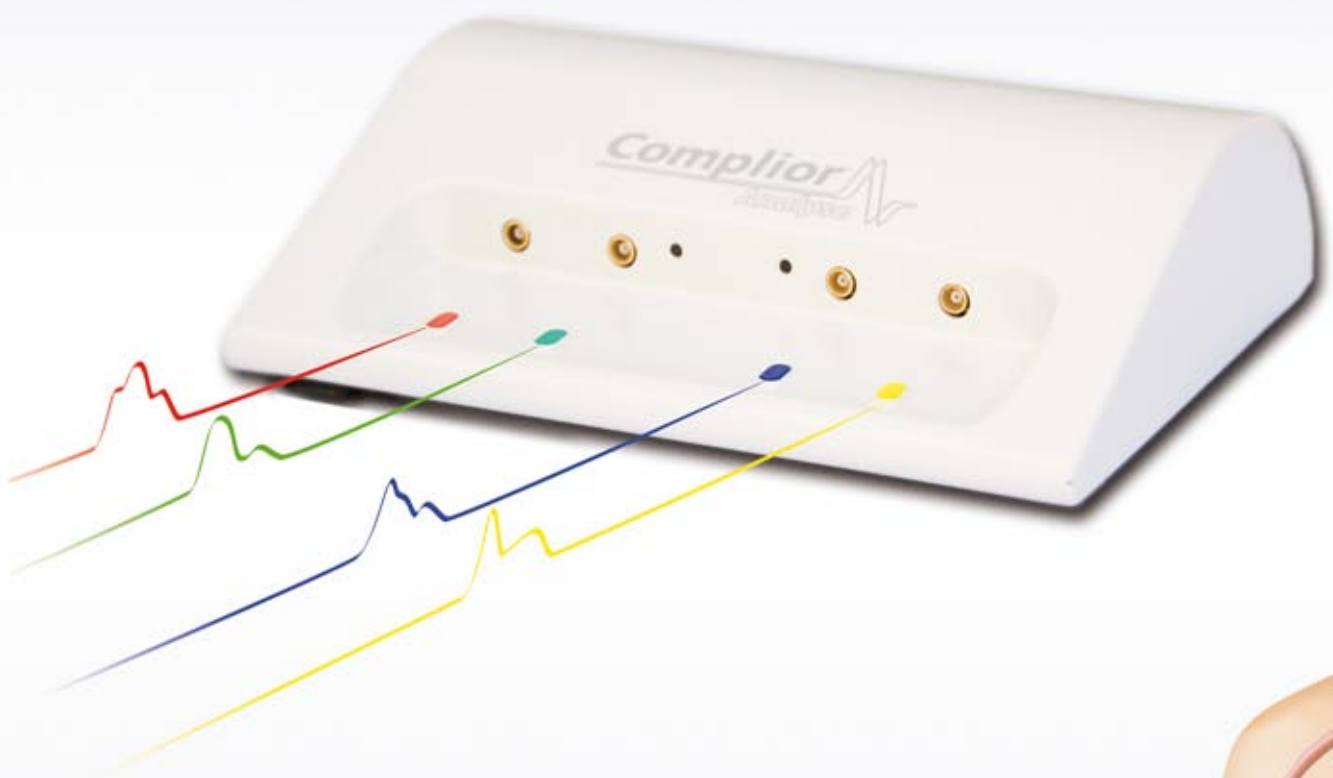


Complior[®] Analyse

ARTERIAL STIFFNESS, A MAJOR CARDIOVASCULAR RISK



Complior Analyse[®]
measures **simultaneous** carotid-femoral
pulse wave velocity,

