GIMP

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Postanowiłem zainstalować edytor obrazów GIMP, pierwotnie miał być on zainstalowany na dystrybucji Slackware, jednak napotkałem problemy z komenda *slapt-get*, więc przesiadłem się na Debian.

1. Pobranie plików źródłowych za pomocą komendy wget, i rozpakowanie za pomocą tar

Widok wewnątrz rozpakowanego archiwum

```
NOTHORS INSTALL in README .118n ac include .44 config .4b win32 g imp.pc.in libg impmodule/ po-plug-ins/ po-plyING LICENSE ac include .44 config .4b win32 g impthumb.pc.in libg impthumb/ po-plython/ po-plython
```

2.Instrukcja

Na początek wyświetlam plik INSTALL.

Skroluje zawartość pliku aż znajduje punkt 19, w którym jest lista wymaganych paczek i ich wersji.

```
19. Summary of required packages and what version you need:
    Package Name
                           Version
                           2.2.0
    ATK
                           0.1.78
1.12.2
    babl
    cairo
    Fontconfig
                           2.12.4
    freetypeZ
                           2.1.7
                           2.30.8
    GDK-PixBuf
    GEGL
                           0.4.34
    \mathbf{G}\mathbf{IO}
    GLib
                           2.56.2
    glib-networking
    GTK+
                           2.24.32
    HarfBuzz
                           0.9.19
    libbzip2
    libjpeg
    liblzma
                           5.0.0
                           1.3.0
    libmypaint
    libpng
                          1.6.25
    libpoppler-glib
                         0.50.0
                           2.40.6
    librsug
    libtiff
    Little CMS
                           2.8
    mypaint-brushes-1.0
                           1.29.4
    pangocairo
    poppler-data
                           0.4.7
    zlib
```

W punkcie 20 i 21 znajduje się dodatkowa lista paczek opcjonalnych i zależności, będę je instalować dopiero, gdy napotkam jakiekolwiek problemy po zainstalowaniu wymaganych paczek.

3.Instalacja pakietów (dystrybucja została zmieniona na Debian)

Instaluje wymagane zależności z instrukcji, niektóre z nich są domyślnie zainstalowane w systemie (m.in. ATK,FONTCONFIG,LIBGLIB,LIBHFARBUZZ,GLIB NETWORKING,LIB PNG)

, wiec nie bede wrzucał ich screenshotow.

ATK – zainstalowane domyślnie

Libatk1.0-dev



Libcairo2-dev

```
root@debian:/home/patryk/gimp-2.10.30# sudo apt install libcairo2-dev
Reading package lists... Done
Building dependency tree... Done
Reading state information... Done
The following additional packages will be installed:
  libbrotli-dev libcairo-script-interpreter2 libexpat1-dev libfontconfig-dev
  libfontconfig1-dev libfreetype-dev libfreetype6-dev libice-dev
  libpixman-1-dev libpng-dev libpng-tools libpthread-stubs0-dev libsm-dev
  libx11-dev libxau-dev libxcb-render0-dev libxcb-shm0_dev libxcb1-dev
  libxdmcp-dev libxext-dev libxrender-dev x11proto-dev x11proto-xext-dev
 xorg-sgml-doctools xtrans-dev
Suggested packages:
  libcairo2-doc freetype2-doc libice-doc libsm-doc libx11-doc libxcb-doc
  libxext-doc
The following NEW packages will be installed:
  libbrotli-dev libcairo-script-interpreter2 libcairo2-dev libexpat1-dev
  libfontconfig-dev libfontconfig1-dev libfreetype-dev libfreetype6-dev
  libice-dev libpixman-1-dev libpng-dev libpng-tools libpthread-stubs0-dev
 libsm-dev libx11-dev libxau-dev libxcb-render0-dev libxcb-shm0-dev
```

Libbabl-dev

patryk@debian: ~/gimp-2.10.30

root@debian:/home/patryk/gimp-2.10.30# sudo apt install libbabl-dev
Reading package lists... Done
Building dependency tree... Done
Reading state information... Done
The following additional packages will be installed:
 girl.2-babl-0.1 libbabl-0.1-0 liblcms2-dev
The following NEW packages will be installed:
 girl.2-babl-0.1 libbabl-0.1-0 libbabl-dev liblcms2-dev
0 upgraded, 4 newly installed, 0 to remove and 0 not upgraded.
Need to get 2,197 kB of archives.
After this operation, 3,109 kB of additional disk space will be used.
Do you want to continue? [Y/n] y

