PHILIPS

Ultrasound

Affiniti 50

It understands your everyday
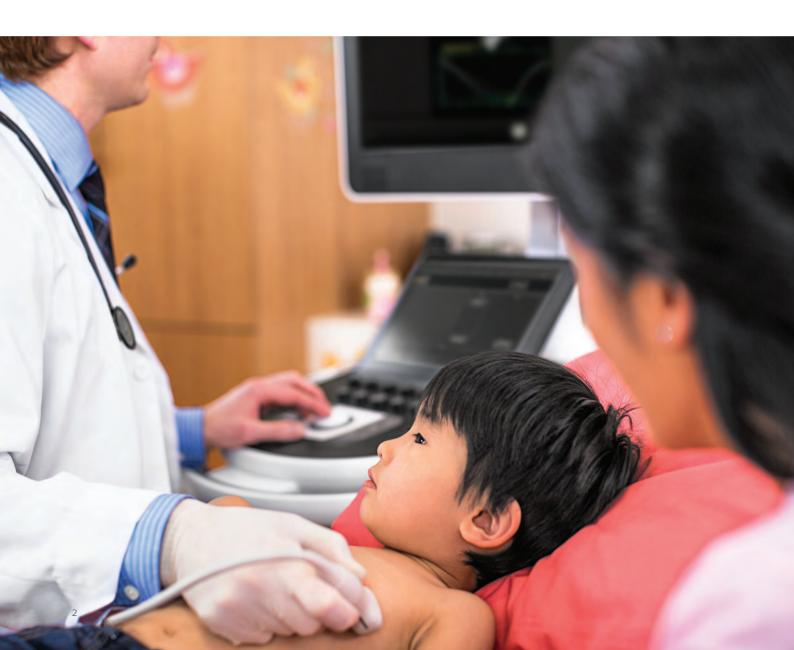
Philips Affiniti 50 cardiovascular ultrasound system

Affiniti 50 is a complete echocardiography solution that addresses the needs of a busy department or office while incorporating those innovations that make Philips ultrasound the global leader in echocardiography.

Designed for **balance**

A complete cardiovascular solution

- Adult echocardiography including TEE
- Pediatric echocardiography including TEE
- Stress echocardiography
- Left Ventricular Opacification (LVO)
- Vascular imaging
- Quantification tools

You always go above and beyond to provide the best care to your patients. But you are expected to do so with less time, fewer resources, and higher patient volume.

To balance these many demands, you need diagnostic information quickly – but not at the expense of accuracy. You need advanced functionality – but not at the expense of ease of use. You need a system that is ergonomic – but built to last for the daily rigors of high patient volume.

Philips Affiniti 50 ultrasound system helps you achieve this balance. Engineered for efficiency and reliability and powered by Philips superb performance, it gets you the diagnostic images you need, quickly. Its intuitive design and walk-up usability help you provide elegant, efficient care – every day.

The Affiniti 50 ultrasound system was designed to work hard, without high costs. Total cost of ownership is kept low through energy-efficient technology, extensive reliability testing that enhances uptime, and a modular design that enables rapid repair, if needed.

Workflow meets **wow**

With Philips Affiniti 50, workflow meets wow. A complete echocardiography solution, it addresses the need to deliver results efficiently, while incorporating those innovations that make Philips ultrasound the leader in echocardiography.

Affiniti 50's precision beamforming, Tissue Specific Presets (TSP), and efficiency and automation tools deliver both performance and workflow for confident throughput.

Affiniti 50's precision beamforming with a wide dynamic range delivers superb spatial and contrast resolution, outstanding tissue uniformity, few artifacts, and reduced image clutter.Tissue Specific Presets (TSP) automatically adjust over 7500 parameters to optimize the transducer for the specific exam type, producing excellent image quality with little or no need for image adjustment.

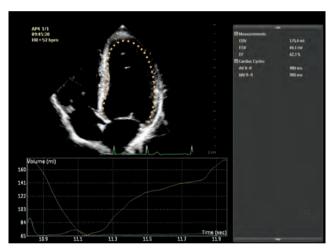**Excellent image quality with with S4-2 transducer.**

Most cardiac transducers, including TEE transducers, can be shared among Philips EPIQ, CX50, Sparq, and Affiniti systems.

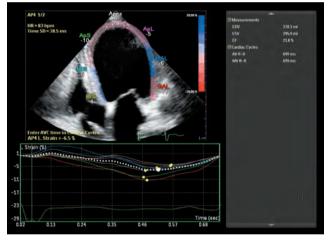# Anatomical Intelligence Ultrasound (AIUS) leads to **everyday efficiency**

Affiniti 50 incorporates Philips exclusive AIUS. Available on both adult and pediatric transducers, it provides automatic anatomy recognition and proven quantification, making it easy to perform exams and deliver clinical information quickly.

