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MINUTES  
 DICOM WG-06 Base Standard  
 November 4-8, 2019  
 MITA HQ, Arlington, VA

Presiding Officers: Bjorn Nolte, Siemens Healthineers, Chair  
 David Clunie, PixelMed, DICOM Editor  
 DICOM Secretariat Luiza Kowalczyk, MITA/NEMA

| Present | First Name | Last Name | Organization           | Voting Status | Nov 4 | Nov 5 | Nov 6 | Nov 7 | Nov 8 |
|---------|------------|-----------|------------------------|---------------|-------|-------|-------|-------|-------|
| Phone   | Nicholas   | Bevins    | AAPM                   | Observer      | P     |       |       |       |       |
| Phone   | Donald     | Peck      | AAPM                   | Observer      | P     | P     |       |       |       |
| Phone   | Paul       | Seifert   | Agfa HealthCare        | Voting        | P     | P     |       |       |       |
| Phone   | Christof   | Schadt    | Brainlab AG            | Observer      |       | P     | P     | P     | P     |
| Present | Kevin      | O'Donnell | Canon                  | Voting        | X     | X     | X     | X     | X     |
| Phone   | Jim        | Percy     | Elekta Inc.            | Observer      |       |       | X     | P     | P     |
| Phone   | Rob        | Horn      | Fairhaven Technologies | Voting        | P     | P     | P     |       |       |
| Present | Steven     | Nichols   | GE Healthcare          | Alt. Voting   | P     | P     |       |       |       |
| Phone   | Francisco  | Sureda    | GE Healthcare          | Alt. Voting   | P     |       |       |       |       |
| Present | Makato     | Suzuki    | JIRA                   | Alt. Voting   | X     | X     | X     |       |       |
| Phone   | Harry      | Solomon   | Laitek                 | Observer      | X     |       |       |       |       |

|         |             |                 |                         |             |   |   |   |   |   |
|---------|-------------|-----------------|-------------------------|-------------|---|---|---|---|---|
| Present | Luiza       | Kowalczyk       | MITA                    | Observer    | X | X | X | X | X |
| Present | Lisa        | Spellman        | MITA                    | Alt. Voting | X | P | P | P | P |
| Phone   | Wim         | Corbijn         | Philips                 | Voting      | P | P | P | P | P |
| Phone   | David       | Clunie          | PixelMed Publishing     | Voting      |   | X | X | X |   |
| Present | Bjorn       | Nolte           | Siemens Healthcare GmbH | Voting      | X | X | X | X | P |
| Phone   | Antje       | Schroeder       | Siemens Healthcare GmbH | Alt. Voting |   | P | P |   |   |
| Phone   | Brad        | Genereaux       | NVIDIA                  | Observer    | P |   |   |   |   |
| Phone   | Uwe         | Tronnier        | CSIMD                   | Observer    |   | P |   |   |   |
| Phone   | Sridhar     | Balasubramanian | Nuance                  | Observer    |   | P | P | P |   |
| Phone   | Yogalakshmi | Selvarajan      | Philips                 | Observer    |   | P | P |   |   |
| Phone   | Herve       | Hoehn           | GE Healthcare           | Observer    |   | P | P |   |   |
| Phone   | Robert      | Zollo           | Avante Technology,      | Observer    | P |   |   |   |   |
| Phone   | Andrey      | Fedorov         | Harvard University      |             |   | P | P |   |   |
| Phone   | Justin      | Ryan            | RCHSD                   | Observer    | P |   |   |   | P |
| Phone   | Allan       | Noordvyk        | Change Healthcare       | Observer    | P |   |   |   | P |
| Phone   | Jonathan    | Whitby          | Vital/Canon             | Observer    |   |   |   |   | P |
| Phone   | Elliot      | Silver          | Argentix Informatics    | Observer    |   |   |   |   | P |
| Phone   | Bill        | Wallace         | Agfa HealthCare         | Observer    | P | P | P |   |   |

#### Opening and Administrative

- The meeting was called to order at 8:30 a.m. on Monday, November 4, 2019.
- The minutes of the September WG-06 meeting were approved.
- The Secretary reviewed the antitrust rules and DICOM Patent Disclosure Policy.
- The agenda was approved.

