

PMID	First Author	Title	Year	Study Type	CVD	RF by CQ	Country	Setting	Blinding	Int Length	Total Study Duration	Main Study Objective	Total N	Target Population	Eligibility Criteria	Patient Characteristics	Int. n at Baseline (n at Follow-up)	Int. Type	Specific Intervention	Control n at Baseline (n at Follow-up)	Specific Control	Outcomes Measured	Results/CI	Significance	Safety and Adverse Events	Additional findings	Summary	Main Reported Findings by Critical Question
1485060	Kist-van Holthetot Echten JE	Protein restriction affects fat intake and serum lipids in children with chronic renal failure	1992	RCT	None	Q13 (RF5, RF9)	Netherlands	Clinical	None/NR	12 mo	12 mo	Assess the effect of a protein-restricted diet on fat intake and serum lipid profiles in children with chronic renal failure	48	Pediatric/ Young Adults	Children Chronic renal failure	Mean age (SD): Arm 1: 10.9 yr (5.0) Control Arm: 10.4 yr (4.4) Boys: 36 Glomerulonephritis: 6 Reflux nephropathy, obstructive uropathy and/or renal dysplasia: 31 Miscellaneous chronic renal failure diagnosis: 11	23 (NR)	Behavioral	Arm 1: Protein restricted diet (INT) Advised to eat the safe levels for protein intake advised by the World Health Organization (WHO) 1985, which varies from 0.8 to 1.1 g/kg/d, according to age and gender of the child	25 (NR)	Control Arm: Normal protein intake diet (CON) Advised to eat usual protein intake for healthy Dutch children, corresponding to 1.5-2.0 times safe levels for protein intake according to age and weight	<b>Primary:</b> Mean fat intake [%E (SD)]  <b>Secondary:</b> Mean calorie intake [% of recommended by WHO (SD)] Mean CHO intake [%E (SD)] Mean cholesterol intake [mg/MJ (SD)] Mean protein intake [g/kg/d (SD)] Mean cholesterol [mmol/L (SD)] Mean TG [mmol/L (SD)] Mean HDL-C [mmol/L (SD)] Mean LDL-C [mmol/L (SD)] Mean VLDL-C [mmol/L (SD)]	<b>Primary:</b> #1: INT:35(7); CON: 37(7) #2: INT:38(6); CON: 37(7)  <b>Secondary:</b> #1: INT: 97(24); CON:106(27) #2: INT: 95(21); CON: 105(18)  #1: INT: 59(10); CON: 52(8) #2: INT: 53(7); CON:53(8)  #1: INT: 17(6); CON: 25(8) #2: INT: 15(5); CON: 24(8)  INT: 0.94(0.13); CON: 1.98(0.54)  #1: INT: 4.48(0.95); CON: 4.52(0.60) #2: INT:4.51(0.70); CON:4.77(0.81)  #1: INT: 1.62(0.76); CON: 1.38(0.88) #2: INT: 1.71(1.12); CON: 1.37(0.73)  #1: INT: 1.20(0.55); CON: 1.25(0.39) #2: INT:1.09(0.36); CON: 1.20(0.35)  #1: INT: 2.66(0.79); CON: 2.63(0.54) #2: INT: 2.61(0.70); CON: 2.93(0.60)  #1: INT: 0.73(0.34); CON: 0.62(0.39) #2: INT: 0.77(0.50); CON: 0.62(0.33)	NS NS NS NS S** S** NS NS NS NS NS NS	None reported	Significant improvement in FIV ratios were also noted	A protein-restricted diet has favorable effects on the cholesterol intake of children with chronic renal failure with no significant impact on serum lipids.	A protein-restricted diet has favorable effects on the cholesterol intake of children with chronic renal failure with no significant impact on serum lipids.
