DoseMonitor

Automated, PACS-based radiation dose management software providing enterprise-wide visibility, patient dose history, and real-time alerts for all imaging modalities.

https://example.com/1762583716454

Overview

DoseMonitor, developed by PACSHealth, is an automated, enterprise-wide, vendor-neutral software solution for patient radiation dose data collection, aggregation, and reporting. It is designed to help healthcare facilities of all sizes manage the risks of overexposure, optimize patient dose, improve consistency of image quality, and comply with evolving regulatory standards.

Product Overview and Key Benefits

The software provides immediate, enterprise-wide visibility into patient dose exposure across multiple modalities (CT, XA, DR, MG, NM, PET, MR) and multiple PACS systems, even across different departments and facilities. Its PACS-based automated system ensures data collection requires no change in clinical workflow, minimizing staff involvement and reducing the potential for error. The single-server, browser-based design facilitates rapid implementation and conserves IT resources, offering a low total cost of ownership with upgrade-inclusive maintenance.

Main Features and Capabilities

Patient Dose History & Alerts: Maintains a complete, real-time patient historical dose repository. Customizable, real-time alerts can be set for any system parameter (e.g., dose value, procedure type) and sent via email or HL-7 when a patient's history exceeds a facility's threshold.

Global Dose Registry™: Allows users to compare local dose metrics (by device, operator, procedure, etc.) against a global database of millions of anonymized studies for real-time benchmarking and quality assurance.

Advanced Dose Analytics: Includes exam-specific Organ Dose calculations using Monte Carlo data and over 50 phantoms (auto-selected by BMI, sex, pregnancy status), as well as Peak Skin Dose mapping and contrast injector support.

Reporting & Compliance: Offers robust, user-defined reporting capabilities for QA, utilization, variance analysis, and modality reporting. It is a certified software partner with the ACR for automated data upload to the Dose Index Registry (DIR).

Vendor Neutrality: Supports all major imaging modalities (CT, XA, DR, MG, NM, PET, MR) and is compatible with all PACS vendors.

Target Users and Use Cases

Target Users include medical physicists, radiologists, radiographers, radiology administrators, and hospital management. **Primary Use Cases** are managing radiation dose effectively, adapting to new technologies, meeting regulatory standards (e.g., CMS, Euratom), identifying outlier devices and procedures, providing staff education and training opportunities, and ensuring data integrity and compliance across a health system.

Key Features

- Automated Patient Dose History Repository
- Real-time Customizable Alerts & Notifications
- Global Dose Registry™ Benchmarking
- Exam-specific Organ Dose Calculations
- Multi-Modality & PACS Vendor Neutral Support
- Automated ACR DIR Data Upload
- Robust Reporting & Analytics
- Peak Skin Dose Mapping & Contrast Injector Support

Pricing

Model: enterprise

Enterprise subscription model, typically priced per hospital per year based on study volume. Pricing includes unlimited modality connections, user and workstation licenses, and all software upgrades/updates. (Average cost cited in 2017 was £10,000 to £15,000 per hospital, per year).

Target Company Size: startup, small, medium, enterprise

Integrations

ACR Dose Index Registry (DIR), RIS (Radiology Information System), EMR (Electronic Medical Record), HL-7 compatible systems, Dictation/Transcription systems

Compliance & Certifications

ACR DIR Certified, 2013/59/Euratom Compliant, CMS Compliant, ISO 9001:2015, HIPAA
