

A pregnant woman with curly brown hair, wearing an orange cardigan over a dark green tank top, is smiling and looking towards a doctor. The doctor, a woman with dark hair, is wearing a white lab coat and is looking at a large ultrasound monitor. The monitor displays a clear image of a fetus in the womb. In the background, there is another smaller monitor showing medical data. The setting appears to be a modern medical office or clinic with large windows in the background.

**PHILIPS**

Ultrasound

Affiniti

It understands  
**your** everyday

Philips Affiniti ultrasound system for Ob/Gyn



# Designed for life

Our solutions are designed to give your patients peace of mind by giving you more information earlier in pregnancy and making it easier to reach a confident diagnosis.

## Diagnostic confidence, earlier and easier

Be certain and decisive with Philips premium-quality imaging.

## Made for you

With optimized workflow, you can spend more time caring for your patients.

## Your partner today and tomorrow

High-impact diagnoses require a trusted partner that brings you closer to your patients.



# The next generation of PureWave

The V9-2 transducer uses the power of PureWave crystal technology to provide premium image quality. The ergonomic form and light weight mean that this transducer is designed to be used all day without fatigue, thus avoiding transducer switching. Pairing the V9-2 transducer with the Affiniti ultrasound system offers next-level Ob/Gyn imaging.

- First PureWave mechanical volume transducer
- Light weight
- Exceptional ergonomic design
- First-, second- and third-trimester applications

## Supports additional technology

2D, 3D and 4D —————

STIC —————

XRES Pro —————

TrueVue/GlassVue —————

TouchVue/MPR Touch —————

FlexVue —————

MicroFlow Imaging —————

aReveal<sup>A.I.</sup> —————

aBiometry Assist<sup>A.I.</sup> —————





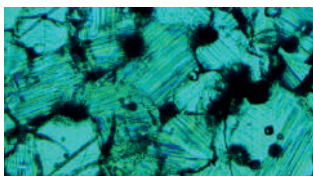
Precision beamforming, PureWave technology, TSPs and efficiency and automation tools deliver both performance and workflow for confident throughput.

# Excellence meets efficiency

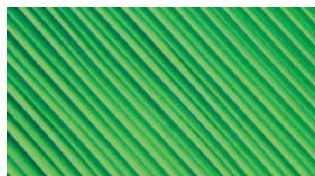
## Power to scan technically difficult patients

While superb image quality is essential in Ob/Gyn ultrasound, the increasing number of patients with a high body mass index (BMI) makes it crucial to find ways to optimize exam success on these technically challenging patients. PureWave is your answer.

PureWave crystals have virtually perfect uniformity for greater bandwidth and twice the efficiency of conventional ceramic materials. The result is excellent imaging and Doppler performance.



Conventional PZT (x800)



PureWave crystal (x800)

## High anatomical detail

PureWave transducers are designed to increase penetration, particularly in technically difficult patients, such as expectant mothers with high BMIs. Pure, more uniform crystals, plus the ability to transform ultrasound energy with precision and efficiency, result in exceptional images with a high level of anatomic detail.

PureWave power is strengthened by precision beamforming, which features a wide dynamic range to deliver superb spatial and contrast resolution, outstanding tissue uniformity, few artifacts and reduced image clutter.

Tissue Specific Presets (TSPs) optimize the transducer for the specific exam type, producing excellent image quality with little or no need for image adjustment. This outstanding image quality combines with advanced clinical functionality.



#### Transducers include:

- PureWave C5-1 and PureWave C9-2 for obstetrical exams
- PureWave C10-3v for early obstetrical and gynecological exams
- PureWave eL18-4\* for a diverse range of clinical applications, including breast, MSK, small parts, vascular, pediatrics and Ob/Gyn
- PureWave V9-2 for obstetrical exams

#### Elevated Ob/Gyn imaging versatility with tilt feature

The tilt feature of the 3D9-3v and V9-2 transducers provides lateral steering of the 2D image plane to the right or left. 2D tilt allows scanning access to anatomical structures that are off-axis without having to manually angle the transducer for maximum scanning versatility during the exam.

