnostic errors in hemostasis²⁻⁴

	Hemolysis	lcterus	Lipemia	Improper Tube Filling
Falsely Increased Results	PT, APTT, D-dimer, FV, FVII, FX	PT, Fibrinogen	Antithrombin	PT, APTT
Unaffected Results		APTT	PT, APTT	
Falsely Decreased Results	APTT, Fibrinogen, Antithrombin, Thrombin Time	Antithrombin	Fibrinogen	D-dimer

Accurate test results from simultaneous multiwavelength scanning



Effects of pre-analytical interferences vary. Please refer to instrument-specific reagent application/reference guide for more information.

"The level of hemolysis causing clinically important changes is test-specific; therefore, test-specific thresholds should be used to assess patient samples that have hemolyzed during collection and/or processing."5

Smartly designed technologies improve sample management, increase efficiency, and streamline lab workflow

Simultaneous multiwavelength analysis and proven PSI technologies identify and automatically manage potentially problematic test samples prior to analysis

- Assay-based pre-analytical sample-quality checks using PSI technology for HIL interference, sample-volume checks for up to five different primary tube types, and clog detection provide accurate and reliable results on the first run.
- Simultaneous multiwavelength analytical scanning detects and manages unsuitable samples to minimize retests and reflex testing.
- 10 flexible reaction detectors enable highcapacity performance for a variety of test profiles.
- Secure aliquot technology enables multiple tests per sample without the risk of debris from cap-piercing in the measurement system.

Get unlimited potential for high-capacity performance and extended walkaway time

- Reagent capacity of up to 3000 tests,[‡]
 with onboard capacity of up to 40 reagents
 and five additional buffer positions.
- Approximately 180 simultaneous PT/APTT tests/hour.§
- Anti-evaporation caps and refrigerated reagent table at approximately 10°C maximize onboard reagent stability.
- Tilted vials and SLD mini cups reduce reagent dead volume to maximize tests per vial.

Uninterrupted workflow delivered in compact, affordable footprint

- Cap-piercing technology allows mix of capped and uncapped tubes and cups for dependable throughput.
- Simultaneous processing of primary samples and micro mode for precious pediatric samples increase productivity.
- Accessible reagent table enables convenient reagent loading without interrupting sample measurement.
- Continous consumables and sample loading helps streamline workflows.
- Automated QC checks are performed at userdefined intervals, and daily maintenance requires less than 5 minutes.
- Ready-to-use cleaning solution simplifies daily maintenance.





Automated mixing studies, integrated platelet aggregation,* and CWA[†] deliver cost-effective instrument and staff consolidation

- Automated mixing studies help clinicians make decisions regarding factor deficiencies and circulating inhibitor patterns.
- Integrated platelet aggregation testing* simplifies and automates assessment of inherited, acquired, or drug-induced platelet disorders.
- CWA[†] illustrates the optical reaction profile during PT or APTT measurement and provides qualitative and sensitive waveform patterns.
- Powerful, easy-to-use graphical analysis tools simplify operations.

Improve efficiency with a wide spectrum of assay parameters, testing methodologies, and sophisticated software

- Optical methodology displays clot formation for evaluation of fragile clots.
- Mixing studies using multidilution analysis (MDA), automated repeat, redilution, and reflex testing are consolidated on one platform.
- 24-inch touchscreen and intuitive software provide an easily customizable and user-friendly interface.
- The system provides high test throughput using four measurement principles along with traceability of sample results and audit trails.

True lab-to-lab consistency enables confident multisite patient monitoring

- Results correlate with CN-3000 and CN-6000,*
 CS-5100, and CA-600 families of hemostasis systems.
- Seamless integration of instruments and standardized PSI technology optimize use across multisite labs.
- Standardized software, reagents, controls, and calibrators improve convenience, offer cost savings, and reduce waste for more efficient utilization of labor.

‡Test capacities: PT—3000; PT/APTT—2880; PT/APTT/Fbg—2840.

§Throughput values were determined by the time to first result using study protocol from Siemens Healthineers with PT (Thromborel® S assay), APTT (Pathromtin® SL assay) test applications.

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Excel with smartly designed technologies that simplify lab operations and allow cost-effective consolidation

CS-2500 System streamlines workflow, saving valuable time and resources while enabling clinicians to make informed clinical decisions with powerful, easy-to-use graphical analysis tools.

- Automated mixing studies help clinicians make decisions regarding factor deficiencies and circulating inhibitor patterns.
 - Automated dilution of sample with graphical output allows easy analysis.
- Integrated platelet aggregation testing* provides cost-effective system consolidation for detection of inherited, acquired, or drug-induced platelet disorders.
 - Streamlined workflow with fewer instruments and less specialized staff leads to significant time and resource savings.
 - Standardized testing reduces variability of results and helps to minimize the need for retesting.
 - Ability to process low sample volumes (140 μ L per test) enables testing for geriatric and pediatric patients.
- Clot waveform analysis[†] illustrates the optical reaction profile during PT or APTT measurement, providing qualitative information as well as sensitive, quantitative waveform patterns.
 - Clinicians can dig deeper into certain underlying clinical conditions such as disseminated intravascular coagulation (DIC), sepsis, antiphospholipid antibodies (LA), factor deficiencies, and presence of heparin.
- Intuitive system interface helps streamline lab operations with onboard help, configurable maintenance, quality control procedures, and real-time monitoring of reagents and consumables.

