



# PIXINSIGHT Plugins et Mise à jour



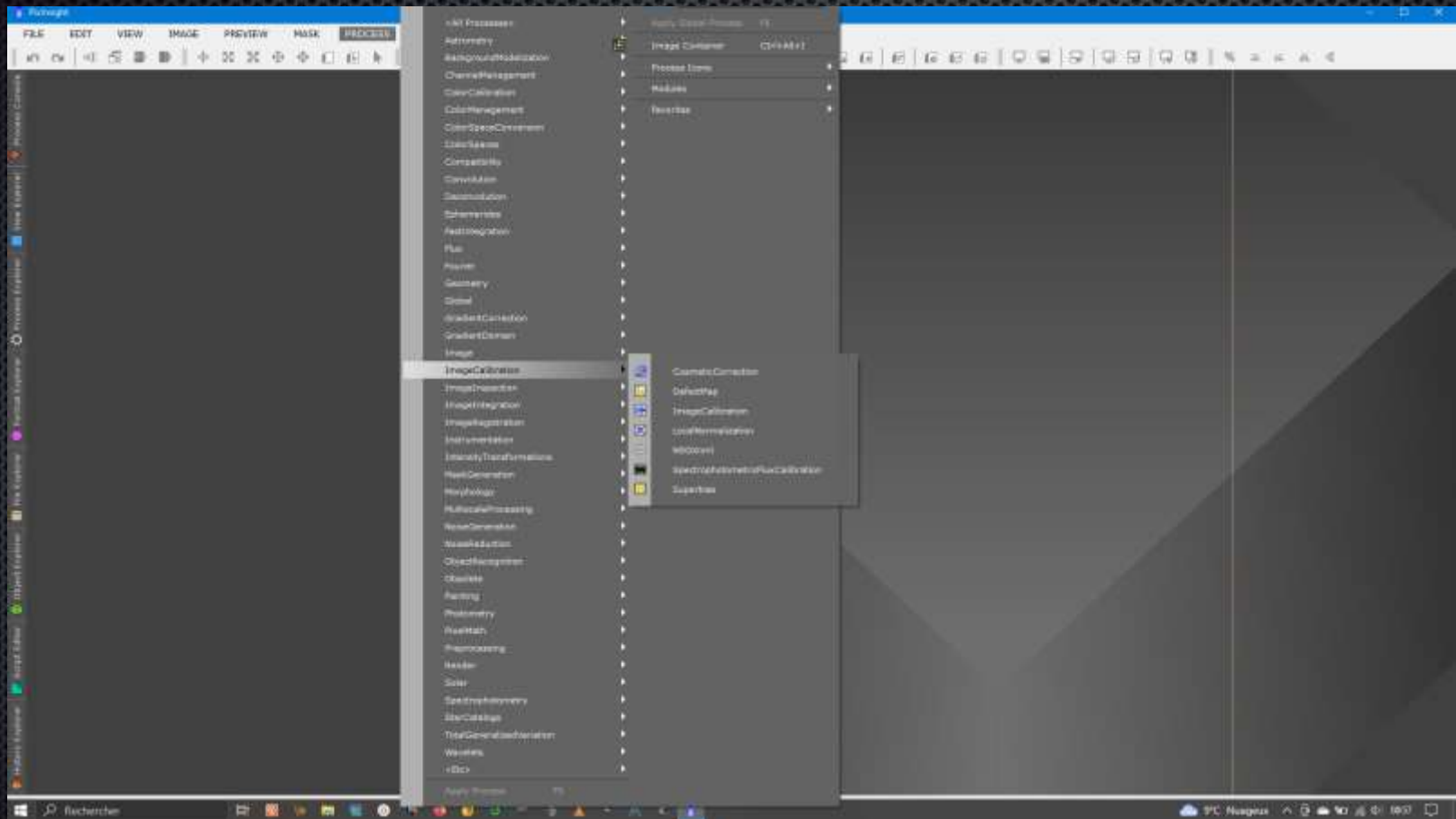




# Classement process par catégories



Les process sont classés par catégorie contrairement aux scripts où ils ne sont pas classés par catégorie mais par rapport à leur concepteur.

