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2/  Our topic : A Multinational Cohort Study of Dialysis Initiation During Pregnancy.

There are no conflicts of interest. #MedSky #NephSky

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A Multinational Cohort Study of Dialysis Initiation During Pregnancy

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3/ How about a quick quiz- What criteria do you consider when starting dialysis during pregnancy?

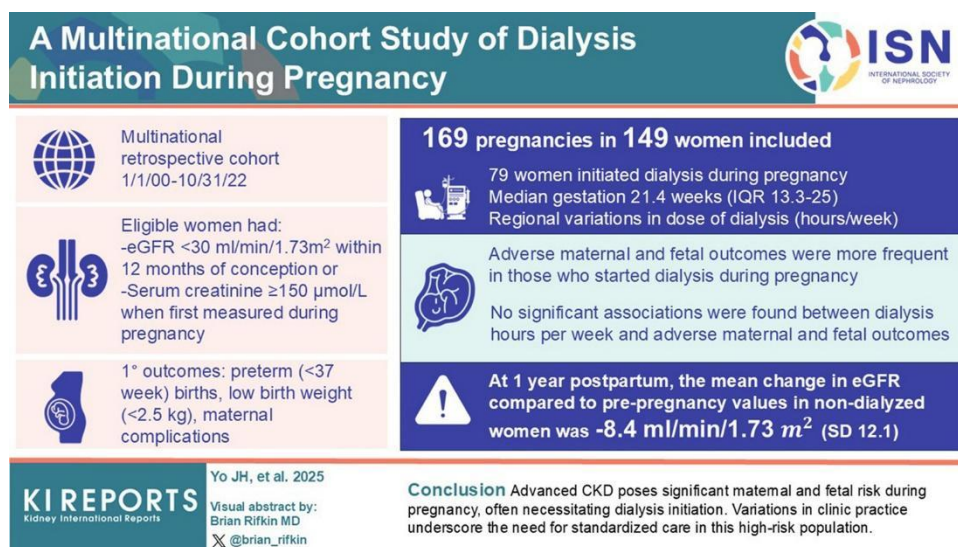


- a) Urea: 17 to 20 mmol/l (47.6-56mg/dL)
- b) Urea: 16.65 mmol/L (100mg/dL)
- c) sCr 3.5–5.0 mg/dL
- d) GFR < 20 mL/min

4/ 💡💥 The correct answer is A. However there is insufficient data to guide the initiation of dialysis in pregnancy; therefore, a multinational retrospective cohort study was conducted.

VA by @brian_rifkin 🤗

👁️👁️ <https://www.kireports.org/article/S2468-0249%2825%2900200-1/fulltext>



5. 📍 Study population

👩 who delivered between 2000 to 2022

🇨🇦🇺🇸🇩🇪🇮🇹 International collaboration

pre 🧑 eGFR <30 within 12 mths of conception or

🩸 sCr ≥150 µmol/l (1.7mg/dL) when 1st measured during 🧑

✅ Kidney transplant recipients

❌ Women who were established on dialysis before 🧑

7. 📍 Aims of this study

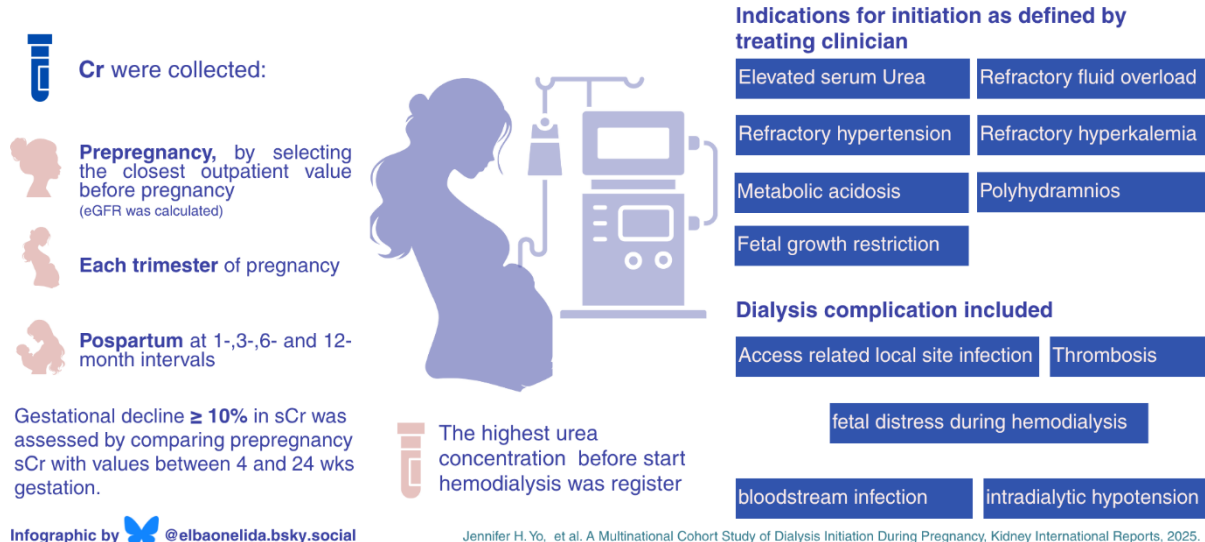
🌐 Examine regional practice patterns in dialysis initiation & prescription during pregnancy among women with advanced CKD

