Note: The following command only needs to be executed once.

"export PATH=/home/pi/ultibo/core/fpc/bin:$PATH"

Compile the programs to run, from the command line, of the Rpi running Raspbian.

"fpc -B -Tlinux -Parm @/home/pi/ultibo/core/fpc/bin/fpc.cfg -O2 imgconv"

"fpc -B -Tlinux -Parm @/home/pi/ultibo/core/fpc/bin/fpc.cfg -O2 drawing"

"fpc -B -Tlinux -Parm @/home/pi/ultibo/core/fpc/bin/fpc.cfg -O2 interpoldemo"

"fpc -B -Tlinux -Parm @/home/pi/ultibo/core/fpc/bin/fpc.cfg -O2 xwdtobmp.pas"

Converts the bmp image to a png image.

"./imgconv b lena_rgb_2048.bmp P lena_rgb_2048.png"
Initing
Reading image
Writing image
 WriteImage, options=P
Grayscale FALSE - Indexed FALSE - WordSized FALSE - UseAlpha FALSE
Options checked, now writing...
Clean up

Converts the bmp image to a jpg image.

"./imgconv b lena_rgb_2048.bmp j lena_rgb_2048.jpg"
Initing
Reading image
Writing image
 WriteImage, options=J
Options checked, now writing...
Clean up

Converts the bmp image to a png image.

"./imgconv b lena_rgb_256.bmp p lena_rgb_256.png"
Initing
Reading image
Writing image
 WriteImage, options=P
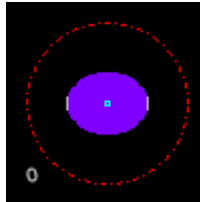Grayscale FALSE - Indexed FALSE - WordSized FALSE - UseAlpha FALSE
Options checked, now writing...
Clean up

"./interpoldemo" Scales the images lena_rgb_256.png to 64 x 64.

"./drawing" Creates the DrawTest.png

"sudo apt-get install x11-apps"

xwininfo: Please select the window about which you
        would like information by clicking the
        mouse in that window.

xwininfo: Window id: 0x1400004 "pi@raspberrypi3: ~/jpeg-2000-test/bare-metal/openjp"

  Absolute upper-left X: 738
  Absolute upper-left Y: 138
  Relative upper-left X: 2
  Relative upper-left Y: 30
  Width: 735
  Height: 510
  Depth: 24
  Visual: 0x21
  Visual Class: TrueColor
  Border width: 0
  Class: InputOutput
  Colormap: 0x20 (installed)
  Bit Gravity State: NorthWestGravity
  Window Gravity State: NorthWestGravity
  Backing Store State: NotUseful
  Save Under State: no
  Map State: IsViewable
  Override Redirect State: no
  Corners: +738+138 -447+138 -447-432 +738-432
  -geometry 80x24+736+108

"xwd -id 0x1400004 -out myshot.xwd"

"./xwdtobmp myshot.xwd tt.bmp"

```
-rw-r--r-- 1 pi pi  417774 Sep 16 12:23 libdwtlift.a
-rw-r--r-- 1 pi pi  417774 Sep 16 12:23 libopenjp2.a
when ./compile.sh is executed should be 23
Word count libopenjp2_obj.txt in /home/pi/t_ultibo/src/lib/openjp2
plus dwtlift.o
 23  23 190 libopenjp2_obj.txt
pi@raspberrypi3:~/jpeg-2000-test/bare-metal/openjp $ rm -f uinterpoldemo.pp
pi@raspberrypi3:~/jpeg-2000-test/bare-metal/openjp $ ls
100CR.bmp                disp_rgb.m            opj_decompress
1024x1024blue.png        dwtlift.c             opj_dump
1024x1024green.png       dwtlift.h             opj_stdint.h
1024x1024lift4resol.png  dwtlift.o             red-out.32t
1024x1024red.png         DWT_LIFT_RPi2.elf     sd-card
2048_2048.jpg            DWT_LIFT_RPi2.lpr     setpath.sh
bb                       DWT_LIFT_RPi2.o       uBufferToC.pas
blu-out.32t              format_defs.h         uBufferToC.ppu
cmdstftp                 grn-out.32t           uliftbitmap.o
compile.sh               kernel7.img           uliftbitmap.pas
decompressed.jpg         libdwtlift.a          uliftbitmap.ppu
decomp-sd-card           libopenjp2.a          uTFTP.o
dis_libopenjp2.txt       libopenjp2_obj.txt    uTFTP.pas
dis_orig_libopenjp2.txt  openjpeg.h            uTFTP.ppu
disp_decomp_rgb.m        opj_config.h
pi@raspberrypi3:~/jpeg-2000-test/bare-metal/openjp $
```