

RESULTS

Data of the present study were statistically analyzed and presented in the following tables and figure:

Table-1 Mode of delivery in the studied population (n=600)

	No	%
Vaginal delivery	387	64.5
CS	213	35.5
• Intrapartum CS	141	23.5
• Elective CS	72	12.0
Total	600	100.0

This table shows that 387 neonates (64.5 %) were delivered vaginally while 141 neonates (23.5 %) were delivered by intrapartum CS and 72 neonates (12.0 %) were delivered by elective CS.

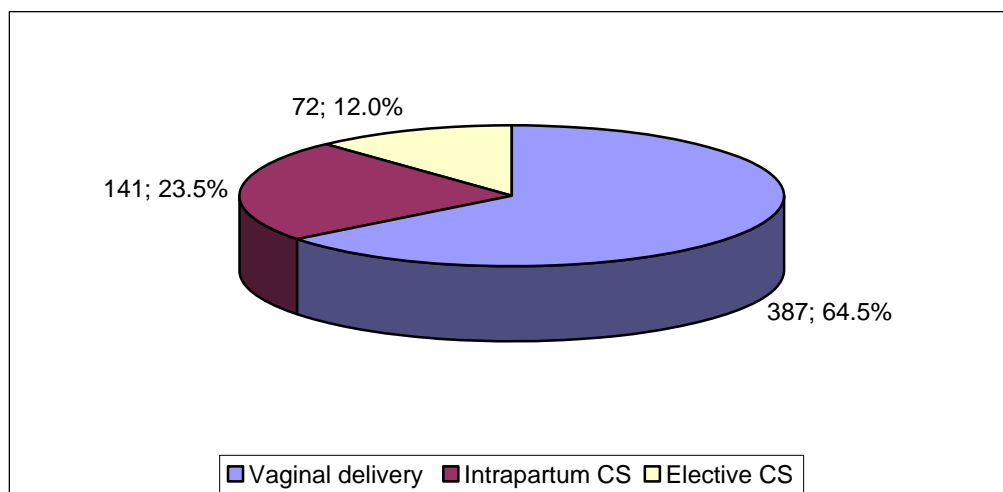


Fig. (5) Mode of delivery in the studied population

Table-2 Demographic characteristics of the studied population (n=600)

		No	%
Pregnancy	Singleton	562	93.7
	Twins	38	6.3
Gestational age	≥ 37 weeks	537	89.0
	< 37 weeks	63	11.0
Birth weight (gm)	< 2500	87	14.5
	≥ 2500	513	85.5
Sex	Male	304	50.7
	Female	296	49.3

This table shows that the majority of the studied population were term neonates (89.0). Only 87 neonates (14.5 %) suffered low birth weight. The majority of neonates came from singleton pregnancy (93.7). Sex distribution included 304 males (50.7 %) and 296 females (49.3 %).