🧑 Describe maternal & fetal outcomes

🕒⌚ Determine the influence of dialysis hours during pregnancy on maternal & fetal outcomes

8. Data Collection

Data collected for women who started hemodialysis during pregnancy



9.- Study outcomes. Analyses were adjusted for maternal age, preexisting DM, chronic HTN, & country

 & fetal outcomes:

- Low birth weight
- Preterm delivery
- Composite of placental abruption, severe HTN, HELLP syndrome, eclampsia, preterm rupture of membranes, & maternal death

10. Secondary fetal outcomes

-  Low birth weight (<1500g)
-  Early preterm delivery (<32 weeks' gestational age)
-  Stillbirth
-  Neonatal death
-  Neonatal intensive care unit admission
-  Small for gestational age

11.- Cohort characteristics

-  169 pregnancies in 149 women 
- Prepregnancy CKD was stage 3 in 48 women (49.5%)
- The most common cause of kidney disease was glomerular disease (49.4%)
- Dialysis was initiated in 79 (46.7%)

12/ who started dialysis during pregnancy vs non-dialyzed group:

- Younger

- Have advanced CKD 4-5
- A higher prepregnancy uACR
- The absence of a gestational decline in sCr $\geq 10\%$ was more common
- Had a lower prevalence of chronic hypertension & diabetes

Table 1. Maternal demographic characteristics

Baseline characteristics	Dialysis not initiated during pregnancy (n = 90) ^a	Dialysis initiated during pregnancy (n = 79) ^a	All (N = 169) ^a	P-value
Unique mothers, n (%)	74 (49.7)	75 (50.3)	149	-
Age, yrs mean (SD)	31.6 (5.4)	28.7 (5.8)	30.2 (5.8)	0.002
Country, n (%)				
Canada	43 (47.8)	16 (20.3)	59 (34.9)	< 0.001
Australia	14 (15.6)	19 (24.1)	33 (19.5)	
Italy	26 (28.9)	0 (0.0)	26 (15.4)	
Mexico	7 (7.8)	44 (55.7)	51 (30.2)	
Gravida, median [IQR]	2 (1–3)	2 (1–3)	2 (1–3)	0.72
Para, median [IQR]	1 (0–1)	0 (0–1)	0 (0–1)	0.45
BMI, mean (SD) ^b	24.5 (4.9)	25.5 (5.9)	25.1 (5.6)	0.36
Pre pregnancy creatinine $\mu\text{mol/l}$, median (IQR) ^c	180 (157–213)	244 (206–347)	194 (160–249)	< 0.001
CKD stage, n (%) ^c				
Stage 3	42/65 (64.6)	6/32 (18.8)	48/97 (49.5)	< 0.001
Stage 4	21/65 (31.3)	16/32 (50.0)	37/97 (38.1)	
Stage 5	2/65 (3.1)	10/32 (31.3)	12/97 (12.4)	
Prepregnancy albumin-to-creatinine ratio mg/mmol, median [IQR] ^d	58 (14–121)	123 (17–330)	87 (14–160)	0.08
Prepregnancy serum urea mmol/l, median [IQR] ^e	10 (8–13)	14 (12–22)	12 (9–15)	< 0.001
Gestational fall in sCr $\geq 10\%$, n (%)	34/65 (52.3)	5/23 (21.7)	39/88 (44.3)	0.01
Ethnicity, n (%)				
Asian	20/86 (23.3)	7/73 (9.6)	27/159 (5.9)	<0.001
Black	12/86 (14.0)	3/73 (4.1)	15/159 (9.4)	
Hispanic/Latino	10/86 (11.6)	44/73 (60.3)	54/159 (34.0)	
Middle Eastern	6/86 (7.0)	0 (0.0)	6/159 (3.8)	
White	38/86 (44.2)	19/73 (26.0)	57/159 (35.8)	
Cause of kidney disease, n (%)				
Glomerular disease	46/89 (51.7)	36/77 (46.8)	82/166 (49.4)	0.08
Congenital/Reflux nephropathy	18/89 (20.2)	8/77 (10.4)	26/166 (15.7)	
Diabetic nephropathy	6/89 (6.7)	13/77 (16.9)	19/166 (11.4)	
Other	19/89 (21.3)	20/77 (26.0)	39/166 (23.5)	
Cardiovascular disease, n (%)	6/82 (7.3)	3/77 (3.8)	9/159 (5.6)	0.23
Type 1 or 2 diabetes mellitus, n (%)	76/82 (92.7)	61/76 (80.3)	137/158 (86.7)	0.02
Chronic hypertension, n (%)	51/82 (62.2)	26/78 (33.3)	77/160 (48.1)	< 0.001
Kidney transplant recipient, n (%)	8 (8.8)	4 (5.1)	12 (7.1)	0.27
Current smoker, n (%)	3/82 (3.7)	2/78 (2.6)	5/160 (3.1)	0.92
Systemic lupus erythematosus, n (%)	6/82 (7.3)	8/78 (10.3)	14/160 (8.8)	0.51
Era of birth year				
2000–2007	6 (7.4)	7 (9.0)	13 (8.2)	0.31
2007–2014	31 (38.3)	21 (26.9)	52 (32.7)	
2014–2022	44 (54.3)	50 (64.1)	94 (59.1)	

BMI, body mass index; CKD, chronic kidney disease; CKD-EPI, CKD Epidemiology Collaboration; eGFR, estimated glomerular filtration rate; IQR, interquartile range; sCr, serum creatinine.

