CARIS[1] HIPS[2] and SIPS[3] 11.3.3

May 2020

Enhancements

HIPS and SIPS

Reference	Description
Georeference Bathymetry	
	Georeference Bathymetry would fail to process all of the track lines passed into the process if any of the track lines contained invalid depth data. The process has been updated to continue processing the track lines with valid data, even when it reports errors when encountering track lines with invalid depth data.
Import	
	The Import To HIPS Destination parameter is no longer case sensitive.
Processes	
1900603	A new command line utility, PrintfHIPSData, has been added to enable dumping the information contained in the HIPS data for multiple files stored within a track line. This utility applies to: • RMS • TrueHeaveRMS • RawDataIndex • WCDRawDataIndex • KMWCDRawDataIndex • SonarError • TideError
	Some processes that read in HIPS track lines from the HIPS file in a process model have been updated to work with the 'Track Line List' from DescribeHIPS in a ForEach helper process. The processes are: • Create VR • Populate VR • Add to VR • Copy to CSAR

Common Desktop Application

Reference	Description
Dynacart	
	Support was added for edge spatial references in Line Style instructions for dynamic cartography XSLT portrayal. This allows individual edges to be symbolized differently based on the XSL rules.

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1. This term is a trademark of Teledyne Digital Imaging, Inc. Reg. USPTO and CIPO.
2. This term is a trademark of Teledyne Digital Imaging, Inc. Reg. USPTO.
3. This term is a trademark of Teledyne Digital Imaging, Inc. Reg. USPTO.

Reference	Description
Import	
	When mapping features, using Import Selected Objects > Feature Mapping or Edit > Change > Selection > Advanced > Feature Mapping, you can now apply a <UpdateEdgeReference Flag/> mapping rule to set the Mask flag on edges. The edges to be masked can be identified based on the attribute values of the feature objects using the edges, including whether the objects are on the same side of the edge or opposite sides of the edges. It is recommended to also include the <CopyConvertibleAttributes/> parameter to avoid losing attribute values.
Process Designer	
	Process Designer can now be used to add default values to parameters. When used, the parameters shown in the Run Process Model dialog box are initially set to the specified value, but can still be changed by users.
	Process Designer can now be used to add default values to parameters. When used, the parameters shown in the Run Process Model dialog box are initially set to the specified value, but can still be changed by users. The defaults are controlled through a right-click context menu on the status box to "Add Default" or "Remove Default".
	It is now possible to define groups in the Presentation window in Process Designer. This adds organization to the options displayed, for example, in the Run Process Model dialog box. Only one layer of groups is currently displayed in the Run Process Model dialog box; any nested groups are shown as top-level groups. It is recommended to first explicitly group all options before adding sub-groups for sets of options, as any options that are not explicitly grouped are added to a default Options group.
	It is now possible to preview how a process model will appear in the Run Process Model dialog box from within Process Designer. This is available through the Tools > Preview Process menu item.
	The display of the selected item in Process Designer was updated to be more visually distinct, making it easier to identify when an item is selected.
S-100, Portrayal	
	S-101 Portrayal Files and S-101 system files have been updated to use the latest S-101 Portrayal. New portrayal rules and rule template files have been created, and svg symbol files have been updated. The portrayal logic for some feature objects have been added/updated to resolve '?' symbols. S-101 Text Placement is now supported. The following changes to S-101 portrayal rules were due to changes in S-101 attributes: • currentVelocity/velocityMaximum has been changed to speed/speedMaximum • verticalClearanceFixed/clearanceValueVertical has been changed to verticalClearanceFixed/verticalClearanceValue • sectorCharacteristic has been changed to sectorCharacteristics, various changes to sector attributes for LightSectored logic • several cases of orientation/orientationValue changed to orientationValue such as RecommendedTrack
	Edge spatial references are now supported in S-100 XSLT portrayal. When edge spatial references are applied the edges will be symbolized according to the XSL rules.

Reference	Description
Tools	
	The Run Process Model dialog box now shows the process model description at the top of the dialog box, if a description is set. The title of the dialog box is simply the name of the process model, if it is set.
	Similarly, when running a process from the Tools window, the description of the process is now shown at the top of the dialog box.
	When creating a process model with a coverage selection control, it is now possible to add a parameter for the coverage and set the default value as (Automatic). When the process model is run through the Run Process Model dialog box, this parameter is automatically set to the currently selected item in the Layers window, if it is a relevant coverage. Otherwise, the parameter is set to the first relevant open coverage.
Miscellaneous	
	The Run Process Model dialog box now validates that necessary options are specified.