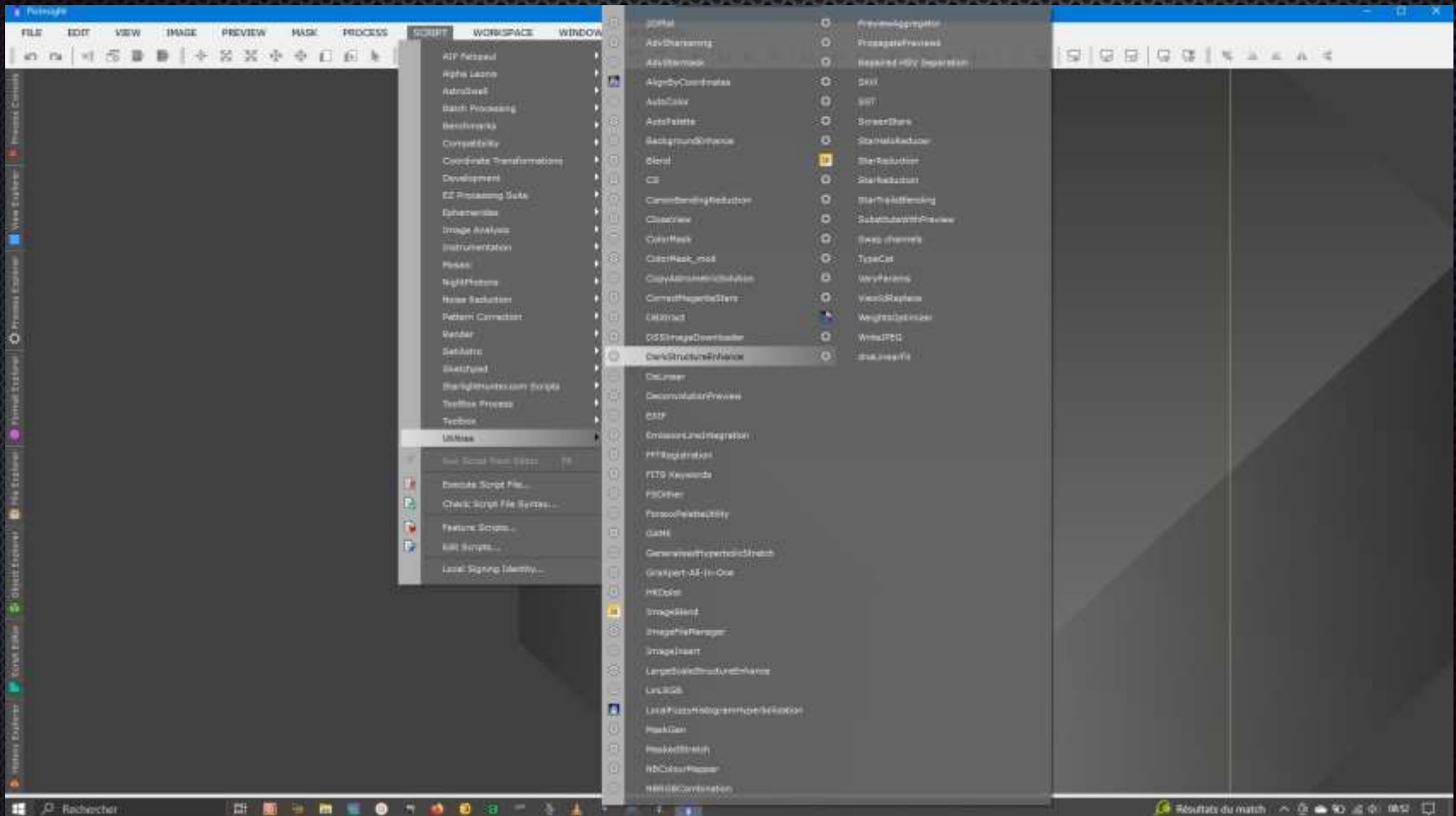




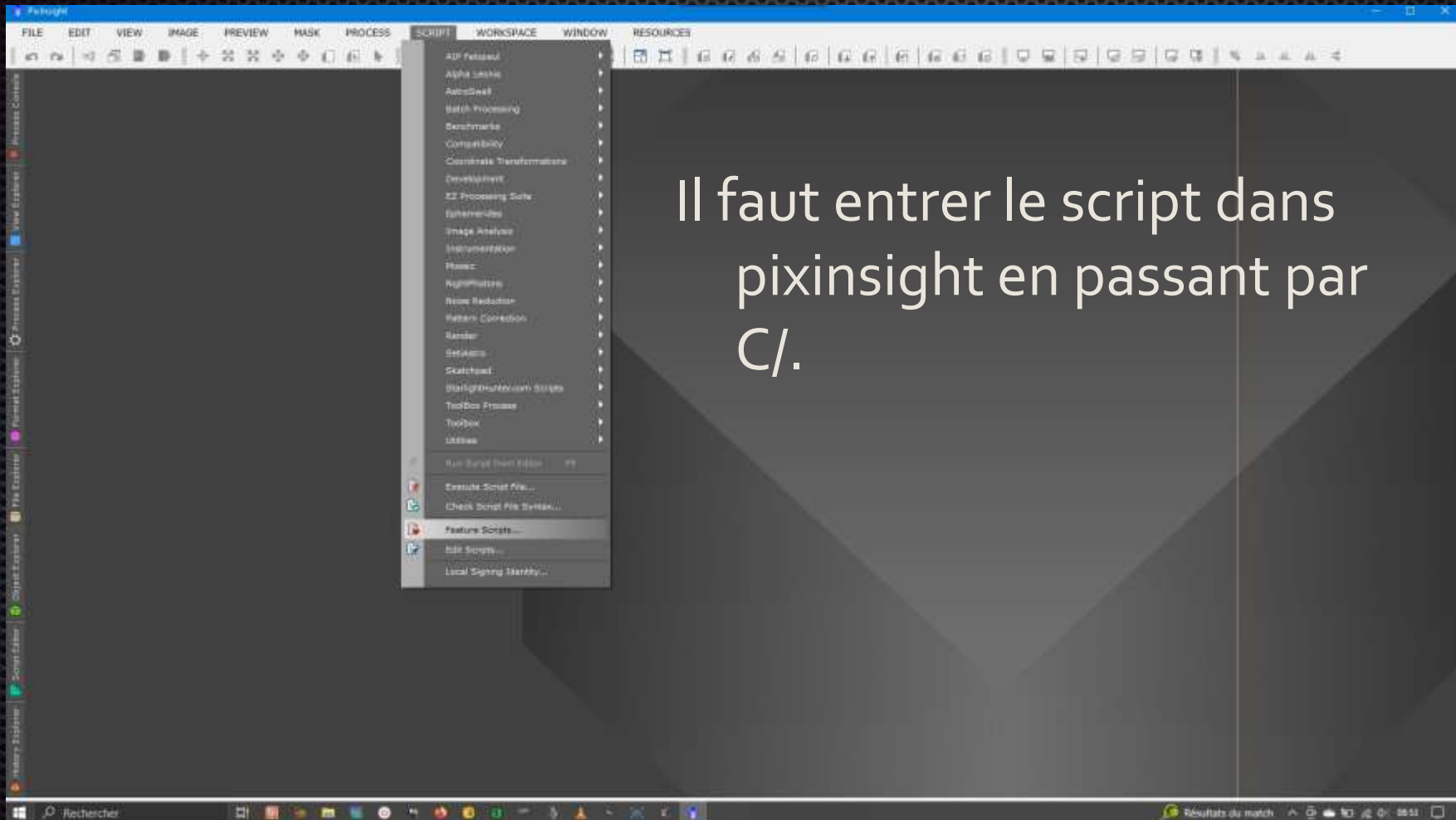
# Scripts



Certains sont inclus dans pixinsight et d'autres sont à charger via des adresses URL ou par installation manuelle.