THE reference for **aortic stiffness**

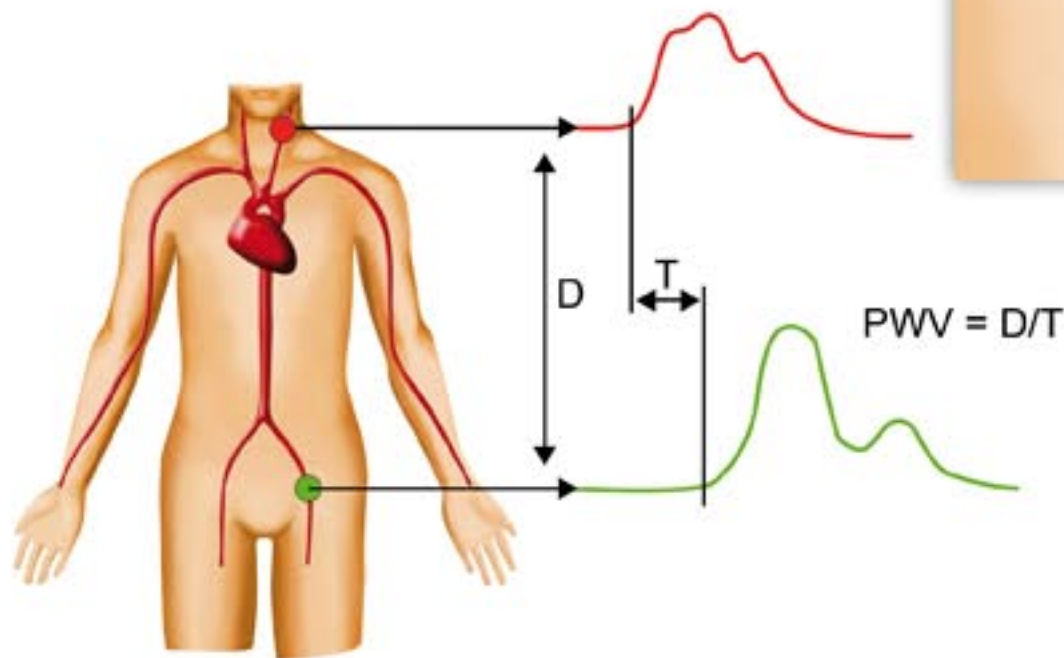
ALAM
MEDICAL



Pulse Wave Velocity, reference measurement for aortic stiffness

An elastic aorta stores energy during systole and releases it during the rest of the cardiac cycle.

Elevated arterial stiffness is a major cardiovascular risk, independent of other usual risk factors¹⁻².



Only carotid-femoral PWV is recognized as a measure of aortic stiffness².

$$PWV = \frac{\text{carotid-femoral distance}}{t}$$

International ESH-ESC guidelines states that PWV values above 12m/s are related to organ damage and high cardiovascular risk³.

1- Laurent S et al. Expert consensus document on arterial stiffness: methodological issues and clinical applications. Eur Heart J 2006;27(21):2588-605.

2- Vlachopoulos C et al. Prediction of cardiovascular events and all-cause mortality with arterial stiffness: a systematic review and meta-analysis. J Am Coll Cardiol 2010;55(13):1318-27.

3- Mancia G et al. 2007 Guidelines for the Management of Arterial Hypertension: The Task Force for the Management of Arterial Hypertension of the European Society of Hypertension (ESH) and of the European Society of Cardiology (ESC). J Hypertens 2007;25(6):1105-87.

4- Asmar R et al. Assessment of arterial distensibility by automatic pulse wave velocity measurement: validation and clinical application studies. Hypertension 1995;26:485-90.

5- Wilkinson IB et al. Artery Society guidelines for validation of non-invasive haemodynamic measurement devices: Part 1, arterial pulse wave velocity. Artery Research 2010;4(2):34-40.

Complior Reference Pulse Wave Velocity

- ▶ **A simple, rapid, reliable and reproducible method**⁴

Connected to a PC, Complior records signals from piezoelectric sensors to calculate pulse wave transit time.

- ▶ **No estimation nor mathematical model**

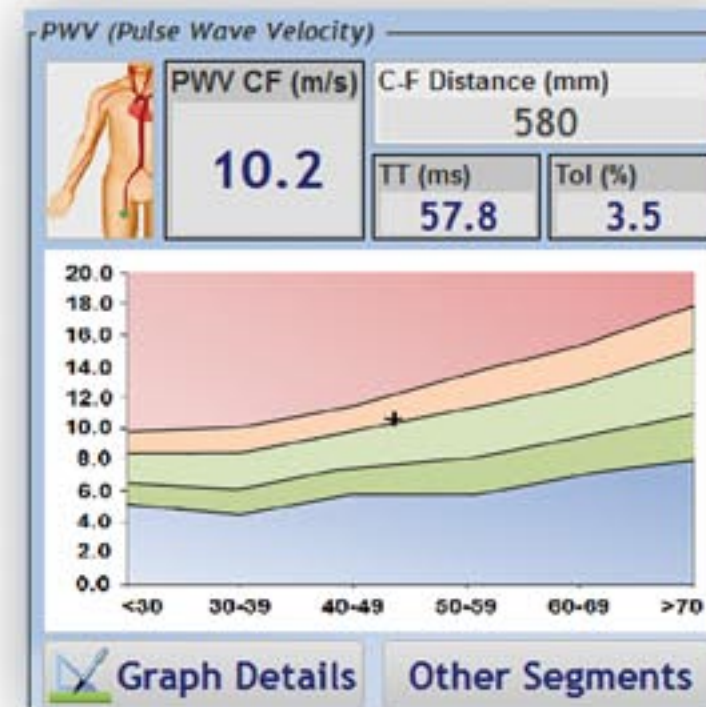
Complior method is the one recommended by scientific committee⁵: simultaneous carotid and femoral acquisition.

