

HIPE : “Herschel Interactive Processing Environment”

INSTALLATION:

- 1) Download from the official HIPE page:
<https://www.cosmos.esa.int/web/herschel/hipe-download>
Find the directory where the downloaded file is located.
- 2) In Terminal, change directory where HIPE is located.
Example: `cd /home/"USER"/Downloads`
- 3) Write the following Command: `sh ./HIPE_15_0_1_INSTALLER.bin`
- 4) The HIPE installer should start running
- 5) Accept Terms and conditions and choose the directory to install the Software

Run HIPE:

- 1) Find the Directory that you choose in the previous step#5
 - 2) Write the complete path to that directory
example: `home/"User"/hipe_v15.0.1/apps/hipe`
- or change to that Directory :`cd home/"User"/hipe_v15.0.1/apps/hipe`
and run HIPE with `"./hipe"`

SPICE

Installation:

- 1) Download Spice

Spice:

`http://irsa.ipac.caltech.edu/data/SPITZER/docs/dataanalysis tools/tools/spice/downloadspice/`

- 2) **Find the Directory of Spice:**

- Change to that directory

Example: `cd /home/"USER"/Downloads`

- Write the following command :

```
chmod +x spice2_5_1-generic-linux.sh
```

- Run the installer :

```
./spice2_5_1-generic-linux.sh
```

The installer will ask for the path of the Directory where you want to save the files example:

```
home/"User"/.
```

The installer will also ask for the path of JAVA, It is usually `"/usr"`

If there is an error during the instalation , it might be necessary to install CSH for linux with:

```
sudo apt-get install csh
```

RUN SPICE:

1) Find the path of the directory that you previously write for the installer

2) Write the path of spice

```
example: home/"User"/spice_Directorio/spice  
or change Directory and write "./spice"
```

MOPEX

Installation:

1) Download MOPEX

<http://irsa.ipac.caltech.edu/data/SPITZER/docs/dataanalysis tools/mopex/mopexdownload/>

2) **Find the Directory of Spice:**

- Change to that directory

```
Example: cd /home/"USER"/Downloads
```

- Write the following command :

```
chmod +x mopex18_5_0-linux.sh
```

- Run the installer :

```
./mopex18_5_0-linux.sh
```

The installer will ask for the path of the Directory where you want to save the files example:

```
home/"User"/.
```

- Modify the file "mopex-script-env.csh"

change the path of MOPEX_INSTALLATION with the path we choose in the previous step example:

```
setenv MOPEX_INSTALLATION /home/"User"/mopex
```

If there is an error during the instalation , it might be necessary to install CSH for linux with:

```
sudo apt-get install csh
```

UPDATE:

Write the following comands in order to Mopex to work correctly under UBUNTU.

- 1) change directory Mopex is installed `cd home/"User"/Mopex`
- 2) `cd jre/`
- 3) `ls`
- 4) `cd bin/`
- 5) `mv java java.OLD`
- 6) `ln -s /usr/bin/java`
- 7) `cd ..`
- 8) `cd ..`
- 9) `./mopex`

RUN MOPEX:

1)Find the path of the directory that you previously write for the installer

2)Run Mopex from csh or tcsh by writting in Terminal "csh" or "tcsh"

change Directory and write `"./mopex "`

CASA

INSTALLATION:

1)Download CASA from the official page:

https://casa.nrao.edu/casa_obtaining_new.shtml

In linux, Find the Directory where the file was downloaded.(Usually in downloads)

2) From SHELL (Terminal) change directory to the one of the previous step where the CASArelease.tar is located.

Example: `cd /home/"USER"/Descargas`

3) Write the command `:tar xzvf casa-release-5.1.2-4.tar.gz`

4)After the last command we will find a new directory with the name "casa-release-5.1.2-4"

5)Inside we can find the "bin" directory with all the executable files

RUN CASA:

1) Change directory to casa-release

2) In the bin directory choose the file that you want to use, for example

`./casaviewer`

GILDAS

<http://www.iram.fr/~gildas/dist/index.html>

INSTALLATION:

1) Download from the official page.

The file gildas-src-feb18c.tar.gz , or the newest one.

*** Before installing we will need to write the following comands:**

UBUNTU:

- sudo apt-get install gfortran g++ libgtk2.0-dev
- sudo apt-get install python-dev python-numpy
- sudo apt-get install libblas-dev liblapack-dev libfftw3-dev libcfitsio3-dev
- export GAG_SEARCH_PATH="/usr/lib:/usr/lib/x86_64-linux-gnu"

FEDORA:

- dnf install gcc-gfortran gcc-c++ gtk2-devel
- dnf install python-devel numpy libpng-devel
- dnf install blas-devel lapack-devel fftw-devel cfitsio-devel
- export GAG_SEARCH_PATH="/usr/lib"

2) From SHELL (Terminal) change directory where the file Gildas was downloaded.

Example: `cd /home/"USER"/Descargas`

3) Write the following command: `gunzip gildas-src-feb18c.tar.gz`

4) Untar the file: `tar -xvf gildas-src-mmmyya.tar`

5) We will see a new Directory with the name "gildas-src-feb18c"

6) Change directory to : `cd gildas-src-feb18c`

7) Write source admin/gildas-env.sh (sometimes we need to open a new terminal for this command to work , remember to change directory to gildas-src-feb18c before)

8) Use the command "make" wait for the process to finish.

9) Write "make install"

10) When this command finish running, an explanation can be found at the end with code to change in specific files in a specific directory(directory : gildax-exe-date/etc).

EXAMPLE OF INDICATIONS:

`" Installation succeeded!`

bash users: You should add in your ~/.bash_profile the following lines

```
export GAG_ROOT_DIR=/home/servidoroaq/Descargas/gildas-exe-may17c
export GAG_EXEC_SYSTEM=x86_64-fedora27-gfortran
source $GAG_ROOT_DIR/etc/bash_profile
```

csh users: You should add in your ~/.login the following lines

```
setenv GAG_ROOT_DIR /home/servidoroaq/Descargas/gildas-exe-may17c
setenv GAG_EXEC_SYSTEM x86_64-fedora27-gfortran
source $GAG_ROOT_DIR/etc/login
```

*You should then exit this xterm and open a new one to reset your path.
GILDAS should be ready for use (e.g. type greg @ gag_demo:demo).
Bye. "*

- As we see files to change are "bash_profile" if we use bash ,
"login" if we use csh .

We recommend to change both and use csh.

- Command : source home/"usuario"/gildas-exe/etc/login
to run the modified file and run Gildas from terminal.

11) We can run GILDAS, by writting "greg" or "class" in Terminal.

How to use CSH

- Install CSH : sudo apt-get install csh
- Write CSH in terminal, and you will change to csh.