

DICOM Correction Item

Correction Number		CP-449	
Log Summary: More Ultrasound Vascular Terms			
Type of Modification	Name of Standard		
Correct Value	PS 3.16-2004		
<p>Rationale for Correction:</p> <p>Clinical applications use arterial and venous branches not covered in the initial set in the DICOM Context Groups. This proposal adds new anatomical terms.</p> <p>The use of "Common Hepatic Artery" is improper with laterality and is removed from CID 12111.</p> <p>Additional vascular measurements are also added.</p> <p>It is also important to identify certain measurement modifiers (e.g., systolic/diastolic for the aorta) consistently; this is done with a change to TID 5104 incorporating elements similar to TID 5203 defined in Supplement 72.</p> <p>The codes for stenosis are changed to the more precise codes for vascular stenosis used in Supplements 76 and 77.</p>			
Sections of documents affected:			
PS 3.16 Annexes A, B, J			
Correction Wording:			

Add concept modifiers to TID 5104 in PS 3.16 Annex A

TID 5104
VASCULAR ULTRASOUND MEASUREMENT GROUP
Type: Extensible

NL	Rel with Parent	VT	Concept Name	VM	Req Type	Condition	Value Set Constraint
1		CONTAINER	\$AnatomyGroup	1	M		
2	> HAS CONCEPT MOD	CODE	EV (G-A1F8, SRT, "Topographical Modifier")	1	U		DCID (12116) Vessel Segment Modifiers
3	> HAS CONCEPT MOD	CODE	EV (125101, DCM, "Vessel Branch")	1-n	U		DCID (12117) Vessel Branch Modifiers
4	> CONTAINS	INCLUDE	DTID (300) Measurement	1-n	M		\$Measurement = DCID (12119) Vascular Ultrasound Property \$Derivation = DCID (3627) Measurement Type
5	>> HAS CONCEPT MOD	CODE	EV (R-4089A, SRT, "Cardiac Cycle Point")	1	U		DCID (12233) Cardiac Phase
6	>> HAS CONCEPT MOD	CODE	EV (R-41FFC, SRT, "Temporal period related to eating")	1	U		DT (G-A491, SRT, "Post-prandial")

Content Item Descriptions

Row 1	Specifies the anatomic context of the observations in the group.
Row 2	Details the anatomical location, e.g. proximal, middle, or distal
Row 3	The particular vessel branch, such as the inferior, medial or lateral

Row 5	Cardiac phase (systolic, diastolic), especially for aorta measurements
Row 6	Eating phase, especially for mesenteric and celiac measurements

Correct codes and add new terms to various Context Groups in PS 3.16 Annex B

Context ID 3606

Arterial source locations

Type: **Extensible** Version: **20030327_20050110**

Coding Scheme Designator	Code Value	Code Meaning
...		
SRT	T- 88F 1810	Umbilical Artery
...		

Context ID 12105

Intracranial Cerebral Vessels

Type: **Extensible** Version: **20030327_20050110**

Coding Scheme Designator (0008,0102)	Code Value (0008,0100)	Code Meaning (0008,0104)
...		
SRT	T-45300	Internal Carotid Artery
SRT	R-102BB	Internal Carotid Artery C5 segment
SRT	R-102BC	Internal Carotid Artery C6 segment
SRT	R-102BD	Terminal internal carotid artery
SRT	T-45600	Middle Cerebral Artery
SRT	R-1024F	Middle Cerebral Artery M1 Segment
SRT	R-10251	Middle Cerebral Artery M2 Segment
SRT	T-45400	Ophthalmic Artery
SRT	T-45900	Posterior Cerebral Artery
SRT	R-10253	Posterior Cerebral Artery P1 Segment
SRT	R-10255	Posterior Cerebral Artery P2 Segment

**Context ID 12107
Upper Extremity Arteries**

Type: Extensible Version: 2003032720050110

Coding Scheme Designator (0008,0102)	Code Value (0008,0100)	Code Meaning (0008,0104)
...		
<u>SRT</u>	<u>T-47260</u>	<u>Digital artery of hand</u>

**Context ID 12109
Lower Extremity Arteries**

Type: Extensible Version: 2003032720050110

Coding Scheme Designator (0008,0102)	Code Value (0008,0100)	Code Meaning (0008,0104)
...		
<u>SRT</u>	<u>R-10258</u>	<u>Common Iliac Artery Bifurcation</u>

