

Matlab™ interface to read Agilent™ data (RA)

Lana Kaiser, Application Scientist, lane.kaiser@agilent.com

Files: 1) Readprocpa, 2) ReadAgilentFDF, 3) ReadAgilent 4) ReadAgilentStart, 5) ReadAgilentStartSpec

Getting started:

This interface is designed to open Agilent files for further data processing.

Type RA at the matlab prompt. In File Open... menu choose **fid** file (for kspace data). You should have several global variables in the matlab window.

- See example on the right for loading various variables (all global) into the matlab workspace.
- There is no user interaction to enter the required parameters, as all the parameters are read from Agilent **procpa** file (in **ReadAgilentStart.m** script)

Tested data types:

1) Raw **fid** 2D and 3D files:

a) seqcon=='**nscnn**'

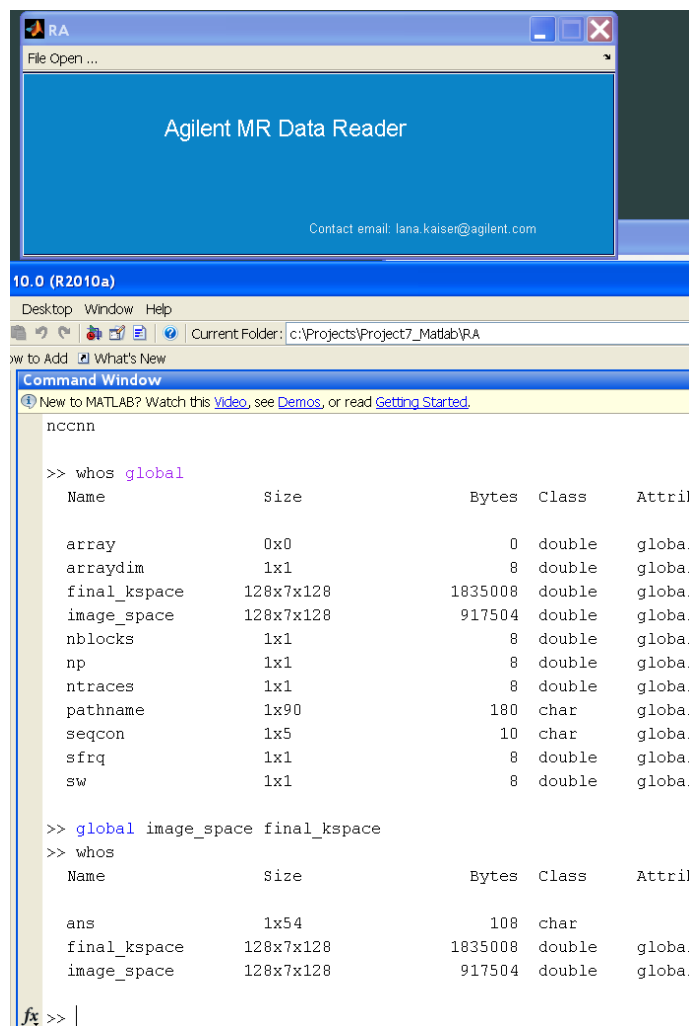
b) seqcon=='**nccnn**'

c) seqcon=='**nccsn**'

Example: gems, sems, fse3D

2) Processed **fdf** images: 2D and 3D, old and new format

3) Spectroscopy(including CSI) **fid**



Additional Notes:

- 1) Variable **final_kspace** contains the time domain data for both imaging and spectroscopy.
- 2) To learn about Agilent fid data structure see **ReadAgilent.m** script
- 3) To learn how to extract parameters from the procpa, see **ReadProcpa.m** script.
- 4) To read parameter from the procpa:
"ns=ReadProcpa('ns',filenameProc)", where ns is the number of slices and filenameProc is the directory where procpa is located
- 5) For older types of imaging procpa files, additional table of phase encoding steps maybe required to be in the same directory as fid file (e.g. fse3d types of sequences). Find out the name of the petable from the procpa and find the corresponding table in the vnmrJ tablib directory.