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Sagepath Labs Pvt. Ltd.

Lab Address:- # Plot No. 564 , 1st floor , Buddhanagar , Near Sai Baba Temple Peerzadiguda Boduppal Hyderabad, Telangana.
ICMR Reg .No. SAPALAPVLHT (Covid -19)

REPORT

Name	: Mrs. SRILATHA	Sample ID	: 24754240
Age/Gender	: 30 Years/Female	Reg. No	: 0312312280028
Referred by	: Dr. Nivedita Ashrit MD (Obs/Gyn)	SPP Code	: SPL-CV-172
Referring Customer	: V CARE MEDICAL DIAGNOSTICS	Collected On	: 28-Dec-2023 11:01 AM
Primary Sample	: Whole Blood	Received On	: 28-Dec-2023 12:15 PM
Sample Tested In	: Serum	Reported On	: 28-Dec-2023 03:16 PM
Client Address	: Kimtee colony ,Gokul Nagar,Tarnaka	Report Status	: Final Report

CLINICAL BIOCHEMISTRY

Test Name	Results	Units	Ref. Range	Method
TSH -Thyroid Stimulating Hormone	1.57	µIU/mL	0.35-5.5	CLIA

Pregnancy & Cord Blood

TSH (Thyroid Stimulating Hormone (µIU/mL)	
First Trimester	: 0.24-2.99
Second Trimester	: 0.46-2.95
Third Trimester	: 0.43-2.78
Cord Blood	: 2.3-13.2

- TSH is synthesized and secreted by the anterior pituitary in response to a negative feedback mechanism involving concentrations of FT3 (free T3) and FT4 (free T4). Additionally, the hypothalamic tripeptide, thyrotropin-releasing hormone (TRH), directly stimulates TSH production.
- TSH interacts with specific cell receptors on the thyroid cell surface and exerts two main actions. The first action is to stimulate cell reproduction and hypertrophy. Secondly, TSH stimulates the thyroid gland to synthesize and secrete T3 and T4
- The ability to quantitate circulating levels of TSH is important in evaluating thyroid function. It is especially useful in the differential diagnosis of primary (thyroid) from secondary (pituitary) and tertiary (hypothalamus) hypothyroidism. In primary hypothyroidism, TSH levels are significantly elevated, while in secondary and tertiary hypothyroidism, TSH levels are low
- TRH stimulation differentiates secondary and tertiary hypothyroidism by observing the change in patient TSH levels. Typically, the TSH response to TRH stimulation is absent in cases of secondary hypothyroidism, and normal to exaggerated in tertiary hypothyroidism
- Historically, TRH stimulation has been used to confirm primary hyperthyroidism, indicated by elevated T3 and T4 levels and low or undetectable TSH levels. TSH assays with increased sensitivity and specificity provide a primary diagnostic tool to differentiate hyperthyroid from euthyroid patients.

Triiodothyronine - Free (FT3)	3.16	pg/mL	2.3-4.2	CLIA

Interpretation:

- The test measures the amount of free triiodothyronine, or FT3, in your blood. Free triiodothyroinine (FT3) can assist in determining whether the thyroid is performing properly, and is used mainly to help diagnose hyperthyroidism, since T3 can become abnormal earlier than T4 and return to normal later than T4. This test may also be used for monitoring of patients on T3 therapy.

Thyroxine Free (FT4)	1.10	ng/dL	0.89-1.76	CLIA

Interpretation:

- This test measures the amount of free thyroxine, or FT4, in your blood. Thyroid stimulating hormone is the preferred initial test in the assessment of thyroid function. Free thyroxine (FT4) measured in response to an abnormal TSH test result.High free thyroxine results may indicate an overactive thyroid gland (hyperthyroidism). Low free thyroxine results may indicate an underactive thyroid gland (hypothyroidism).

Correlate Clinically.

Laboratory is NABL Accredited

*** End Of Report ***

MC 3633

DR.VAISHNAVI
MD BIOCHEMISTRY