DICOM Correction Proposal

STATUS	Final Text
Date of Last Update	2026/09/12
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Submission Date	2025/09/24

Correction Number CP-2590
Log Summary: Dose Calculation Model Name
Name of Standard PS3.3, PS3.6, PS3.15 2026c
Rationale for Correction: CP-2428 introduced the RT Dose Calculation Model Macro into the standard. In a treatment planning system, the combination of the selected algorithm and the measured beam data together creates the calculation model that needs to be commissioned and eventually approved for clinical use. Treatment planning system can have multiple algorithms for calculating the dose. The same dose calculation algorithm can be used in multiple calculation models which can be configured using different measurement data. E.g., in a clinic, model 'A' could be approved for clinical use while model 'B' could be under commissioning even if the underlying algorithm within 'A' and 'B' would be the same. The model 'B' could e.g., contain more recent measurements with done with better measuring equipment. During the development of the CP-2428, the name of the calculation model got dropped. This CP introduces it back.
Correction Wording:

Update PS 3 Table C.36.2.5.1-1

C.36.2.5.1 RT Dose Calculation Model Macro

The RT Dose Calculation Model Macro describes the **calculation model, its** algorithm and parameters used for calculating a dose distribution.

Table C.36.2.5.1-1. RT Dose Calculation Model Macro Attributes

Attribute Name	Tag	Type	Description
Dose Calculation Model Name	**(3004,007F)**	**3**	**Name of the dose calculation model.**
Dose Calculation Algorithm Sequence	(3004,0081)	3	Software Algorithm used to calculate the dose. Only a single Item is permitted in this Sequence.
>Include Table 10-19 "Algorithm Identification Macro Attributes".			*DCID 9585 "RT Dose Calculation Algorithm Family" shall be used for Algorithm Family Code Sequence (0066,002F)*

Attribute Name	Tag	Type	Description
Commissioning Status	(3004,0082)	3	Specifies if the calculation model was commissioned when the dose data was produced. Enumerated Values: **NOT_COMMISSIONED** **COMMISSIONED**
Radiation Device Configuration and Commissioning Key Sequence	(300A,065A)	3	Keys identifying the configuration and commissioning data used as input for treatment planning of this Instance. One or more Items are permitted in this Sequence.
>Include Table 10-2, "Content Item Macro Attributes"			*Value Type (0040,A040) is constrained to Value UIDREF.* *No Baseline TID defined.*
Dose Calculation Model Parameter Sequence	(3004,0083)	3	A set of parameters used by the dose calculation model when calculating the dose. One or more Items are permitted in this Sequence.
>Include Table 10.2.1-1 "Content Item with Modifiers Macro Attributes"			*DTID 15311 "RT Dose Calculation Model Parameters"*

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Add to PS3.6, section 6

Tag	Name	Keyword	VR	VM	
(3004,007F)	**Dose Calculation Model Name**	**DoseCalculationModelName**	**LO**	**1**	

Add to PS3.15, section E.1

Attribute Name	Tag	Retd. (from PS3.6)	In Std. Comp. IOD (from PS3.3)	Basic Prof.	Rtn. Safe Priv. Opt.	Rtn. UIDs Opt.	Rtn. Dev. Id. Opt.	Rtn. Inst. Id. Opt.	Rtn. Pat. Chars. Opt.	Rtn. Long. Full Dates Opt.	Rtn. Long. Modif. Dates Opt.	Clean Desc. Opt.	Clean Struct. Cont. Opt.	Clean Graph. Opt.

Dose Calculation Model Name	**(3004,007F)**	**N**	**Y**	**X**								**C**		