Freetype2

root@debian:/home/patryk/gimp-2.10.30# sudo apt install freetype2-demos
Reading package lists... pone
Building dependency tree... Done
Reading state information... Done
The following NEW packages will be installed:
 freetype2-demos
0 upgraded, 1 newly installed, 0 to remove and 0 not upgraded.
Need to get 250 kB of archives.
After this operation, 1,103 kB of additional disk space will be used.
Get:1 http://deb.debian.org/debian bullseye/main amd64 freetype2-demos amd64 2.1
0.4+dfsg-1 [250 kB]

Pixbuffer



Libgegl-dev

```
⊞
                             patryk@debian: ~/gimp-2.10.30
                                                                     Q
                                                                          \equiv
root@debian:/home/patryk/gimp-2.10.30# sudo apt install libgegl-dev
Reading package lists... Done
Building dependency tree... Done
Reading state information... Done
The following additional packages will be installed:
 qir1.2-qeql-0.4 libamd2 libcamd2 libccolamd2 libcholmod3 libqeql-0.4-0
 libgegl-common libjson-glib-dev libmetis5 libumfpack5
Suggested packages:
 libjson-glib-doc
The following NEW packages will be installed:
 gir1.2-gegl-0.4 libamd2 libcamd2 libccolamd2 libcholmod3 libgegl-0.4-0
 libgegl-common libgegl-dev libjson-glib-dev libmetis5 libumfpack5
0 upgraded, 11 newly installed, 0 to remove and 0 not upgraded.
Need to get 2,801 kB of archives.
After this operation, 12.8 MB of additional disk space will be used.
Do you want to continue? [Y/n]
```

Libgtk

```
root@debian:/home/patryk/gimp-2.10.30# sudo apt install libgtk2.0-dev
Reading package lists... Done
Building dependency tree... Done
Reading state information... Done
The following additional packages will be installed:
 autoconf automake autopoint autotools-dev binutils binutils-common
 binutils-x86-64-linux-gnu build-essential debhelper dh-autoreconf
 dh-strip-nondeterminism dpkg-dev dwz fakeroot g++ g++-10 gcc gcc-10 gettext
 gir1.2-gtk-2.0 icu-devtools intltool-debian libalgorithm-diff-perl
 libalgorithm-diff-xs-perl libalgorithm-merge-perl libarchive-cpio-perl
 libarchive-zip-perl libasan6 libbinutils libcc1-0 libctf-nobfd0 libctf0
 libdatrie-dev libdebhelper-perl libfakeroot libfile-stripnondeterminism-perl
 libfribidi-dev libgcc-10-dev libgraphite2-dev libharfbuzz-dev
 libharfbuzz-gobject0 libicu-dev libitm1 liblsan0 libltdl-dev
 libmail-sendmail-perl libpango1.0-dev libsigsegv2 libstdc++-10-dev
 libsub-override-perl libsys-hostname-long-perl libthai-dev libtool libtsan0
 libubsan1 libxcomposite-dev libxcursor-dev libxdamage-dev libxfixes-dev
```

Libhfarbuzz zainstalowany domyślnie

Libbz2

```
root@debian:/home/patryk/gimp-2.10.30# sudo apt install libbz2-dev
Reading package lists... Done
Building dependency tree... Done
Reading state information... Done
The following additional packages will be installed:
   bzip2-doc
The following NEW packages will be installed:
   bzip2-doc libbz2-dev
0 upgraded, 2 newly installed, 0 to remove and 0 not upgraded.
Need to get 544 kB of archives.
After this operation, 724 kB of additional disk space will be used.
Do you want to continue? [Y/n]
```

Sudo apt Install libjpeg-dev

```
root@debian:/home/patryk/gimp-2.10.30# sudo apt install libjpeg-dev
Reading package lists... Done
B∰ilding dependency tree... Done
Reading state information... Done
The following additional packages will be installed:
  libjpeg62-turbo-dev
The following NEW packages will be installed:
  libjpeg-dev libjpeg62-turbo-dev
0 upgraded, 2 newly installed, 0 to remove and 0 not upgraded.
Need to get 346 kB of archives.
After this operation, 1,114 kB of additional disk space will be used.
Do you want to continue? [Y/n] ■
```