^aThe N/n represents the number of pregnancies.

^bBMI missing for n = 66 pregnancies.

^ceGFR was estimated using the CKD-EPI 2021 equation.¹²

^dPre pregnancy albumin-to-creatinine ratio missing for n = 46 pregnancies (51.1%) in nondialysis group; missing for n = 51 (64.8%) pregnancies in dialysis group.

^ePrepregnancy serum urea (mmol/l) missing for n = 49 (54.4%) in nondialysis group; missing for n = 53 (67.1%) in dialysis group.

Denominator is provided where there are missing values.

13.- 🧑 Among women initiating dialysis

17 - The median gestational age at the start of dialysis was 21.4 wks

👁️ - There was striking intersite variation in dialysis commencement and prescription.

Table 2. Dialysis management during pregnancy

Characteristics	Australia <i>n</i> = 19	Canada <i>n</i> = 16	Mexico <i>n</i> = 44	All <i>N</i> = 79 ^a	<i>P</i> -value
Prepregnancy CKD stage ^b , <i>n</i> (%)					
Stage 3	6/14 (42.9)	0/13 (0.0)	0/5 (0.0)	6/32 (18.8)	0.04
Stage 4	6/14 (42.9)	7/13 (53.9)	3/5 (60.0)	16/32 (50.0)	
Stage 5	2/14 (14.3)	6/13 (46.2)	2/5 (40.0)	10/32 (31.3)	
Gestational fall in SCr $\geq$ 10% ^c , <i>n</i> (%)	2/12 (16.7)	3/17 (42.9)	0/4 (0.0)	5/23 (21.7)	0.21
Gestational age at dialysis start, wks, median [IQR]	23.0 (12.0–28.0)	17.1 (10.0–24.4)	(22.0 15.0–25.7)	21.4 (13.3–25.0)	0.22
Indication for dialysis, <i>n</i> (%) ^d					
Refractory fluid overload	3 (8.3)	0	5 (5.9)	8 (5.7)	0.28
Elevated urea	17 (47.2)	7 (35.0)	37 (43.5)	61 (43.3)	0.002
Hyperkalemia	5 (13.9)	3 (15.0)	18 (21.2)	26 (18.4)	0.21
Metabolic acidosis	3 (8.3)	4 (20.0)	22 (25.9)	29 (20.6)	0.02
Refractory hypertension	3 (8.3)	0	0	3 (2.1)	0.007
Polyhydramnios	2 (5.6)	3 (15.0)	1 (1.2)	6 (4.3)	0.09
Fetal growth restriction	0	0	1 (1.2)	1 (0.7)	0.67
Unspecified	3 (8.3)	3 (15.0)	1 (1.2)	2 (1.4)	0.50
Urea at dialysis start, mmol/l, median, [IQR] ^e	23.3 (18.0–28.3)	18.1 (15.4–19.9)	22.9 (21.1–30.6)	22.6 (18.5–28.3)	0.006
Target urea on dialysis, mmol/l, median [IQR]	12.0 (12.0–20.0)	12.0 (12.0–12.0)	6.5 (5.0–9.0)	9.7 (5.8–12.0)	<0.001
Urea, mmol/l, median [IQR] ^f					
First trimester	15.0 (11.6–23.0)	17.0 (13.5–19.3)	22.1 (15.3–24.5)	18.1 (13.0–22.8)	0.25
Second trimester	14.2 (11.8–18.7)	13.7 (10.6–15.9)	22.1 (10.7–27.6)	16.6 (11.3–23.0)	0.04
Third trimester	16.4 (12.0–19.0)	8.9 (7.7–11.9)	7.5 (5.2–16.3)	9.1 (6.7–17.6)	0.36
Mode of dialysis, <i>n</i> (%)					
Hemodialysis, in-center	19 (100.0)	13 (81.3)	44 (100.0)	74 (96.1)	<0.001
Hemodialysis, home	-	3 (21.4)	-	3 (3.9)	
Dialysis hours, h/wk, median [IQR] ^g					
Total over pregnancy	18.0 (14.0–20.0)	23.2 (19.0–30.7)	12.0 (12.0–13.5)	13.0 (12.0–19.0)	<0.001
First trimester	15.0 12.0–18.0	20.0 12.0–24.0	12.0 0.0–12.0	12.0 12.0–18.0	0.03
Second trimester	20.0 16.0–20.0	24.0 20.0–36.0	12.0 12.0–13.0	14.0 12.0–20.0	<0.001
Third trimester	19.0 15.5–20.0	27.0 24.0–40.0	12.0 12.0–16.0	16.0 12.0–20.0	<0.001
Ultrafiltration, total liters per dialysis session, median [IQR] ^h					
First trimester	0.5 (0.0–1.0)	0.0 (0.0–2.0)	0.0 (0.0–0.5)	0.1 (0.0–1.2)	0.72
Second trimester	0.5 (0.0–1.5)	0.0 (0.0–2.0)	0.5 (0.5–0.6)	0.5 (0.3–1.4)	0.73
Third trimester	1.0 (0.0–1.5)	0.4 (0.0–1.0)	0.5 (0.5–1.4)	0.5 (0.4–1.5)	0.48
Complications of dialysis, <i>n</i> (%)					
Infection, bloodstream	0 (0.0)	1 (6.2)	1 (2.3)	2 (2.5)	0.50
Infection, local	0 (0.0)	0 (0.0)	1 (2.3)	1 (1.3)	0.67
Access thrombosis	0 (0.0)	0 (0.0)	0 (0.0)	0 (0.0)	-
Intradialytic hypotension	3 (15.8)	0 (0.0)	5 (11.4)	8 (10.1)	0.28
Fetal distress	1 (5.3)	0 (0.0)	6 (13.6)	7 (8.9)	0.21