Smart Remove Services (SRS)** is a fast, secure, and powerful data link that connects your medical equipment to our experts, who provide proactive and interactive services

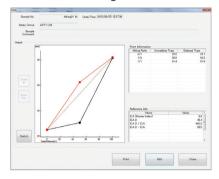
- Enables remote technical and application support for error identification, troubleshooting, and guidance to restore your system operations.**
- Supports remote hands-on training on specific clinical applications and features, according to your training needs, to help enhance the skills and productivity of your staff.^{††}

Simplify operations and gain greater insights with Atellica Diagnostics IT

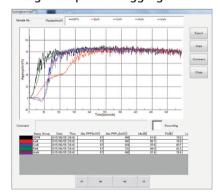
Atellica® Diagnostics IT complements our comprehensive portfolio of lab innovations and services by unifying data from your instrument and automation systems, combining sample, process, result, QC, and inventory data for greater insights. This gives you greater visibility into your lab's clinical, operational, and financial performance every step of the way, from sample collection to results reporting.

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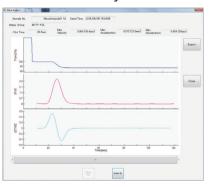
Automated mixing studies



Integrated platelet aggregation*



Clot waveform analysis†



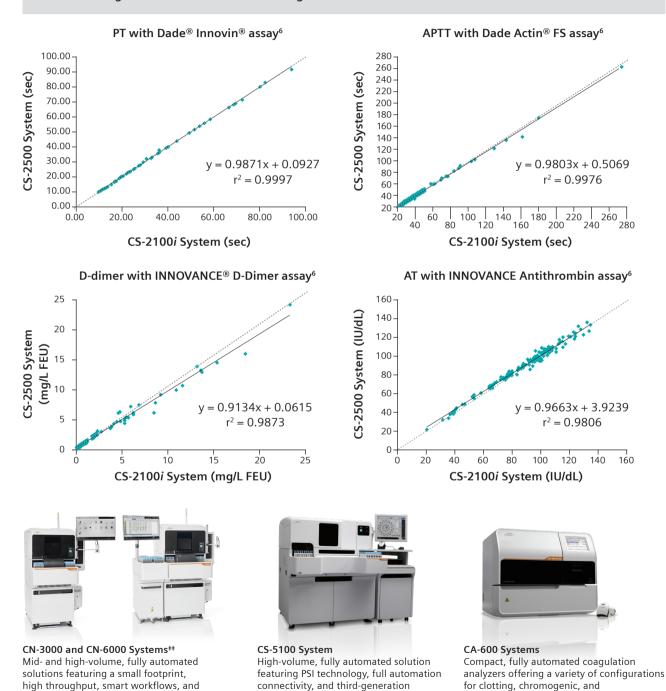
Atellica Data Manager



^{**}Connection to Smart Remote Services (SRS) infrastructure is required. SRS has advanced security measures in place and is compliant with the ISO 27001:2017 Standard for Information Security. ††Purchasable service option.

Excel with true lab-to-lab consistency for confident multisite patient monitoring

"The inclusion of innovative functionality in new analyzers is highly desirable, in addition to the prerequisites of sample throughput, result precision, and comparability. The CS series of analyzers has made significant advances in addressing these issues."



^{##}The products/features/applications mentioned here are not commercially available in all countries and are subject to local regulations.

Their future availability cannot be guaranteed. Not available for sale in the U.S.

cap-piercing technology

flexible configurations

immunologic methods

At Siemens Healthineers, we pioneer breakthroughs in healthcare. For everyone. Everywhere. Sustainably. As a leader in medical technology, we want to advance a world in which breakthroughs in healthcare create new possibilities with a minimal impact on our planet. By consistently bringing innovations to the market, we enable healthcare professionals to innovate personalized care, achieve operational excellence, and transform the system of care.

Our portfolio, spanning in vitro and in vivo diagnostics to image-guided therapy and cancer care, is crucial for clinical decision-making and treatment pathways. With the unique combination of our strengths in patient twinning,* precision therapy, as well as digital, data, and artificial intelligence (AI), we are well positioned to take on the greatest challenges in healthcare. We will continue to build on these strengths to help overcome the world's most threatening diseases, enable efficient operations, and expand access to care.

We are a team of more than 71,000 Healthineers in over 70 countries passionately pushing the boundaries of what is possible in healthcare to help improve the lives of people around the world.

*Personalization of diagnosis, therapy selection and monitoring, aftercare, and managing health.

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CS-2500 System refers to Automated Blood Coagulation Analyzer CS-2500. CS-2100*i* System, CN-3000 System, CN-6000 System, CA-620 System and CA-660 System refer to Automated Blood Coagulation Analyzer CS-2100*i*, -CN-3000, -CN-6000, -CA-620, -CA-660 respectively.

Product availability may vary from country to country and is subject to varying regulatory requirements. Please contact your local representative for availability.

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