Minutes

Discrete Positioning and Delivery Workflow (DPDW)

Conference Call

February 17, 2015

11:00am – 12:30pm EST

DPDW Subgroup Chair:

Thomas Schwere, Varian Medical Systems  
([thomas.schwere@varian.com](mailto:thomas.schwere@varian.com))

IHERO Task Force Co-Chairs

Dick Fraass, Ph.D., FAAPM, FASTRO, FACR

John Buatti, MD

**Mission Statement:** *The American Society for Radiology Oncology (ASTRO) has formed a multi-society Task Force to undertake an initiative to promote the Integration of the Healthcare Enterprise (IHE) – Radiation Oncology (RO), fostering seamless connectivity and integration of radiotherapy equipment and the patient health information systems. The Task Force will include members from ASTRO, RSNA, American Association of Physicists in Medicine (AAPM), the American College of Radiology (ACR) and the Medical Imaging and Technology Alliance (MITA). In addition, members of the International community have also been invited to participate in IHE-RO. The IHE-RO Task Force, in close collaboration with radiotherapy product manufacturers, will develop appropriate integration profiles for radiation therapy and setup a demonstration of seamless communication among the full array of radiotherapy products.*

**In Attendance:**

Stephen Vastagh (Medical Imaging)

Crystal Carter (ASTRO)

Luiza Kowalczyk (Medical Imaging)

Thomas Schwere (Varian)

Sanjay Bari (Elekta)

Harold Beunk (ICT)

Chris Pauer (Accuray)

Martin Vonach (Brainlab)

Rickard Holmberg (RaySearch)

Bruce Curran (Brown Univ. / ASTRO)

# Call to Order

The meeting was started at 11:05 EST.

# Monthly TCons

Stephen mentioned that Tuesdays some other DICOM working groups have their regular meetings. Therefore it might become difficult to have the DICOM web meeting available. The group should look for other web meeting possibilities. However, the March TCon (March 24, 2015) can be assured.

# Face-to-Face Meeting

T. Schwere informed that the March 2015 meeting in Washington is canceled due to the unavailability of some core people.

An alternative would be to have the meeting in parallel to the WG6 meeting June 15-19 2015 in Barcelona or the week after the WG6 meeting June 22-26 2015.

Stephen mentioned that there it will anyway be hard to find meeting rooms in Barcelona. He proposed to find another company for hosting this meeting (similar to the last DPDW meeting at IBA in Brussels).

Stephen also mentioned that he does not have a budget if the meeting runs under IHE-RO.

T. Schwere to send out an email announcing the face-to-face meeting together with some possible dates. Recipients shall be requested to express their willingness to participate. Audience of the email should also include the Brussels participants.

Stephen to provide the roster of the Brussels meeting.

# Transactions

T. Schwere introduced the group on the rework on transaction RO-DPD-219. Basically the creation of a new Treat UPS/BDI was removed. However, this again led to a long discussion about when an in-session continuation is possible and when a regular resumption over TMS is more indicated.

* If TDD can solve the issue without requiring any other actor 🡪 in-session continuation.
* Harold raised the question, how the PPAS/PPRS/PPCRS know for which radiation/isocenter the patient should be positioned.
* The group decided to have one set of UPS (acquisition, registration, correction, treatment) per isocenter.

# General Design Topics

## New Workflow Notification Service

H. Beunk introduced the group about the application hosting as described in DICOM part 19. To make this applicable to the UPS, the states of the UPS would need to be extended. There is no chance to get an agreement for that from WG6. Therefore the additional states are rather artificial states internal to the actors only.

The notification mechanism could make use of the generic N-ACTION/ N-EVENT-REPORT publish/subscribe mechanism.

# Other Business

## Next DPDW TCon

Tuesday, March 24, 2015: 11:00am – 12:30pm EST.

# Adjournment

The meeting was adjourned at 12:30 EST.

Appendix A: Administration and Process Information

Documents are published at the following locations. If you have problems in accessing the document, please contact the Chair ([ulrich.busch@varian.com](mailto:ulrich.busch@varian.com)).

## Process of Authoring:

Steps:

1. Download a local copy of the document from locations below
2. Open this copy and remove all change bars
3. Ensure, that Changes Bars are switched on
4. **Make your changes**
5. Provide the updated version to the Chair

## Location of Documents:

DPDW Subgroup Minutes

<http://wiki.ihe.net/index.php?title=RO_DPDW_WorkingGroup>

DPDW Profile

The DPDW Profile is an IHE-RO document.

The current version is available in the IHE-RO Org Wiki:

<http://www.ihe-ro.org/>

Please find the current document under this page:

<http://www.ihe-ro.org/doku.php?id=doc:profiles>

Supp 160

DICOM Supplement 160 (Patient Positioning and Workflow) in s DICOM WG-07 document.