## Report on Letter Ballots

### 1. Supplement 176 Tomotherapeutic, Multiple Fixed Source and Robotic-Arm Treatment Modalities (2<sup>nd</sup> Gen.) [WI 2007-06-B]

| <i>Ballot</i> | <i>Approve</i> | <i>Disapprove</i> | <i>Abstain</i> | <i>Comments</i> |
|---------------|----------------|-------------------|----------------|-----------------|
| Sup 176       | 19             | 0                 | 4              | 2               |

### 2. CPack-103

- The official ballot was distributed to voting members of DICOM Standard Committee September 16, 2019.
- The deadline: Monday, November 4, 2019.
- The CPack-103 has passed the ballot with the following results:

| <i>Ballot</i> | <i>Approve</i> | <i>Disapprove</i> | <i>Abstain</i> | <i>Comments</i> |
|---------------|----------------|-------------------|----------------|-----------------|
| CPack-103     | 22             | 2                 | 3              | 24              |

## Report on Correction Proposals

### SECRETARY NOTES:

- Remember that we have CP t-cons between face to face meetings so please read the minutes:
  - <https://www.dicomstandard.org/wgs/>
  - <http://dicom.nema.org/Dicom/minutes/WG-06/2019/>
- The CP excel spreadsheet is updated after each CP discussion. Make sure to always look at the latest version.
  - <ftp://medical.nema.org/MEDICAL/Private/Dicom/WORKGRPS/Wg06/2019/2019-06-03/CP-2019-11-10.xlsx>

### 3. September Voting Package, CPack-103.

- 1721 Clarification of Distances in Ion Beams
  - No comments received. Good to go.
- 1726 Add clarification note that C-FIND SCP should ignore
  - No comments received. Good to go.
- 1777 Derivation of Photometric Interpretation in STOW-RS
  - No comments received. Good to go.
- 1852 Add code for bounding box for SR
  - Good to go.
- 1867- Add codes for AI visual explanation maps
  - No comments
- 1886 Add trans-rectal to ultrasound beam path context group
  - Good to go.
- 1888 Reverse sense of all other encoding based on VR to follow
  - Good to go.
- 1890 Add more renal vessels
  - Good to go.
- 1891 Add generic echocardiography measurements missing from

- Good to go.
- 1892 Correct code meanings for body surface area codes
  - Good to go.
- 1893 Fix inconsistent Relationship Content Constraints (SR IODs from Supplement 164)
  - No comments received. Good to go.
- 1894 Add translocator protein tracers
  - No comments received. Good to go.
- 1895 Add presentation address to file meta information for DULP and Web Services
  - No comments received. Good to go.
- 1899 Number of Frames attribute should never have a value of zero
  - No comments received. Good to go.
- 1900 WADO-RS Transfer Syntax to use when cannot be decompressed
  - No comments received. Good to go.
- 1901 Return in query response what Transfer Syntax is available for retrieval
  - Good to go.
- 1902 Some IODs that need it are missing the Synchronization Module
  - Good to go.
- 1903 Add laterality parameter to TID 300
  - Good to go.
- 1904 Correct code for anatomical structure in CID 7150 and CID 9501
  - No comments received. Good to go.
- 1905 Additional Category codes for CID 9502
  - No comments received. Good to go.
- 1906 Add Laterality to Treatment Site Code
  - Good to go.
- 1907 UPS-RS Support for Query Only
  - Good to go.
- 1909 Add Institution and Admission attributes to UPS
  - No comments received. Good to go.
- 1910 Add "all other attributes" row for Patient Demographics to UPS
  - Good to go.
- 1911 Add Reason For Requested Procedure Query Keys to UPS
  - Good to go.
- 1912 Correct Retired Attributes in PS3.15 E
  - Good to go
- 1913 Coding Scheme Version requires Coding Scheme Designator to be present
  - Good to go.

**CPack-103 was approved on 11/5/2019, except for the following CPs below.**

- **1614** Add a bulkdata subresource to study, series and instance WADO-RS
  - WG-27 needs to review comments received during the ballot process. It will be revisited in January 2020. See the CP for details.
- **1868** Update PS3.18 Status Codes to be correct HTTP
  - It is on hold. It requires further discussion with Jim.
- **1869** Update PS3.18 Header Fields to include origin server and user agent permissions requirements
  - It is on hold. It requires further discussion with Jim.
- **1871** Improve Notification Connections

- It is on hold. It requires further discussion with Jim.
- **1872** Improvements to Worklist Service
  - WG-06 is proposing cancel this CP, not adding anything new.
  - Follow up with Jim.
- **1885** Correct conflict in number of values between General Anatomy Optional and Required Macros causing conflict in DX introduced by CP 1744
  - **Cancelled**

**4. November Voting Package, CPack-104.**

The 2 CPs below were not included in CPack-104.