Libmypaint

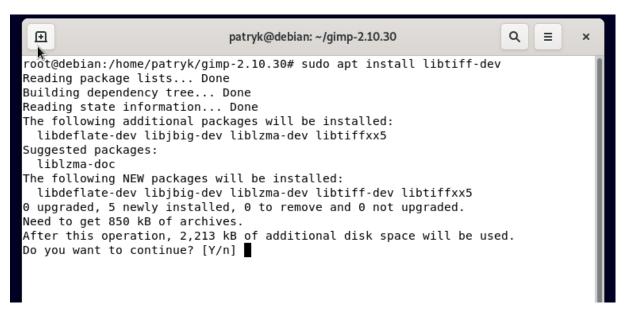
```
root@depian:/home/patryk/gimp-2.10.30# sudo apt install libmypaint-dev
Reading package lists... Done
Building dependency tree... Done
Reading state information... Done
The following additional packages will be installed:
    gir1.2-mypaint-1.5 libjson-c-dev libmypaint-1.5-1 libmypaint-common
Suggested packages:
    libmypaint-doc
The following NEW packages will be installed:
    gir1.2-mypaint-1.5 libjson-c-dev libmypaint-1.5-1 libmypaint-common
    libmypaint-dev
0 upgraded, 5 newly installed, 0 to remove and 0 not upgraded.
Need to get 292 kB of archives.
After this operation, 1,698 kB of additional disk space will be used.
Do vou want to continue? [Y/n] ■
```

```
⊞
                             patryk@debian: ~/gimp-2.10.30
root@debian:/ト⇨me/patryk/gimp-2.10.30# sudo apt install libpoppler-glib-dev
Reading package lists... Done
Building dependency tree... Done
Reading state information... Done
The following additional packages will be installed:
 gir1.2-poppler-0.18 libpoppler-dev
Suggested packages:
 libpoppler-glib-doc
The following NEW packages will be installed:
 gir1.2-poppler-0.18 libpoppler-dev libpoppler-glib-dev
0 upgraded, 3 newly installed, 0 to remove and 0 not upgraded.
Need to get 146 kB of archives.
After this operation, 913 kB of additional disk space will be used.
Do you want to continue? [Y/n]
```

Librsvg2

```
root@debian:/home/patryk/gimp-2.10.30# sudo apt install librsvg2-dev
Reading pagkage lists... Done
Building dependency tree... Done
Reading state information... Done
Suggested packages:
  librsvg2-doc
The following NEW packages will be installed:
  librsvg2-dev
0 upgraded, 1 newly installed, 0 to remove and 0 not upgraded.
Need to get 58.4 kB of archives.
```

Libtiff



Mypaintbrushes

```
root@debian:/home/patryk/gimp-2.10.30# sudo apt install mypaint-brushes
Reading package lists... Done
Building debendency tree... Done
Reading state information... Done
The following NEW packages will be installed:
 mypaint-brushes
0 upgraded, 1 newly installed, 0 to remove and 0 not upgraded.
Need to get 1,500 kB of archives.
After this operation, 5,823 kB of additional disk space will be used.
Get:1 http://deb.debian.org/debian bullseye/main amd64 mypaint-brushes all 2.0.2
+ds1-1 [1,500 kB]
Fetched 1,500 kB in 0s (3,317 kB/s)
Selecting previously unselected package mypaint-brushes.
(Reading database ... 151759 files and directories currently installed.)
Preparing to unpack .../mypaint-brushes 2.0.2+ds1-1 all.deb ...
Unpacking mypaint-brushes (2.0.2+ds1-1) ...
Setting up mypaint-brushes (2.0.2+ds1-1) ...
root@debian:/home/patryk/gimp-2.10.30#
```

Instalacja.

Po odpaleniu ./configure dostałem odpowiedz zwrotną z błędami o brakujących zależnościach, Instaluje brakujące zależności.

Gegl- wersja zbyt stara

Gexiv - brak

Python 2 - dziwne, że GIMP potrzebuje pythona.

```
Error: GIMP configuration failed.
  - Error: missing dependency gegl-0.4 >= 0.4.34
  - Error: missing dependency gegl
      *** Could not find native gegl executable in your PATH.
  - Error: missing dependency gexiv2 >= 0.10.6
    Python 2 (2.5.0 or newer)
      *** Please install it, or skip building the python scripting extension by
      *** passing --disable-python to configure (but then you will not be able
      *** to use scripts for GIMP that are written in Python).
   Python 2 headers
      *** Please install them, or skip building the python scripting extension b
      *** passing --disable-python to configure (but then you will not be able
      *** to use scripts for GIMP that are written in Python).
    PvGTK 2.10.4 or newer
      *** Please install it, or skip building the python scripting extension by
      *** passing --disable-python to configure (but then you will not be able
```

