

Step 1 : Reproduce the bug

According to the report : try to save or load a preset to a file, the host is freezing.

Observed :

1. The host is freezing after save to a file (we can still be able to choose the file to save).
2. The file chosen is not updated after the freezing

Step 2 : Localize the item which may cause the problem

The problem can be due to :

1. The class RockyPresetSaver and RockyPresetLoader or
2. Their mother RockyEngineBase, since both Save and Load can cause the freezing

The “freezing” can probably indicate some thread error, thus it is necessary to check the step of thread.

Step 3 : Check Class RockEngineBase

The scenario defined by RockEngineBase (RockyProcessor::savePresetTo(const juce::File& inFile)):

1. Create object RockEngineBase (assume it is a) as well as initializeEngine()
2. a() <- the operator is defined to startThread()
3. run() to start triggerAsyncUpdate() and trigger handleAsyncUpdate()

I found there are something wrong :

1. There is no stopThread() in the scenario
-> Add into RockyEngineBase::~~RockyEngineBase()
2. In void RockyProcessor::savePresetTo(const juce::File& inFile) and void RockyProcessor::loadPresetFrom(const juce::File& inFile) : they defined a real object (RockyPresetSaver saver(*this, inFile);) instead of using pointer
-> Change to pointer

Step 4 : Check Class RockyPresetSaver

Message "Can't retrieve Plugin State." is obtained in the Save File after the correction in Step 3. So we must check the class RockyPresetSaver. In the RockyPresetSaver::execute(), there is a lack of mProcessor.getStateInformation(mState) (which is put in the middle of function) at the beginning. -> Move it to the beginning

Then I found that if I tried to save to a existing file, the file would not reflect to what I save. So I add a mFile.deleteFile().

These are all I have done.