

Home Hemodialysis Devices: Providing Optimal Hemodialysis with Minimal Burdens

Annual Dialysis Conference
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Machines FDA approved for HHD and NHD

- FDA approved for Home Hemodialysis and Nocturnal Home Hemodialysis: NxStage System One & One S
- FDA approved for Home Hemodialysis: Fresenius 2008 K@ Home
- No machine FDA approved for Pediatric use
- All machines used for HHD & NHD not approved by FDA must be ordered by the physician off label
- All machines used for HHD and NHD for pediatric patients must be ordered by the physician off label

Machines to be presented March 12, 2017

- 2:00 Fresenius 2008K@Home - Karsten Fischer
- 2:20 NxStage System One - Jose Molina, MBA
- 2:40 Outset - Tablo - Luis Alvarez, MD, PhD
- 3:00 Quanta SC+ - John E. Milad, CEO, Quanta Dialysis Technologies
- 3:20 Wearable Artificial Kidney (WAK) - Nancy Colobong Smith, MN, ARNP, CNN
- 3:40 Summary and Discussion - Robert S. Lockridge, Jr., MD

Demonstration of Home Hemodialysis Machines
4:45 pm to 6pm

- 2008K@Home (Fresenius)
- System One & One S (NxStage)
- Tablo (Outset)
- Quanta SC+ (Quanta)
- Wearable Artificial Kidney (WAK)

	WAK	2008K	NxStage	Tablo	Quanta
Single pass dialysate	No	Yes	Yes	Yes	Yes
Batch dialysate	No	No	Yes	No	No
Online dialysate	Yes	Yes	No	Yes	Yes
HCO3 dialysate	Yes	Yes	No	Yes	Yes
Minimum dialysate flow cc/min	30	100	0	100	200
Max dialysate flow cc/min	120	800	300	300	500
Sterile dialysate bags	Yes	No	Yes	No	No
Machine reuse artificial kidneys	No	No	No	No	No
Machine cartridge set up	Yes	No	Yes	Yes	Yes
Uses standard blood, dialysate lines & kidneys	No	Yes/No	No	Yes	No

	WAK	2008K	NxStage	Tablo	Quanta
Built in Heparin pump	Yes	Yes	No	Yes	No
Air blood interface	No	Yes	No	Yes	Yes
Venous medication port	Yes	Yes	Yes	Yes	Yes
Venous disconnect (Machine stops)	Yes	Yes	No	No	No
Single needle use	No	No	Yes	No	No
Standard air & blood leak detectors	Yes	Yes	Yes	Yes	Yes
Built in moisture detectors	Yes	No	Yes	Yes	No
Monitor arterial pressure	No	Yes	Yes	Yes	Yes
Monitor venous pressure	No	Yes	Yes	Yes	Yes
Built in BP cuff	No	Yes	Yes	Yes	No

	WAK	2008K	NxStage	Tablo	Quanta
Download encrypted data to clinic	No	Yes	Yes	Yes	Yes
Real time monitoring	No	No	No	No	No
Minimum blood flow cc/min	30	20	0	50	50
Max blood flow cc/min	120	600	600	400	450
Traditional roller blood pump	No	Yes	Yes	?	Yes
Water purification RO vs DI	No	RO/DI	DI	RO	RO
Water system part of machine	Yes	No	Yes	Yes	No
Water Standard Ultrapure	Sterile IV quality	Ultrapure	Ultrapure	Ultrapure	Ultrapure
Automatic prime	Yes	No	Yes	Yes	Yes
Automatic rinse back	No	Yes/No	Yes	Yes	Yes

	WAK	2008K	NxStage	Tablo	Quanta
Vary sodium concentration in dialysate	No	Yes	No	Yes	Yes
Vary HCO3 concentration in dialysate	Yes	Yes	NA	Yes	Yes
Vary temperature of dialysate	No	Yes	Yes	Yes	Yes
Vary lactate level in dialysate	No	NA	Yes	NA	NA
Vary calcium level in dialysate	Yes	Yes	Yes	Yes	Yes
Vary potassium concentration in dialysate	Yes	Yes	Yes	Yes	Yes
Add PO4 to dialysate	No	No	No	No	No
Calculate ultra-filtration per hour	Yes	Yes	Yes	Yes	Yes
Ultra- filtration: Volume, Metered, Weight	Volumetric	Volumetric	Volumetric	Volumetric	Volumetric

	WAK	2008K	NxStage	Tablo	Quanta
Automatic bolus NS	No	No	No	Yes	No
Automatic bolus ultra pure dialysate	No	No	No	?	No
Portable Machine	Yes	No	Yes	No	Yes
Max liters of dialysate produced per treatment		384 L/Tx	60 L/Tx	95L/Tx	240 L/Tx
Provide conventional HD 3 x per week	No	Yes	Yes	Yes	Yes
Provide Conventional QOD HD	No	Yes	Yes	Yes	Yes
Provides Short Daily 5 x per week	No	Yes	Yes	Yes	Yes
Provide QOD extended	No	Yes	Yes	Yes	Yes
Provide Daily extended	Yes	Yes	Yes	Yes	Yes

Questions?
