THE

TINY CORE LINUX

HANDBOOK

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INTRODUCTION

Tiny Core Linux is a fast and small linux distribution.

tinycorelinux.net/
http://distro.ibiblio.org/tinycorelinux/

It runs well on old computers even on a P233 80MB of RAM

Recommended hardware is Pentium 2 or better, 128mb of ram + some swap
Minimum of RAM is 46mb.
Microcore (the version without a graphical user interface) runs with 28mb of ram. The minimum cpu is i486DX (486 with a math processor).

There are other Linux distributions for old hardware but they need more RAM or CPU power
For example:

Puppy Linux
http://www.puppylinux.org/wikka/MinimumSystemRequirements
People have succeeded in running Puppy with a 333MHz CPU and 64MB. To be comfortable 256MB RAM and a 512MB swap file will run smoother.

Lubuntu
Lubuntu can be installed on a Pentium II or Celeron system with 128 MB of RAM, but such a system would not perform well enough for daily use. With 256MB - 384MB of RAM, the performance will be better and the system will be more usable.

Baslinux
This stripped down version of Slackware 3.5 needs less power than Tiny Core Linux. It can run on 386 and 486 but can not run programs like OpenOffice etc...
http://distro.ibiblio.org/baslinux/

Windows XP support ends April 8, 2014
In April 2013 38,31% of the desktop computers still used Windows XP
So instead of having to buy the next version of Windows and then the next one and then have to change your computer because it is to slow to run it, you have time to experiment with Linux. You could keep XP on a partition of your hard disk to run programs that you don't find for Linux and use Linux for the rest.

On new computers Tiny Core Linux boots ultra fast.
DOWNLOADING TINY CORE LINUX

The official website is
tinycorelinux.net/
http://distro.ibiblio.org/tinycorelinux/

Download the latest release directly from:
http://distro.ibiblio.org/tinycorelinux/downloads.html
Select “Core Plus” especially if you have a non US keyboards
Direct link:
http://distro.ibiblio.org/tinycorelinux/4.x/x86/release/CorePlus-current.iso
66 Mb

Write this iso file to a cd
You have to write it as a Disk Image not as a regular file.

If you have the Nero Burning Software:
In Nero Express choose « Disk Image or saved project »
Nero Burning ROM in the Recorder menu choose « Burn Image »

With Windows 7 you do not need additional software: http://windows.microsoft.com/fr-fr/windows7/burn-a-cd-or-dvd-from-an-iso-file

For Microsoft Windows XP/2003/Vista you can use: http://www.freeisoburner.com/

Once your cd is read if you open it and see a .iso file, you didn't burn it as a disk image and it won't boot.
LIVE-CD MODE

By running Tiny Core Linux from the CD-Rom you can try it without installing it or having to create a partition for it.

http://youtu.be/EBJB95AlsZY

Put the cd in your computer and boot from it.
You may have to change the boot sequence in the BIOS so that it boots from the CD and not from the hard disk (press DEL or F11 when the computer starts)

If the mouse is not working or if you don't see the whole screen read the next chapter.

The disadvantages of the Live-CD mode are:
-on old computers the cd player is usually slow so the boot takes much longer.
-the cd-drive is used by the Linux Live-CD so you can not read another one.
-if you hard drive doesn't use the a supported file system but NTFS (used since Windows NT and XP) it is read only and you won't be able to save your settings. Supported file systems are ext2, ext3, ext4, vfat, or fat.

The live-Cd mode is mainly used to try Tiny Core Linux or to use it as a rescue system when Windows doesn't boot anymore.

Example:
Saving files from a computer on a USB-pendrive.