- CP-1916 The grammar for the “quality” Query Parameter is wrong
  - It was not uploaded on the ftp server, so it was not discussed during this meeting.
- CP-1917 Clarify Character Set handling
  - Requires further discussion with Jim Philbin.

The following CPs were approved for a Letter Ballot, CPack-104.

| CP#  | Title   |
|------|---|
| 1954 | Fix inconsistent DIMSE status code meaning  |
| 1953 | Add more specific tumor graft histologic types  |
| 1952 | Remove common name from taxonomic rank code meanings  |
| 1949 | Specify the identity window level values  |
| 1948 | Part 10 Format security considerations  |
| 1947 | Add security considerations for encapsulated formats  |
| 1946 | Update Part 15 Annex H (add conformance)  |
| 1945 | Add coding scheme designator for RadElement   |
| 1943 | Incorrect Frame Time's value for Video Type 60 Hz HD  |
| 1942 | Revise Part 15 Annex F (DHCP)   |
| 1941 | Change name of TID 11003 for better comprehensibility in context with changes of CP-1937 in the cases of non-automated administration |
| 1940 | Correction of a incorrect datetime value.   |
| 1939 | Semantic issue in consumable parts.   |
| 1938 | Inconsistent representation of CODE values within example MMMM.1 in part 17   |
| 1937 | Extend semantic of TID 11003 to be more flexible to the needs and correct node numbering in example                                   |
| 1936 | Correction of "Adverse Event" child node relation to parent node within TID 11021 and 11022   |
| 1935 | Correction of child node relation to parent node within part 16, TID 11005  |
| 1933 | Add PIRADS V2.1 base PZpm sector anatomy  |
| 1932 | Add Series Date and Time to missing Modules   |
| 1931 | COORD3D should be allowed for Planar ROIs in TID 1411 and be more flexible for Volumetric ROIs in TID 1410                            |
| 1930 | Erectile dysfunction test drug administration   |
| 1929 | Add precoordinated measurement CODE content item parameter to TID 300   |
| 1928 | Add multi-energy CT attributes to de-identification profile   |
| 1925 | PS3.18 Section 8.3.1 has syntax mistakes  |
| 1924 | PS3.18 Section 5.1.1 does not have a definition for NON-ZERO-DIGIT  |
| 1922 | Update PS3.19 WADO-RS and STOW-RS to PS3.18 Studies Service Retrieve and Store  |

|      |   |
|------|---|
| 1920 | Padding in DICOM JSON and XML (Native) Models   |
| 1919 | Clarify the Media Type sections for Studies Service   |
| 1889 | Recently added OV, SV and UV VRs were not included in PS3.18 or PS3.19                        |
| 1862 | Necessity of returning the Specific Character Set (0008,0005) attribute in a QIDO-RS response |
| 1861 | Consistency between DICOM VR definition of DS & IS, and JSON Value Representation             |
| 1479 | Update PS3.4 for expanded Code Sequence   |