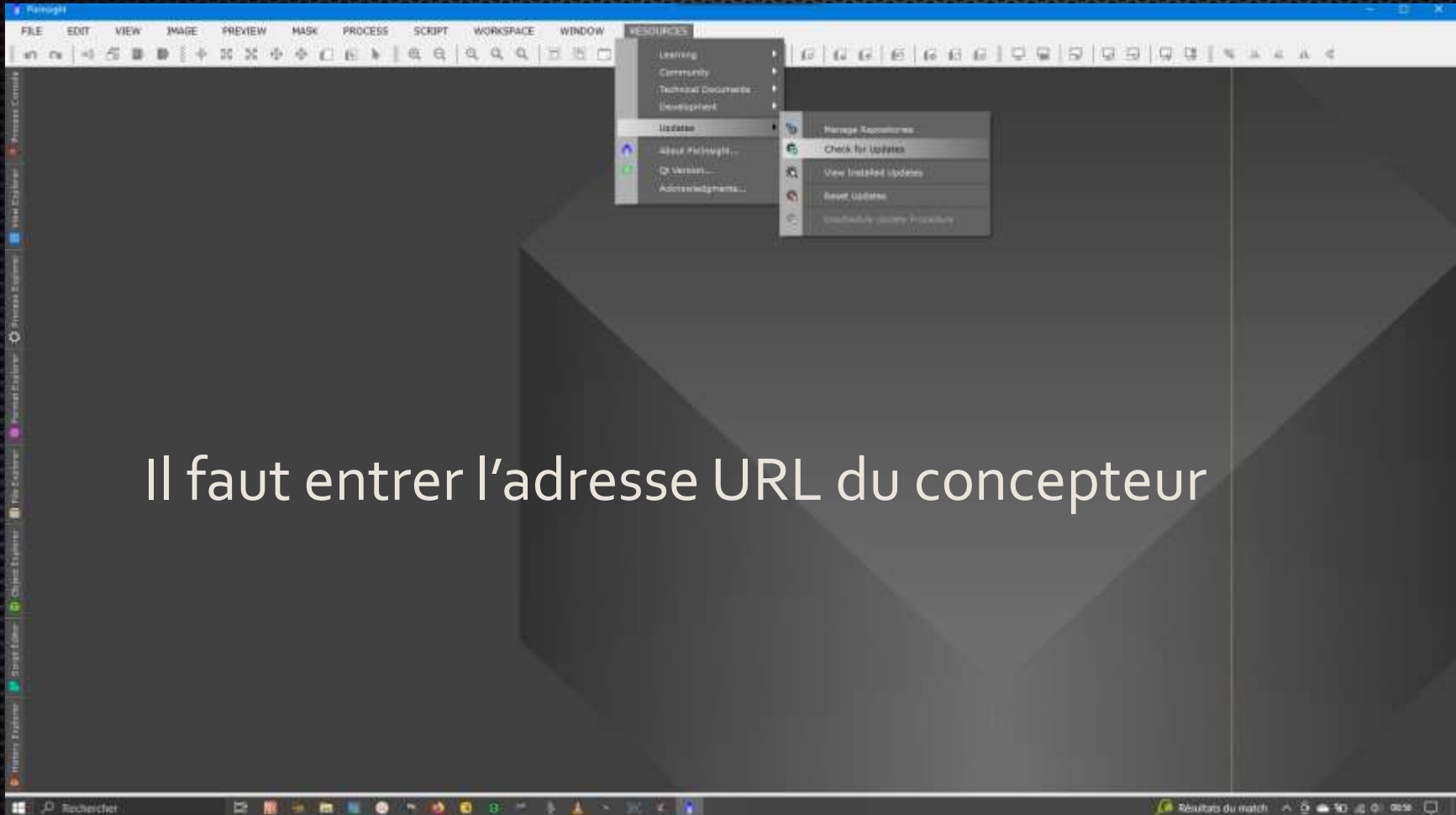
# Ajout manuel script: Feature Scripts







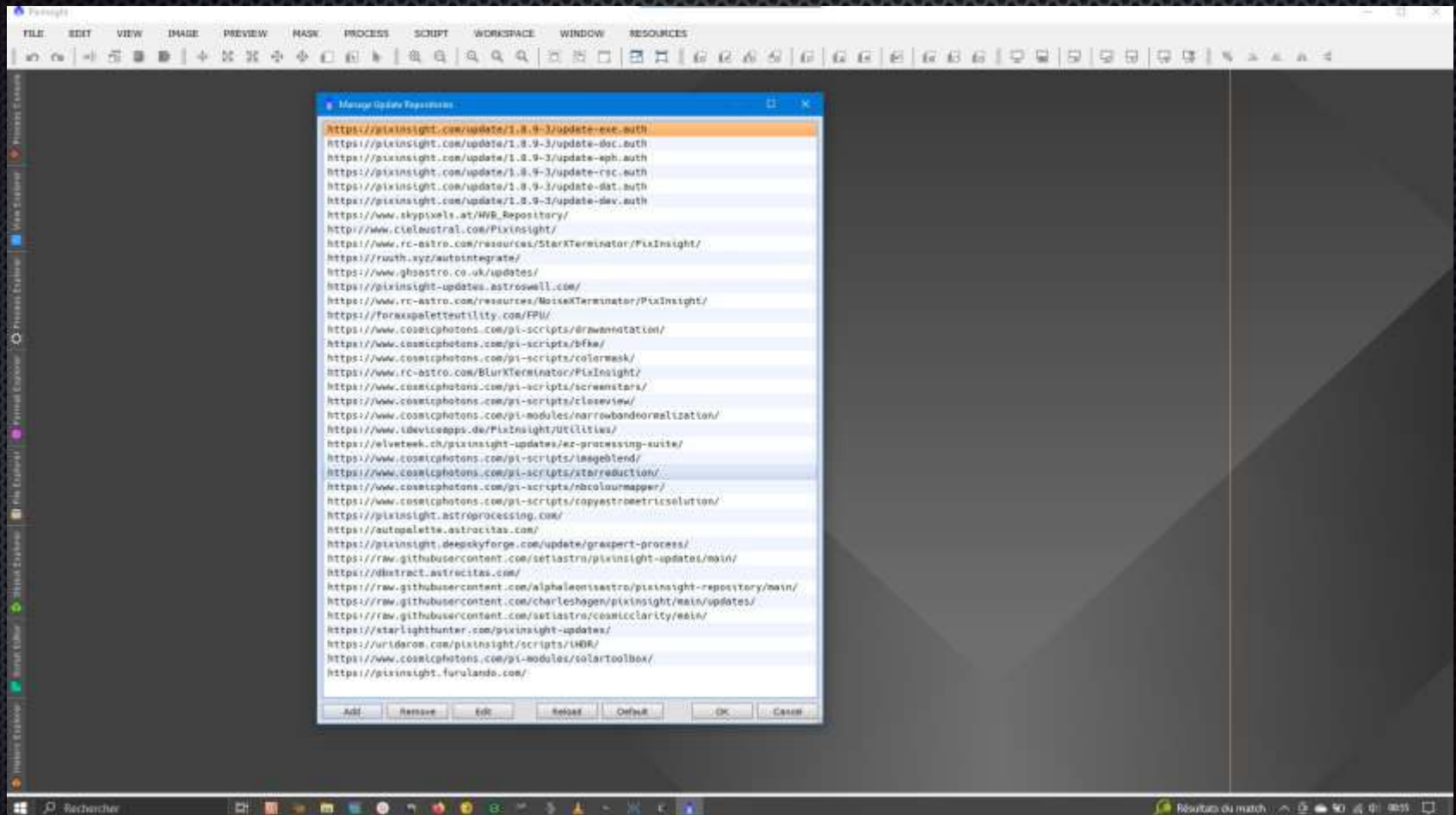
# Manage repositories



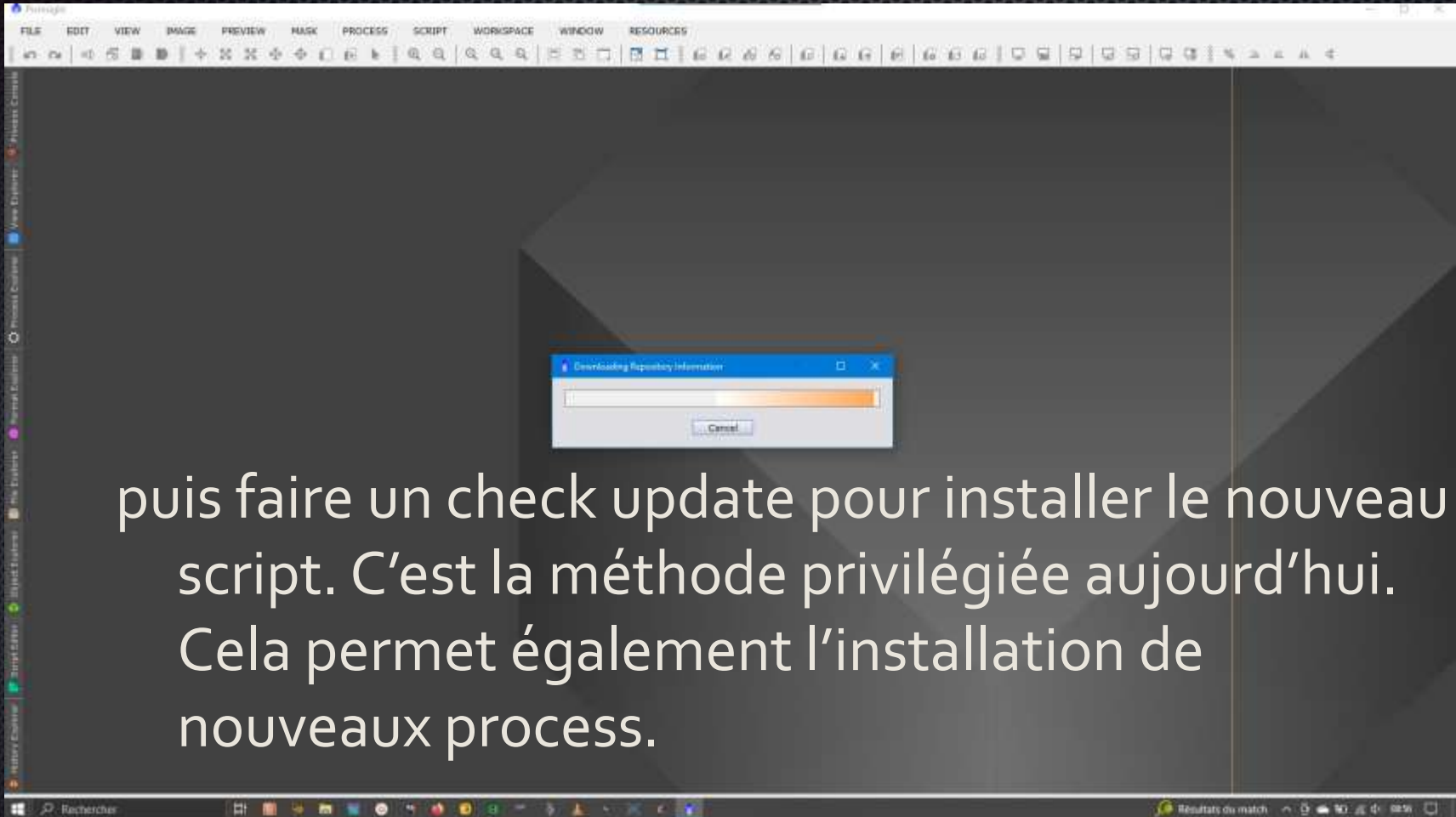
Il faut entrer l'adresse URL du concepteur



# Manage repositories



# Check for updates



puis faire un check update pour installer le nouveau script. C'est la méthode privilégiée aujourd'hui. Cela permet également l'installation de nouveaux process.



# Adresses URL manage repositories 1 (novembre 2024)



- [https://www.skypixels.at/HVB\\_Repository/](https://www.skypixels.at/HVB_Repository/)
- <https://pixinsight-updates.astroswell.com/>
- <https://www.cielaustral.com/Pixinsight/>
- <https://www.rc-astro.com/resources/StarXTerminator/PixInsight/>
- <https://www.rc-astro.com/resources/NoiseXTerminator/PixInsight/>
- <https://www.rc-astro.com/BlurXTerminator/PixInsight/>
- <https://ruuth.xyz/autointegrate/>
- <https://www.ghsastro.co.uk/updates/>



# Adresses URL manage repositories 2 (novembre 2024)



<https://www.ideviceapps.de/PixInsight/Utilities/>  
<https://foraxpaletteutility.com/FPU/>  
<https://www.cosmicphotons.com/pi-scripts/screenstars/>  
<https://www.cosmicphotons.com/pi-scripts/starreduction/>  
<https://www.cosmicphotons.com/pi-scripts/drawannotation/>  
<https://www.cosmicphotons.com/pi-scripts/bfke/>  
<https://www.cosmicphotons.com/pi-scripts/colormask/>  
<https://www.cosmicphotons.com/pi-scripts/closeview/>  
<https://www.cosmicphotons.com/pi-modules/narrowbandnormalization/>  
<https://www.cosmicphotons.com/pi-scripts/nbcolourmapper/>  
<https://www.cosmicphotons.com/pi-scripts/imageblend/>  
<https://www.cosmicphotons.com/pi-scripts/copyastrometricresolution/>  
<https://pixinsight.astroprocessing.com/>  
<https://elveteeek.ch/pixinsight-updates/ez-processing-suite/>  
<https://autopalette.astrocitas.com/>  
<https://pixinsight.furulando.com/>  
<https://www.cosmicphotons.com/pi-modules/solartoolbox/>



# Adresses URL manage repositories 3 (novembre 2024)



<https://www.cosmicphotons.com/pi-modules/colourmask/>  
<https://pixinsight.deepskyforge.com/update/graxpert-process/>  
<https://raw.githubusercontent.com/setiastro/pixinsight-updates/main/>  
<https://uridarom.com/pixinsight/scripts/iHDR/>  
<https://dbxtract.astrocitas.com/>  
<https://starlighthunter.com/pixinsight-updates/>  
<https://raw.githubusercontent.com/bitli/pixinsight-updates/main/>  
<https://raw.githubusercontent.com/setiastro/cosmicclarity/main/>  
<https://raw.githubusercontent.com/charleshagen/pixinsight/main/updates/>