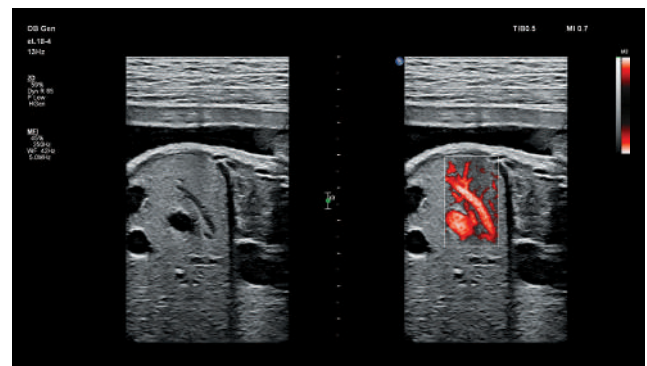
#### eL18-4 transducer\*

The eL18-4 transducer is a high-frequency linear transducer that incorporates ultra-broadband PureWave crystal technology with fine-elevation focusing capability. The transducer's advanced design allows for wide field-of-view trapezoid imaging and superb 2D detail resolution along with the penetration needed in obstetrical and gynecological examinations to provide diagnostic confidence.

#### MicroFlow Imaging

MicroFlow Imaging, found on the C5-1,\* eL18-4 and V9-2 transducers, is a proprietary mode designed to detect low flow and low velocity blood flow found in small fetal, placental, uterine and ovarian vasculature. MicroFlow Imaging overcomes

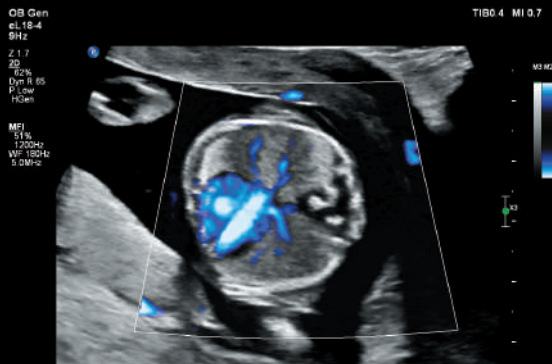
many of the technical barriers associated with conventional methods to detect small vessel blood flow with high resolution and minimal artifacts. MicroFlow Imaging maintains high frame rate and 2D image quality while applying advanced artifact reduction techniques. New 2D image subtraction, 2D blending and side-by-side display options offer excellent visualization versatility.



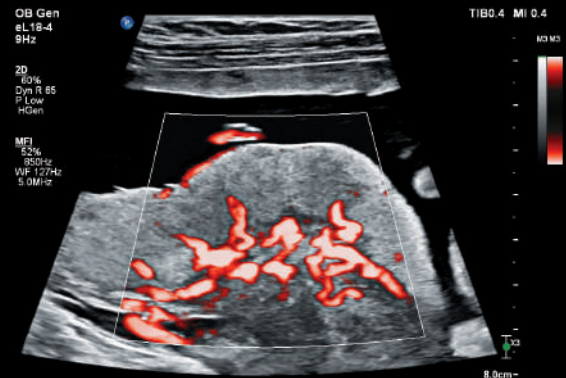
Fetal liver with eL18-4 transducer and MicroFlow Imaging

\* The eL18-4 transducer and the C5-1 preset are only available on Affiniti 70.

