

RaySafe X2 vs Xi comparison

The RaySafe X2 is a multi-parameter, multi-modal-ity instrument. It combines state-of-the-art sensor technology with a completely new user interface, making X2 the ultimate in user-friendliness. A complete range of sensors is available to cover all your measurements needs.

- Large touch-screen display for simple operation and great overview of all measured parameters.
- Full waveforms directly in the base unit for quick analysis of measurements.

- No special settings to handle different types of X-ray machines. Just connect and measure.
- Built-in memory – up to 10 000 measurements with waveforms are stored in the base unit.

RaySafe customers have depended on the Xi for years. However, in December of 2018 it was retired. If you haven't already upgraded to the X2 it is time to do so. Here are some of the benefits the X2 has over the Xi.



Benefit	X2	Xi
System		
Complete overview of all measured parameters and waveforms	4.3" color touch screen display	3-row, monochrome alpha numerical display
Ability to check system prior to service calls	Built-in Self-test	No self-test feature, needs X-ray
Previous exposures available for direct access and comparison	Built-in memory for about 10,000 exposures	No memory, measurements can be stored in PC
Future proof, great connectivity, easy to integrate	Built-in USB and Ethernet	RS 232 with limited connectivity
Direct feedback about the performed measurement	Full waveforms in base unit	Maximum 1200 ms and only on PC.
Actions needed to get a reading are easily accessed	Notifications when a measurement parameter is not shown	No specific information, only Low signal or—shown in the display
Easy to pick the right cable	Color coded cables	All cables are black
R/F		
Independent of angle versus the tube axis (heel effect has no influence)	Stacked sensor	Must be perpendicular to the tube axis
Less impact on AEC and ABC for easy placement	Small dense sensor area with transparent cover	Larger footprint, special Transparent Detector sometimes needed to avoid impact on AEC/ABC
One dynamic range for all measurements	Wide dynamic range	R/F High or R/F Low needs to be selected
Just connect and measure	No settings	kVp delay and trig level settings sometimes needed
mA/mAs		
True mA in the pulse of a pulse train for correct adjustment or Average mA if needed.	Tube mA or Average mA	Average mA
No need to worry about polarity	Any polarity accepted	Will only give reading if connected correctly

X2 vs Xi comparison *continued*

Benefit	X2	Xi
MAM		
Ease-of-use, lower risk of errors	Dose & HVL on all beam qualities without selections	Beam quality has to be selected
Independent of angle versus the tube axis (no influence of heel effect)	Stacked sensor	Must be perpendicular to the tube axis
Less impact on AEC for easy placement	Small dense sensor area with transparent cover	Larger detector with less transparency requires more attention for positioning
Easy to select beam quality to also get kVp reading	Quick Settings one swipe away	Beam quality selected by scrolling among the available beam qualities prior to measurements
CT		
No need for manual corrections	Built-in temperature and pressure compensation	Same benefit
Relevant measurement parameters included	Measures time	Does not measure time. Need to use R/F detector
Additional valuable information about exposures	Dose rate wave forms	Does not display wave forms
Handles high power machines and low dose rate applications	Larger dynamic range	Lower range
Enables CBCT measurement in CTDI phantom in one measurement	Stop delay setting up to 30 seconds	Max calc. delay string of 7 seconds
Light		
Linear response even in very low light conditions	Larger dynamic range	Lower range
Easier to measure perpendicular to the screen and on a fixed position	Improved ergonomics	Design based on older light detector
Meets international standards. Less interference when measuring on a distance from the source. Handles different LCD/LED panels correctly.	Smaller aperture angle, 5 degrees	Larger aperture angle
Survey		
Just connect and measure	No settings	Must select R/F, MAM or Nuclear range before measuring
Great visualization of how high the intensity is in the environment	Real-time dose rate bar in the display with sound	3-row, monochrome alpha numerical display
Can be used in environments where the temperature is changing over time during a measurement	Temperature compensated in production	Needs constant temperature during a measurement to perform well
Can be set to trigger manually as well as on radiation and therefore be used as a low dose rate meter	Auto trig mode (< 5 µGy/h) and Manual mode	Only Manual trig mode
Shows mean energy which gives a better understanding of the radiation environment	Measurement parameter Mean energy	Does not show mean energy
Software		
New base unit features can be introduced without returning the instrument	Update software via internet	Base unit can only be upgraded by factory
Service		
Only the sensor/s needed during service	Base unit independent from sensors	Complete system needs to be sent in for service

To learn more about how the X2 can help you contact your sales representative.