Boot from the live-CD
With the Mount Tool in the Icon Bar Mount the hard drive and the USB-Penddrive so that they are green
open a terminal window
Go to the hard disk
cd /mnt/sda1
List the content
ls -ail
go to a directory where there are files to save:
cd mydirectory
cd mysubdirectory
use TABULATOR if you don't want to type long names
if there a directory names with spaces use quotation marks. Like “Documents and Settings”
copy all the files to the pendrive:
cp * /mnt/sdb1/
* means all the files
*.doc means all .doc files
to copy directories and subdirectories use “-r” (recursive):
cp -r mystuff /mnt/sdb1/

Before unplugging the pendrive shut down the computer with the Exit Icon or Unmount the pendrive with the mount tool so that it is red.
THE GRAPHICAL USER INTERFACE

Setting up the right screen resolution and mouse parameters

If the graphical environment is not set up properly i.e if you don't see the whole screen or if your mouse is not working press ctrl+alt+backspace

This stops the graphical environment and brings you to a text terminal
Type
xsetup
choose a screen resolution
(if there are a lot of mode type “n” to see all of them)
choose a mouse type

Type
startx

The Tiny Core Linux desktop

http://youtu.be/bbYeU5WB-eI

The icons at the bottom of the screen are called the tc-wbar

Exit

**Shutdown**
Reboot
Exit to prompt
Choose to backup and where

Terminal

where you can run linux/unix-like commands “ls”, “cd /mnt/”, “cd ..” etc...

Editor

An easy to use text editor like Notepad or WordPad under Windows

ControlPanel

Backup/Restore where to backup
Date/Time
Network
tcWbarConf Configure the icons at the bottom of the screen

**Mount Tool green to have access to other partitions or disks**
Mouse Tool parameter the mouse
System Stats see CPU, memory usage etc...
Wallpaper choose a wall paper
crond enables users to schedule jobs (commands or shell scripts) to run periodically at certain times or dates. dhcp Dynamic Host Configuration Protocol see Network where you can choose to use DHCP Broadcast tftp a server for the Trivial File Transfer Protocol. The TFTP protocol is extensively used to support remote booting of diskless devices. Swap File Tool choose on which partition to create a swap file. tcl.swp and its size In kilo bytes. Don't create a swapfile on a NFTS partition! Terminal Server Xvesa parameter Xvesa graphical interface

Apps : install .tcz applications

ScmApps . install .scm (Self-Contained Mountable) applications

RunProgram

**MountTool green to have access to other partitions or disks**

ecz ezremaster : to create a .iso file to burn a customized TCL Live-CD

TC_Install : If you want to install TCL to the hard drive or a USB-stick

If you add .tcz or .scm programs there icon will be added to the wbar

**The Mouse menu**

#youtube video

If you click somewhere on the screen a menu will appear it gives access to the desktops and the running applications

Applications:
You can start applications from here or from the bottom icon menu. Contains only ezremaster and TC_Install if no other .tcz or .scm modules are loaded
OnDemand: start the .tcz or .scm applications installed as OnDemand with Apps or ScmApps
SystemTools:

- Apps
- ControlPanel
- Editor
- Exit
- MountTool
- RunProgram
- ScmApps
- ScreenShote
- Services
- SetTime
- tc-wbarconf
Terminal
Top shows system statistics and process list in a Terminal
Xkill choose this and click on a window to kill a freezed application
New desktop creates a new desktop use the right click menu to switch between desktops
Exit

In the beginning the important ones are:

Exit to shutdown your computer properly

Mount tool to have access to all the drives, CDs, USB-pendrive. Green means mounted (usable)
HOW TO SAVE YOUR SETTINGS (PERSISTENCE)

In Tiny Core Linux all the settings, user files and programs are saved in a directory called /tce (Tiny Core Extension)

If you run Tiny Core Linux from a Live-CD in the case your hard-drive has a FAT File system, the one used before Windows NT and XP you can:
- simply create a /tce directory under Windows then boot the Live-CD
- or setting the tce directory under Linux by using Apps Browser (http://youtu.be/KzMH72LTfg0):
  - Click on the Mount Tool icon in the menu at the bottom of the screen
  - Click on the partition/drive on which you want to create the tce directory so that it gets green
  - Click on the Apps Browser icon in the menu at the bottom of the screen
  - Click on the “Set” button in the right lower corner of the windows
  - Choose the partition/drive on which you want to create the tce directory