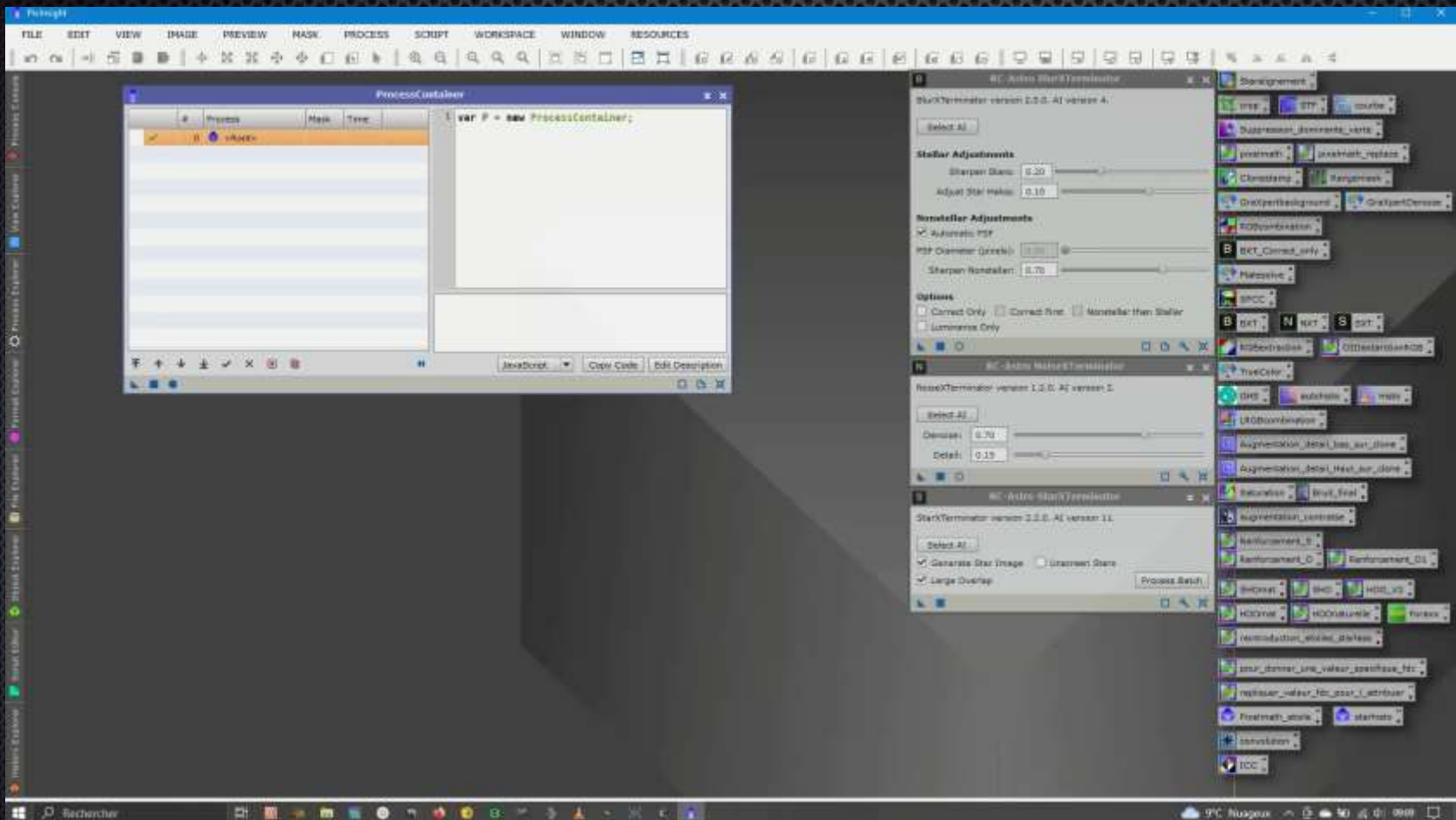
# Process container



Ne pas confondre process container et script!



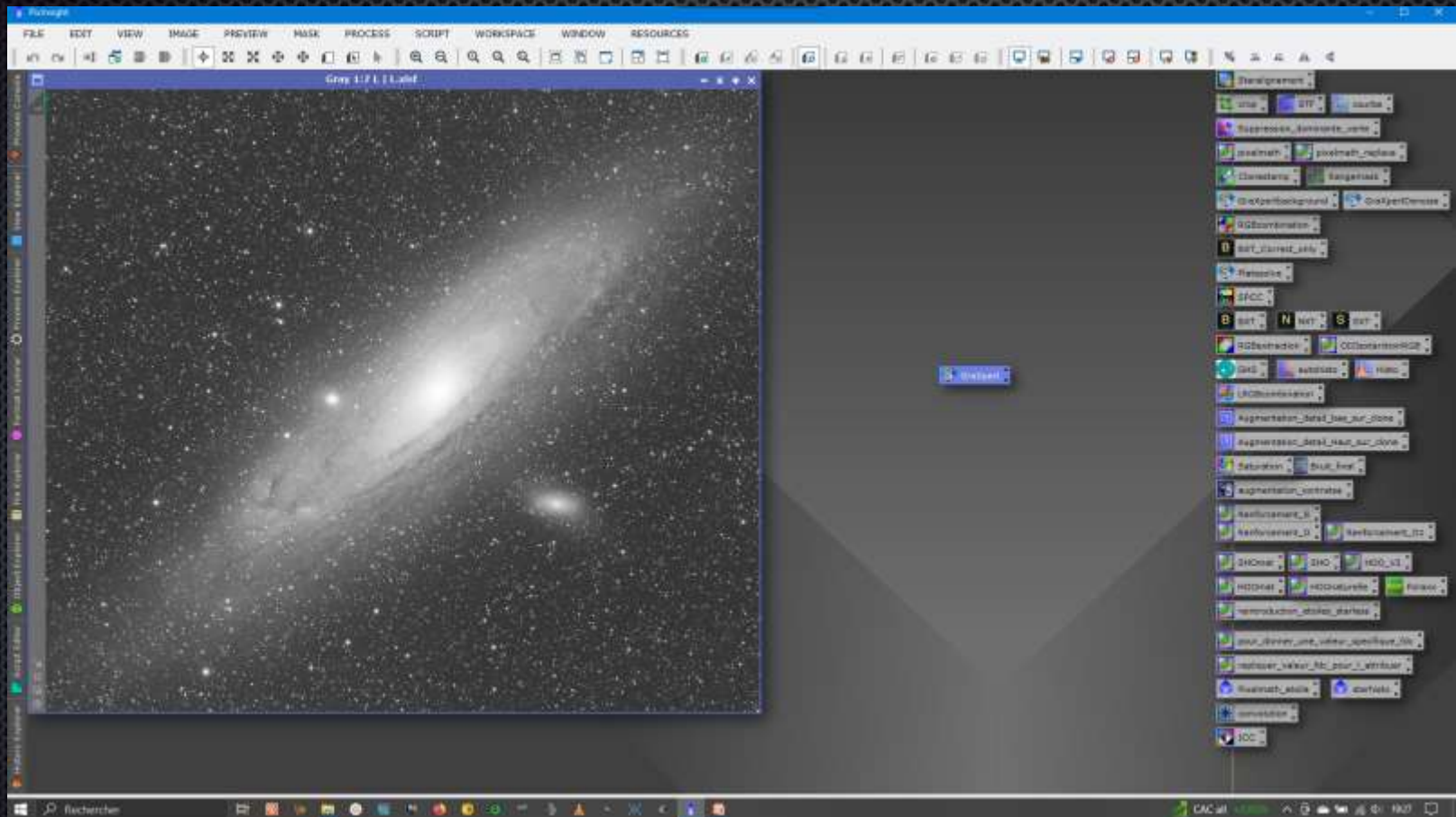
# Process container



# SCRIPT DANS LE WORKFLOW



Les scripts ont la forme d'un diamant avec le script quand on l'intègre dans le workflow. Les valeurs par défaut sont définies au préalable.

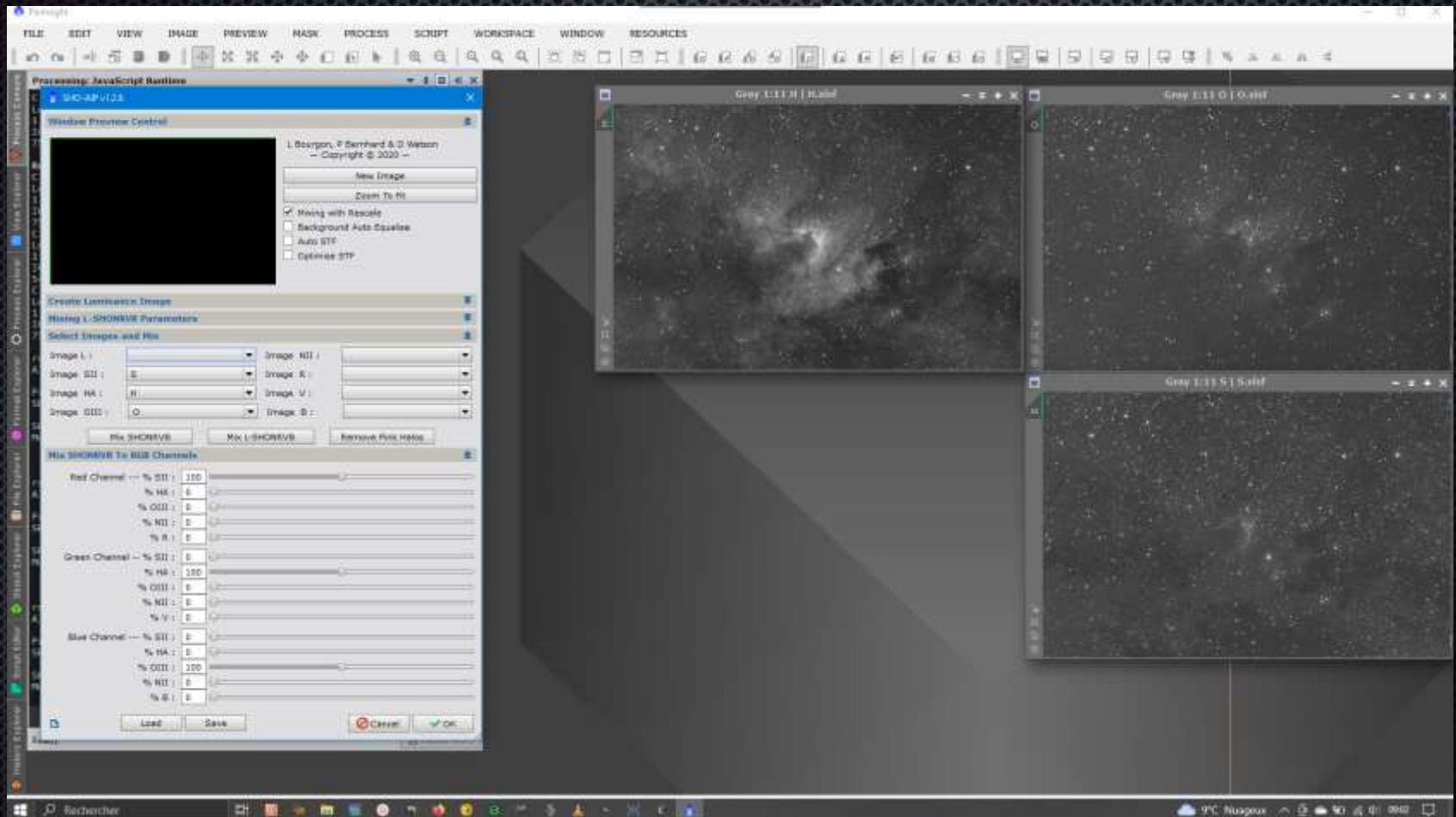




# Script AIP



script AIP par L. Bourgon, D. Watson et P. Bernhard qui permet le mixage en SHORVB ainsi que le mixage de la luminance.