Maintenance

HIPS and SIPS

Reference	Description
Backscatter	
02000363, 02000714, 02000206	When creating a mosaic with SIPS Backscatter (WMA with Area AVG), if the process encountered a track line where the backscatter file was larger than 2GB, the process would not complete and possibly cause the application to fail. Due to a limitation in the current software, rather than fail the mosaic creation, that line is skipped and a message is reported indicating such.
1901627	The Create SIPS Backscatter Mosaic process was failing to create a mosaic when a large amount of data at the beginning of a line was rejected. This has been fixed so that a mosaic is created using the accepted data for the line.
Coverages	
2000772	Surfaces with a lineage containing a duplicate track line source can now be opened and processed.
	Error handling has been changed for designated soundings. No functional changes are expected.
	The internal handling for special bands in designated soundings has been updated. No functional changes are expected.
Import	
2000142	Additional error checking has been added for importing and processing Kongsberg data to ensure bad datagrams do not cause processing to fail.
	An issue preventing more than one Kongsberg HISAS file to be imported on the first run of the import was resolved in HIPS and SIPS 11.3.2.
2000904	The Import Hypack HS2 process has been updated to use a newer version of the Hypack HS2 API library,

Reference	Description
Processes	
	Add/Create HIPS Grid processes were failing when run in a process model containing the Import HIPS from Auxiliary (Applanix SBET) process. This has been fixed.
	The Add Slope Bands process was calculating aspect bands incorrectly (off by 180 degrees) if the active z-axis convention was set to "up is positive" in the application. This has been changed so that the active z-axis convention does not affect the calculation of aspect values. Also, a slope of 0 and an aspect of -1 is now set if the area is flat. Slope and Root Mean Square Error calculations may also have been affected.
Subset Editor	
02000725, 02000881	Automatic Surface Update is now working properly when saving changes from applying a surface filter in Subset Editor.
Sound Velocity Correction	
2000362	The Tools >HIPS and SIPS >Sound Velocity Correction (Kongsberg) function was causing the application to fail. This has been fixed.

Common Desktop Application

Reference	Description
Connection	
	Error messages were being displayed when making a TMS connection and the user agent was not specified. This has been resolved and the TMS data can now be viewed.
Formats	
	An error message was being displayed when running CARIS Batch with a 000 file and verbose logging enabled, but the 000 did not have a corresponding catalogue control entry. This message has been updated to provide more information and is no longer considered an error case as the active catalogue is used instead.
Import	
	Editing an existing script in the Object Import Utility now retains the previously specified coordinate reference system and the source type (ODBC, shapefile, text).
Options	
2001073	The Tools > Options setting for whether to see all coverages in tooltips is now set to "True" (On) by default.
Process Designer	
	When more than one tool is selected in Process Designer, the properties for the highlighted item are displayed.
	Output ports are no longer shown in the Presentation window in Process Designer. These ports are used to chain the output from one process model into another model when sub-models are inserted into a larger process model, and are not shown when running the process model through the Run Process Model command or the Tools window.
Processes	

Reference	Description
	When running a process model and browsing for a file-based coverage or vector source, the filters from the base process are now used to make it easier to find relevant files.
	The Delete Band process now reports an error message if the band to be deleted is referenced by other bands in a raster surface.
Properties	
	Controls with up/down arrow buttons for floating point numbers no longer round the numbers to integers.
Selection	
	Columns containing quantity attribute values with both numbers and units, such as 1.2m as a value for the Depth Range 1 (DRVAL1) attribute, in sources such as HOB files, are now sorted in the Selection window based on the numeric value.
	Columns such as Length and Area columns in sources such as HOB files which contain numeric values but have N/A when they were not applicable to specific features were not being sorted correctly. These N/A values are now sorted as if the field was empty.
	Sorting in the selection window now ignores the case of any text entries. For example, both a and A will now be sorted before b and B.
S-100, Portrayal	
	S-101 Coastlines and Depth Contour feature objects with the QualityOfHorizontalMeasurement attribute set to 4 (approximate) now display with dashes.
Tools	
	Optional check boxes are shown more consistently for all types of options in the Run Process Model dialog box.
	Specifying certain options, such as --write-process-log,, multiple times in CARIS Batch used to give an internal error. Now, an informative error message is displayed.
	CARIS Batch command line parsing now displays an error message when a complex option is specified too many times when the complex is defined differently in CARIS Batch and in the process as shown in Process Designer. As an example, an error message is now displayed if the --shading option in RenderRaster is specified multiple times.
User Interface	
02000308, 02000356	Keyboard buttons, such as Escape, Enter, Tab and the Up and Down Arrow keys, now function properly with undocked windows. The capability now works the same as when the windows are docked. This affected, for example, the Selection and Properties windows when they were undocked.
	A general change was made to support nesting of groups of process model options in dialog boxes. No functional changes are expected.