Ejection Fraction (EF) measurements are now part of nearly every exam. Yet current methodologies, such as biplane Simpson's method of disks, are time-consuming and can interrupt workflow. The ideal tool for every echo exam, Automated 2D Cardiac Quantification[A.I.] (a2DQ[A.I.]) provides rapid access to validated 2D EF and volumes within 10 seconds.

Speckle strain echocardiography is a technique designed to allow clinicians to quickly and easily assess myocardial deformation (strain) in day-to-day practice, going beyond ejection fraction in the assessment of left ventricular (LV) function. Automated Cardiac Motion Quantification[A.I.] (aCMQ[A.I.]) provides reproducible 2D Global Longitudinal Strain (GLS) speckle measurements. An accurate EF is also calculated simultaneously with no extra steps.

a2DQ[A.I.] for fast, reproducible EF on all your patients.

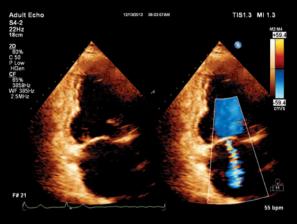**aCMQ[A.I.] provides both EF and GLS from the same 2D images.**

Automation tools save time

Philips Affiniti 50 system is equipped with automation features that reduce repetitive button pushes and steps, leading to enhanced workflow.
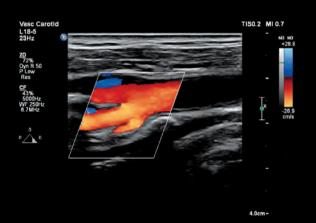
- **Real-time iSCAN (AutoSCAN):** Automatically and continuously optimizes gain and TGC
- **Auto Doppler for vascular imaging:** Color-box positioning and sample volume placement in just three steps, with an average of 67.9% fewer button pushes
- **SmartExam guided workflow:** Increases consistency, reduces keystrokes, and decreases exam time by 30%-50% by automatically planning and processing application protocols
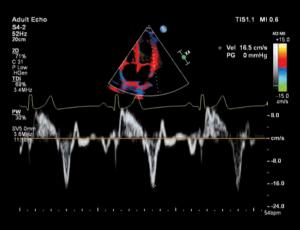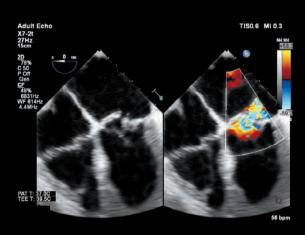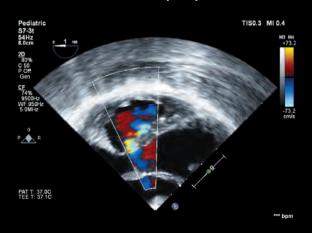
Performance

Mitral regurgitation

TDI PW

Carotid bulb

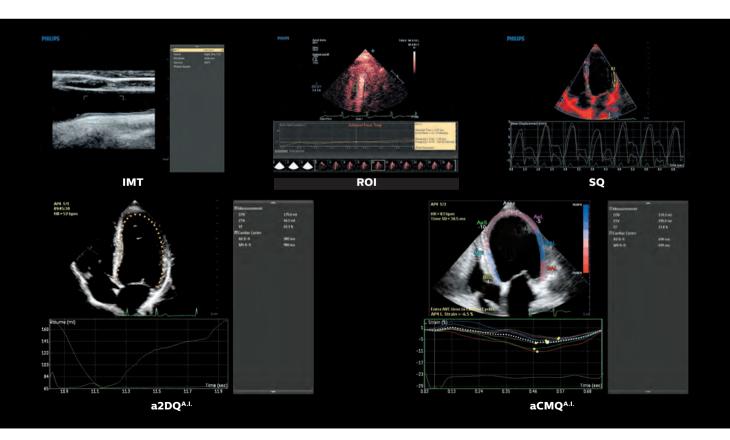Mitral valve prolapse

Contrast LVO focusing on the apex

PFO

you can see

Q-App quantification applications

Affiniti 50 offers a wide variety of sophisticated Q-Apps to quantify echocardiography information.

Q-App	Clinical application	Benefit
Intima Media Thickness (IMT) for vascular	Automatic carotid intima media thickness measurement	Fast and easy access to IMT data
Region of Interest (ROI)	Echo contrast and color images	Extract acoustic measurements from images
Strain Quantification (SQ)	Measures the myocardial velocity from color tissue Doppler	Derive displacement strain and strain rate
Automated 2D Cardiac Quantification[A.I.] (a2DQ[A.I.])	Provides rapid access to proven 2D EF and volumes	Easy access to EF and volumes as part of everyday echo protocols
Automated Cardiac Motion Quantification[A.I.] (aCMQ[A.I.])	Reproducible 2D GLS speckle measurements	Fast GLS measurements

IMT

ROI

SQ

a2DQ[A.I.]

aCMQ[A.I.]

Designed around your everyday workflow, Affiniti 50 offers walk-up usability, ergonomics, and mobility.

