

Description of Support Levels for File Formats in 3D Slicer				
Support Level	Description			
<i>minimal</i>	This is a file format that is only minimally supported and/or not well tested in 3D Slicer currently. Not all features of this file format are fully implemented. Only minimal support for these file formats will be provided as part of a maintenance agreement. Kitware will do a cursory investigation on any reported issues. A valid resolution of the reported issue is for Kitware to (if necessary) update the documentation to more clearly indicate that a particular aspect of the file format is not supported. Kitware will not develop new functionality under a maintenance agreement to extend/enhance a partially implemented file format			
✓	This is a file format that is supported and is covered by the maintenance agreement. The supported features of this file format are those documented in the 3D Slicer ReadTheDocs or the doxygen documentation for this particular reader/writer/importer/exporter. The file format may support more features than are implemented in 3D Slicer; those additional features are not supported by this agreement. Kitware will not develop new functionality under a maintenance agreement to extend/enhance a partially implemented file format			
Type	Built-in or Extension	File Format	Common File Extensions	Support Level
Image	Built-in	DICOM : CT, MRI, PET, X-ray, some ultrasound images; secondary capture with Slicer scene (MRB) in private tag	(.dcm)	✓
Image	QuantitativeReporting	DICOM Segmentation objects (SEG modality), Parametric Maps, Encapsulated STL (M3D modality), certain flavors of Structured Reports that follow TID 1500 Measurement report template		✓
Image	SlicerRT	DICOM RT Structure Set, RT Dose, RT Plan, RT Image		✓
Image	SlicerHeart	2D/3D/4D ultrasound (GE, Philips, Eigen Artemis, and other)		<i>minimal</i>
Image	SlicerDMRI	Tractography storage		✓
Image	SlicerDcm2nii	Diffusion weighted MR		<i>minimal</i>
Image	Built-in	NRDD General-purpose 2D/3D/4D file format	(.nrrd, .nhdr)	✓
Image	Built-in	NRDD sequence 4D Volume	(.seq.nrrd)	✓
Image	Built-in	MetalImage	(.mha, .mhd)	✓
Image	Built-in	Legacy VTK File	(.vtk)	✓
Image	Built-in	Analyze	(.hdr, .img, .img.gz)	<i>minimal</i>
Image	Built-in	Nifti	(.nii, .nii.gz)	<i>minimal</i>
Image	Built-in	Tagged image file format	(.tif, .tiff)	✓
Image	Built-in	PNG: can read single/series of frames, can write a single frame	(.png)	✓
Image	Built-in	JPEG: can read single/series of frames, can write a single frame	(.jpg, .jpeg)	✓
Image	Built-in	Windows bitmap: can read single/series of frames	(.bmp)	✓
Image	Built-in	BioRad	(.pic)	✓
Image	Built-in	Brains2	(.mask)	✓
Image	Built-in	GIPL	(.gipl, .gipl.gz)	<i>minimal</i>
Image	Built-in	LSM	(.lsm)	<i>minimal</i>
Image	Built-in	Scanco	(.isq)	<i>minimal</i>
Image	Built-in	Stimulate	(.spr)	<i>minimal</i>
Image	Built-in	MGH-NMR	(.mgz)	<i>minimal</i>
Image	Built-in	MRC Electron Density	(.mrc)	<i>minimal</i>
Image	SlicerRT	Vista cone beam optical scanner volume	(.vff)	<i>minimal</i>
Image	SlicerRT	DOSXYZnrc 3D dose	(.3ddose)	<i>minimal</i>
Image	SlicerHeart	Philips 4D ultrasound: from Cartesian DICOM exported from QLab		<i>minimal</i>
Image	SlicerHeart	GE Kretz 3D ultrasound	(.vol, .v01)	<i>minimal</i>
Image	SlicerHeart	Eigen Artemis 3D ultrasound		<i>minimal</i>
Image	SlicerHeart	Any 3D/4D ultrasound image and ECG signal: if the user obtains Image3dAPI plugin from the vendor (GE Voluson, Philips, Siemens, etc.)		<i>minimal</i>
Image	RawImageGuess	RAW volume: requires manual setting of header parameters	(.raw)	<i>minimal</i>
Image	RawImageGuess	Samsung 3D ultrasound: requires manual setting of header parameters	(.mvl)	<i>minimal</i>
Image	SlicerGSIO	Compressed video	(.mkv, .webm)	✓
Image	SlicerGSIO	IGSIO sequence metafile	(.igs.mha, .igs.mhd, .igs.nrrd, .seq.mha, .seq.mhd, .mha, .mhd, .mkv, .webm)	✓
Image	OpenIGTLink	PLUS toolkit configuration file	(.plus.xml)	✓
Image	Sandbox	Topcon OCT image file	(.fda)	<i>minimal</i>
Models	Built-in	VTK Polygonal Data	(.vtk, .vtp)	✓
Models	Built-in	VTK Unstructured Grid Data: Volumetric mesh.	(.vtk, .vtu)	✓
Models	Built-in	StereoLithography	(.stl)	✓
