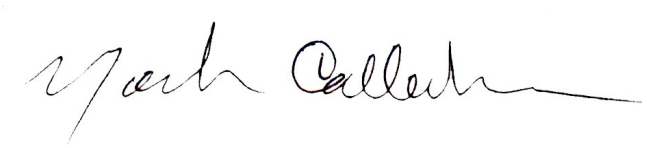
Thanks for downloading my recommended test kit list. I created the list to give you a no-nonsense approach to which test kits to use and more importantly, what your parameters should be in your saltwater tank. These are the test kits I use and recommend to my clients.

Enjoy your tank,



-Mark Callahan, *Mr. Saltwater Tank*

Mr. Saltwater Tank Tests Recommended List

Description of each parameter appears at the end of the tables.

Test by Tank Type		
Fish Only With Live Rock (FOWLR)		
Test Parameter	*Recommended Test Kit (clickable links)*	*Acceptable Value*
Salinity/Specific Gravity	Refractometer	1.019 - 1.025* (25 - 33 ppt)
Ammonia	Salifert	0 mg/mL
Nitrite	Salifert	0 ppm
Nitrate	Salifert, NYOS	0 - 10 ppm
pH	Salifert	7.6 - 8.5
Phosphate	Hanna Checker	0 - 0.1 ppm
Softie Tank (Soft Corals)		
Test Parameter	*Recommended Test Kit (clickable links)*	Acceptable Value
Salinity/Specific Gravity	Refractometer	1.023 - 1.026 (31 - 34 ppt)
Alkalinity	Hanna Checker	6 - 9 KH

Test by Tank Type		
Softie Tank (continued)		
Ammonia	Salifert	0 mg/mL
Nitrite	Salifert	0 ppm
Nitrate	Salifert, NYOS	3 - 10 ppm
pH	Salifert	7.6 - 8.6
Phosphate	Hanna Checker	0 - 0.1 ppm
Mixed Reef (Softies, LPS, SPS)		
Test Parameter	*Recommended Test Kit (clickable links)*	*Acceptable Value*
Salinity/Specific Gravity	Refractometer, Hanna Salinity Checker	1.023 - 1.026 (31 - 34 ppt)
Alkalinity	Hanna Checker	6 - 10 KH
Ammonia	Salifert	0 mg/mL
Calcium	SeaChem, NYOS	380 - 450 mg/mL
Magnesium	SeaChem, NYOS	1200 - 1400 mg/mL
Nitrite	Salifert	0 ppm
Nitrate	Salifert, NYOS	0 - 5 ppm
pH	Salifert	7.6 - 8.6
Phosphate	Hanna Checker	0 - 0.03 ppm
SPS Dominant Reef		
Test Parameter	*Recommended Test Kit (clickable links)*	*Acceptable Value*
Salinity/Specific Gravity	Refractometer, Hanna Salinity Checker	1.023 - 1.026 (31 - 34 ppt)

Test by Tank Type		
SPS Dominant Reef (continued)		
Alkalinity	Hanna Checker	6 - 10 KH
Ammonia	Salifert	0 mg/mL
Calcium	SeaChem, NYOS	380 - 450 mg/mL
Magnesium	SeaChem, NYOS	1200 - 1400 mg/mL
Nitrite	Salifert	0 *ppb*
Nitrate	Salifert, NYOS	0 - 3 ppm
pH	Salifert	7.6-8.4
Phosphate	Hanna Checker (low range)	0 - 5 ***ppb***

Test to Run by Tank Personality		
Tank Dabblers		
Test Parameter	*Recommended Test Kit (clickable links)*	*Acceptable Value*
Salinity/Specific Gravity	Refractometer	1.019 - 1.025* (25 - 33 ppt)
Ammonia	Salifert	0 mg/mL
Nitrite	Salifert	0 ppm
Nitrate	Salifert, NYOS	0 - 10 ppm
pH	Salifert	7.6 - 8.4
Phosphate	Hanna Checker	0 - 0.03 ppm

Test to Run by Tank Personality		
Reef Enthusiasts		
Salinity/Specific Gravity	Refractometer, Hanna Salinity Checker	1.023 - 1.026 (31 - 34 ppt)
Alkalinity	Hanna Checker	6 - 10 KH
Ammonia	Salifert	0 mg/mL
Calcium	SeaChem, NYOS	380 - 450 mg/mL
Magnesium	SeaChem, NYOS	1200 - 1400 mg/mL
Nitrite	Salifert	0 ppm
Nitrate	Salifert, NYOS	0 - 5 ppm
pH	Salifert	7.6 - 8.6
Phosphate	Hanna Checker	0 - .03 ppm
Reef Junkies		
Test Parameter	*Recommended Test Kit (clickable links)*	*Acceptable Value*
Salinity/Specific Gravity	Refractometer, Hanna Salinity Checker	1.023 - 1.026 (31 - 34 ppt)
Alkalinity	Hanna Checker	6 - 10 KH
Ammonia	Salifert	0 mg/mL
Calcium	SeaChem, NYOS	380 - 450 mg/mL
Magnesium	SeaChem, NYOS	1200 - 1400 mg/mL
Nitrite	Salifert	0 - 5 *ppb*
Nitrate	Salifert, NYOS	0 - 3 ppm
pH	Salifert	7.6 - 8.6
Phosphate	Hanna Checker (low range)	0 - 5 ***ppb***

Explanation of Parameters

(in everyday language)

Alkalinity - how much your tank can resist a drop or rise in pH. Also known as "buffering capacity"

Ammonia - fish and invertebrate waste. Ammonia is the first step in the nitrogen cycle

Calcium - building block of coral. Also moves in opposite direction to Alkalinity. So when your Alkalinity is high, Calcium tends to be low.

Magnesium - binds to ions preventing their precipitation in your tank. Consistent low Alkalinity readings can be due to low Magnesium values. Magnesium is also a building block of coral and is often overlooked by saltwater tank owners.

Nitrite - *highly* toxic compound to fish, corals and invertebrates. A fully cycled saltwater tank should show 0 nitrates. Nitrites come about in the second step of the nitrogen cycle.

Nitrate - last step of nitrogen cycle. Toxic in high levels (above 20 ppm) to fish, invertebrates and corals. Learn more about it here

pH - simply, how acidic or basic a solution is. In reality, keeping it at the suggested 8.3 is not necessary.

Phosphate - food for algae. Usually introduced into tank by foods, non RO/DI water or the break down of wastes/excess food/dying livestock.

Salinity/Specific Gravity - how much salt is dissolved in water.