CALL_MFILE

Overview

The CALL_MFILE command performs the following tasks:

- Exports data to a MAT file.
- Runs a compiled Matlab-based .exe file to load the data, process the data, and create a new MAT file containing the processed data.
- Imports the data from the second MAT file back into Visual 3D.

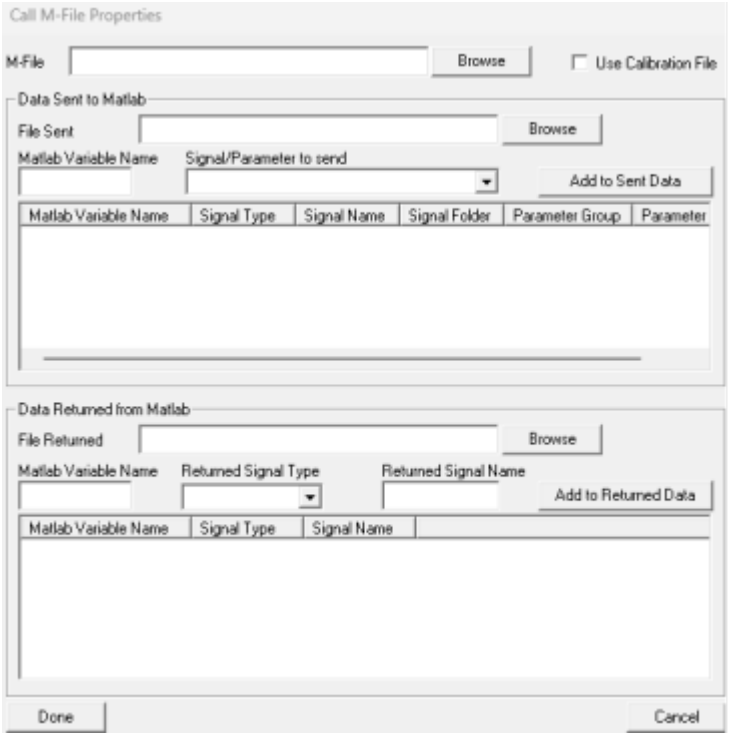
Pipeline Command

```
Call_MFile
! /MFILE_NAME=
! /USE_CALIBRATION_FILE=FALSE
! /USE_NAN_FOR_DATANOTFOUND=FALSE
! /INPUT_FILE=
/INPUT_NAMES=
/INPUT_SIGNAL_TYPES=
! /INPUT_SIGNAL_FOLDERS=
/INPUT_SIGNAL_NAMES=
! /OUTPUT_FILE=
/OUTPUT_SIGNAL_TYPES=
/OUTPUT_SIGNAL_FOLDER=
/OUTPUT_SIGNAL_NAMES=
/OUTPUT_NAMES=
! /PARAMETER_NAMES=
! /PARAMETER_GROUPS=
! /OUTPUT_PARAMETER_NAMES=
;
```

Command Parameters

Parameter	Description
!/MFILE_NAME= **|Specify the entire directory path| |!/OUTPUT_FILE|**Name of the mat file exported from Visual3D|** |!/OUTPUT_SIGNAL_NAMES=|**Visual3D Signals to export|** |!/OUTPUT_SIGNAL_TYPES= |**Visual3D Signal Type|** |!/OUTPUT_SIGNAL_PROCESSED= |**Visual3D Processed Flag|** |!/OUTPUT_NAMES=|**Signal names used in the exported|** |!/OUTPUT_SIGNAL_NAMES=|**Visual3D Signals to export|** |!/INPUT_FILE= |**Name of the mat file save by the Matlab exe|** |!/INPUT_NAMES= | **Names assigned to these signals|** |!/INPUT_SIGNAL_NAMES= |**Names assigned to these signals|** |!/INPUT_SIGNAL_TYPES= **	Types of signals imported to Visual3D

Dialog



Examples

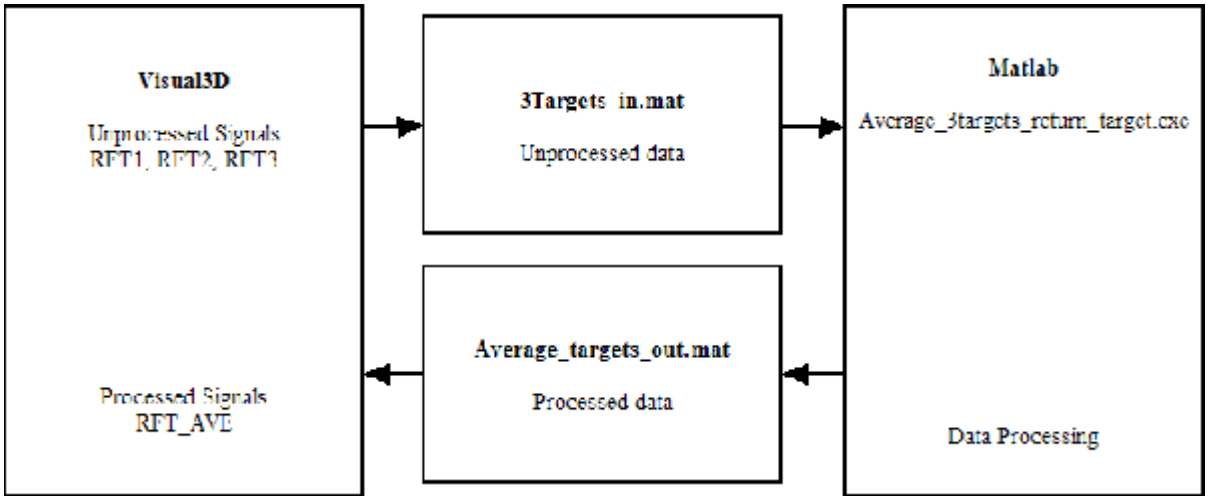
This example uses this: Sample Data.

```
CALL_MFILE
/MFILE_NAME= average_3targets_return_target.exe
/OUTPUT_FILE= c:temp3Targets_in.mat
/OUTPUT_SIGNAL_NAMES= RFT1+RFT2+RFT3
/OUTPUT_SIGNAL_TYPES= TARGET+TARGET+TARGET
/OUTPUT_SIGNAL_PROCESSED= FALSE+FALSE+FALSE
/OUTPUT_NAMES= SIGNAL1_IN+SIGNAL2_IN+SIGNAL3_IN
/INPUT_FILE= c:tempaveraged_targets_out.mat
/INPUT_SIGNAL_NAMES=RFT AVE
/INPUT_SIGNAL_TYPES=TARGET
/INPUT_NAMES=SIGNAL_OUT;
```

The OUTPUT_FILE parameter specifies the name of the MAT file to create.

- OUTPUT_SIGNAL_NAMES, OUTPUT_SIGNAL_TYPES, and OUTPUT_SIGNAL_PROCESSED refer to the cell array variables that the Matlab function is expecting.
- MFILE_NAME specifies the name of the compiled Matlab function to run (this must be an .exe file).
- INPUT_FILE specifies the MAT file from which the processed data is imported
- INPUT_NAMES are the variable names (in the m-file) that are read.
- The processed data is placed in the signals specified by INPUT_SIGNAL_NAMES and INPUT_SIGNAL_TYPES (this data is considered “processed” by default).

To clarify, the basic algorithm of the above CALL_MFILE command is illustrated below:



Note that, in order to pass the time signal to a MAT file, you should use “TIME” for the signal name, ”FRAME_NUMBERS” for the signal type, and “FALS” for processed.