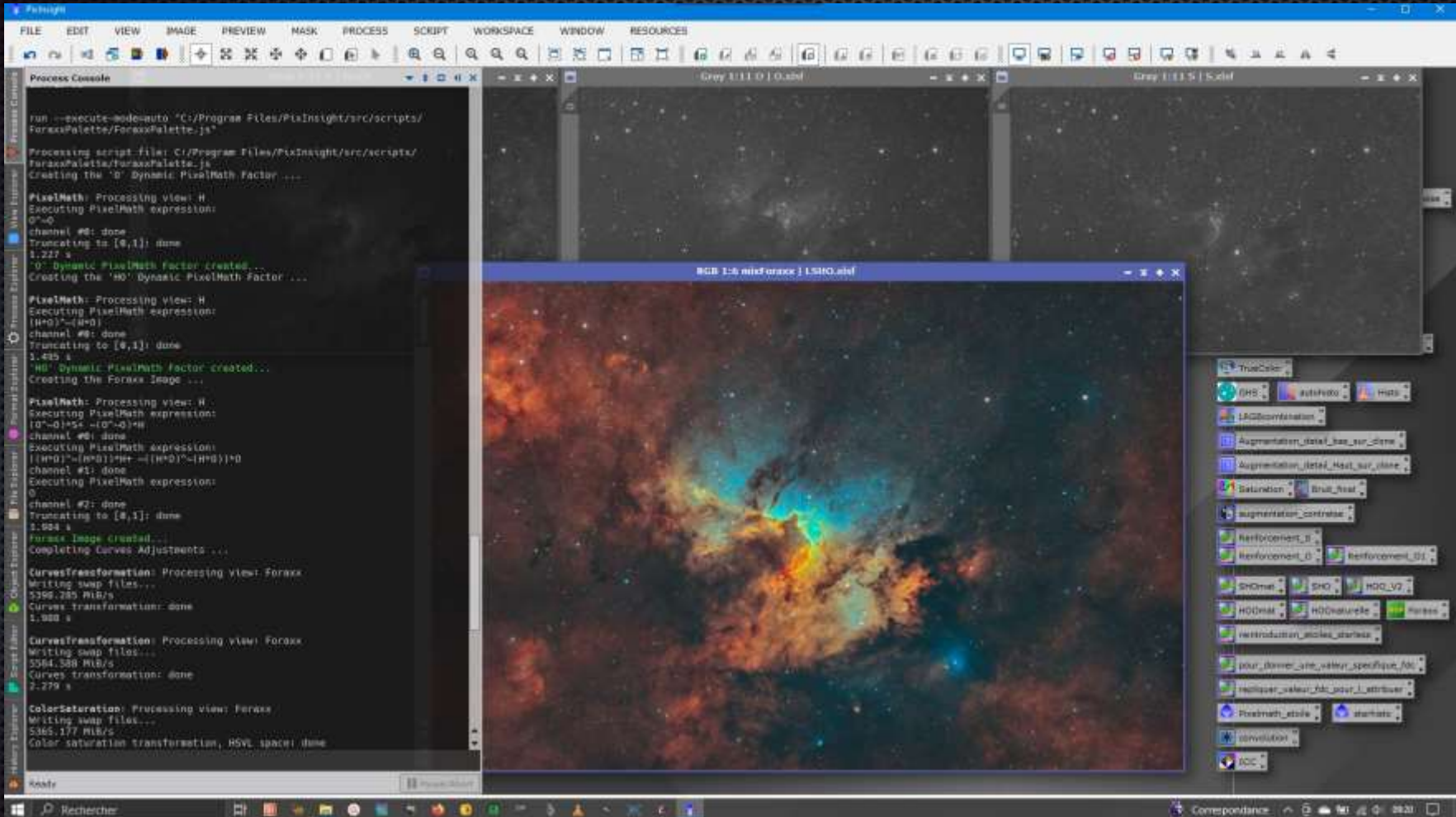




# Process Console



importance de la console qui permet de voir les process utilisés pour l'exécution du script.





# Process Console



The screenshot displays the PixInsight software interface. The top menu bar includes FILE, EDIT, VIEW, IMAGE, PREVIEW, MASK, PROCESS, SCRIPT, WORKSPACE, WINDOW, and RESOURCES. The Process Console on the left shows the following log:

```
channel #0: done
Truncating to [0,1]: done
1.277 s
!D Dynamic PixelMath Factor created...
Creating the "HD" Dynamic PixelMath Factor ...

PixelMath: Processing view: H
Executing PixelMath expression:
[H*0]~(CM*0)
channel #0: done
Truncating to [0,1]: done
1.495 s
"HD" Dynamic PixelMath Factor created...
Creating the Foraxx Image ...

PixelMath: Processing view: H
Executing PixelMath expression:
[H*0]~(R*0)**4 ~ ([H*0]~(M*0))**0
channel #1: done
Executing PixelMath expression:
0
channel #2: done
Truncating to [0,1]: done
1.944 s
Foraxx Image created...
Completing Curves Adjustments ...

CurvesTransformation: Processing view: Foraxx
Writing swap files...
5395.285 MiB/s
Curves transformation: done
1.949 s

CurvesTransformation: Processing view: Foraxx
Writing swap files...
5584.588 MiB/s
Curves transformation: done
2.279 s

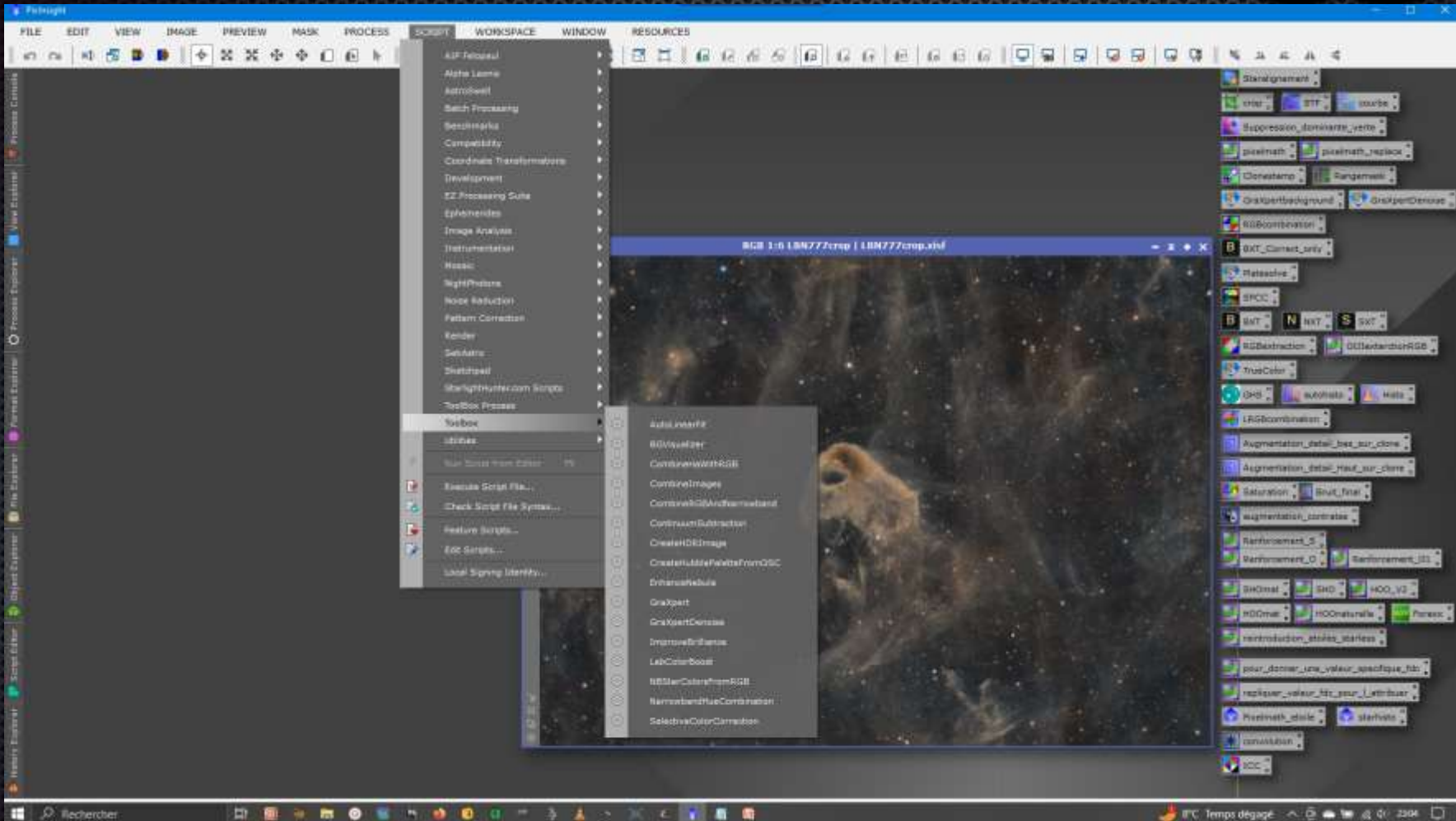
ColorSaturation: Processing view: Foraxx
Writing swap files...
5365.177 MiB/s
Color saturation transformation, HSVL space: done
1.976 s

ColorSaturation: Processing view: Foraxx
Writing swap files...
4792.435 MiB/s
Color saturation transformation, HSVL space: done
2.899 s
Curves Adjustments Complete...
Script Complete...
Goodbye from ForaxxPalette
```

