

# Esri Response

Canada – U.S. Geospatial Software Developers Summit: Implementation of CSRS and NSRS Modernization 30 November – 1 December 2022

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### Transformations between epochs

- •Esri plans to implement the IFDM by 2025
  - Usage via toolsets in ArcGIS
  - No on-the-fly capability
- •NGS should provide:
  - Beta IFDM in OGC DMFM and GGXF format
  - Comprehensive IFDM documentation
  - NGS user software
  - Suite of comprehensive test cases
  - Details of proposed updates to IFDM
    - Backwards compatibility?

## Grid formats and model representation standards

- Esri plans to adopt OGC DMFM and GGXF
  - Esri is an active participant on OGC
  - Contributing member on DMFM project team
  - Contributing member on GGXF project team
- See previous slide for NGS deliverables

### **Timelines**

#### •GGXF

- Approximately one year after release
- Subject to Esri software release cycle

#### DMFM

- About one to two years
- Contingent on development of time-based functionality and tools

## **Projected Coordinates format**

- Esri will apply EPSG definitions
  - Likely to be Well Known Text, version 2 (WKT2)
  - Esri software has WKT2 read/write capability
  - Implementation after 1-2 software releases after EPSG release
- Esri can develop using beta information
  - CRS, transformation, or file name changes must be clearly communicated
  - Changes after software release are problematic
  - NGS/Industry collaboration on file-naming?

### Data and tool Access

- Esri prefers to have access to official NGS products
  - Will build applications and tools directly accessing these products
- •NGS/CGS to provide:
  - WKT2 versions of the transformations
  - NSRS product extents, accuracies, usages
- Likely will not use NGS/CGS web services

# Additional questions or comments

None