## 5. Assigned CPs

- CP1733 Add Primary Anatomic Structure Context Group for Pathology.
  - A candidate for the 2020 January Voting Package.
- **CP1944**
  - WG-06 is proposing to cancel this CP.
  - Circulate to WG-06 and make a decision in January 2020.
- CP1955 De-identification and datetime stamps in UIDs
  - A candidate for the 2020 January Voting Package.
- CP1956 Update DICOM to reflect changes in IHTSDO SNOMED CT-DICOM Subset for JUL 2019 INT Release
  - A candidate for the 2020 January Voting Package.
- CP1957 More replacements of DICOM codes for headings with LOINC
  - A candidate for the 2020 January Voting Package.
- CP1958 Add Coronary Artery CT Fat Attenuation Index (FAI)
  - A candidate for the 2020 January Voting Package.
- CP1959 Add codes for more biliary tree structures
  - A candidate for the 2020 January Voting Package.
- CP1960 Correct some incorrect assignments of unilateral versus lateral vessels
  - A candidate for the 2020 January Voting Package.
- CP1961 Allow more general ultrasound report document titles
  - A candidate for the 2020 January Voting Package
- CP1963 Add codes for selected laterality precoordinated anatomical structures
  - A candidate for the 2020 January Voting Package
- CP1965 Update NTP profile in PS3.15
  - A candidate for the 2020 January Voting Package
- CP1973 There are different names used for the same UID in different parts of the standard. Same UIDs should be referred to by the same name.
  - A candidate for the 2020 January Voting Package
- **CP1975** Active image region overlay
  - Assigned
- CP1976 Add reference to ImageType as alternative to FrameType for Sequences added to CT Image
  - A candidate for the 2020 January Voting Package
- CP1977 Correct Multi-energy Sequence Nesting
  - A candidate for the 2020 January Voting Package
- **CP1978** Media Type issues
  - Assigned. It requires further discussion. Jim.
- CP1979 Value Set Constraint of row 4 within TID11005 has to be changed from CID 230 “Yes-No” to CID 231 “Yes-No Only”.
  - A candidate for the 2020 January Voting Package

- CP1980 Change Requested Type attribute of row 15 within TID 11004 from Mandatory (M) to Optional (U)
  - A candidate for the 2020 January Voting Package

## 6. New CPs

| CP#  | Title  | Submitted by & Assigned to                    | Discussion  | State |
|------|--|---|---|-------|
| 1993 | OB-GYN Ultrasound code and template updates            | Submitter David Clunie, Assignee David Clunie | Meeting: 2019-11-05<br>cp_dac527_obgynultrasou<br>ndcodeupdates.pdf   | New   |
| 1994 | Primary Anatomic Structure Sequence has no CID defined | Submitter Wim Corbijn, Assignee ???           | Meeting: 2019-11-08<br>cp_wc27_Primary<br>Anatomic Structure<br>Sequence.docx<br><b>Note:</b> The number was given via email. | New   |

### Report on Supplements

**SECRETARY NOTE:** All documents are uploaded on the ftp server in the directory of WG-06. Please refer to documents for more technical details.

<ftp://medical.nema.org/MEDICAL/Private/Dicom/WORKGRPS/Wg06/2019/2019-11-06/Sups>

## 7. CP-1927\_Patient\_Sex\_and\_Gender

- Reviewed and discussed. (WG-06 GSE)
- <https://meteor.aihw.gov.au/content/index.phtml/itemId/635994>
  - <ftp://medical.nema.org/MEDICAL/Private/Dicom/WORKGRPS/Wg06/2019/2019-11-04/CPs/Assigned>
  - cp1927\_10\_Patient\_sex\_and\_gender.doc

### Decision:

- CP instead of Supplement.

### Next steps:

1. Waiting for the Vocab so we would align with them
2. Some text will be updated based on HL7 recommendations.
3. WG-06 GSE next call: Tuesday, November 19, 2019, 9:00-10:00 US ET.
  - a. Dial-in information: <http://workspaces.nema.org/dicom/Lists/Calendar/calendar.aspx>

## 8. Supplement XXX Prostate Imaging SR

- Reviewed and discussed (WG-08)
- It received a number "220".
- The scope was explicitly narrowed down to MRI only.
- The plan is to refine the supplement to be ready for the next review and release for public comment in January 2020.
- Documents can be found: <ftp://medical.nema.org//MEDICAL/Private/Dicom/WORKGRPS/Wg06/2019/2019-11-04/Sups/Sup220/>

## 9. Supplement 208 DICOM Encapsulation of OBJ Models for 3D Manufacturing and Virtual Reality

- Reviewed and discussed (WG-17 3D)
- It was pre-approved for Letter Ballot on Friday, November 8, 2019.

- No quorum to approve Sup 208 during the meeting. Luiza to send a ballot via-email.
- Sup 209 will return for a review (Pre-Final Text) in January 2020.