The main image window displays a colorful nebula image. A script editor window titled "#00 1:6 mbf foraxx | 1580.vof" is open, showing a script with various processing steps like TrueColor, RGBColorize, Augmentation, Saturation, and ColorSaturation. The Windows taskbar at the bottom shows the search bar, task view, and system tray with the date and time 09:21.

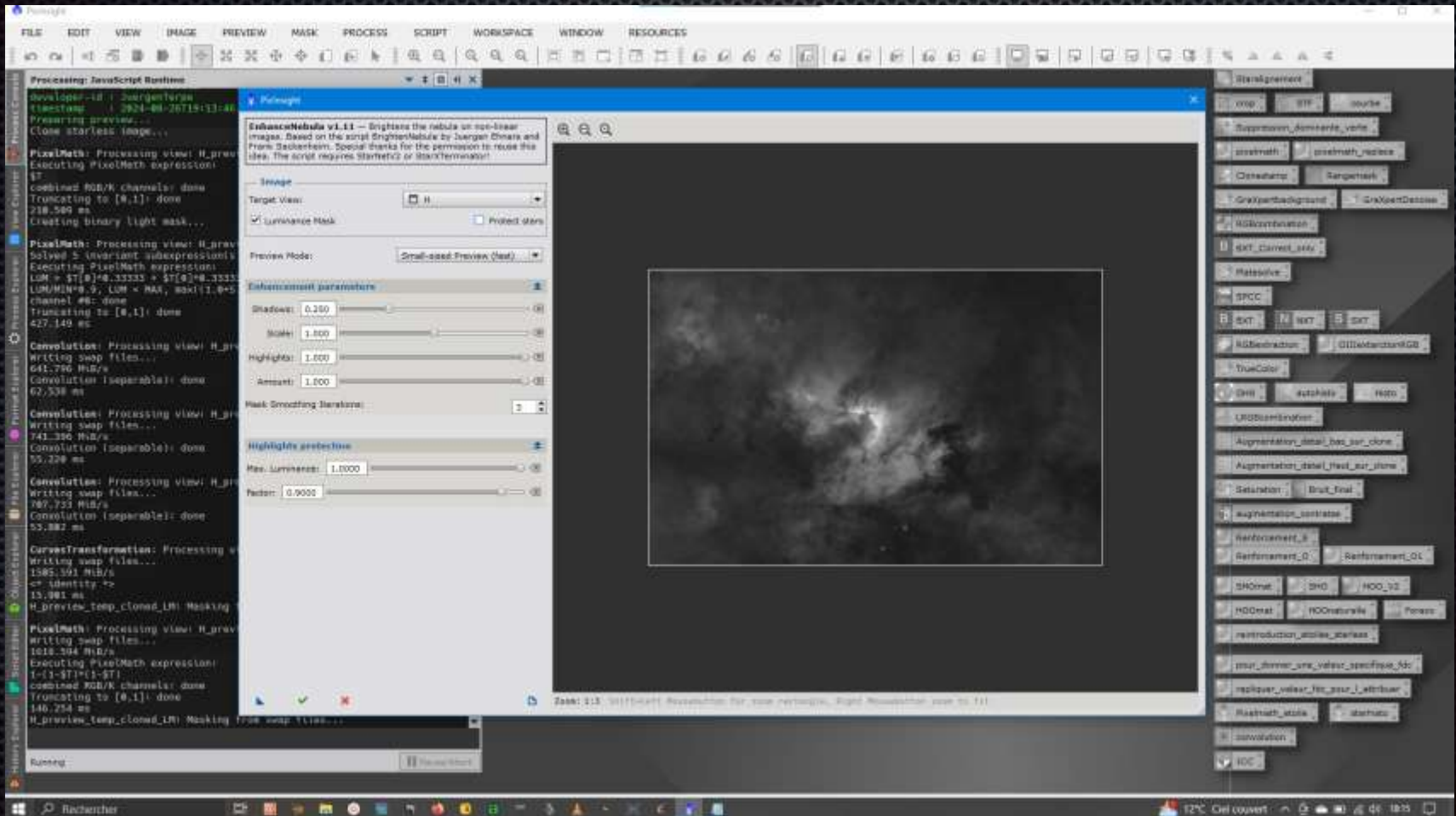
# Toolbox

Parmi les indispensables!

