

Michigan Department of Licensing and Regulatory Affairs Radiation Safety Section



Dosimetry for Dental X-ray Machines

Type of Machine	Policy	Rationale
Intraoral Panoramic Cephalometric	Dosimeters are not required.	The Ionizing Radiation Rules Governing the Use of Radiation Machines do not require dosimeters for intraoral, panoramic or cephalometric machines.
Dental CT	Dosimeters are not required.	Dental CT machines are not specifically mentioned in the <i>Rules</i> . These are low-power machines with radiation scatter levels only slightly higher than panoramic machines and are specifically exempted under part 15.
Dental tomography machines that operate at tube currents less than 100 mA	Dosimeters are not required.	Dental tomography machines that operate at tube currents less than 100 milliamperes are also low-power machines with scatter levels similar to cephalometric machines.
Dental tomography machines that operate at tube currents of 100 mA or greater	Dosimeters are required.	Dental tomography machines that operate at tube currents of 100 milliamperes or greater are similar to medical x-ray machines. These machines are required to meet the requirements of Part 7, Medical X-Ray Installations.