**10. Supplement 219 Simplified SR in JSON for AI results**

- Reviewed and discussed. (WG-23)
- Documents can be found:  
<ftp://medical.nema.org/MEDICAL/Private/Dicom/WORKGRPS/Wg06/2019/2019-11-04/Sups/Sup220/>

**Decision:**

- ❖ It was approved for Public Comment on 11/7.
- ❖ WG-23 is going to address and resolve any received public comments on Sup 219 between now and January WG-06 meeting.
- ❖ Sup 219 will return for a review (Pre-Letter Ballot) in January 2020.

**11. Supplement 211 DICOMweb Support for the application/zip Media Type [WI 2018-09-C]**

- Reviewed and discussed. (WG-27)

**Decision:**

- ❖ Sup 211 will return for a review (Pre-Public Comment) in January 2020.

**12. Supplement 212 XA Protocol Storage [WI 2018-09-A]**

- Reviewed and discussed. (WG-02)

**Decision:**

- ❖ Sup 212 will return for a review (Pre-Public Comment) in January 2020.

**13. Supplement 209 DICOM Conformance Statement [WI 2017-04-F]**

- Reviewed and discussed.
- Reserve a 2-hour slot for 2020 January.
  - Discuss any issues between now and then.

**14. Supplement 176 Tomotherapeutic, Multiple Fixed Source and Robotic-Arm Treatment Modalities (2<sup>nd</sup> Gen.) [WI 2007-06-B]**

- Reviewed and discussed. (WG-07)
- Letter Ballot comments were addressed.
  - Still to resolve: Controversial table RT position , CODES DEFINITIONS . WG-06 is comfortable with the rest of the content.

**Decision:**

- It will return for a review (Pre-Final Text) in November 2019.

**15. Supplement 199 RT Radiation Records (2<sup>nd</sup> Gen) [WIP 2007-06-B]**

- Reviewed and discussed. (WG-07)

**Decision:**

- ❖ It will return for a review (Pre-Public Comment) in January 2020. .

**16. HL7 Coordination**

- Jonathan gave an update on activities of WG-20 II.
- Presentation can be found:  
<ftp://medical.nema.org/MEDICAL/Private/Dicom/WORKGRPS/Wg06/2019/2019-11-04/HL7-Coordination>
  - Week of May TC215 , if WG-10 wants , 30 minutes. Follow up with Jonathan

**New Business**

**Future Meetings**



### CP t-cons 2019:

**Action item:** Send a doodle poll to schedule a 2-hour CP t-con-Luiza

Dial in info: <http://workspaces.nema.org/dicom/Lists/Calendar/calendar.aspx>

### In-Person 2020:

- January 13-17, 2020, MITA HQ, Arlington, VA, USA
  - <ftp://medical.nema.org/medical/Private/Dicom/WORKGRPS/Wg06/2020/2020-01-13/>
- March 30-April 3, 2020 Takamatsu, Japan
  - DATES:** Monday-Friday, March 30-April 3, 2019
  - TIMES:** Monday-Thursday 09:00-17:00  
Friday 09:00-13:00
  - LOCATION:** Takamatsu Chamber of Commerce and Industry in Japan  
2-2-2 Ban-cho, Takamatsu-shi,  
Kagawa 760-0017, Japan  
<http://www.takacci.or.jp>

The Outlook invitation and PPT with details on the meeting have been uploaded in the March meeting folder.

- June 15-19, 2020, MITA HQ, Arlington, VA, USA
- August 31-September 4, 2020, MITA HQ, Arlington, VA, USA
- November 9-13, 2020, MITA HQ, Arlington, VA, USA

### Next Meeting Agenda

An agenda plan was prepared for the next meeting. It was posted as < Agenda-plan-DICOM-WG06-Jan-2020 .xlsx in the January 2020 meeting folder.

### Preliminary Agenda for January:

Sup 176Sup 199, Sup 208, Sup 209, Sup 210, Sup 211, Sup 212, Sup 214, Sup 218, Sup 219, and Sup 220 Sup XXX  
Dermoscopy IOD

<ftp://medical.nema.org/medical/Private/Dicom/WORKGRPS/Wg06/2020/2020-01-13/>

### Adjournment

The meeting recessed at 17:30 daily and resumed at 8.30 a.m. the next day. The meeting was adjourned at 12:30 local time on Friday, November 8, 2019.

Submitted by Luiza Kowalczyk, DICOM Secretary

Reviewed by Clark Silcox, Legal Counsel, November 18, 2019.