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X-RAY SENSOR SIGNAL PROCESSOR AND X-RAY COMPUTED
TOMOGRAPHY SYSTEM USING THE SAME

ABSTRACT OF THE DISCLOSURE

An X-ray sensor signal processor including capacitors 114 for removing DC components (dark currents) from output signals of semiconductor sensors 21 to 2n detecting pulse-like X-rays passed through an object, and integrators (each of which is constituted by a combination of an operational amplifier 115, a resistor 116 and a capacitor 117) for integrating the output signals of the X-ray sensors after removal of the DC components by the capacitors 114. By this, a value proportional to the average number of photons in X-rays can be obtained even in the case where a small number of incident photons are given, and an X-ray CT system using the X-ray sensor signal processor.

Figure 1