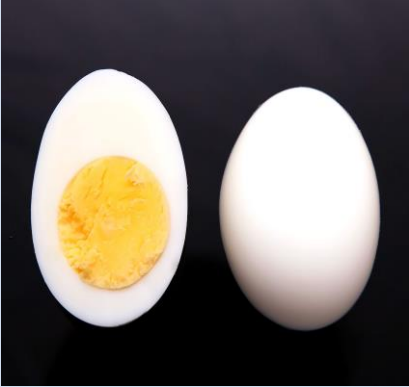
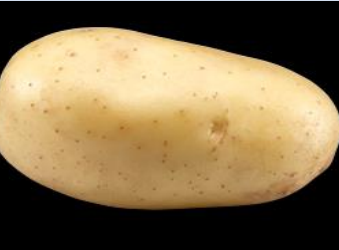


DIET IN CKD

DIET IN CKD (NOT ON RRT)

DIET	REQUIREMENT
ENERGY	30 – 35 Kcal/Kg wt/ day
PROTEIN	0.55 – 0.7 gms/Kg wt/ day
FLUID	(depends on urine output) Up to 3000 ml/day, more if fluid loss is high
SODIUM (SALT)	2 – 4 gms/day
POTASSIUM	40 – 70 mEq / day

DIET IN CKD (NOT ON RRT)

TO EAT			NOT TO EAT		
					
					
APPLE	GRAPES	PINEAPPLE	Salt	Pizza	Pickles
					
CORN	EGGS	BOIL VEGETABLES AND DISCARD THE WATER BEFORE COOKING	BANANA	TOMATO	ORANGE
					
			NUTS	ICECREAM	POTATO

DIET IN CKD ON DIALYSIS (HEMODIALYSIS AND PERITONEAL DIALYSIS)

DIET	HEMODIALYSIS	PERITONEAL DIALYSIS
ENERGY	< 60 years , 35 Kcal/Kg wt/ day > 60 years , 30 – 35 Kcal/Kg wt/ day	< 60 years , 35 Kcal/Kg wt/ day > 60 years , 30 – 35 Kcal/Kg wt/ day
PROTEIN	1.0 – 1.2 gms/Kg wt/ day	1.2 – 1.3 gms/Kg wt/ day
FLUID	Output plus 1000 ml	Output plus 2000 ml
SODIUM (SALT)	2 gms/day	2 – 3 gms/day
POTASSIUM	40 – 70 mEq / day	40 – 70 mEq / day

- **Intra-Dialytic Parenteral Nutrition (IDPN)** : For hemodialysis patients, intravenous amino acids, carbohydrates, and fats are infused directly into the venous drip chamber of the hemodialysis circuit during treatment.
- **Intra-Peritoneal Nutrition (IPN)** : In peritoneal dialysis, a bag of dextrose dialysate is fortified with an amino acid solution and can be given as a final fill for CCPD patients and drained after a 4- to 6-hour dwell. It can also be administered as a 4- to 6-hour dwell for CAPD patients.

Guidelines for Treatment of Malnutrition in Hemodialysis Patients

≥ 1 of the following characteristics*:

- Decreased serum albumin (< 3.4-3.8 g/dL)
- Weight loss (> 10% of body weight)
- Decreased dietary intake
- Low subjective global assessment score (SGA)

ESPEN Minimum Criteria

- BMI < 18.5 kg/m²

OR

- Unintentional weight loss (> 10% over indefinite amount of time or > 5% over the last 3 months)

In addition to:

- BMI < 20 kg/m² if over 70 years of age, or < 22 kg/m² if ≥ 70 years of age OR
- Fat free mass index < 15 and < 17 kg/m² in men and women, respectively

*Specific characteristic for individual guidelines vary (see Supplemental Materials Appendix A for detailed criteria)

INTRADIALYTIC PARENTERAL NUTRITION

Manufacturer Regime	Bbraun®		Fresenius Kabi®	
	Nutriflex Lipid Special	Nutriflex Lipid Plus	SMOF Kabiven EF	SMOF Kabiven
Total Volume (ml)	625-1250	1250	493-986	986
Protein(g/L)	57.6	38.4	50	50
Total energy (kcal/L)	1180	1012	1100	1100
Non-protein (kcal/L)	936	840	900	900
Nitrogen (g/L)	8	5.6	8	8
Glucose (g/L)	144	120	125	125
Lipid(g/L)	40	40	38	38
Fish oil (g)	0	0	5.6	5.6
Type of Lipid	PUFA+MCT	PUFA+MCT	PUFA(omega 3) +OO+MCT	PUFA(omega 3) +OO+MCT
Osmolarity(mOsm/L)	1545	1215	1300	1500
Sodium	53.6	40	0	40
Potassium	37.6	28	0	30
Phosphate	16	12	0	12
Available without electrolytes?	Yes	Yes	Yes	No

Reference: Product Inserts from Bbraun (Malaysia) Sdn. Bhd. and Fresenius Kabi (Malaysia).

Abbreviations: ESRD = End-Stage Renal Disease; EF = electrolyte free; PUFA = Polyunsaturated Fatty Acids; MCT = Medium Chain Triglycerides
OO = Olive Oil.

DIET IN CKD ON DIALYSIS

TO EAT



ANIMAL PROTEIN



GRAPES



PINEAPPLE



CORN



EGGS



APPLE

NOT TO EAT



Salt



Pizza



Pickles



BANANA



TOMATO



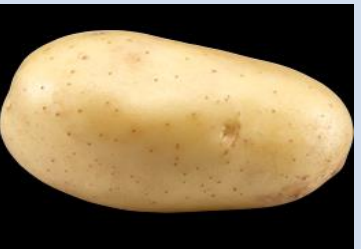
ORANGE



NUTS



ICECREAM



POTATO