Models	Built-in	Wavefront OBJ	(.obj)	✓
Models	Built-in	Stanford Triangle Format	(.ply)	✓
Models	Built-in	BYU	(.byu, .g)	<i>minimal</i>
Models	Built-in	UCD	(.ucd)	<i>minimal</i>
Models	Built-in	ITK meta	(.meta)	<i>minimal</i>
Models	FreeSurfer	Freesurfer surfaces	(.orig, .inflated, .sphere, .white, .smoothwm, .pial)	<i>minimal</i>
Models	SlicerHeart	CARTO surface model	(.vtk)	<i>minimal</i>
Segmentations	Built-in	Segmentation labelmap representation: 3D volume (4D volume if there are overlapping segments) with custom fields specifying segment names, terminology, colors, etc.	(.seg.nrrd, .nrrd, .seg.nhdr, .nhdr, .nii, .nii.gz, .hdr)	✓
Segmentations	Built-in	Segmentation closed surface representation: saved as VTK multiblock data set, contains custom fields specifying segment names, terminology, colors, etc.	(.vtm)	✓
Segmentations	Built-in	Labelmap volume: segment names can be defined by using a color table.	(.nrrd, .nhdr, .nii, .nii.gz, .hdr)	✓
Segmentations	Built-in	Closed surface	(.stl, .obj)	✓

Description of Support Levels for File Formats in 3D Slicer				
Support Level	Description			
<i>minimal</i>	This is a file format that is only minimally supported and/or not well tested in 3D Slicer currently. Not all features of this file format are fully implemented. Only minimal support for these file formats will be provided as part of a maintenance agreement. Kitware will do a cursory investigation on any reported issues. A valid resolution of the reported issue is for Kitware to (if necessary) update the documentation to more clearly indicate that a particular aspect of the file format is not supported. Kitware will not develop new functionality under a maintenance agreement to extend/enhance a partially implemented file format			
✓	This is a file format that is supported and is covered by the maintenance agreement. The supported features of this file format are those documented in the 3D Slicer ReadTheDocs or the doxygen documentation for this particular reader/writer/importer/exporter. The file format may support more features than are implemented in 3D Slicer; those additional features are not supported by this agreement. Kitware will not develop new functionality under a maintenance agreement to extend/enhance a partially implemented file format			
Type	Built-in or Extension	File Format	Common File Extensions	Support Level
Segmentations	SlicerOpenAnatomy	GL Transmission Format	(.glTF)	<i>minimal</i>
Segmentations	Sandbox	Osirix ROI file	(.json)	<i>minimal</i>
Segmentations	Sandbox	sliceOmatic tag file	(.tag)	<i>minimal</i>
Transforms	Built-in	ITK HDF transform: For linear, b-spline, grid (displacement field), thin-plate spline, and composite transforms.	(.h5)	✓
Transforms	Built-in	ITK TXT transform: For linear, b-spline, and thin-plate spline, and composite transforms.	(.tfm, .txt)	✓
Transforms	Built-in	Matlab MAT file: For linear and b-spline transforms.	(.mat)	✓
Transforms	Built-in	Displacement field NRRD	(.nrrd, .nhdr)	✓
Transforms	Built-in	Displacement field MetaImage	(.mha, .mhd)	✓
Transforms	Built-in	Displacement field NIFTI	(.nii, .nii.gz)	✓
Transforms	SlicerRT	Pinnacle DVF	(.dvf)	<i>minimal</i>
Markups	Built-in	Markups JSON	(.mkp.json)	✓
Markups	Built-in	Markups CSV: legacy file format for storing point list.	(.fcsv)	✓
Markups	Built-in	Annotation CSV: legacy file format for storing markups line, ROI.	(.acsv)	✓
Scenes	Built-in	MRML (Medical Reality Markup Language File)	(.mrml)	✓
Scenes	Built-in	MRB (Medical Reality Bundle)	(.mr, .zip)	✓
Scenes	Built-in	Data collections in XNAT Catalog format	(.xcat)	<i>minimal</i>
Scenes	Built-in	Data collections in XNAT Archive format	(.xar)	<i>minimal</i>
Other	Built-in	Text	(.txt, .xml, .json)	✓
Other	Built-in	Table	(.csv, .tsv)	✓
Other	Built-in	Slicer color table	(.ctbl, .txt)	✓
Other	Built-in	ITK-Snap label description file	(.txt, .label)	<i>minimal</i>
Other	Built-in	Volume rendering properties	(.vp)	✓
Other	Built-in	Volume rendering shader properties	(.sp)	✓
Other	Built-in	Terminology: dictionary of standard DICOM or other terms	(.term.json, .json)	✓
Other	Built-in	Node sequence: sequence of any MRML node (for storage of 4D data)	(.seq.mrb)	✓