CKD, Chronic Kidney Disease; CKD-EPI, CKD Epidemiology Collaboration; IQR, interquartile range; SCr, serum creatinine ($\mu\text{mol/l}$).

^aThere were no pregnancies from Italy where dialysis was commenced in this cohort. Two women declined dialysis during pregnancy and are represented in the nondialysis cohort.

^beGFR was estimated using the CKD-EPI 2021 equation.¹²

^cPaired SCr measurements were available for 23 pregnancies to calculate gestational decline in SCr.

^dMore than 1 indication for dialysis could be selected, hence numbers do not add up in individual columns. Frequencies (%) represent the percentage of each indication relative to the total number of indications selected.

^eDefined as highest serum urea measured in mmol/l prior to hemodialysis commencement. Data missing for *n* = 2 pregnancies.

^fData missing for *n* = 55 in first trimester, *n* = 23 in the second trimester, *n* = 21 in the third trimester.

^gData for dialysis hours was missing for 2 pregnancies.

^hData for ultrafiltration on dialysis was missing for 21 pregnancies.

Denominator is provided where there are missing values.

14.- What was the most frequent indication for starting dialysis?

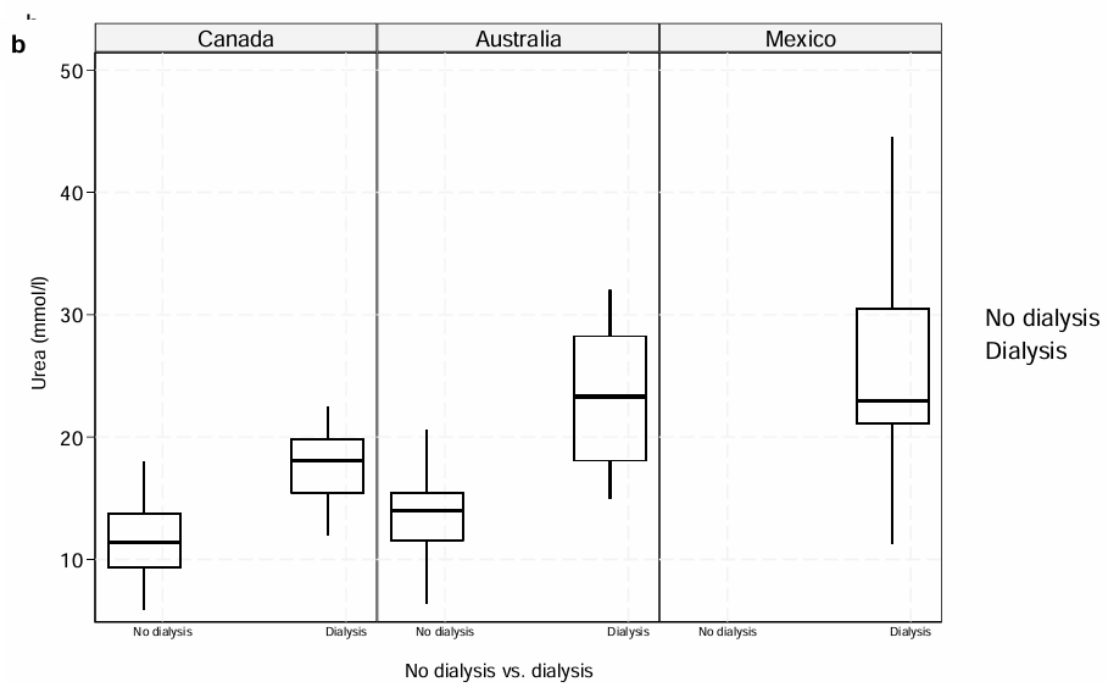
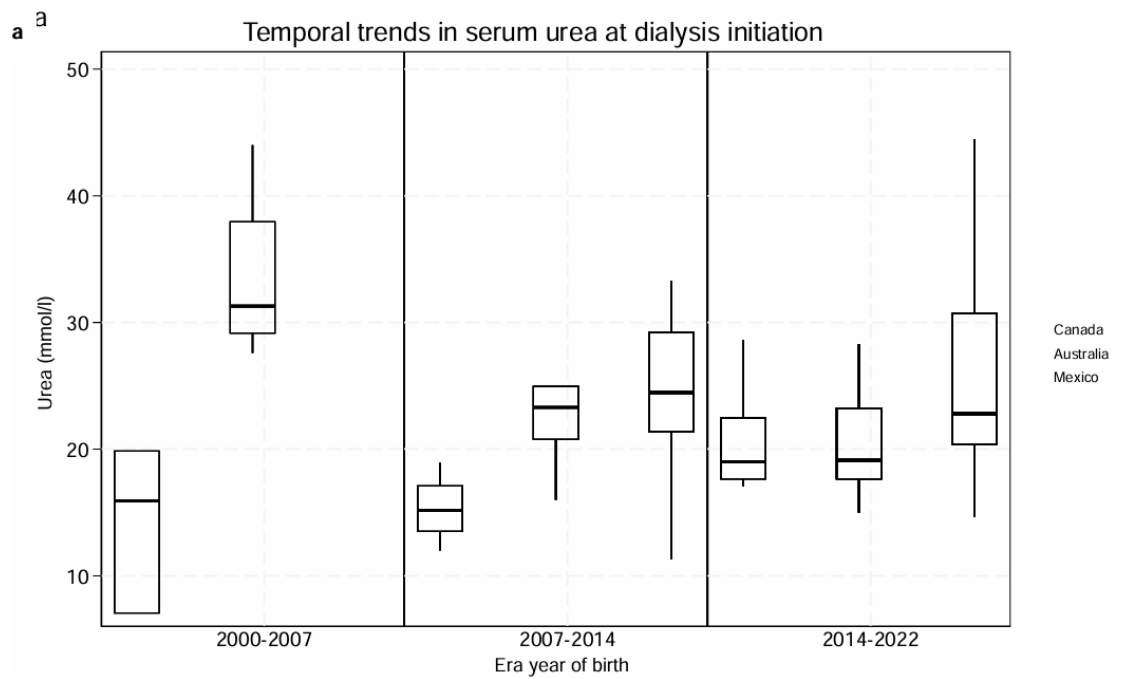


