



# L. N. MEDICAL COLLEGE & J. K. HOSPITAL

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Patient Name	MRS ARADHANA TIWARI	Age/Sex	29 Years / FEMALE
Patient ID	2402627874	Visit NO	02
Referred by	DR. MALINI BHARDWAJ	Visit Date	24/07/2024
C-LMP Date	08/03/2024	C-LMP EDD	13/12/2024

## SECOND TRIMESTER SCAN

Present Pregnancy: Single Intrauterine gestation

- Conception- Spontaneous
- Maternal blood group: O+ ve
- FIRST TRIMESTER BIOCHEMICAL SCREENNING NOT DONE

### Obstetric History:

-Gravida - 1

### Chronic Disease:

- Chronic Hypertension- NO
- Diabetes Mellitus- NO

### Family History

- Consanguinity- NO
- Significant Family history- NO

### Ultrasound

- Operator - Dr Sonam Verma , MD RADIO-DIAGNOSIS , Fellowship in Fetal Medicine FMF ID- 277360
- US system - Voluson S10 Expert 22  
Transabdominal  
Real time B-mode/color/3D ultrasonography of gravid uterus done.  
Technically imaging- SUB-OPTIMAL DUE TO HIGH MATERNAL BMI WITH POOR PENETRATION OF WAVES.

### Gestational Age

	Gestation age	EDD
CORRECTED LMP BY DATING SCAN	19 weeks 5 days	13/12/2024
BY USG	20 weeks 3 days	08/12/2024

### Fetal Survey:

Presentation:	Variable
Placenta :	Anterior
Liquor :	Adequate
Umbilical cord:	Two arteries and one vein
Fetal activity:	Fetal activity present
Fetal heart rate:	147,bpm Regular



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## Biometry weight parameter (Hadlock)

BPD (48 mm)	HC (176.5 mm)	AC (147.1 mm)	FL - (32.3 mm)	EFW BPD,HC,AC,FL
20 W 4 D (81.1%) + + + - - -	20 w 1 D ( 62.9%) + + + - - -	20 w 1 D (59.4%) + + + - - -	20 W 0 D (55.8%) + + + - - -	334 Grams + 49 Grams. (68.1%) + + + - - -

## FETAL BIOMETRIC PARAMETERS

Biometry	measurement(mm)	Weeks	Days	Centile
TCD :	21.3	20	1	83.1% + + + - - -
OOD	33.3	21	2	64% + + + - - -
IOD	15.8	26	5	90.8% + + + - - -
Humerus	30.9	20	2	72.7% + + + - - -
Radius	27.1	20	0	58% + + + - - -
Ulna	31.1	21	5	90% + + + - - -
Tibia	29.2	20	5	83.3% + + + - - -
Fibula	28	20	0	54.8% + + + - - -
Foot	36			62.8% + + + - - -
FL-FOOT RATIO	0.90			
HC/AC	1.19			
FL/BPD	67.29%			
FL/AC	21.71%			
	NASAL BONE: 7.3 mm(99.90%)	NUCHAL FOLD THICKNESS:3.5 mm		Cistern Magna:6.3 mm

## 2 nd Trimester aneuploidy risk table/Genetic Sonogram:

Sr No	2 <sup>nd</sup> Trimester Aneuploidy Markers	
1	Intracardiac Echogenic Focus	Absent
2	Ventriculomegaly	Absent
3	Increased Nuchal Fold	Absent
4	Echogenic Bowel	Absent
5	Mild Hydronephrosis	Absent
6	Short Humerus	Absent
7	Short Femur	Absent
8	Aberrant Right Subclavian Artery	Absent
9	Absent or Hypoplastic Nasal Bone	Normal size
	Apriori Risk (From Maternal Age):	1 in 695
	LR Ratio:	0.13
	Trisomy21 Risk:	1 in 5340



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## ANATOMICAL FETAL SURVEY

### HEAD

Normal skull shape

Midline falx seen.

Both lateral ventricles appear normal measured 7.5 mm in width.

Posterior fossa structures appeared normal

No identified intracranial lesion seen.

### SPINE

Vertebrae and spinal canal appear normal.

No obvious sign of spina bifida or kyphoscoliosis.

### FACE & NECK

Both orbits, nose and mouth appeared normal.

Mandible appears normal.

No evidence of skin oedema or cystic hygroma.

### THORAX

Both lung seen.

No evidence of pleural or pericardial effusion.

No evidence of SOL in the thorax.

### Heart

Normal cardiac situs.

Normal 4-chamber view.

Normal 3-vessels view & 3-vessels trachea view.

SVC and IVC Seen.

### ABDOMEN

Abdominal situs appeared normal.

Stomach bubble & Gall bladder seen.

Normal bowel pattern appropriate for the gestation seen.

No evidence of ascites. Abdominal wall intact.

### KUB

Right and Left kidneys, Urinary Bladder appear normal

(AP Dimension of RENAL PELVIS, RT- 2.9 mm & LT- 2.7 mm. within normal limit for this GA.)

### Extremities

All fetal long bones visualized and appear normal for the period of gestation.

Both Hands & feet appeared normal.

### **Maternal & Fetal Doppler:**

Right uterine	Left uterine	Mean	Ductos Venosus
PI:0.9	PI:0.99	PI:0.95	0.84
16.4% + - + +	28.4% + - + +	24% + - + +	

**Cervical Assessment:** measured 35.7 mm in length with closed os & canal(ON TAS)



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## Impression :

- SINGLE LIVE INTRAUTERINE GESTATION
- ESTIMATED GESTATIONAL AGE BY FETAL BIOMETRY : 20 WEEKS 3 DAYS +/- 1 WEEK
- AGREED EDD (BASED ON CORRECTED LMP BY DATING SCAN): 13/12/2024
- NO OBVIOUS STRUCTURAL CONGENITAL ABNORMALITIES DETECTED FOR GESTATION.
- NO OBVIOUS SONOGRAPHIC MARKERS FOR CHROMOSOMAL ABNORMALITIES NOTED AT THIS GESTATION.
- PLACENTA: Anterior
- CERVICAL LENGTH: 35.7 mm : NORMAL(ON TAS)
- UTERINE ARTERY DOPPLER: SCREEN NEGATIVE FOR PET.

## COMMENTS:

- On today's detailed scan, there are no obvious structural abnormalities or markers of chromosomal abnormalities.
- I have explained to mother in detail that chromosomal abnormalities can not be diagnosed by ultrasound or blood test on their own. The only way to know the chromosomal make up of the fetus is by karyotyping from amniocentesis with 0.1% chance of procedure related miscarriage.
- **Suggested :Rescan at 26-28 week for Periodic assessment , to rule out evolving anomalies & for growth interval monitoring.**

**Please note:** All abnormalities and genetic syndromes cannot be ruled out by ultrasound examination. Ultrasound examination has its own limitations. Some abnormalities evolve as the gestation advances. The detection rate of abnormality depends on gestational age of the fetus, fetal position, tissue penetration of sound waves, amniotic fluid volume, fetal movements and patient's body habitus. Patient has been counseled about the capability & limitation of the examination.

**Declaration:** I, Dr Sonam Verma declare that while conducting ultrasonography /image scanning on MRS ARADHANA TIWARI, I have neither detected nor disclosed the sex of her fetus to anybody in any manner.

Best Wishes

Dr Sonam Verma  
M.D. RADIODIAGNOSIS  
FETAL MEDICINE CONSULTANT  
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