

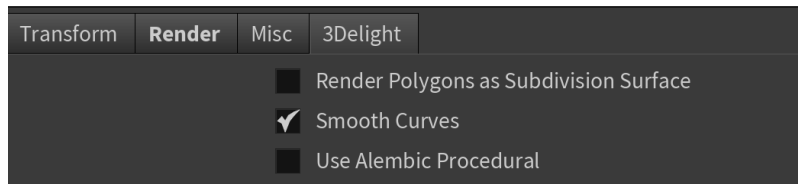
# Geometry

3Delight for Houdini supports all Houdini geometry apart from NURBs. Geometry loading from BGEO, Alembic, USD is supported as well. Packed primitives and all flavours of geometry instancing (SOP, OBJ, instancefile) are supported and rendered using 3Delight's high performance instancer.

## Delayed Loading of Geometry

When rendering file caches from disk (BGEO, Alembic, etc) 3Delight will first convert data into a NSI representation that is suitable for rendering. This approach can cause problems when exporting a sequence of NSI files because geometry contained in these cache files is duplicated in the NSI files.

This problem can be solved by using 3Delight's alembic procedural to read alembic files in a delayed manner. This feature is off by default and can be enabled inside object's properties (*Use Alembic Procedural*):



This workflow has these limitations for the time being:

- No SOP-level material assignment yet.
- You must use "Pack and Instance" when instancing alembic archives.

Note that "Render Polygon as Subdivision Surface" is correctly propagated to alembic geometry.