1 Urea concentration

- Australia had the highest median at 23.3 mmol/l.
- Australia starts dialysis at a lower urea level over time.



2 Metabolic acidosis



15.- What happened with the hours of hemodialysis?

🕒 The median dialysis hours during pregnancy were 13 h/wk

🇨🇦 Canada received the highest dialysis hours at 27 h/wk

🇲🇽 Mexico received the least at 12 hours/wk

Table 3. Major maternal and fetal outcomes comparing dialysis versus non-dialysis during pregnancy

Outcomes	Dialysis not initiated during pregnancy	Dialysis initiated during pregnancy	All	P-value
Pregnancies, <i>n</i> (%) ^a	83 (53.5)	72 (46.5)	155 (100)	
Children, <i>n</i> (%)	86 (54.4)	72 (45.6)	158 (100.0)	
Primary outcomes				
Low birth weight (< 2500 g)	49/66 (74.2)	67/68 (98.5)	116/134 (86.5)	0.008
Preterm birth (< 37 wks)	55/70 (78.6)	64/69 (92.8)	119/139 (85.6)	0.30
Maternal complications (composite)	26/67 (38.8)	48/68 (70.6)	74/135 (54.8)	< 0.001
Secondary outcomes				
Live birth rate, <i>n</i> (%)	78 (94.0)	66 (92.7)	145 (92.9)	0.54
Spontaneous abortion, first trimester	3 (3.6)	0 (0.0)	3 (1.9)	0.62
Spontaneous abortion, second trimester	1 (1.2)	1 (1.4)	2 (1.3)	0.62
Stillbirth	1 (1.2)	4 (5.6)	5 (3.2)	0.03
Neonatal death	0 (0.0)	1 (1.4)	1 (0.6)	0.50
Early preterm delivery (< 32 wks)	32/70 (45.7)	46/69 (66.7)	78/139 (56.1)	0.07
Very low birth weight (< 1500 g)	22/66 (33.3)	37/68 (54.4)	59/134 (44.0)	0.04
SGA 10th percentile	23/66 (34.8)	32/68 (47.1)	55/134 (41.0)	0.05
SGA 5th percentile	15/66 (22.7)	17/68 (25.0)	32/134 (23.9)	0.45
Gestational age, wks, median [IQR]	35.1 (31.5–36.8)	32.4 (28.8–36.1)	33.5 (29.4–36.6)	0.11
Birth weight, g, median [IQR]	2115 (1284–2526)	1500 (1013–2175)	1736 (1,135–2330)	< 0.001
Mode of delivery, <i>n</i> (%)				
Vaginal delivery, spontaneous	9/67 (13.4)	9/67 (13.4)	18/134 (13.4)	0.47
Vaginal delivery, induced	19/67 (28.4)	9/67 (13.4)	28/134 (20.9)	
Cesarean delivery, emergency	24/67 (35.8)	35/67 (52.2)	59/134 (44.0)	
Cesarean delivery, elective	15/67 (22.4)	14/67 (20.9)	29/134 (21.6)	
NICU, <i>n</i> (%)	42/77 (54.5)	38/77 (49.3)	80/154 (51.9)	0.42
PROM, <i>n</i> (%)	6/77 (7.8)	6/70 (8.6)	12/147 (8.2)	0.99
Short cervix, <i>n</i> (%)	2/60 (3.3)	2/70 (2.9)	4/130 (3.1)	0.99
Polyhydramnios, <i>n</i> (%)	5/69 (7.2)	12/60 (20.0)	17/129 (13.2)	0.12
Abruption, <i>n</i> (%)	3/71 (4.2)	1/69 (1.4)	4/140 (2.9)	0.62
Maternal death, <i>n</i> (%)	0 (0.0)	0 (0.0)	0 (0.0)	-
Eclampsia, <i>n</i> (%)	0 (0.0)	1/69 (1.4)	1/154 (0.6)	0.50
HELLP, <i>n</i> (%)	8/72 (11.1)	20/70 (28.6)	28/142 (19.7)	0.06
Severe hypertension ^b , <i>n</i> (%)	21/68 (30.9)	33/68 (48.5)	54/136 (39.7)	0.04