# Performance you can see



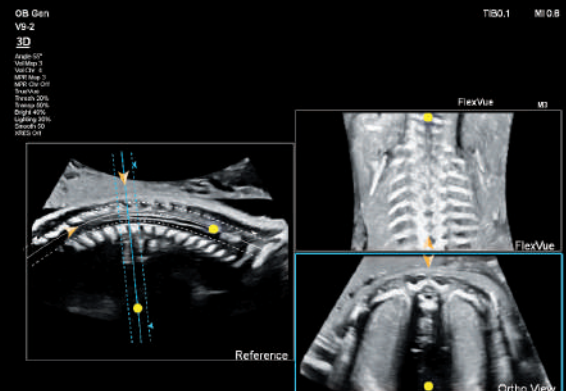
Second trimester fetal heart with MFI



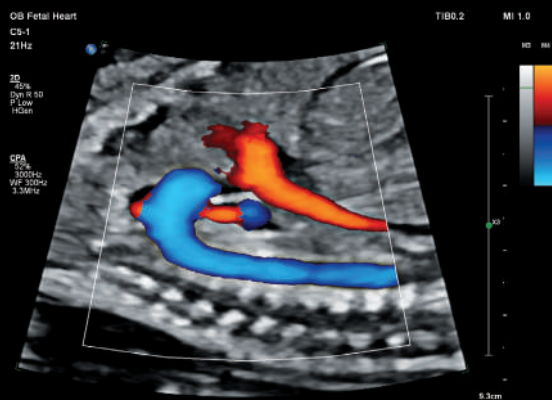
Placenta vascularization with MFI



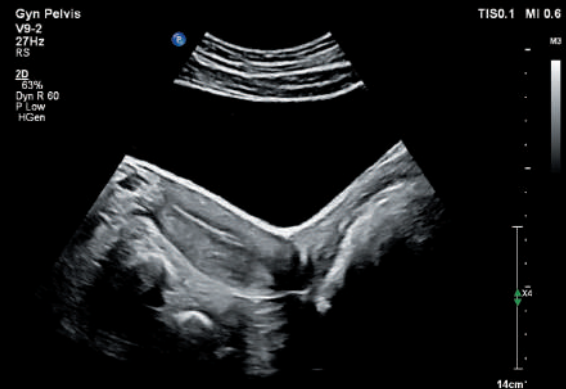
Fetal brain at 17 weeks of gestation



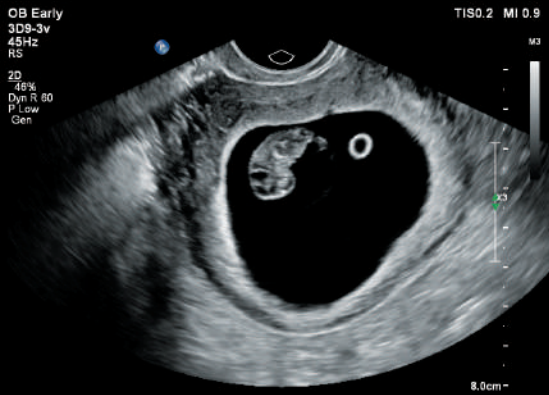
Spine with FlexVue and OrthoView



Aortic arch with CPA



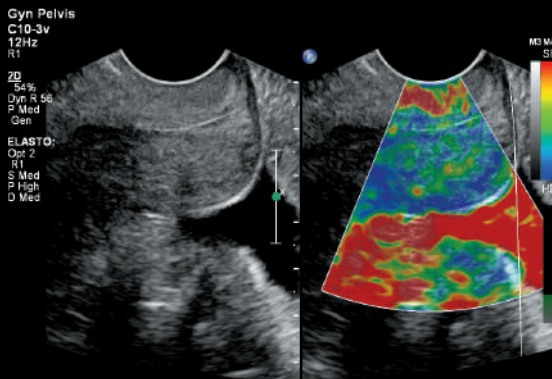
Uterus with transabdominal scan



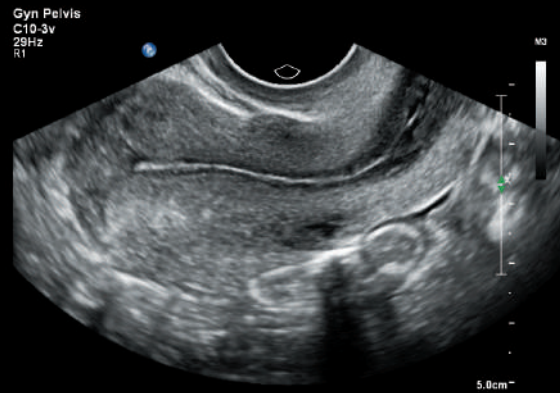
Early OB, 9 weeks of gestation



11 weeks of gestation



GYN elastography



Long uterus



TrueVue baby face



Second trimester fetal heart

# Real life, illuminated

Affiniti offers easier, more intuitive workflow with the right touch to enhance detailed Ob/Gyn exams through “lifelike” TrueVue 3D imaging display with the intuitive TouchVue 3D volume workflow. The combination of TrueVue with TouchVue may help in the maternal-fetal bonding process and may facilitate doctor-to-patient communication.

