

— LIAPHEN™ · LATEX IMMUNOTURBIDIMETRIC · ANTIGEN ASSAYS

Antigen by latex — *the other half of the answer.*

Activity tells you how much protein is **working**; antigen tells you how much is **there**. The LIAPHEN™ range measures five hemostasis proteins by **latex-enhanced immunoturbidimetry** — antigen-antibody binding agglutinates latex particles, and the absorbance change is proportional to the analyte. Reagents are **liquid, ready-to-use and automatable**; paired with the matching activity assay, antigen separates **quantitative (type I)** from **qualitative (type II)** defects.

THE LIAPHEN ANTIGEN PANEL

ASSAY · REFERENCE	MEASURES & WHAT IT ADDS	US LIST
LIAPHEN™ AT A120002 · 2x2 mL	Antithrombin antigen (AT:Ag) — type I vs type II AT deficiency with an activity assay; supports monitoring of AT-lowering therapy .	\$489 RUO
LIAPHEN™ Protein C A120003 · kit	Protein C antigen (PC:Ag) — classifies type I vs type II PC deficiency when paired with PC activity.	\$763 RUO
LIAPHEN™ Free Protein S A120004 · kit	Free Protein S antigen — the free, biologically active fraction; detects type I and type III PS deficiency.	\$1,098 RUO
LIAPHEN™ vWF:Ag A120206 · kit	von Willebrand factor antigen — first-line VWD screening ; type the disease alongside a vWF activity assay.	\$1,235 RUO
LIAPHEN™ Fibrinogen A120102 · 4x5 mL	Fibrinogen antigen (Fib:Ag) — flags dysfibrinogenaemia when the antigen is compared with the von Clauss functional result.	\$489 RUO

WHY MEASURE ANTIGEN AS WELL AS ACTIVITY

A low **activity** result alone can't tell you whether a protein is simply **reduced** or present but **dysfunctional**. Adding the antigen does:

TYPE THE DEFECT

Normal antigen + low activity = a qualitative (type II) defect; both low = quantitative (type I).

FIND DYSPROTEINS

Dysfibrinogenaemia and dysfunctional AT/PC surface only when antigen and activity disagree.

SCREEN & MONITOR

vWF:Ag for first-line VWD work-up; AT:Ag to follow antithrombin-directed therapy.

COMPLETE THE PICTURE — PAIR WITH ACTIVITY

Each LIAPHEN™ antigen has a matching activity assay in the HYPHEN™ range — **BIOPHEN™** chromogenic antithrombin (anti-Xa / anti-IIa), Protein C and Protein S activity, vWF activity, and **von Clauss fibrinogen** — so you can run antigen and activity side by side on the same analyzer. Ask your Aniara rep for the matched set.

SELECTED REFERENCES LIAPHEN™ AT (HYPHEN BioMed) used for antithrombin antigen alongside chromogenic activity assays in functional characterization of antithrombin mutations — *Int. J. Mol. Sci.* 2021 (PMC7924598). · Latex particle-enhanced immunoturbidimetric vWF assays show excellent correlation with reference methods and are validated for VWD screening — *J. Thromb. Haemost.* 2011.

Regulatory: LIAPHEN™ AT (A120002), Protein C (A120003), Free Protein S (A120004), vWF:Ag (A120206) and Fibrinogen (A120102) are **For Research Use Only** in the United States; **CE-IVD** in Europe, with **Health Canada** licensed (–CAN) configurations available for selected items. All are latex-enhanced immunoturbidimetric methods for the quantitative determination of the respective antigen in human citrated plasma; antigen and activity methods measure different properties and are interpreted together. Pricing shown is US list and subject to change. © 2026 Aniara Diagnostica, Inc.