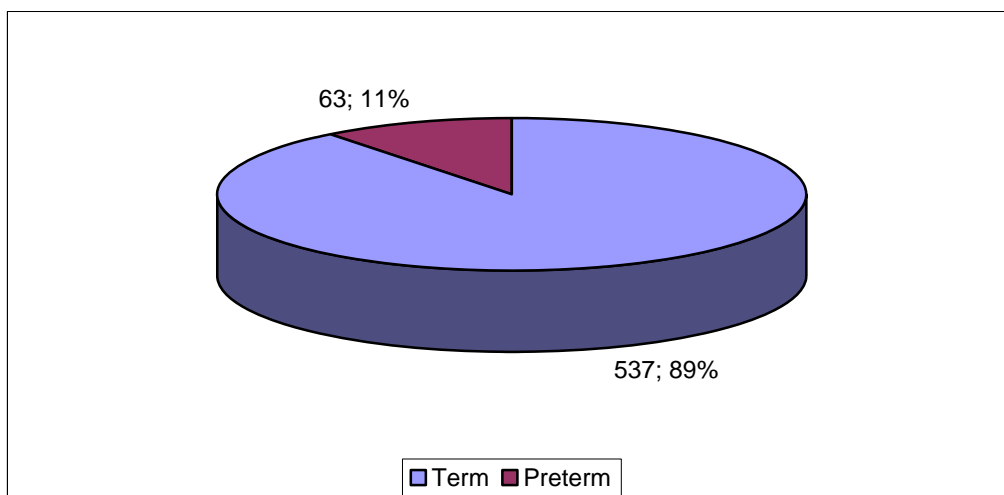


Fig. (6) Gestational age of the studied population

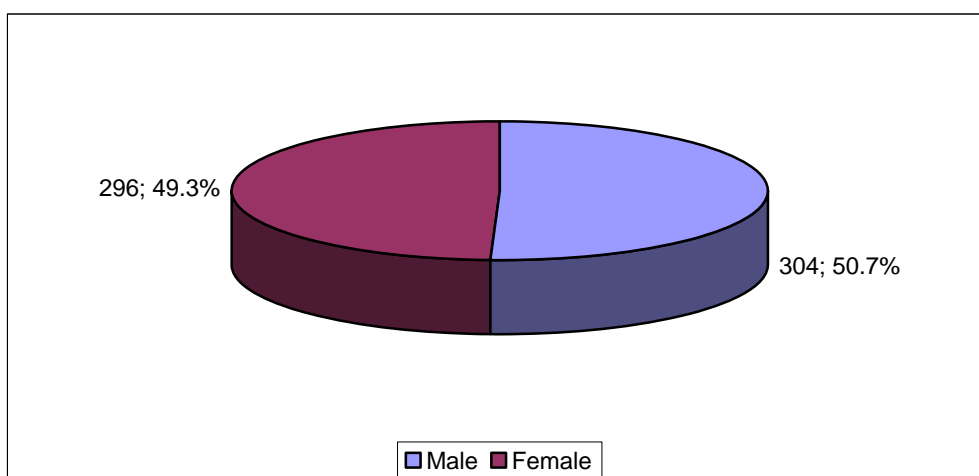


Fig. (7) Sex distribution in the studied population

Table-3 Prevalence of respiratory distress (RD) in the studied population (n=29).

	No	%
RD +ve	29	4.8
RD -ve	571	95.2

This table shows that 29 neonates (4.8 %) had respiratory distress while the remainder 571 (95.2) were free from RD.

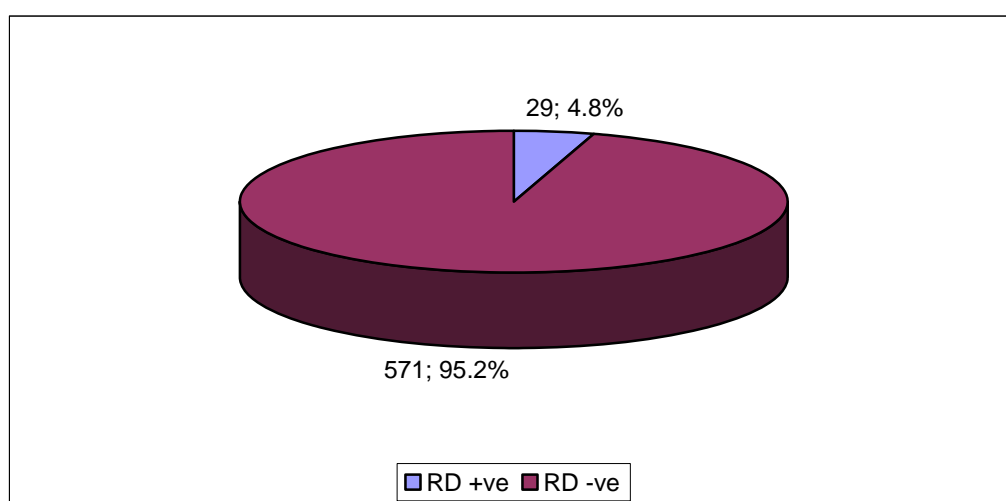


Fig. (8) Prevalence of RD in the studied population

Table-4 Relation of respiratory distress to mode of delivery

	Vaginal delivery (n=387)	CS (n=213)	Chi-square test	
			X ²	P
RD +ve (n=29)	13 (3.4 %)	16 (7.5 %)	5.2	0.023
RD-ve (n=271)	374 (96.4 %)	197 (92.5 %)		

This table shows a significantly higher frequency of RD in neonates delivered by CS (7.5 %) in comparison with those delivered vaginally (3.4 %) (p=0.023).