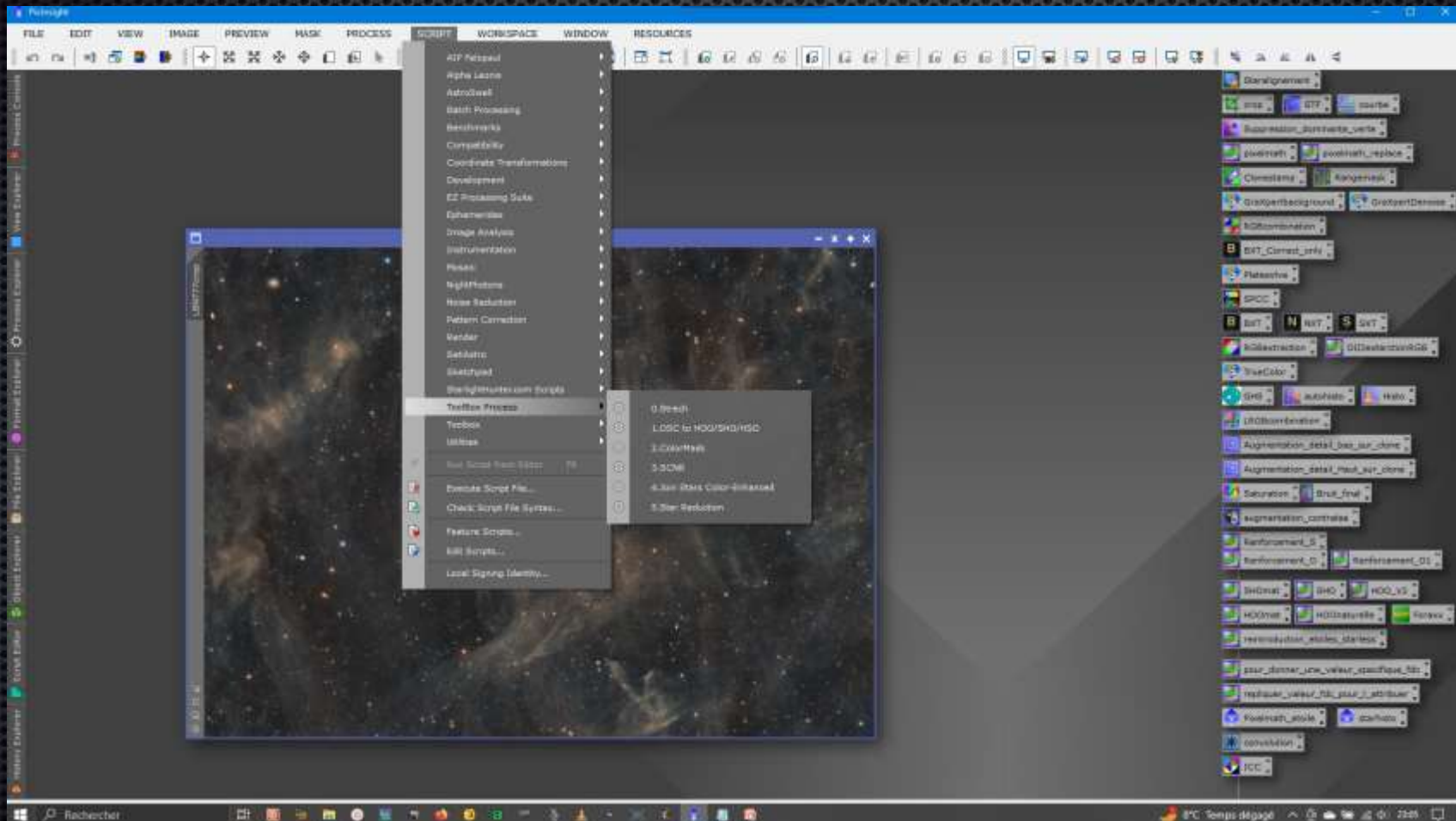




# Toolbox: Enhance nebula



# Toolbox Process





# Toolbox process: Colormask



The screenshot shows the PixInsight software interface. The main window displays a color mask being applied to an image of a nebula. A dialog box titled "Color Mask with Pixelmath" is open, showing settings for mask strength and blur. A terminal window in the foreground displays the execution of a script named "MaskMerge".

```
script -sd MaskMerge
developer-id : FrankMarak
timestamp   : 2024-07-09T12:31:54.821Z
Mask Merge Dialog Closed.

run --execute--modeauto "C:/Program Files/PixInsight/src/scripts/
ToolBoxProcess/ColorMasks.js"

Processing script file: C:/Program Files/PixInsight/src/scripts/
ToolBoxProcess/ColorMasks.js

INFO: Color Mask with Pixelmath 1.0.4:

run --execute--modeauto "C:/Program Files/PixInsight/src/scripts/
ToolBoxProcess/ColorMasks.js"

Processing script file: C:/Program Files/PixInsight/src/scripts/
ToolBoxProcess/ColorMasks.js

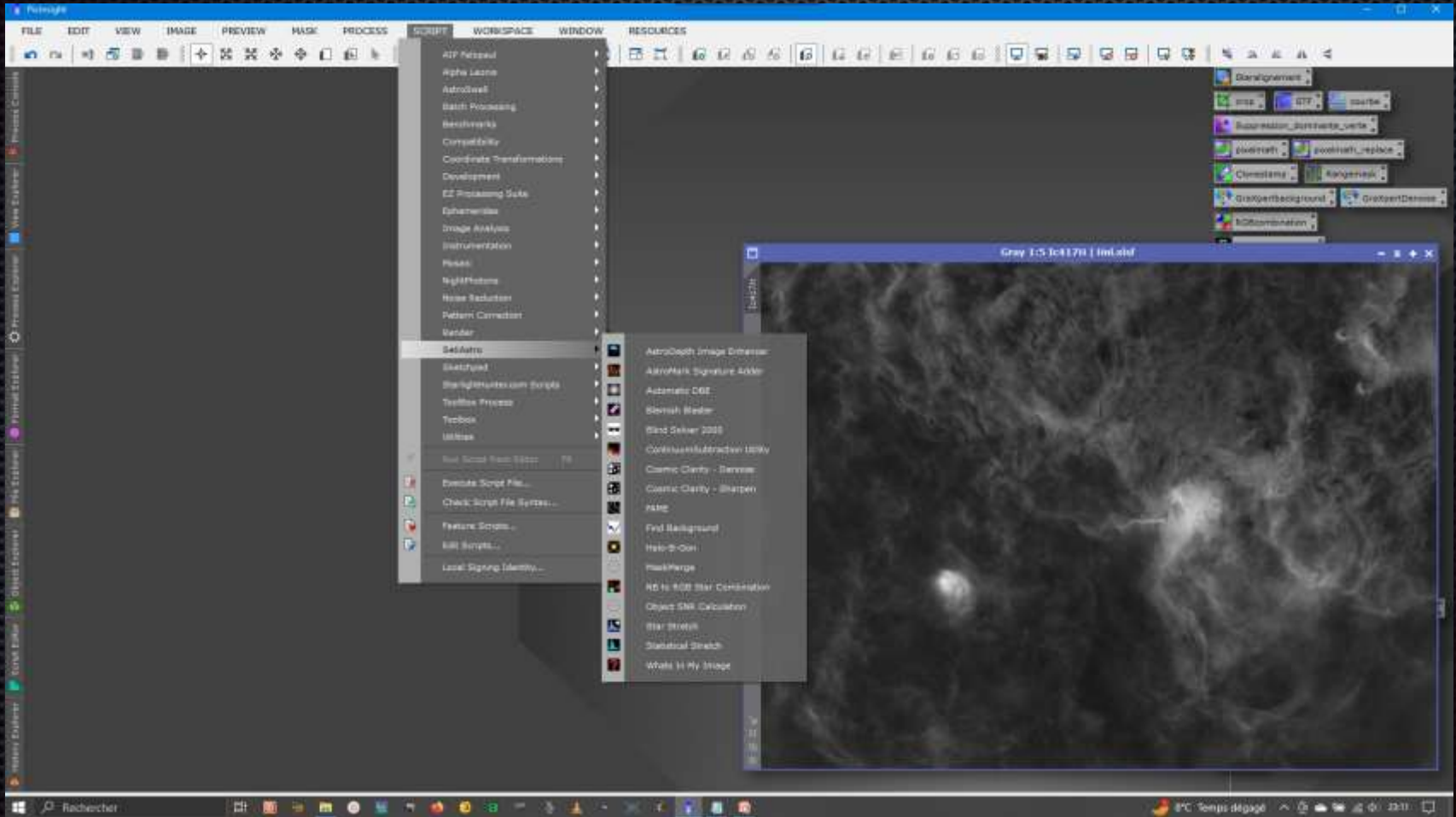
INFO: Color Mask with Pixelmath 1.0.4:

Ready
```

# Seti astro



Certains scripts sont en version libre hors Pix!





# Setiastro Statistical Stretch



**Statistical Stretch 1.6.1**

Select your image in the dropdown.

Use the slider to adjust your Target Median value.  
3.10 is a good start for distinct objects eg galaxy or PN.  
0.25 is a good start for starfield objects like nebula filling the image.  
Auto Convergence option to achieve statistical exploration, most image will only require 1 iteration.

Option to Perform Linked or Unlinked Stretch.  
Optional checkbox to normalize the image to fill the range [0,1]

Use Preview Refresh to Update the Preview.

Select Image to Stretch: **H**

Target Median: **0.25**

Automatic Convergence

Curves Boost: **0.80**

Normalize Image Range to [0,1]  Linked Stretch

Written by Franklin Mark  
www.setiastro.com

Preview Zoom Level: **Fit to Preview** Evaluate

Preview Refresh

# Setiastro star stretch



The screenshot displays the PixInsight software interface. A terminal window on the left shows the execution of a JavaScript script named 'star\_stretch\_v2.1.js'. The terminal output includes the following information:

```
Processing script file: C:/Program Files/PixInsight/src/scripts/star_stretch_v2.1.js
* Code signature verified
script-id : FAME
developer-id : FranklinMarek
timestamp : 2024-10-24T14:03:13.110Z

IntegerResampler: Processing view: Image02
Writing swap files...
3268.848 MB/s
Downsampling 1:2, 2581x1048, average: done
363.957 ms
Calculating the script with the selected parameters.
Mask Creation Started

ImageIdentifier: Processing view: Image03
id = H_FAME_Mask_Bin
1.959 ms

Convolution: Processing view: H_FAME_Mask_Bin
Writing swap files...
2721.348 MB/s
Convolution (separable): done
996.354 ms

Reading 1 image(s):
C:/Users/Mat/Desktop/SH2-125/1c2/stars.psf
Loading image: wd962 h=3081 m=3 RGB Float32
1 image property
ICC profile extracted: "sRGB IEC61986-2.1", 3144 bytes

run --execute-wideauto "C:/Program Files/PixInsight/src/scripts/star_stretch_v2.1.js"

Processing script file: C:/Program Files/PixInsight/src/scripts/star_stretch_v2.1.js
* Code signature verified
script-id : StarStretch
developer-id : FranklinMarek
timestamp : 2024-10-24T12:25:02.301Z
```