## TrueVue with TouchVue interface and GlassVue feature

TrueVue offers a powerful 3D visualization tool that produces highly realistic imaging of fetal and gynecological anatomy. TrueVue features an innovative internal light source that provides illumination at any location within the 3D volume for exceptional visualization. The internal light source allows the freedom to adjust the amount of light and shadow displayed on anatomical structures to reveal subtle detail not obtainable with conventional 3D rendering.

In addition, GlassVue is an advanced 3D imaging tool that goes beyond the surface to reveal bone, organs and other internal structures. Users have control over the amount of transparency in the 3D volume.

TrueVue features an interactive interface called TouchVue. TouchVue utilizes the Affiniti touchscreen to allow fingertip control of both volume rotation and internal light source position directly on the TrueVue 3D image.



**TrueVue** virtual light source can be placed anywhere within the acquired 3D volume, allowing manipulation of light and shadow on anatomical structures to enhance clinical confidence.



Light source, umbilical cord



Light source, upper right



Light source, deep in gestational sac



Light source, lower right



# Workflow meets WOW

The Affiniti ultrasound system incorporates innovations that make Philips ultrasound the choice of those who demand high image quality and proven clinical applications, while also addressing the everyday need to scan quickly and deliver results efficiently, even for complex cases.

## Automation tools save time

Automation features enhance workflow, decrease repetitive tasks and enhance ease-of-use and consistency of exams among users. These include:

- **aBiometry Assist<sup>AI</sup>**: virtually every obstetrical ultrasound examination includes standardized measurements of fetal structures to assess age and growth trends. aBiometry Assist<sup>AI</sup> uses anatomical intelligence of fetal anatomy to automatically preplace measurement cursors on selected structures, which users can quickly accept or edit. This helps reduce conventional measurement steps and streamlines obstetrical report generation. aBiometry Assist<sup>AI</sup> allows selection of auto measure function for BPD, HC, AC and FL fetal structures.
- **Real-time iSCAN (AutoSCAN)**: provides outstanding images in 2D, 3D, or 4D by automatically and continuously optimizing gain and TGC.
- **SmartExam protocols**: system-guided SmartExam protocols facilitate exams with an onscreen menu guiding you through required views and modes while automatically entering annotations and prompting for measurements. SmartExam protocols help you build a report quickly, alert to missed views and reduce overall keystrokes and exam time.
- **Efficient fetal scanning**: ability to create protocols for all trimesters and specialty exams such as trisomy 13 and 21.

# More reproducible results

## Anatomical Intelligence for Ultrasound (AIUS)

At the heart of the powerful Affiniti architecture is our Philips exclusive Anatomical Intelligence for Ultrasound (AIUS), designed to elevate the ultrasound system with advanced organ modeling, image slicing and proven quantification. Exams are easier to perform, more reproducible and deliver additional levels of clinical information.



Before aReveal<sup>AI</sup>.



After aReveal<sup>AI</sup> applied



aBiometry Assist<sup>AI</sup>.

## One touch to reveal

aReveal<sup>AI</sup> uses a proprietary anatomical intelligence algorithm that automatically sculpts away data around the fetal face by recognizing the geometry of the skull.

## A welcome assist during the obstetrical exam

aBiometry Assist<sup>AI</sup> uses anatomical intelligence to automatically preplace measurement cursors on selected structures to assess fetal age and growth trends.