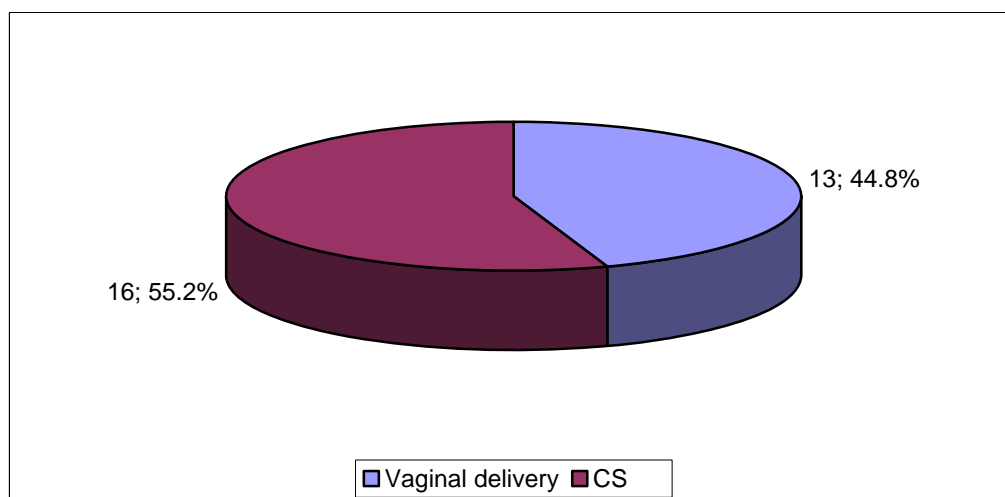
**Fig. (9) Relation of respiratory distress to mode of delivery**

Table-5 Relation of respiratory distress to type of CS

	Elective CS (n=72)	Intrapartum CS (n=141)	Chi-square test	
			X ²	P
RD +ve (n=16)	9 (12.5 %)	7 (5.0 %)	3.9	0.048
RD-ve (n=197)	63 (87.5 %)	134 (95.0 %)		

This table shows a significantly higher frequency of neonates with RD in those delivered by elective CS (12.5 %) in comparison with those delivered by intrapartum CS (5.0 %).

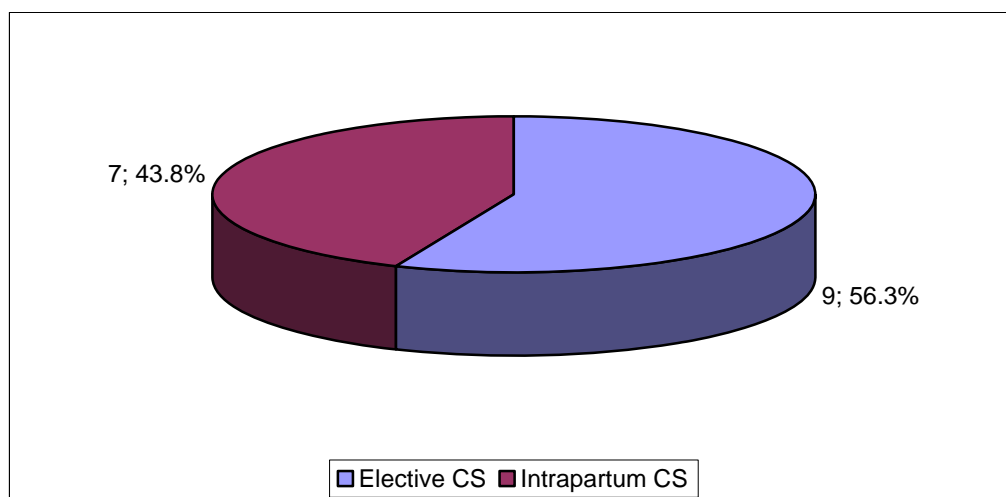
**Fig. (10) Relation of respiratory distress to type of CS**

Table-6 Comparison of the reported causes of RD between patients delivered vaginally and patients delivered by CS (n=29).

