SC 24/WG 8 Convenor's Report for the WG 8 and SC 24 Plenary Meetings, Held as a series of Web Meetings

12 July – 4 August 2021

The progress of SC 24/WG 8 during 2020-21, in co-operation with the SEDRIS Organization, is summarized in this report.

WG 8 is responsible for standards relating to the representation and interchange of environmental data. The WG 8 Standards published and in development are as shown in the following table.

Standard	Current Status
ISO/IEC 9973 Procedures for registration of items	Ed. 3 published July 2013.
ISO/IEC 18023-1: SEDRIS Functional Specification (DRM and API)	Ed. 1 Amd.1 Published June 2012.
ISO/IEC 18023-2: SEDRIS Abstract Transmittal Format	Ed. 1. Published July 2006.
ISO/IEC 18023-3: SEDRIS Transmittal Format Binary Encoding	Ed. 1 Amd.1. Published June 2012.
ISO/IEC 18024-4: SEDRIS Language Binding to C	Ed. 1 Amd.1. Published June 2012
ISO/IEC 18025: Environmental Data Coding Specification (EDCS)	Ed. 2. Published February 2014.
ISO/IEC 18041-4: EDCS Language Binding to C	Ed. 3 Published May 2016.
ISO/IEC 18041-5: EDCS Language Binding to C++	In development at CD level
ISO/IEC 18026: Spatial Reference Model (SRM)	Ed. 2. Published July 2009.
ISO/IEC 18042-4: SRM Language Binding to C	Ed. 1 Amd.1. Published June 2011.
ISO/IEC 18042-5: SRM Language Binding to C++	In development at NP/WD level

Korean National Body has initiated work on the following projects:

- > 18041-5: EDCS Language Binding to C++
- > 18042-5: SRM language Binding to C++

ISO/IEC 18041-5 EDCS language bindings – Part 5 C++ is currently at Committee Draft (CD) ballot stage, and ISO/IEC 18042-5 SRM language bindings – Part 5 C++ is currently in ballot stage as a New Work item (along with Working Draft (WD) text).

Possible additional new projects have been discussed. These include:

- 18024-5: SEDRIS language binding Part 5 C++
- An XML encoding of SEDRIS transmittals, and
- STF to X3D Conversion

Since the last two items involve complex and non-trivial tasks, further discussions will be required.

WG 8 still anticipates work on 18026 (SRM) to complete the revision to Edition 3.

WG 8 also remains involved with other developments that leverage either the use of SEDRIS standards or the use of SC 24 Registration Procedures (ISO/IEC 9973). The Reuse and Interoperation of Environmental Data and Processes (RIEDP) is a SISO initiative that started in 2010 and provides two products that leverage the SEDRIS standards. The first is a SISO Guidance product, the RIEDP Data Model Foundations, which was formally published by SISO in 2018. The second is a SISO Standard product, the RIEDP Detailed Features Description, which is in development. Both Products use and reference the SEDRIS standards; in particular the DRM (18023-1), the SRM (18026), and the EDCS (18025) standards. Internal to SC 24, SEDRIS standards are also being utilized in the on-going work of other SC 24 Working Groups.

ISO TC 211 has recently announced plans for revising ISO 19135-1 – Procedures for Item Registration. ISO 19135-1:2015 specifies procedures for establishing, maintaining, and publishing registers of unique, unambiguous, and permanent identifiers and meanings that are assigned to items of geographic information. SC 24's ISO/IEC 9973 references the earlier (2005) Edition of ISO 19135. TC 211 members have expressed interest in creating a mapping or harmonization of, ISO 19135 and ISO/IEC 9973, or a single more general standard that the two committees could then implement, as long as any new version does not break any existing implementations. In April 2021, an initial meeting between members of TC 211 and SC 24 was held, in which some of these ideas were discussed.

Further information on these activities – proposed XML encoding of SEDRIS transmittals, the status of the C++ language bindings, the STF to X3D conversion, the SISO RIEDP Project, and discussions on Registration Procedure standards – will be given during the on-line WG 8 Working Session on 19 July 2021.

There have been no face-to-face WG 8 meetings since the online 2020 Plenary meeting. Work has continued, however, via web meetings and e-mail.

Respectfully submitted,

Jack Cogman, 2020 Convenor Farid Mamaghani, Acting Convenor ISO/IEC JTC 1/SC 24/WG 8: Environmental Data Representation 2021-06-28

Acting Convenor's Footnote:

WG 8 is very grateful to Dr. Jack Cogman for his 22 years of service and diligent work as the Convenor of WG 8, and his continuing support to both WG 8 and SC 24, since standing down as the WG 8 Convenor at the end of 2020.