11956124	Bennett-Richards K	Does oral folic acid lower total homocysteine levels and improve endothelial function in children with chronic renal failure?	2002	RCT (crossover)	FMD	Q10 (RF5)	UK	Clinical	Double	8 wk	24 wk	Determine if oral folic acid lowers total homocysteine levels and improves endothelial function in children with chronic renal failure	25	Pediatric/ Young Adults	Chronic renal failure (glomerular filtration rate $26.8 \pm 13.2$ mL/min per $1.73$ m <sup>2</sup> ) of noninflammatory etiology Exclusions: Smokers Hypertensive Diabetic or nephrotic	Mean age (SD): 12 yr (3) Boys: 14	25 (23)	Dietary Supplements	Intervention: Folic acid 5 mg/m <sup>2</sup>	25 (23)	Control: Placebo	<b>Primary:</b> Serum folate [umol/L(SD)] Red cell folate [umol/L(SD)] Total homocysteine [umol/L(SD)] Change in FMD [% (SD)] Change in vessel diameter [cm(SD)]  <b>Secondary:</b> Total antioxidant activity [utrolox Eq(SD)] LDL lag times [min(SD)]	<b>Primary:</b> INT: 13.1(8.8) to 635(519) CON: 17.0(8.9) to 12.4(6.0) INT: 364(195) to 2891(2693) CON: 596(468) to 405(168) INT: 10.28(4.16) to 8.62(2.32) CON: 9.02(2.19) to 9.84(2.74) INT: 7.21(2.81) to 8.47(3.01) CON: 8.20(3.41) to 8.80(4.01) INT: 0.217(0.106) to 0.252(0.81) CON: 0.244(0.102) to 0.276(0.104)  <b>Secondary:</b> No change in INT or CON INT: 58.4(16) to 68.4(25) CON: 62.8(17) to 63.2(13)	S** NS S** S S NS NS NS NS NS NS NS NS	None reported	No change in any lipid measure or BP on folic acid treatment.	Supplementation with folic acid for 8 weeks results in reduction in homocysteine levels, resistance of LDL to oxidation, and increases in endothelial function in children with chronic renal failure.	Supplementation with folic acid for 8 weeks results in reduction in homocysteine levels, resistance of LDL to oxidation, and increases in endothelial function in children with chronic renal failure.
12234308	Bennett-Richards KJ	Oral L-arginine does not improve endothelial dysfunction in children with chronic renal failure	2002	RCT (crossover)	FMD	Q13 (RF4, RF5)	United Kingdom	Clinical	Double	4 wk	12 wk	Examine whether dietary L-arginine supplementation improves endothelial function in children with chronic renal failure	25	Pediatric/ Young Adults	Chronic renal failure defined as glomerular filtration rate < 50 mL/min/1.73 m <sup>2</sup> Endothelial dysfunction Normotensive Exclusions: Smokers Hypertensive Diabetic Nephrotic	Mean age (SD): 12 yr (3) Males: 14 Congenital structural causes of chronic renal failure: 24 Acquired (neonatal cortical necrosis) causes of chronic renal failure: 1	25 (21)	Dietary Supplements	Intervention: Oral L-arginine supplementation	25 (21)	Control: Placebo	<b>Primary:</b> Mean change in L-arginine level [umol/L(SD)] Mean change in brachial artery diameter [mm(SD)] Mean change in FMD [% (SD)]  <b>Secondary:</b> Mean TC [mmol/L (SD)] Mean TG [mmol/L (SD)] Mean HDL-C [mmol/L (SD)] Mean LDL-C [mmol/L (SD)] Mean SBP[mmHg(SD)] Mean DBP[mmHg(SD)]	<b>Primary:</b> INT: 104(110); CON:4(14.5) INT: 0.007(0.15); CON: -0.03(0.04) INT: 0.06(2.4); CON: -0.14(3.23)  <b>Secondary:</b> No difference between measurements INT: -0.06(0.54); CON: 0.19(0.57) No difference between measurements No difference between measurements No difference between measurements No difference between measurements	S** NS NS NS NS NS NS NS	No effect on NO chemistry. No difference in GTN mediated dilation with arginine or placebo.	Oral L-arginine does not improve brachial artery reactivity in the setting of chronic renal failure despite elevated plasma arginine levels.	Oral L-arginine does not improve brachial artery reactivity in the setting of chronic renal failure despite elevated plasma arginine levels.	