# Visualize

## the challenging with ease

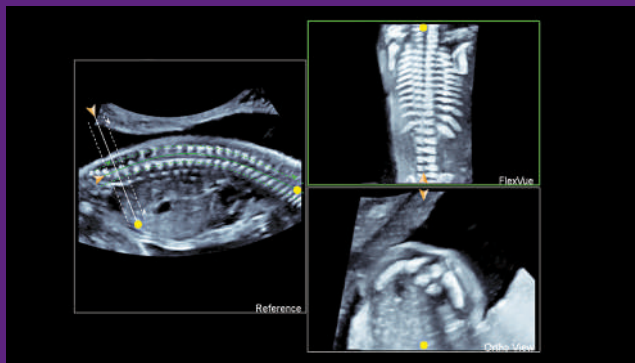
You need the ability to quickly visualize a wide variety of planes of section within 3D volumes. FlexVue with orthogonal view is a highly versatile tool that allows for easy visualization of technically difficult anatomical views from 3D volumes that are essential for diagnosis of Ob/Gyn pathology.

### Easily evaluate anatomy

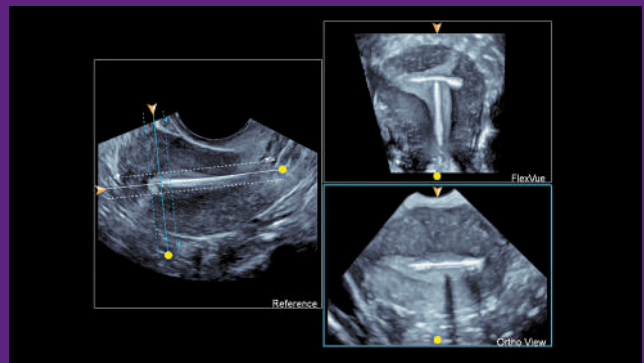
FlexVue with orthogonal view displays structures in their entirety in projected views. Even when a structure is curved, you can easily evaluate the anatomy in a wide variety of planes of section. The coronal and transverse planes are imperative for diagnosing uterine malformations and IUD placement. FlexVue with orthogonal view is particularly useful in assessing the uterine anomalies where the cervix and uterine body are not always in the same plane due to their curvature. FlexVue with orthogonal view is also useful in assessing the fetal spine where all portions of the spine are not always in the same plane due to their curvature.

### Tissue Emphasis Control

You now have the ability to change the image appearance of the projected view produced by FlexVue. FlexVue offers Tissue Emphasis Control, which allows you to change the range of intensity projections from Maximum Intensity Projection to Minimum Intensity Projection in just four stages.



FlexVue demonstrating a curved fetal spine in a complete projected planar view and orthogonal view in a corresponding transverse view.



FlexVue produces a complete projected coronal view of the uterus with an IUD perforating the myometrium and the corresponding transverse view is displayed by orthogonal view.

# Comfort meets competence

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

Philips leveraged the experiences of its customers to design Affiniti 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 to help lighten your workload.



You wouldn't notice it unless it were 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.

## MaxVue high-definition display

With a touch of a button, MaxVue brings full high-definition display quality to ultrasound imaging. Now you can experience extraordinary visualization of anatomy with 1,179,648 more image pixels when compared to the standard 4:3 display format mode. MaxVue enhances ultrasound viewing during interventional procedures and provides 38% more viewing area to optimize the display of dual, side/side, biplane and scrolling imaging modes.

**Over one million more pixels per image**

**38% larger viewing area**

Standard  
format 4:3

**1024 X 768  
pixels**

**MaxVue**  
Full high definition  
format 16:9

**1920 X 1080 pixels**



With image replication and TGCs on its tablet touchscreen, Affiniti was designed to reduce reach and button pushes.



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



One of the lightest in its class, so pushing the system down hallways and tight spaces is easy.



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.

### Enhanced native data

Active native data allows post-processing of many exam parameters, allowing you to finalize images before transfer to PACS. Now with enhanced functionality, users can move or change annotation or body markers as well as adjust 2D Gain, Views, Display Zoom, Gray map, Chroma map, and dynamics range on frozen or stored cine clips. Enhanced active native data also allows users to perform retrospective measurements on stored ElastQ Imaging exams.