	Vaginal (n=13)	Intrapartum CS (n=7)	Elective CS (n=9)	Chi-square test	
				X2	P
RDS	3 (23.1 %)	1 (14.3 %)	6 (66.7 %)	6.1	0.046
TTN	4 (30.8 %)	2 (28.6 %)	3 (33.3 %)	0.04	0.98
Pneumonia	4 (30.8 %)	2 (14.3 %)	-	3.4	0.18
Pulmonary hypertension	1 (7.7 %)	1 (14.3 %)	-	1.1	0.58
Others	1 (7.7 %) *	1 (14.3 %) **	-	1.1	0.58

This table shows a significantly higher frequency of RDS among patients delivered by elective CS (66.7 %) than those delivered vaginally (23.1 %). In patients delivered by elective CS, there was a higher frequency of patients with TTN (33.3 %) than those delivered vaginally (30.8 %). However, the difference was statistically insignificant.

* Meconium aspiration syndrome ** Pneumothorax

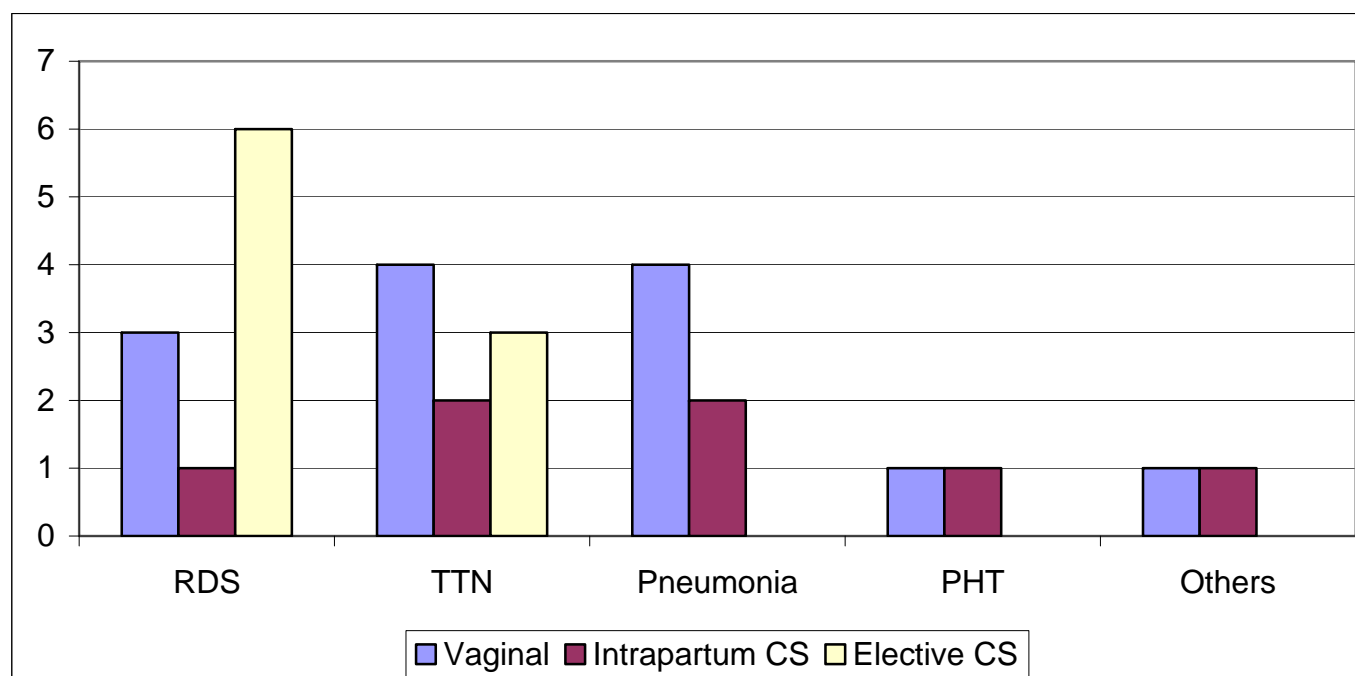


Fig. (11) Reported causes of RD in the studied patients

Table-7 Comparison of maternal factors between patients delivered vaginally and patients delivered by CS

		Vaginal (n=13)	Intrapartum CS (n=7)	Elective CS (n=9)	Chi-square test	
					X2	P
Age (years)	< 35	10 (76.9 %)	3 (42.9 %)	5 (55.6 %)	2.5	0.29
	≥ 35	3 (23.1 %)	4 (57.1 %)	4 (44.4 %)		
Parity	Nullipara	4 (30.8 %)	2 (28.6 %)	4 (44.4 %)	0.58	0.75