- ▶ **Device used in reference publications**

Complior is the **system used in epidemiologic studies** showing PWV is an important and independent predictor of cardiovascular risk².

- ▶ **Measurement possible even with arrhythmia**

Because of simultaneous recordings of carotid and femoral pulse, Complior **can measure PWV despite irregular heart beats**.



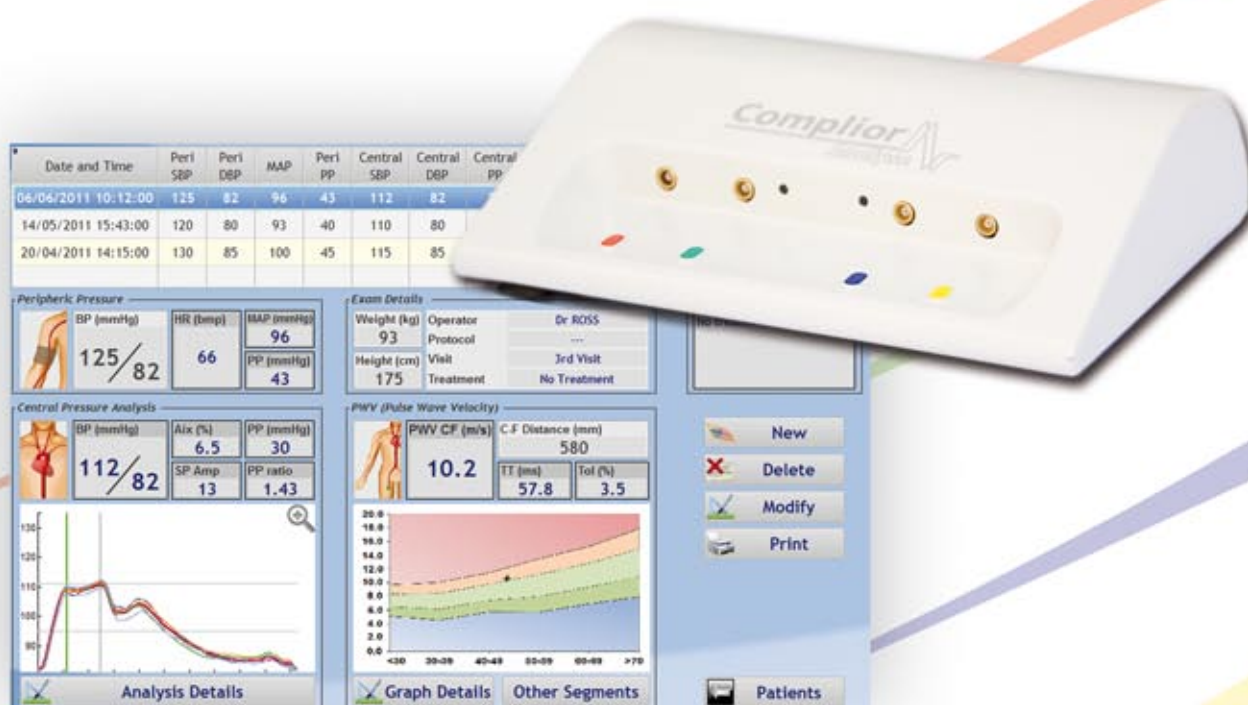
- ▶ **Up to 3 arterial segments simultaneously**

With a total of 4 sensors, it is possible with Complior to measure PWV on **3 different arterial segments in a single acquisition** in order to study peripheral arteries.

In its full version, Complior Analyse also measures **central pressure** and performs central pressure analysis.

Specifications

Sensors:	up to 4 piezoelectric sensors: carotid, femoral, radial, distal
Acquisition:	up to 30s covering at several breathing cycles
Dimensions:	43 x 150 x 128 mm (HxWxD)
Weight:	450 g (PC excluded)
Power supply :	USB port
PC specifications:	processor 1GHz, 256MB RAM, 2 USB port, Microsoft Windows
Conditions of use:	from +10°C to +40°C, humidity < 95%
Regulatory:	CE Mark (class IIa), IEC 601-1-1, IEC 601-1-2



ALAM
MEDICAL

112 avenue de Paris
94300 Vincennes
France
Tel: +33 9 52 96 88 10
Fax: +33 9 57 96 88 10
www.complior.com
info@complior.com

Distributed by: