Lab Dept: Chemistry

Test Name: PROSTAGLANDIN D2

General Information

Lab Order Codes: PGD2

Synonyms: N/A

CPT Codes: 84150 – Prostaglandin, each

Test Includes: Prostaglandin D2 level reported in pg/mL.

Logistics

Test Indications: Prostaglandins are fatty acids derived from arachidonic acid metabolism. They are closely related to the Thromboxanes and Leukotrienes. Prostaglandin D2 is derived mainly from Prostaglandin H2, and is metabolized to Dihydroketo Prostaglandin D2. Prostaglandin D2 is excreted directly into the urine. The sites of highest Prostaglandin D2 activity are the brain, spinal cord, intestines, and stomach. Prostaglandin D2 is the major Prostaglandin produced by uterine tissue. Prostaglandin D2 is a potent bronchoconstrictor, neuromodulator, and anti-antithrombin agent. It also stimulates the secretion of Pancreatic Glucagon. Prostaglandin D2 has been found to have an anti-metastatic effect on many malignant tumor cells. Prostaglandin D2 production and circulating levels are drastically suppressed by aspirin and Indomethacin

Lab Testing Sections: Chemistry – Sendouts

Referred to: Mayo Clinical Laboratories (MML test: FPGD2) and forwarded to InterScience

Phone Numbers: MIN Lab: 612-813-6280

STP Lab: 651-220-6550

Test Availability: Daily, 24 hours

Turnaround Time: Results in 5-11 days

Special Instructions: See Patient Preparation

Specimen

Specimen Type: Blood
Container: SST (gold, marble or red)

Draw Volume: 9 mL (Minimum: 3 mL) blood

Processed Volume: 3 mL (Minimum: 1 mL) serum

Collection: Routine blood collection

Special Processing: Lab Staff: Centrifuge specimen, remove serum aliquot. Store and ship at frozen temperatures. Forward promptly.

Patient Preparation: Patient should not be on aspirin, indomethacin, or anti-inflammatory medications, if possible, for at least 48 hours prior to specimen collection.

Sample Rejection: Warm specimens or thawed specimens; mislabeled or unlabeled specimens

Interpretive

Reference Range: 35 – 115 pg/mL

Note: No pediatric ranges are available for this test.

Critical Values: N/A

Limitations: Prostaglandin D2 production and circulating levels are drastically suppressed by aspirin or indomethacin.

Methodology: Radioimmunoassay (RIA) following extraction of specimens

References: Mayo Clinical Laboratories (January 2019)