	Multipara	9 (69.2 %)	5 (71.4 %)	5 (55.6 %)		
BMI	< 25 kg/m2	6 (46.2 %)	3 (42.9 %)	3 (33.3 %)	0.37	0.83
	≥ 25 kg/m2	7 (53.8 %)	4 (57.1 %)	6 (66.7 %)		

This table shows no statistically significant differences among patients delivered vaginally or by CS (intrapartum or elective) as regards the maternal factors

Table-8 Comparison of neonatal risk factors for RD between patients delivered vaginally and patients delivered by CS

		Vaginal (n=13)	Intrapartum CS (n=7)	Elective CS (n=9)	Chi-square test	
					X2	P
Sex	Male	5 (38.5 %)	3 (42.9 %)	7 (77.8 %)	3.6	0.17
	Female	8 (61.5 %)	4 (57.1 %)	2 (22.2 %)		
Gestational age	Term	9 (69.2 %)	5 (71.4 %)	1 (11.1 %)	8.6	0.013
	Preterm	4 (30.8 %)	2 (28.6 %)	8 (88.9 %)		
Birth weight	Normal	8 (61.5 %)	4 (57.1 %)	3 (33.3 %)	1.8	0.41
	Low	5 (38.5 %)	3 (42.9 %)	6 (67.7 %)		

This table shows a statistically higher frequency of preterm deliveries in patients delivered by elective CS when compared with those delivered vaginally or by intrapartum CS ($p=0.013$). No significant differences were noted among groups as regards the sex distribution and birth weight.

