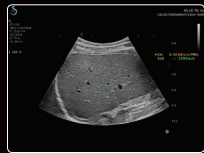


# CHRONIC LIVER DISEASE ASSESSMENT

NON-INVASIVE MANAGEMENT OF LIVER DISEASE THROUGHOUT THE CARE CYCLE

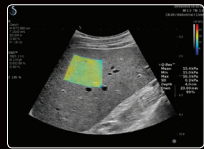
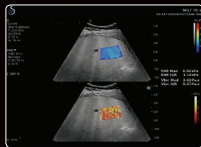


## Att PLUS and SSp PLUS

Measurement of attenuation and speed of sound in the liver

## Vi PLUS

Visualization and quantification of tissue viscosity

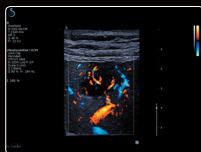


## ShearWave™ PLUS

Measurement of liver elasticity (in kPa) for liver fibrosis assessment

## Angio PL.U.S.

Visualization of microvascularization for the characterization of lesions



**SUPERSONIC**  
imagine



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# LIVER MARKERS IN ULTRAFAST ULTRASOUND IMAGING

Indications for Use: The SuperSonic Imagine Aixplorer MACH® range ultrasound diagnostic systems and transducers are intended for general purpose pulse echo ultrasound imaging, soft tissue viscoelasticity imaging and Doppler fluid flow analysis of the human body. The Aixplorer MACH® ultrasound diagnostic systems are indicated for use in the following applications, for imaging and measurement of anatomical structures: Abdominal, Small Organs, Musculoskeletal, Superficial Musculoskeletal, Vascular, Peripheral Vascular, Intraoperative, OB-GYN, Pelvic, Pediatric, Transrectal, Transvaginal, Urology, Neonatal/Adult Cephalic and Non-invasive Cardiac. In addition, the SuperSonic Imagine Aixplorer MACH® ultrasound diagnostic systems and associated transducers are intended for: measurements of abdominal anatomical structures; measurements of broadband shear wave speed, and tissue stiffness in internal structures of the liver and the spleen; measurements of brightness ratio between liver and kidney; visualization of abdominal vascularization, microvascularization and perfusion; quantification of abdominal vascularization and perfusion. The shearwave speed, beam attenuation, viscosity and stiffness measurements, the brightness ratio, the visualization of vascularization, microvascularization and perfusion, the quantification of vascularization and perfusion may be used as an aid to clinical management of adult and pediatric patients with liver disease. It is intended for use by licensed personnel qualified to direct the use of the medical ultrasound devices. CE certificate no. 26415, FDA cleared K180572.

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**AIXPLORER**  
**mach**<sup>30</sup>  
ULTRAFAST™ INTELLIGENCE

HEPATOCELLULAR CARCINOMA ..... FIBROSIS ..... STEATOHEPATITIS ..... STEATOSIS

# ARSENAL OF 3 NEW INNOVATIVE TOOLS

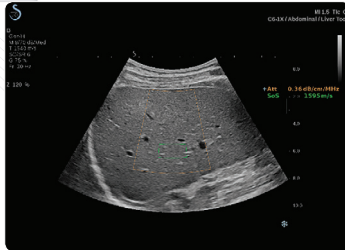
Non-invasive and quick exams

Quantitative and reproduceable results

1

## Aff PLUS

Quantification of the ultrasound beam attenuation in the liver

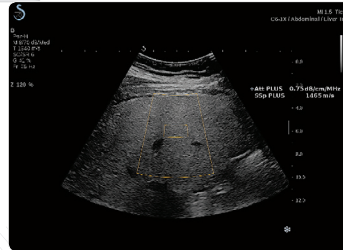


Information on the intra-hepatic fat content, an important indicator for the detection of liver steatosis\*

2

## SSp PLUS

Measurement of the intra-hepatic speed of sound

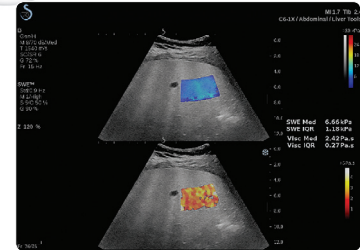


Data on the intra-hepatic fat content, an asset in the diagnosis of liver steatosis\*\*

3

## Vi PLUS

Visualization and quantification of tissue viscosity\*\*\*



Real-time access to information on viscosity in addition to elasticity, two major tissues' characteristics

\* Fujiwara et al., The B-mode image-guided ultrasound attenuation parameter accurately detects hepatic steatosis in chronic liver disease, *Ultrasound in Med. & Biol.* 2018

\*\* Dioguardi Burgio et al., Ultrasonic Adaptive Sound Speed Estimation for the Diagnosis and Quantification of Hepatic Steatosis: A Pilot Study, *Ultraschal Med.* 2018

\*\*\* Delfieux T et al., Shear Wave Spectroscopy for In Vivo Quantification of Human Soft Tissues Visco-Elasticity, *IEEE Transactions on Medical Imaging*, 2009