Comfort meets **competence**

Philips leverages the experiences of its customers to design Affiniti 50 to address the challenges of daily scanning. We understand the reality of tight spaces, high patient volume, technically difficult patients, and time constraints, and we've designed the system with thoughtful details that lighten your workload.

You won't notice it's there unless it's gone, but users have reported that easy clip, our innovative cable management solution, keeps cables tangle-free and reduces damage while decreasing cable strain to enhance comfort while scanning.

The tablet-like touchscreen reduces button pushes.

Walk-up usability

The intuitive, intelligently designed user interface and system architecture have been validated by studies that show that users with ultrasound experience require minimal training on system use to be able to complete an exam.[1]

Reduced reach and button pushes

To enhance exam efficiency, Affiniti 50 places relevant, easy-to-learn controls right at your fingertips, streamlining workflow. Affiniti 50 is designed to make a full day of scanning comfortable. Because 80% of ultrasound clinicians experience work-related pain, and more than 20% suffer a career-ending injury,[2] we've designed our intuitive, tablet-like touchscreen interface to reduce reach and button pushes.

Affiniti 50's friendly design and library-quiet operation enhance patient comfort.

Scanning comfort

Affiniti 50 is designed to make a full day of scanning comfortable. The control panel and generously sized, 54.6 cm (21.5 in) monitor add to the system's ergonomics, enhancing scanning comfort whether standing or sitting. The touchscreen is one of the largest in its class, so you can easily make selections and control scanning while focusing on your patients.

Ready when you need it

At just 83.5 kg (184 lb), Affiniti 50 is one of the lightest in its class and is 16% lighter than its predecessor.[†] With a small footprint and a fold-down monitor, pushing the system down hallways and in tight spaces is easy.

When an exam is finished, a full suite of DICOM and PC format capabilities make information-sharing simple. Structured reporting facilitates patient workflow by giving you the ability to transfer measurements, images, and reports over network share, and wireless capability plus easy connection to printers helps you document exams.

To reduce the time required for mobile scans, the system can be put to sleep in two seconds, and then moved to a new location, where it starts up in just seconds.

[1] 2014 internal workflow study comparing Affiniti to HD15.
[2] Society of Diagnostic Medical Sonography, Industry Standards for the Prevention of Musculoskeletal Disorders in Sonography, May 2003.
[†] HD15

Built to withstand the rigors of daily use, Affiniti 50 offers low operating costs and is backed by Philips support and value-added services. The Affiniti 50 system boasts a low total cost of ownership, making it a smart investment.

A **smart** investment

Enhance uptime

- A modular design for enhanced reliability and rapid repair
- Philips remote services* monitoring, which corrects issues using a standard Internet connection, reducing the need for service calls
- Access to our award-winning service organization

Responsive relationships

The value of a Philips ultrasound system extends far beyond technology. With every Affiniti 50 system, you get access to our award-winning service organization, our competitive financing, and educational programs that help you get the most out of your system.

Exceptional serviceability
The system features a superb modular design for rapid repair.

Service Request button for immediate access to Philips support.

*Not all services available in all geographies; contact your Philips representative for more information. May require service contract.

Smart service options* help reduce disruption to your everyday workflow. We also offer technology to keep your data secure, and education and utilization reports that help you get the most out of your system.

Remote desktop

Spend less time on the phone with a Philips "Virtual Visit" with remote system* interaction for fast technical and clinical troubleshooting and guided scanning options.

iSSL technology

This industry-standard protocol meets global privacy standards and provides a safe and secure connection to the Philips remote services network using your existing Internet access point.

Online support request

Enter a support request directly from your Affiniti 50 system for a fast, convenient communication mechanism that reduces workflow interruption and keeps you at the system and focused on your patient.

Utilization reports

Data intelligence tools can help you make informed decisions to improve workflow, deliver quality patient care, and decrease the total cost of ownership. This is the only ultrasound utilization tool that provides individual transducer usage and the ability to sort by exam type.
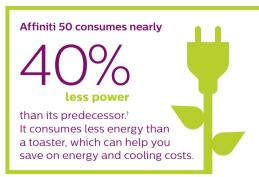
Proactive monitoring

Proactive monitoring allows for the detection and repair of anomalies before they become problems, and helps us to better predict potential failures and proactively act on them. Increase system availability, optimize workflow, and promote patient satisfaction by scheduling downtime as opposed to reacting to an unexpected problem.

Intelligent software architecture

Software is easily optimized, maintained, and restored by the service user without risk to patient data, giving you peace of mind and confidence that your data is secure. Patient data is stored on a separate partition and physical location to provide protection and ease of removal, providing you total control of your data.

Clinical education solutions

Our comprehensive, clinically relevant courses, programs, and learning paths are designed to help you improve operational efficiency and enhance patient care.

Affiniti 50 consumes nearly

40%
less power

than its predecessor.[†]
It consumes less energy than a toaster, which can help you save on energy and cooling costs.

* Not all services available in all geographies; contact your Philips representative for more information. May require service contract.
† HD15

Please visit **www.philips.com/Affiniti**