**Lab Dept:** Coagulation  
**Test Name:** D DIMER

### General Information

**Lab Order Codes:** DDI  
**Synonyms:** D-dimer  
**CPT Codes:** 85379 – Fibrin degradation products, D-dimer; quantitative  
**Test Includes:** Fibrin D-Dimer reported in mg/L FEU.

### Logistics

**Test Indications:** Useful for the detection of deep vein thrombosis, evaluation of disseminated intravascular coagulation (DIC), acute myocardial infarction, unstable angina, and following a leukemia patient's chemotherapy.  
**Lab Testing Sections:** Coagulation  
**Phone Numbers:**  
MIN Lab: 612-813-6280  
STP Lab: 651-220-6550  
**Test Availability:** Daily, 24 hours; Minneapolis and St. Paul Laboratories.  
**Turnaround Time:** 2 hours  
**Special Instructions:** None

### Specimen

**Specimen Type:** Whole blood  
**Container:** Light Blue top tube (Buffered Na Citrate 3.2%)  
**Draw Volume:** 1.8 mL blood (in 2 mL tube) or 2.7 mL blood (in a 3 mL tube).  
**Processed Volume:** 0.9 mL plasma  
**Collection:**  
- A clean venipuncture is essential, avoid foaming.  
- Entire sample must be collected with single collection, pooling of sample is unacceptable.  
- Capillary collection is unacceptable.
● Patient's with a hematocrit level >55% must have a special tube made to adjust for the hematocrit; contact lab for a special tube.
● Mix thoroughly by gentle inversion. Deliver immediately to the laboratory at room temperature via courier or pneumatic tube.

Off campus collections:
● Must be tested within 4 hours.
● Do not refrigerate.
● If not received in our lab within 4 hours of collection, sample must be centrifuged and *platelet-poor plasma removed from cells and transferred to an aliquot tube being careful not to disturb the cell layer. Centrifuge the plasma a second time and transfer into a clean aliquot tube being careful not to include any residual platelets on the bottom of the tube. Freeze at -20°C and deliver to the lab on dry ice within 2 weeks.
*Validation of your lab's centrifuge for platelet poor plasma is required.

Special Processing:
Lab staff: Centrifuge in Stat Spin for 5 minutes or 10 minutes at 3000 rpm at room temperature. For primary tube testing, leave plasma on cells OR remove plasma and place in a 4 mL plastic cup; allow for 100 mL of dead-space.

Test within:
● Four (4) hours when stored in the capped tube above the packed cells 18 to 24°C.
● Four (4) hours as plasma that has been separated from cells by centrifugation when stored 2 to 8°C or 18 to 24°C.
● Two (2) weeks when stored -20°C.
● Six (6) months when stored -70°C (rapidly frozen).
● Plasma must be frozen if testing cannot be completed within four (4) hours.
● Frozen plasmas are thawed at 37°C for three (3) minutes, test immediately.

Patient Preparation:
None

Sample Rejection:
Improper tube; clotted sample; under-filled tube; mislabeled or unlabeled specimens

Interpretive

Reference Range:
A clinical cut-off of 0.5 mg/L FEU when used along with a low clinical pretest probability assessment model has been established to exclude DVT/PE.

Interpretation: Results of D-Dimer should always be interpreted in conjunction with the patient’s medical history, clinical presentation and other findings. Clinical diagnosis should not be based on the results of D-Dimer alone.

Critical Values:
N/A
Limitations: Elevated D-dimer levels are not specific for the presence of DIC or of deep vein thrombosis. False-positive or false-negative results may occur when attempting to confirm a diagnosis of DIC.

Methodology: Immunoturbidometric (optical)


Updates: 7/16/2012: Method update. Previously a screening test; Monoclonal Antibodies Attached to Latex Particles
CPT update, previously listed as 85378.
9/15/2014: Added Off Campus collection info.

7/18/23: Updated special processing instructions.