BP, blood pressure; HELLP, Hemolysis Elevated Liver enzymes and Low Platelets; IQR, interquartile range; NICU, neonatal intensive care unit; PROM, premature rupture of membranes; SGA, small for gestational age.

^aExcluding elective terminations for *n* = 7 in nondialysis and *n* = 7 in dialysis.

^bSevere hypertension refers to BP ≥ 160/110 mm Hg.

Denominator is provided where there are missing values.

16.- 🧯 complications of dialysis

♦ n:18 dialysis-associated complications (n=8 intradialytic hypotension, n=7 fetal distress, n=2 bloodstream infections, n=1 local tunneled catheter infection) N.8 discontinued dialysis postpartum.

17. 👤 Fetal outcomes were determined on univariable & multivariable analyses, controlling for confounders. 👤 who started dialysis during 👤 vs nondialyzed 👤 had:

> Frequency of preterm birth & low birth weight

↓ <Median gestational age (32.4wks)

↓ <Median birth weights (1500g)

↓ <Livebirth rate (92.7%)

Table 4. Major maternal and fetal outcomes according to highest serum urea concentration during pregnancy

Outcomes	Urea < 10 ^a	Urea 10–15 ^a	Urea 15–20 ^a	Urea 20–25 ^a	Urea ≥ 25 ^a	P-value
Pregnancies, <i>n</i> (%) ^a	18 (13.3)	31 (23.0)	32 (23.7)	24 (17.8)	30 (22.2)	
Children, <i>n</i> (%)	22 (14.7)	35 (23.3)	33 (22.0%)	28 (18.7)	32 (21.3)	
Low birth weight (< 2500 g)	6/14 (42.9)	24/29 (82.8)	25/31 (80.6)	21 (87.5)	29/29 (100)	< 0.001
Preterm birth (< 37 wks)	11/17 (64.7)	22/29 (75.9)	25 (78.1)	19 (79.2)	26/29 (89.7)	0.363
Maternal complications (composite)	8 (44.4)	13/30 (43.3)	21/31 (67.7)	11/23 (47.8)	14/28 (50.0)	0.330
Live birth rate, <i>n</i> (%)	16 (88.9)	30 (96.8)	31 (96.9)	23 (95.8)	26 (86.7)	0.381
Spontaneous abortion, first trimester	1 (5.6)	0 (0.0)	0 (0.0)	0 (0.0)	0 (0.0)	0.133
Spontaneous abortion, second trimester	1 (5.6)	0 (0.0)	0 (0.0)	0 (0.0)	1 (3.3)	0.309
Stillbirth	0 (0.0)	1 (3.2)	0 (0.0)	1 (4.2)	3 (10.0)	0.292
Neonatal death	0 (0.0)	0 (0.0)	1 (3.1)	0 (0.0)	0 (0.0)	1.00
Early preterm delivery (< 32 wks)	4/17 (23.5)	11/29 (37.9)	20 (62.5)	10 (41.7)	20/29 (69.0)	0.010
Very low birth weight (< 1500 g)	2/14 (14.3)	11/29 (37.9)	12/31 (38.7)	9 (37.5)	17/29 (58.6)	0.087
SGA 10th percentile	4/14 (28.6)	14/28 (50.0)	9/31 (29.0)	15 (62.5)	13/28 (46.4)	0.095
SGA 5th percentile	3/14 (21.4)	9/28 (32.1)	5/31 (16.1)	8 (33.3)	8/28 (28.6)	0.559
Gestational age, wks, median [IQR]	36.6 34.0–37.0	35.4 32.1–36.7	32.8 28.9–36.7	34.3 30.5–36.3	32.0 29.0–34.0	0.015
Birth weight, grams, median [IQR]	2607.0 2046.0–2892.0	2010.0 1380.0–2381.0	1694.0 1060.0–2268.0	1717.5 1232.5–2298.0	1400.0 1125.0–1855.0	< 0.001
Mode of delivery, <i>n</i> (%)						
Vaginal delivery, spontaneous	5/16 (31.2)	4/30 (13.3)	3/29 (10.3)	2 (8.3)	2/29 (6.9)	0.134
Vaginal delivery, induced	4/16 (25.0)	11/30 (36.7)	4/29 (13.8)	4 (16.7)	5/29 (17.2)	
Cesarean delivery, emergency	4/16 (25.0)	10/30 (33.3)	17/29 (58.6)	10 (41.7)	17/29 (58.6)	
Cesarean delivery, elective	3/16 (18.8)	5/30 (16.7)	5/29 (17.2)	8 (33.3)	5/29 (17.2)	
NICU, <i>n</i> (%)	5/16 (31.2)	19/30 (63.3)	18 (56.2)	13 (54.2)	20 (66.7)	0.202
PROM, <i>n</i> (%)	1/17 (5.9)	2/29 (6.9)	6 (18.8)	1 (4.2)	2 (6.7)	0.406
Short cervix, <i>n</i> (%)	1/17 (5.9)	1/30 (3.3)	2/31 (6.5)	0 (0.0)	0 (0.0)	0.487
Polyhydramnios, <i>n</i> (%)	0/17 (0.0)	1/30 (3.3)	8/31 (25.8)	2 (8.3)	6 (20.0)	0.021
Abruption, <i>n</i> (%)	1 (5.6)	1/29 (3.4)	1/31 (3.2)	1 (4.2)	0 (0.0)	0.807
Maternal death, <i>n</i> (%)	0 (0.0)	0 (0.0)	0 (0.0)	0 (0.0)	0 (0.0)	-
Eclampsia, <i>n</i> (%)	0 (0.0)	0/30 (0.0)	0/31 (0.0)	1 (4.2)	0 (0.0)	0.316
HELLP, <i>n</i> (%)	2 (11.1)	3/30 (10.0)	4 (12.5)	2 (8.3)	2 (6.7)	0.949
Severe hypertension ^b , <i>n</i> (%)	6 (33.3)	12/30 (40.0)	19/31 (61.3)	7/23 (30.4)	10/28 (35.7)	0.144