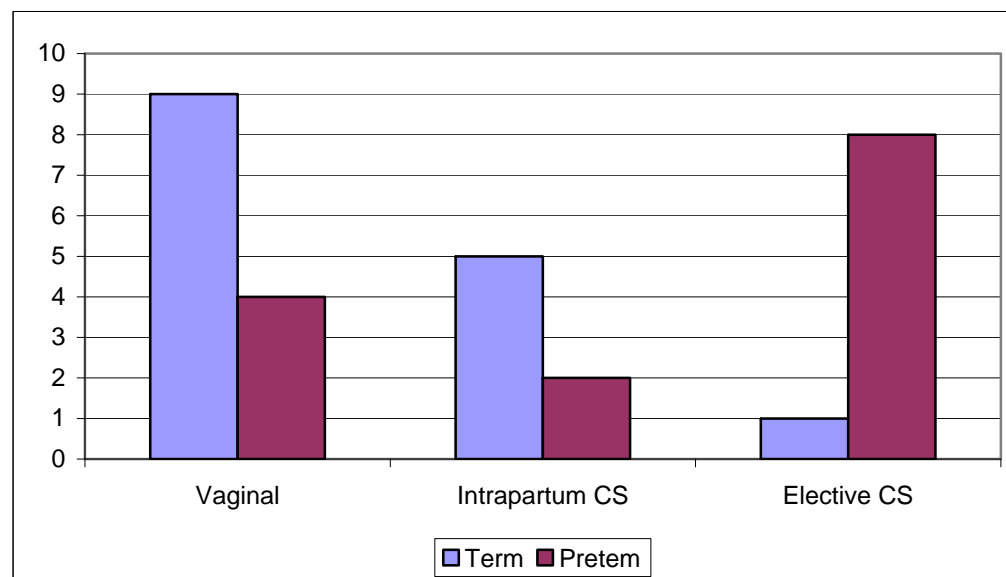


Fig. (12) Comparison of gestational age for RD between patients delivered vaginally and patients delivered by CS.

Table-9 Comparison of RD management interventions between patients delivered vaginally and patients delivered by CS

		Vaginal (n=13)	Intrapartum CS (n=7)	Elective CS (n=9)	Chi-square test	
					X2	P
Open oxygen		7 (53.8 %)	2 (28.6 %)	-	7.2	0.027
Nasal canula		3 (15.4 %)	1 (14.3 %)	-	1.5	0.47
CPAP		2 (15.4 %)	2 (28.6 %)	4 (44.4 %)	2.0	0.36
Mechanical ventilation (MV)		1 (15.4 %)	2 (28.6 %)	5 (55.6 %)	6.1	0.047
Days on MV	< 3	1 (100.0 %)	1 (50.0 %)	1 (20.0 %)	2.5	0.29
	≥ 3	-	1 (50.0 %)	4 (80.0 %)		

This table shows higher frequency of need of advanced assisted ventilation in patients delivered by elective CS when compared with patients delivered vaginally or by intrapartum CS.

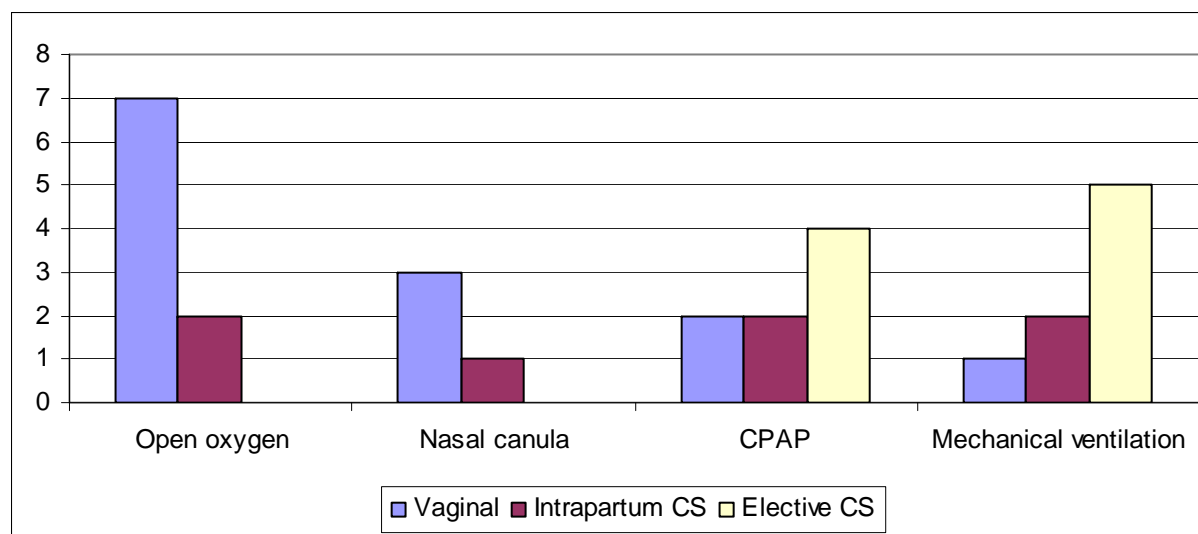


Fig. (13) Therapeutic interventions in the studied groups