THE AGA KHAN UNIVERSITY HOSPITAL
CLINICAL LABORATORIES
UPDATE

Neonatal Dried Blood Spot (DBS) Immunoreactive Trypsinogen

VOL.XXVIII NO 11,2022

INTRODUCTION:

The quantitative determination of Immunoreactive Trypsinogen (IRT) on dried blood spot (DBS) is a primary screening test for cystic fibrosis (CF) in babies. CF is an autosomal recessive disorder affecting the lungs, pancreas, intestine, and liver. Trypsinogen is the precursor of the pancreatic enzyme trypsin, and a specific marker of pancreatic function. Newborns with CF may have elevated levels of IRT. In patients with CF, pancreatic ducts are plugged due to mucus, preventing trypsinogen from reaching the small intestine, leading to increased levels in the blood.

PRINCIPLE:

Fluorometric Enzyme Immunoassay.

SPECIMEN COLLECTION:

- Blood sample is collected on dried blood spot filter paper (DBS) by trained phlebotomist / nurses.
- For newborn screening blood sample is collected from the pricked heel of the baby 3-5 days after birth.
- The blood spot should be air-dried for at least 3 hours. Once dry, sample should be mailed to the laboratory within 24 hours in a separate paper envelope, along with humidity indicator card, desiccant pouch to protect against moisture.

SCHEDULE:

Performed on: Third Thursday of the Month (Cut-off: Thursday morning 8:00 am)
Reported on: Following Monday

PLEASE FILE FOR QUICK REFERENCE

آغا خان یونیورسٹی ہسپتال، کراچی
The Aga Khan University Hospital, Karachi
Stadium Road, P.O. Box 3500, Karachi 74800, Pakistan.
Tel: +92 21 3493 0051; Fax: +92 21 3493 4294
www.aku.edu