BP, blood pressure; HELLP, Hemolysis Elevated Liver enzymes and Low Platelets; IQR, interquartile range; NICU, neonatal intensive care unit; PROM, premature rupture of membranes; SGA, small for gestational age.

^aTotal sample size (*N*) = 135, after excluding elective terminations (*n* = 14) and pregnancies with missing serum urea data (*n* = 21). For each pregnancy, the highest serum urea concentration recorded during pregnancy was used for categorization. If dialysis was started during pregnancy, then the highest serum urea concentration prior to dialysis initiation was used.

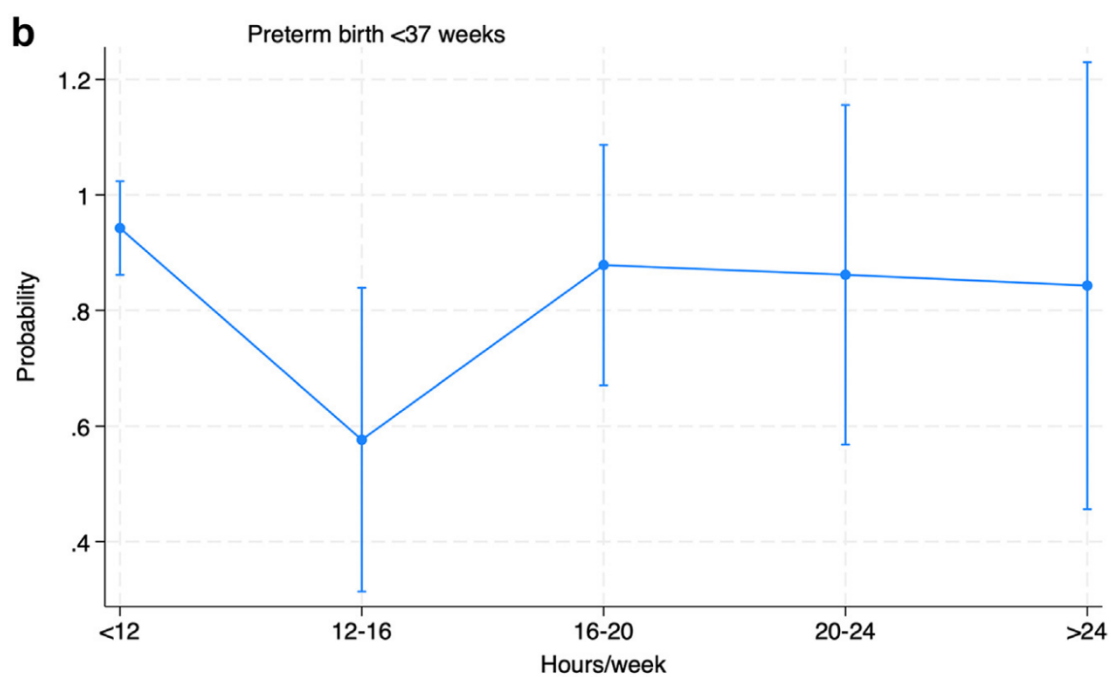
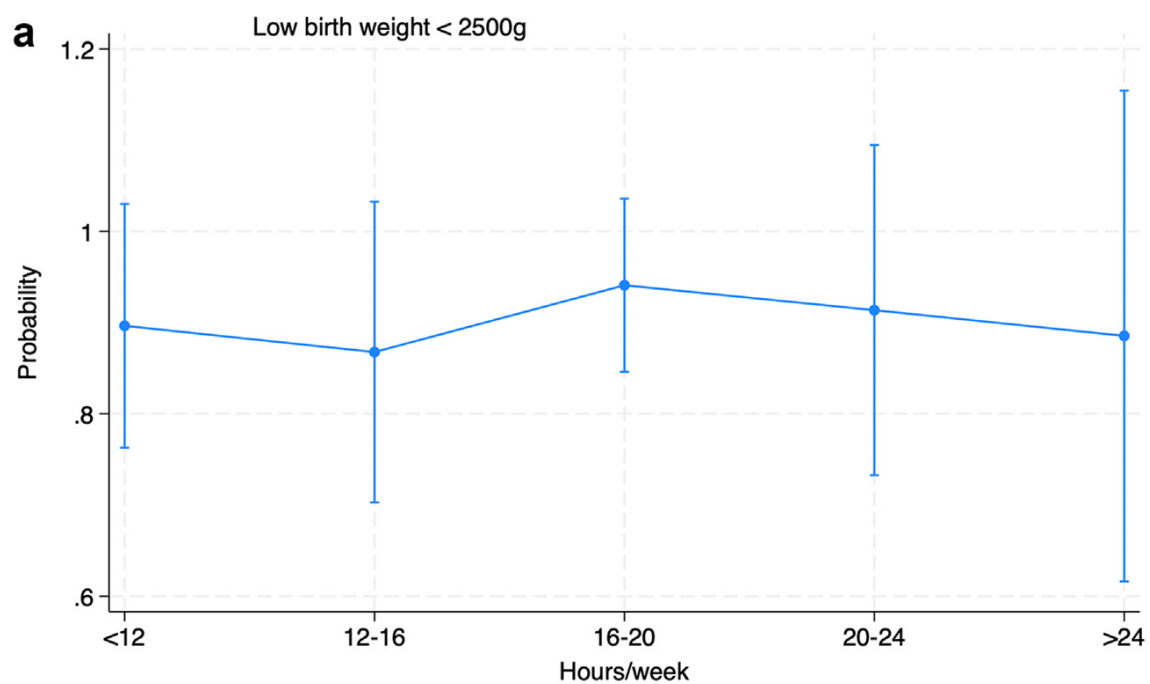
^bSevere hypertension refers to BP ≥ 160/110 mm Hg.