### 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.\*

### Reduced reach and button pushes

To enhance exam efficiency, Affiniti places relevant, easy-to-learn controls right at your fingertips, streamlining workflow. Because 80% of ultrasound clinicians experience work-related pain, and more than 20% suffer a career-ending injury<sup>1</sup> we've designed our intuitive, tablet-like touchscreen interface to reduce reach and button pushes.

### Scanning comfort

Affiniti is designed to make a full day of scanning comfortable. The control panel with 180° of movement and generously sized 54.6 cm (21.5 in) articulating monitor enhance scanning comfort whether sitting or standing, but also can be used to bring comfort to patients because you can easily turn the monitor towards them and share images on the large screen. At just 83.5 kg (184 lb), with a small footprint and a fold-down monitor, the system can be easily moved, and fits into small spaces.

### Ready when you need it

The Set-up Wizard provides out-of-the-box usability that allows users to step up to the system, easily establish user configurations and get running quickly.

When an exam is finished, a full suite of DICOM and PC format capabilities makes 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.

\* 2014 internal workflow study comparing Affiniti to HD15.

# A smart investment

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

## Enhance uptime

- 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 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.

Affiniti offers a defense-in-depth strategy, implementing a suite of security features designed to help clinical IT professionals and healthcare facilities provide additional patient data privacy and virus protection, as well as protection from unauthorized access via the ultrasound systems on hospital networks.



## Exceptional serviceability

The system features a superb modular design for rapid repair.

Affiniti consumes nearly

**40%**  
less energy

than its predecessor.\*\*

It consumes less energy than a toaster and may help you save on energy and cooling costs.



Support 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.

\*\* HD15

# Count on us as your patients count on you

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

## Always there, always on

We work as one with your team to keep your Affiniti system running smoothly.

### Remote service capabilities maximize efficiency

Easy, rapid technical and clinical support through remote desktop enables a virtual visit with a Philips expert.

### Remote software distribution boosts performance over the entire system lifecycle

Remote software distribution provides a simple, convenient and safe process to seamlessly receive updates at a time the suits you keeping your system at peak performance now and in the future.

### Proactive monitoring solutions maximize uptime

Philips proactive monitoring increases system availability by predicting potential system disruptions and proactively acting on them, letting you focus on what is most important – your patients.

### Immediate support request at your fingertips

The support request button allows you to enter a request directly from the control panel, for a fast and convenient communication mechanism with Philips experts without leaving your patient, minimizing workflow interruption.

### On-cart transducer test provides confidence in your transducer quality

On-cart transducer test provides a non-phantom method to test Affiniti transducers at any time, giving you confidence in your diagnostic information.

## Sharing risk, increasing the return on your investment

Partner with us to maximize utilization and uptime of your Affiniti system.

### Utilization reports for confident decision-making

Data intelligence tools can help you make informed decisions to improve workflow, deliver quality patient care and decrease the total cost of ownership. The on-board utilization tool provides individual transducer usage data and the ability to sort by exam type.

## Understanding your needs, designed for you

Our flexible RightFit service agreements, education offerings and innovative financing solutions can be adapted to meet your needs and strategic priorities.

- **Technology Maximizer Program:** helps keep your system performing at its peak by continuously providing the latest software from Philips at a fraction of the cost of the same upgrades purchased individually over time.
- **Xtend Coverage:** lets you choose additional service coverage for your ultrasound equipment at the time of purchase to more easily calculate your total cost of ownership.
- **Clinical education solutions:** comprehensive, clinically relevant courses, programs and learning paths designed to help you improve operational efficiency and enhance patient care.

## 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.



\* Philips is rated number one in overall service performance for ultrasound for 26 consecutive years in the annual IMV ServiceTrak survey in the USA.

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



1. Society of Diagnostic Medical Sonography, Industry Standards for the Prevention of Musculoskeletal Disorders in Sonography, May 2003.