Po zainstalowaniu brakujących zależności odpalam plik configure jeszcze raz, tym razem nie rozumiem dlaczego pojawia się następujący błąd z pythonem

```
Error: GIMP configuration failed.
  - Error: missing dependency gegl-0.4 >= 0.4.34

    Python 2 headers

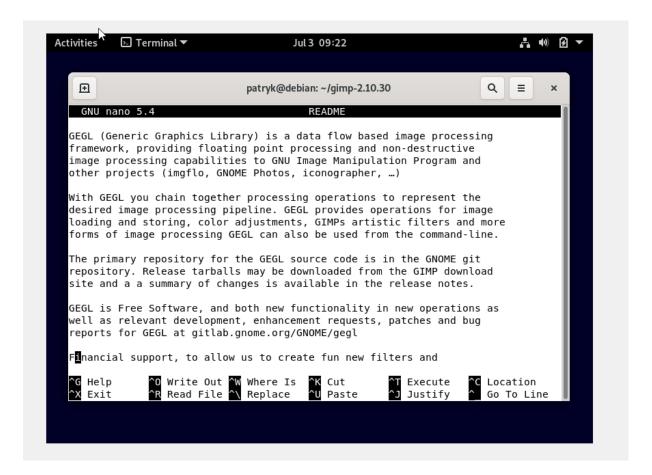
      *** Please install them, or skip building the python scripting extension b
      *** passing --disable-python to configure (but then you will not be able
      *** to use scripts for GIMP that are written in Python).
    PyGTK 2.10.4 or newer
      *** Please install it, or skip building the python scripting extension by
      *** passing --disable-python to configure (but then you will not be able
      *** to use scripts for GIMP that are written in Python).
    pygtk-codegen-2.0 script
      *** Please install it, or skip building the python scripting extension by
      *** passing --disable-python to configure (but then you will not be able
      *** to use scripts for GIMP that are written in Python).
   PyCairo 1.0.2 or newer
      *** Please install it, or skip building the python scripting extension by
      *** passing --disable-python to configure (but then you will not be able
      *** to use scripts for GIMP that are written in Python).
See the file 'INSTALL' for more help.
root@debian:/home/patryk/gimp-2.10.30#
```

Ale zgodnie ze wskazówkami użyje flagi –disable-python, nie mam pomysłu dlaczego to nie chce działać mimo tego ze przed chwila Python został zainstalowany, dodatkowa wersja gegla nie została zaktualizowana wiec zrobię to ręcznie, na początek usunę go za pomocą komendy *apt remove gegl*

A następnie pobiorę wymagana wersje za pomocą wget

```
root@debi&n:/home/patryk# ls
Desktop gegl-0.4.34.tar.xz Music Templates
Documents gimp-2.10.30 Pictures Videos
Downloads gimp-2.10.30.tar.bz2 Public
root@debian:/home/patryk#
```

Gegl został pobrany czas na rozpakowanie, jednak w pliku readme nie ma poradnika jak zbudować gegl wiec przeszukuje Internet i znajduje poradnik.



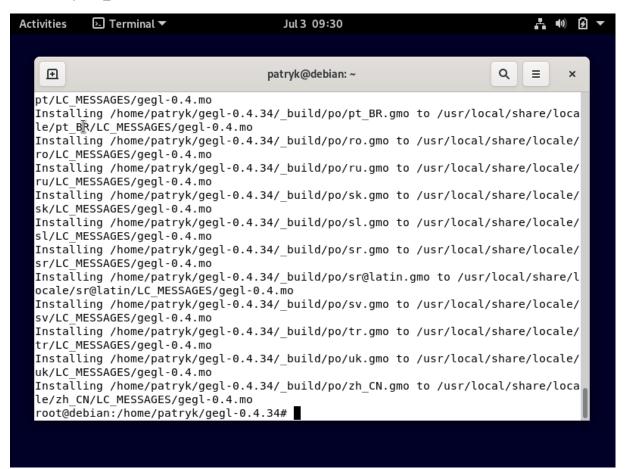
\$ meson _build

```
root@debian:/home/patryk/gegl-0.4.34# meson build
The Meson build system
Version: 0.56.2
Source dir: /home/patryk/gegl-0.4.34
Build dir: /home/patryk/gegl-0.4.34/ build
Build type: native build
Project name: gegl
Project version: 0.4.34
C compiler for the host machine: cc (gcc 10.2.1 "cc (Debian 10.2.1-6) 10.2
C linker for the host machine: cc ld.bfd 2.35.2
C++ compiler for the host machine: c++ (gcc 10.2.1 "c++ (Debian 10.2.1-6)
20210110")
C++ linker for the host machine: c++ ld.bfd 2.35.2
Host machine cpu family: x86 64
Host machine cpu: x86 64
Program python3 found: YES (/usr/bin/python3)
Compiler for C supports arguments -DHAVE CONFIG H: YES
Compiler for C supports arguments -Ofast: YES
Compiler for C supports arguments -DGEGL ENABLE DEBUG: YES
Compiler for C supports arguments -Winit-self: YES
Compiler for C supports arguments -Wmissing-declarations: YES
Compiler for C supports arguments -Wpointer-arith: YES
Compiler for C supports arguments -Wno-deprecated-declarations: YES
```

```
patryk@debian: ~ Q = x

root@debian:/home/patryk/gegl-0.4.34# ninja -C _build
ninja: Entering directory `_build'
[110/753] Compiling C object gegl/libg...33.1.p/buffer_gegl-buffer-iterator.c.o
```

