

To install and run DinerolV proceed as follows:

Requirement: a Linux system.

Step 1

In Linux create a project directory (ex: oc-lab1) and change to that directory

```
~ > mkdir oc-lab1  
~ > cd oc-lab1
```

Download Dinero IV (d4-7.tar.gz) from <ftp://ftp.cs.wisc.edu/markhill/DinerolV> in that directory.

Step 2

Unzip and untar the downloaded file by running the following command in the terminal window:

```
oc-lab1 > gunzip d4-7.tar.gz
```

(The file name changes to d4-7.tar)

```
oc-lab1 > tar -xvf d4-7.tar
```

(A new folder is created called **d4-7**)

Step 3

Change to the **d4-7** folder that was created in Step 2 and compile dinero using the following commands:

```
oc-lab1 > cd d4-7  
d4-7 > ./configure
```

(this setups dinero installation)

```
d4-7 > make
```

(this creates the executable **dinerolV**)

Step 4

Inside a terminal window create a **test** directory under **oc-lab1**, change to that directory and download the source file of the motion estimation algorithm (`motion_estimation.c`), as well as the input pixel data file (`table_tennis_qcif_3frames.yuv`), from the course webpage.

In that working directory compile the source file, by issuing the command:

```
test > gcc motion_estimation.c -o motion_estimation
```

Then Run the compiled executable file:

```
test > ./motion_estimation
```

Step 5

Inside a terminal window you may then use `dinero` from your working **test** directory as follows (adapt to your directory structure and to the command options and trace files).

```
test > ../d4-7/dineroIV -l1-usize 8k -l1-ubsize 8  
-l2-usize 128k -l2-ubsize 16 < trace.log
```