Denominator is provided where there are missing values.

18.- There was a trend toward a higher proportion of low-birth-weight infants & polyhydramnios with ↑ serum urea.

🇮🇹 Had a higher frequency of low-birth-weight babies, small for gestational age, a lower proportion of neonatal ICU admissions & lower overall live-birth rate.

19.- ⚡ There was no significant association between increasing hours of dialysis per wk and low birth weight, preterm birth or maternal complications. **A potential limitation is that in some patients, fetal adverse effects were not adjusted for immunosuppressive treatment.**



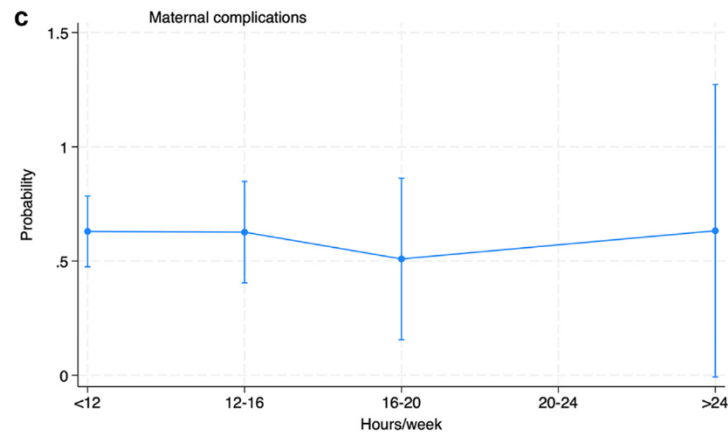


Figure 1. Association between hours of dialysis per week and adverse maternal and fetal outcomes. Graph depicting the relationship between dialysis hours (≤ 12 hours; 12 to ≤ 16 hours; 16 to ≤ 20 hours; 20 to ≤ 24 hours; >24 hours) and the probability of adverse outcomes (a) low birth weight < 2500 g (overall $P = 0.94$); (b) preterm birth < 37 weeks (overall $P = 0.05$), and (c) composite maternal complications (overall $P = 0.95$). Model was adjusted for preexisting diabetes mellitus, chronic hypertension, maternal age at pregnancy, and country.

20. n=90 🧑 where dialysis was not initiated

Most were from 🇨🇦 (47.8%)

A gestational decline in sCr $\geq 10\%$ occurred in 52.3% of nondialyzed pregnancies

At 1 year postpartum, the mean change in eGFR compared with prepregnancy values in nondialyzed women was -8.4 ml/min per 1.73 m²

21.- 📅 Follow-up

🧑 22 of 79 women started dialysis at 2 yr (IQR: 1- 4) postpartum

🧑 17 of 79 received a kidney transplant, a 3.9-year

🚫 n=32 women who did not start kidney replacement therapy by the last follow-up, the median eGFR was 22ml/min per 1.73 m² at 1.8 years

22. 🔥 The authors concluded that determining the optimal time to start dialysis during pregnancy is challenging, & worldwide guidelines to aid clinicians in this decision are required because of the potential for devastating consequences for the fetus and mother.

23. This has been @elbaonelida with another @KlReports learning opportunity. Thank you! Please share this #tweetorial with your followers and friends!

Don't forget to check out KI Reports Community for more: <http://kireportscommunity.org> Thanks to @, @, @ for great feedback!