The current version is available at the DICOM ftp server:

<ftp://d9-workgrps:goimagego@medical.nema.org/MEDICAL/Private/Dicom/WORKGRPS/WG07/Supp160>

## Mailing List:

The mailing list for the DPDW subgroup is:

[iherodpdw2015@aapm.org](mailto:iherodpdw2015@aapm.org)

Appendix B: Task Assignments

Per end this TCon (2015-01-27).

| **No** | **TX / Area** | **Old Number** | **Title** | **Group** | **Owner** |
| --- | --- | --- | --- | --- | --- |
| 1 | ./. | ./. | Use Case Delivery-Device Independent Imaging |  | David Wikler |
| 2 | RO-DPD-200 | RO-DPD-01 | Worklist Query for Positioning Acquisition | Acquisition | Martin Vonach |
| 3 | RO-DPD-201 | RO-DPD-02 | Retrieve Device Position Information | Acquisition | Martin Vonach |
| 4 | RO-DPD-202 | RO-DPD-03 | Request RT Patient Position Correction | Correction | Martin Vonach |
| 5 | RO-DPD-203 | RO-DPD-04 | Store RT Patient Position Modification Instruction | Correction | Martin Vonach |
| 6 | RO-DPD-204 | RO-DPD-05 | Store RT Repositioning Results to Object Storage | Correction | Martin Vonach |
| 7 | RO-DPD-205 | RO-DPD-06 | Worklist Query for Repositioning | Correction | Martin Vonach |
| 8 | RO-DPD-206 | RO-DPD-07 | Notify on Radiation Delivery Status Change | Delivery | Thomas Schwere, Sanjay Bari |
| 9 | RO-DPD-207 | RO-DPD-08 | Retrieve RT Patient Position Correction Instruction | Correction | Martin Vonach |
| 10 | RO-DPD-208 | RO-DPD-09 | Subscribe/Unsubscribe to Treat UPS Status | UPS Notification | Thomas Schwere |
| 11 | RO-DPD-209 | RO-DPD-10 | Notify on Radiation State | Delivery | Thomas Schwere, Sanjay Bari |
| 12 | RO-DPD-210 | RO-DPD-11 | Retrieve Positioning Acquisition Results | Registration | Chris Pauers |
| 13 | RO-DPD-211 | RO-DPD-12 | Worklist Query for Positioning Registration | Registration | Chris Pauers |
| 14 | RO-DPD-212 | RO-DPD-13 | Worklist Query for Position Monitoring | Monitoring | Stephen Phillips |
| 15 | RO-DPD-213 | RO-DPD-16 | Store Monitoring Results to Object Storage | Monitoring | Stephen Phillips |
| 16 | RO-DPD-214 | RO-DPD-17 | UPS Final Update at Session Termination | Framework | Thomas Schwere, Sanjay Bari |
| 17 | RO-DPD-215 | RO-DPD-18 | UPS Completed / Cancelled at Session Termination | Framework | Thomas Schwere, Sanjay Bari |
| 18 | RO-DPD-216 | RO-DPD-19 | Indicate Ready for Monitoring | Monitoring | Stephen Phillips |
| 19 | RO-DPD-217 | RO-DPD-20 | Notify Device to start UPS | UPS Notification | Thomas Schwere, Sanjay Bari |
| 20 | RO-DPD-218 | RO-DPD-21 | Create Positioning Acquisition and Positioning Registration UPS | Workflow | Thomas Schwere |
| 21 | RO-DPD-219 | RO-DPD-22 | Create Treat UPS and Radiation Delivery Instruction for Continuation | Workflow | Thomas Schwere |
| 22 | RO-DPD-220 | RO-DPD-23 | Notify Treatment Session Actors on Starting Session | UPS Notification | Thomas Schwere, Sanjay Bari |
| 23 | RO-DPD-221 | RO-DPD-24 | Notify Device to stop UPS | UPS Notification | Thomas Schwere, Sanjay Bari |
| 24 | RO-DPD-222 | RO-DPD-25 | UPS Progress Update for Discrete non-Treatment Steps | UPS Notification | Thomas Schwere, Sanjay Bari |
| 25 | RO-DPD-223 | RO-DPD-26 | Worklist Query for Positioning Correction Reconciliation | Registration | Chris Pauers |
| 26 | RO-DPD-224 | RO-DPD-27 | External Verification | External Verification | Sanjay Bari |
| 27 | RO-DPD-225 | ./. | Notify Device to resume UPS | Monitoring | Stephen Phillips |
| 28 | RO-DPD-226 | ./. | Create new Positioning UPS | Monitoring | Stephen Phillips |
| 29 | RO-DPD-227 | ./. | UPS Final Update after Positioning Information Acquisition | Workflow |  |
| 30 | RO-DPD-228 | ./. | UPS Final Update after Treatment Interruption | Workflow | Thomas Schwere |