If your hard-drive uses NTFS this doesn't work because by default Tiny Core Linux can not write on a NTFS partition. In this case consider installing Tiny Core Linux on a free partition or on a pendrive as explained in the next chapters. But if your computer has an USB-port you can simply create a /tce directory on a FAT, VFAT, EXT2, EXT3, EXT4 pendrive. In this case as opposed to a real installation on a pendrive you won't lose the data that was previously on that drive and you will still be able to use it under Windows.

A back up of your settings and files is made when you exit Tiny Core Linux with the Exit icon (on/off button)

You can also run a backup anytime by choosing “Back up” and “go” in Control Panel - Backup/Restore

Your back-up will be saved as a compressed file called mydata.tgz in the /tce directory

he main directory saved are:
/home/tc/ called $HOME or ~
/opt/

other files/directories to save are found in the file
/opt/filetool.lst
files/directories excluded from the back-up are found in in /opt/.xfiletool.lst

You can add files/directories names manually (without the leading “/”) with the editor to these .lst files.

For more information if needed see also:
http://wiki.tinycorelinux.net/wiki:persistence_for_dummies
INSTALLING TINY CORE LINUX ON A HARD DISK/FREE PARTITION

You can install Tiny Core Linux on your hard drive on the whole disk or on a free partition.

Usually you will have to create a new partition for it. See the appendix ### for partitioning tools like gparted or cfdisk

Once you have a free partition it is quite easy:

http://youtu.be/6TOBkRrsq8Y

**Warning if you select the wrong partition or disk you will lose all your data on it!**

None of the partitions on the target disk should be mounted before launching the installation!
If Windows and Tiny Core Linux are on the same disk you have to check Mark Partition Active (bootable).

Eject CD after shutting down

This installation will create the /tce/ and /tce/optional/ directories so you don't have to do it manually as when you run Tiny Core Linux from the Live-CD.
INSTALLING TINY CORE LINUX ON A USB-PENDRIVE

The advantages of an installation to a USB-pendrive are:
- you can take your system with you anywhere
- it is faster than a Live-CD
- if your hard drive uses NTFS and you can't or don't want to repartition it, you can still have persistence (save your settings and files)

http://youtu.be/YnPEAb2PMu8

All the data on the pendrive will be lost. Its size should be at least 512 MB.

USB-HDD is obvious the entire pendrive is used and seen as a hard disk drive.
USB-ZIP usually only for older computers that had BIOS that supported booting from an actual ZIp drive.

Warning carefully choose the disk: usually the pendrive is sdb...
if you choose your hard drive partition by error you will lose all your data on it!

Never put a swap partition on a USB drive, as this results in a lot of writing to it, and will greatly shorten its life. Use a non-journaling file system to minimize the amount of writing to the drive.
When installing Tinycore, ext2 is ideal.

When finished reboot without backup.

If your computer doesn't boot from the pendrive you might have to change the BIOS boot sequence http://youtu.be/1-om762V7sQ

This installation will create the /tce/ and /tce/optional/ directories so you don't have to do it manually as when you run Tiny Core Linux from the Live-CD.
EMBEDDED INSTALLATION WITHIN WINDOWS

#Not tried yet

http://wiki.tinycorelinux.net/wiki:grub4dos#howto_install_tiny_core_linux_inside_a_microsoft_windows_system
http://wiki.tinycorelinux.net/wiki:linld
Select Embedded. (Select Embedded when installing Tinycore in the same partition as Windows. Select Frugal when installing Tinycore in a separate partition.)
APPLICATIONS/EXTENSIONS

Tiny Core is a small distribution that you can expand by adding extensions.

