

GTK4 és Code::Blocks 25.03 telepítése Debian GNU/Linux 13 operációs rendszerre

The GIMP Toolkit

Terminál

```
$ su root
```

Jelszó:

```
# apt-get update && apt-get upgrade
```

```
# apt-get install libgtk-4-dev
```

```
# apt-get install make
```

```
# apt-get install gtk-4-examples
```

```
# apt-get install highlight
```

```
# apt-get install codeblocks
```

```
# exit
```

Window

```
$ mkdir -p /home/user/CodeBlocksProjects/window
```

```
$ cd /home/user/CodeBlocksProjects/window
```

```
$ nano window.c
```

```
--
```

```
#include <gtk/gtk.h>
```

```
static void activate (GtkApplication *app, gpointer user_data)
```

```
{
```

```
    GtkWidget *window;
```

```
    window = gtk_application_window_new (app);
```

```
    gtk_window_set_title (GTK_WINDOW (window), "Window");
```

```
    gtk_window_set_default_size (GTK_WINDOW (window), 400, 400);
```

```
    gtk_window_present (GTK_WINDOW (window));
```

```
}
```

```
int main (int argc, char **argv)
```

```
{
```

```
    GtkApplication *app;
```

```
    int status;
```

```
    app = gtk_application_new ("hu.nye.inf.window", G_APPLICATION_DEFAULT_FLAGS);
```

```
    g_signal_connect (app, "activate", G_CALLBACK (activate), NULL);
```

```
    status = g_application_run (G_APPLICATION (app), argc, argv);
```

```

    g_object_unref (app);
    return status;
}
--

$ nano makefile

--
CC = gcc
CFLAGS = -Wall -O3 -std=c99
GTK_CFLAGS = `pkg-config --cflags gtk4`
GTK_LIBS = `pkg-config --libs gtk4`

all:
    @mkdir -p ./bin/Debug
    $(CC) $(GTK_CFLAGS) -o ./bin/Debug/window window.c $(GTK_LIBS)
--

```

```
$ ls -l
```

```
$ make
```

```
$ ls -l
```

```
$ ./bin/Debug/window
```

GTK4 Examples

```
$ ls -l /usr/share/doc/gtk-4-examples/examples
```

```
$ cat /usr/share/doc/gtk-4-examples/examples/README
```

```
$ cp -r /usr/share/doc/gtk-4-examples/examples /home/user/CodeBlocksProjects
```

```
$ cd /home/user/CodeBlocksProjects/examples/application9
```

```
$ make -f Makefile.example
```

```
$ ls -l
```

```
$ ./exampleapp
```

GTK4 Demo

```
$ gtk4-demo --list
```

```
$ gtk4-demo --run dialog
```

```
$ gtk4-demo
```

Code::Blocks

Code::Blocks start

Settings -> Compiler

Compiler Settings

Compiler Flags

General

Have gcc follow the 1999 C language standard [-std=c99]

Warnings

Enable all common compiler warnings (overrides many other settings) [-Wall]

Optimization

Optimize fully (for speed) [-O3]

Other Compiler Options -> `pkg-config --cflags gtk4`

Linker Settings -> Other Linker Options -> `pkg-config --libs gtk4`

OK

Code::Blocks restart

Hello World

Create a new project -> Console application -> Go -> C -> Next

Project title: hello_world

Folder to create project in: /home/user/CodeBlocksProjects/

Project filename: hello_world.cbp

Resulting filename: /home/user/CodeBlocksProjects/hello_world/hello_world.cbp

Next

Finish

--

```
#include <gtk/gtk.h>
```

```
static void print_hello (GtkWidget *widget, gpointer data)
{
    g_print ("Hello World\n");
}
```

```
static void activate (GtkApplication *app, gpointer user_data)
{
    GtkWidget *window;
    GtkWidget *button;
    GtkWidget *box;
    window = gtk_application_window_new (app);
```

```

gtk_window_set_title (GTK_WINDOW (window), "Window");
gtk_window_set_default_size (GTK_WINDOW (window), 400, 400);
box = gtk_box_new (GTK_ORIENTATION_VERTICAL, 0);
gtk_widget_set_halign (box, GTK_ALIGN_CENTER);
gtk_widget_set_valign (box, GTK_ALIGN_CENTER);
gtk_window_set_child (GTK_WINDOW (window), box);
button = gtk_button_new_with_label ("Hello World");
g_signal_connect (button, "clicked", G_CALLBACK (print_hello), NULL);
g_signal_connect_swapped (button, "clicked", G_CALLBACK (gtk_window_destroy),
window);
gtk_box_append (GTK_BOX (box), button);
gtk_window_present (GTK_WINDOW (window));
}

```

```

int main (int argc, char **argv)
{
    GtkApplication *app;
    int status;
    app = gtk_application_new ("hu.nye.inf.hello_world",
G_APPLICATION_DEFAULT_FLAGS);
    g_signal_connect (app, "activate", G_CALLBACK (activate), NULL);
    status = g_application_run (G_APPLICATION (app), argc, argv);
    g_object_unref (app);
    return status;
}

```

--

Rebuild

Run

Getting Started with GTK

https://docs.gtk.org/gtk4/getting_started.html