**Context ID 12110
Lower Extremity Veins**

Type: Extensible Version: 2003032720050110

Coding Scheme Designator (0008,0102)	Code Value (0008,0100)	Code Meaning (0008,0104)
...		
SRT	T-49530	Great Saphenous Vein
<u>SRT</u>	<u>R-10259</u>	<u>Great Saphenous Vein of Thigh</u>
<u>SRT</u>	<u>R-1025A</u>	<u>Great Saphenous Vein of Calf</u>
...		
<u>SRT</u>	<u>T-48940</u>	<u>Internal iliac vein</u>
<u>SRT</u>	<u>T-4941A</u>	<u>Saphenopopliteal junction</u>
<u>SRT</u>	<u>T-4942A</u>	<u>Hunterian perforating vein</u>
<u>SRT</u>	<u>T-49426</u>	<u>Cockett's perforating vein</u>
<u>SRT</u>	<u>T-49424</u>	<u>Boyd's perforating vein</u>

Context ID 12111
Abdominal Arteries (lateral)

Type: **Extensible** Version: **2003032720050110**

Coding Scheme Designator (0008,0102)	Code Value (0008,0100)	Code Meaning (0008,0104)
...		
SRT	T-46421	Common Hepatic Artery
...		
SRT	T- 88 F1810	Umbilical Artery
...		

Context ID 12112
Abdominal Arteries (unilateral)

Type: **Extensible** Version: **2003032720050110**

Coding Scheme Designator (0008,0102)	Code Value (0008,0100)	Code Meaning (0008,0104)
...
SRT	T-46422	Proper Hepatic Artery
SRT	T-46423	Right Branch of Hepatic Artery
SRT	T-46427	Left Branch of Hepatic Artery

Context ID 12116
Vessel Segment Modifiers

Type: **Extensible** Version: **2003032720050110**

Coding Scheme Designator (0008,0102)	Code Value (0008,0100)	Code Meaning (0008,0104)
...		
SRT	R-1025B	Dilated portion of segment

Context ID 12121
Vascular Indices and Ratios

Type: **Extensible** Version: **2003032720050110**

Coding Scheme Designator (0008,0102)	Code Value (0008,0100)	Code Meaning (0008,0104)
LN	20167-3	Acceleration Index

Coding Scheme Designator (0008,0102)	Code Value (0008,0100)	Code Meaning (0008,0104)
SRT	G-0371 <u>R-101BA</u>	% <u>Lumen</u> Area Reduction <u>Stenosis</u>
SRT	G-0372 <u>R-101BB</u>	% <u>Lumen</u> Diameter Reduction <u>Stenosis</u>
LN	12008-9	Pulsatility Index

Note: This Context Group formerly included SNOMED codes G-0371 and G-0372, which have been replaced by R-101BA and R-101BB, respectively. See Annex J.

Context ID 12122
Other Vascular Properties

Type: Extensible

Version: 2003032720050110

Coding Scheme Designator (0008,0102)	Code Value (0008,0100)	Code Meaning (0008,0104)
LN	20168-1	Acceleration Time
LN	20217-6	Deceleration Time
SRT	G-0364	Vessel lumen diameter
SRT	R-1025C	Vessel Intimal Diameter
SRT	R-1025D	Vessel Intimal Cross-Sectional Area
SRT	G-0365	Vessel outside diameter
SRT	G-0366	Vessel lumen cross-sectional area
LN	33878-0	Volume flow
SRT	R-1025E	Vessel depth from surface
LN	20247-3	Peak Gradient
LN	20256-4	Mean Gradient
SRT	R-1025F	Length of Segment

Add replacement terms to Annex J

SNOMED DICOM Microglossary Retired Codes

Retired Code Value	Code Meaning	Replacement Code (SNOMED)	Notes
...			
<u>G-0371</u>	<u>% Area Reduction</u>	<u>R-101BA</u>	<u>Lumen Area Stenosis</u>
<u>G-0372</u>	<u>% Diameter Reduction</u>	<u>R-101BB</u>	<u>Lumen Diameter Stenosis</u>

Modify PS3.16 Annex G

Annex G English Code Meanings of Selected Codes (Normative)

Coding Scheme Designator (0008,0102)	Coding Scheme Version	Code Value (0008,0100)	Code Meaning (0008,0104)
SRT		R-101BA	vessel lumen cross sectional area reduction lumen area stenosis
SRT		R-101BB	vessel lumen diameter reduction lumen diameter stenosis