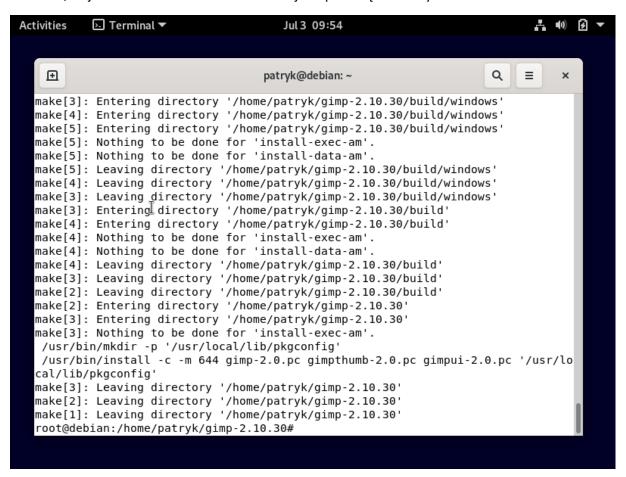
\$ sudo ninja -C _build Install



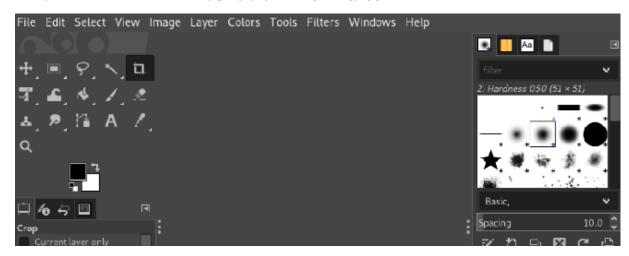
Po wykonaniu poprzednich komend ./configure działa

```
ⅎ
                                   patryk@debian: ~
                                                                      Q
                                                                           \equiv
                                                                                ×
 WMF:
                             no (libwmf not found)
 X11 Mouse Cursor:
                             ves
 XPM:
                             no (XPM library not found)
 Email:
                             yes (xdg-email)
Optional Modules:
                             nc (libasound not found or unusable)
 ALSA (MIDI Input):
 Linux Input:
                             yes (GUdev support: no (libgudev not found))
 DirectInput (Win32):
                             no
Tests:
 Use xvfb-run
                             no (not found)
 Test appdata
                             no (appstream-util not found)
 Test desktop file
                             ves
Bug report URL: https://gitlab.gnome.org/GNOME/gimp/issues/new
NOTE: if you plan on packaging GIMP for distribution, it is recommended
      to override the bug report URL with option:
        --with-bug-report-url=https://example.com/
      so that you can filter packaging bugs from core bugs before
      reporting upstream.
root@debian:/home/patryk/gimp-2.10.30#
```

Następnym krokiem jest kompilacja za pomocą komendy *make -j4,* po kompilacji która trwała ponad 10 minut, co jest bardzo dziwne czas na instalacje za pomocą komendy *sudo make Install*



Po wpisaniu w terminal komendy gimp pojawia się następujące okno



Wnioski:

Proces konfiguracji był strasznie długi i trudny, ogromna ilość zależności do zainstalowania, dodatkowo gegl nie posiadał w instrukcji żadnych przydatnych informacji na temat instalacji wiec wymagane było posiłkowanie się Internet. Błędy z pythonem2 których nie rozumiem, nie mam pomysłu dlaczego po instalacji pythona2 ./configure nadal nie działało, gdyby nie opcja wyłączająca pythona prawdopodobnie nie udało by mi się zainstalować GIMP.