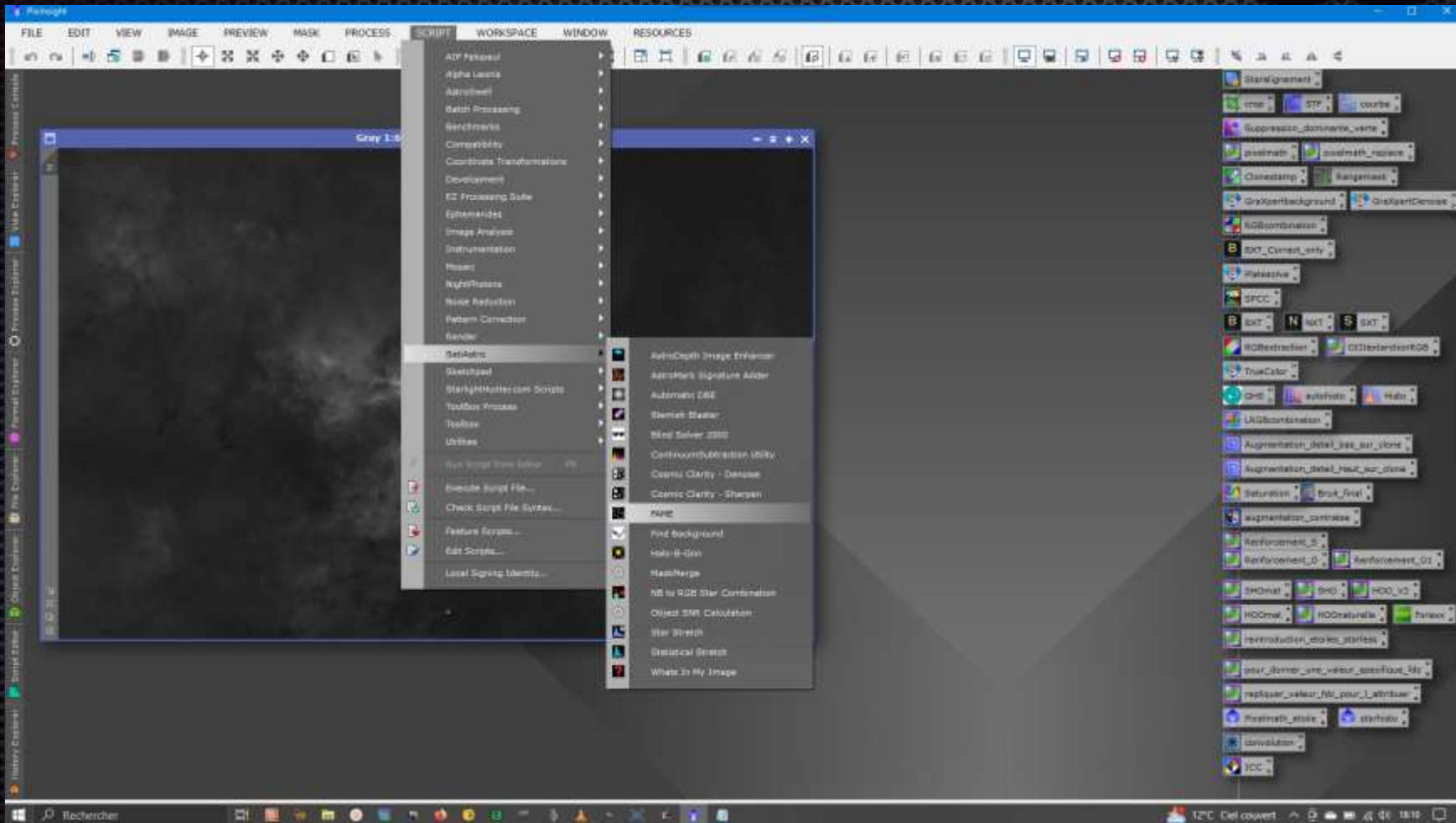
The main window shows a star field image. A dialog box titled "Star Stretch v2.6: Linear to Non-Linear Stretch of a Stars Only Image" is open, displaying the following settings:

- Stretch Amount: 5.00
- Color Boost Amount: 1.00
- Remove Green via SCNR (Optional)
- Show Preview

The dialog box also includes a "Zoom" dropdown set to 1/4, a "Refresh Preview" button, and an "Execute" button. The background shows a complex workflow graph with various processing steps like "align", "crop", "median", etc.



# Setiastro Fame



# Setiastro Fame



**Freehand Adaptive Mask Editor (FAWE) v1.5**

Instructions:

- Shift + Click and drag to draw a shape.
- Multiple Shapes can be drawn.
- CTRL+Click and Drag to MOVE the drawn shape.
- ALT+Click and Drag to ROTATE and RESIZE.
- Right Click to define start and end points for Gradient.
- SPACEBAR cycles through the active shapes.
- Grey undo button removes the active shape.
- Red Reset button removes all shapes.

Select Image: [m]

Freehand Shape (Lasso Tool)

- Brush
- Spray Can
- Erase
- Rectangle

Blur Amount: 25.0000

Mask Type:  Binary  Lightness  Chrominance

Gradient Mask  Color  Rat

AutoDITF Preview Zoom Level: 112

Written by Franklin Hamik  
Website: [www.setiastro.com](http://www.setiastro.com)

Processing: JavaScript Runtime...

Reading icon: Augmentation\_detail\_haut\_sur\_clone

Reading icon: Suppression\_dominante\_verte

Reading icon: Blur1\_Final

Reading icon: Rampmask

Reading icon: convolution

Reading icon: Reinforcement\_5

Reading icon: Reinforcement\_0

Reading icon: pixelmath

Reading icon: Reinforcement\_01

Reading icon: ICC

Reading icon: SHDmat

Reading icon: augmentation\_contraste

Reading icon: HQDmat

Reading icon: pour\_bonne\_vue\_valour\_specifique

Reading icon: repliquer\_valour\_fdc\_pour\_l\_eti

Reading icon: pixelmath\_replace

Reading icon: HQD\_V2

Reading icon: SHD

Reading icon: Saturation

Reading icon: reintroduction\_etatles\_starless

Reading icon: Clonestamp

Reading icon: atarhats

Reading icon: Pixelmath\_etatle

Reading icon: HQDnaturelle

Reading icon: Foraxx

Reading icon: SET

Reading icon: OITTestwrittenRGB

Reading icon: atarhats

Reading icon: HQD

Reading icon: Graxpertbackground

Reading icon: Graxpertmosaic

Reading icon: LRRCcombination

46 icons loaded.

run --executa-mode-auto "C:/Program Files/PixInsight/FAWE\_v1.5.exe"

Processing script file: C:/Program Files/PixInsight/FAWE\_v1.5.exe

Only signature verified

32785-1d - 5285

Developer-id : FranklinHamik

timestamp : 2024-10-23T14:03:13.118Z

Displaying the initial image in the preview.

Writing swap files...

3499.324 MB/s

IntegerResample: Processing view: Image82

Writing swap files...

3266.848 MB/s

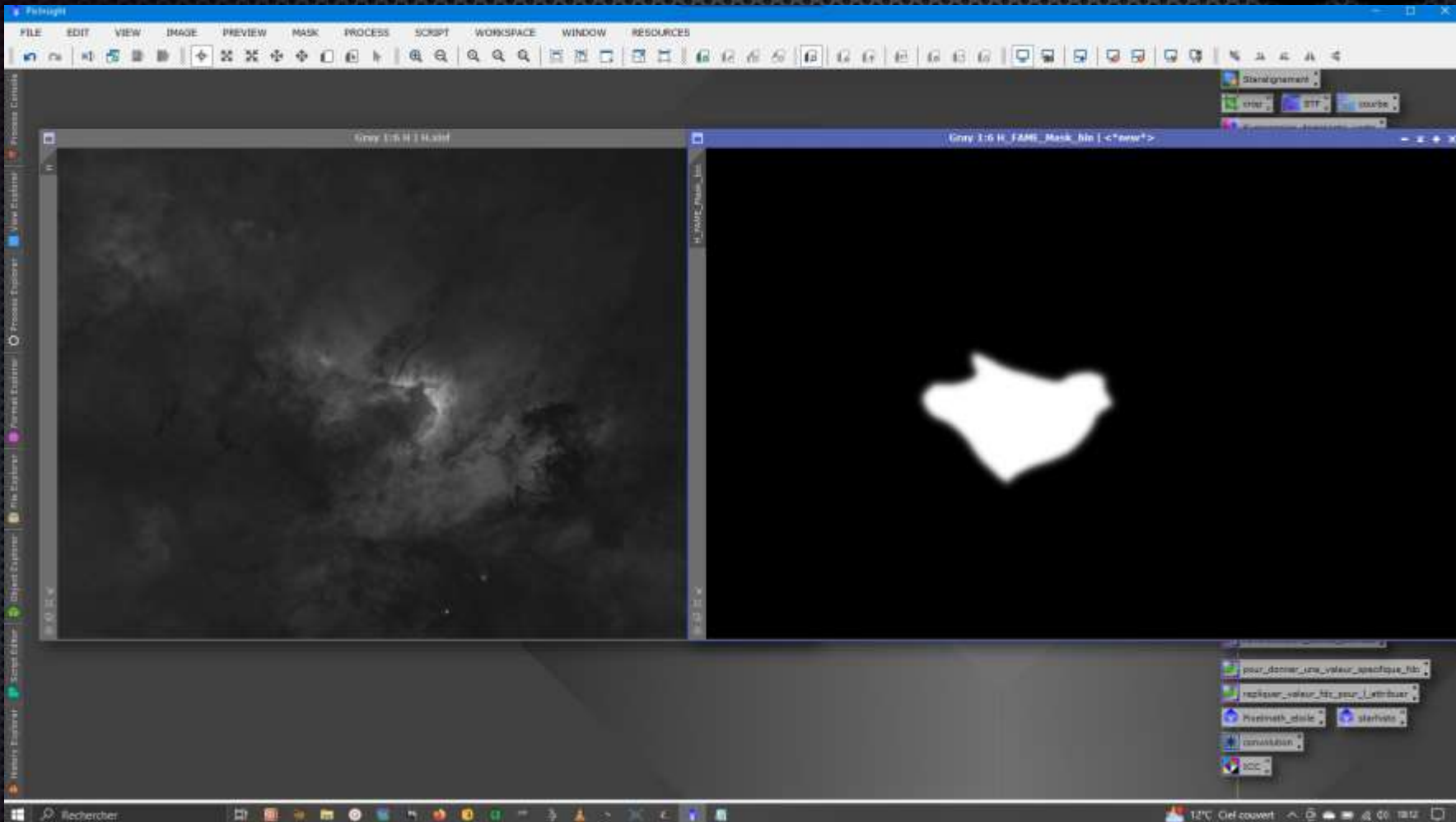
Downsampling 1:2, 200x1000, average: done

363.957 ms

Running



# Setiastro Fame





◎ Pixinsight est donc un logiciel très complet qui associe notamment le prétraitement et le traitement des images astronomiques. (Ce n'est pas un logiciel d'acquisition). Il permet donc également aux amateurs d'apporter leur contribution en élaborant des scripts qui peuvent être mis à la disposition de tout le monde.





# Questions?





# Merci de votre attention