Some of the application you might want to install are:

File Manager emelfm, mc (midnight Commander), pcmmanfm, xfe
CD/DVD burning tool Brasero, flburn
Web Browser Opera*, Firefox
Word processor AbiWord, OpenOffice Write (oo2***), LibreOffice*** Writer
Spreadsheet Gnumeric, OpenOffice Calc (oo2***), LibreOffice*** Calc
Image Editor gimp Gnu image manipulation program (like Photoshop)
Video Player vlc Media player plays most audio and video formats
Calculator galculator
PDF Reader xpdf, zathura
Chess game xboard

* Opera requires at least 24 bit resolution.
** oo2.scm may also require gtk2.tcz and/or its dependencies for extra functionality...and
libIDL.tcz, libxslt.tcz
***LibreOffice requires a lot of RAM and storage. On a old computer it is better to use OpenOffice
2.0. On very old machines use AbiWord and Gnumeric instead.

There are two kinds of file format for extensions/applications:
.tc2 and .scm

.tc2 extensions are installed by using the icon Apps (AppBrowser) in the bottom menu

.sc2m extensions are installed by using the icon ScmApps in the bottom menu
SCM (Self-Contained Mountable) extensions are self contained extensions which are
mountable/unmountable. When a SCM extension is loaded, it is mounted under the /apps/ directory
and only a few symbolic links are created in order to put the extension binaries in the system path
and to load a desktop menu item/icon. SCM extensions can easily be unmounted/removed without a
reboot.

You can install extensions as:
OnBoo2t
OnDemand
Download + Load (only for .tc2)
Download Only

For most applications an icon will be added to the bottom menu (wbar). Their name also appear in
the mouse menu.

Installing extensions while connected to the Internet

If your Internet connection is working, installing extensions is very easy: in AppBrowser or
ScmApps click on Apps - Cloud (Remote) – Browse to see all the available extensions. If you click on one you can read its description in the info Panel.

You can also search for a specific extension/application with the “Search” field for example “emelfm” or “file manager”.

Installing extensions manually without being connected to the Internet

If your computer is not connected to the internet you can download the .tcz or .scm files with an online computer from:

tinycorelinux.net - download - Extensions - Browse TCZs
http://distro.ibiblio.org/tinycorelinux/4.x/x86/base-locale.tcz
/tcz/

tinycorelinux.net - download - Extensions - Browse SCMs
http://distro.ibiblio.org/tinycorelinux/4.x/x86/scm/
(md5.txt files are required for .scm)

save them to CD/floppy/pendrive
then copy them to the tce/optional/ directory
In AppBrowser or ScmApps use “Apps -> Maintenance -> OnDemand Maintenance or OnBoot Maintenance” to install the extension.

The problem is that you also have to download the dependencies listed in the .dep files.
For .scm files or some extensions like pppoe.tcz that don't have many dependencies you can do it manually. If there are a lot of dependencies you can:

- Download the extensions with tiny Core Linux's AppBrowser or ScmApps on another computer and then copy the content of /tce/optional/ to the other machine.

- Use tczdwnld.exe
It is a small Windows program downloadable from http://tinycorelinux.inf.hu
It downloads a .tcz file with all its dependencies into the directory where it is launched.

- Use a Cygwin script
http://forum.tinycorelinux.net/index.php/topic,7243.msg41574.html#msg41574
http://cygwin.com/install.html
Cygwin enables to run Linux scripts under Windows
you might also be able to use/adapt this script with another distribution of Linux.

Always read the .info file before downloading an extension.
One of the first extension you probably want to add is a File Manager. Emelfm is easy to use and also works on old computers. Xfe seems to have some problems. Midnight Commander might be too difficult to use for beginners.
Example: installing the file manager Midnight Commander (mc) without internet connection

http://youtu.be/gicsK_x9jik

On another computer or with an operating system with which internet is working, manually download all the files starting with mc.scm* with right click “save target as” from the tiny core linux website: download -> Extensions -> Browse SCMs

http://distro.ibiblio.org/tinycorelinux/4.x/x86/scm/

copy the files to /tce/optional/

In this examples the files are on a USB-pendrive and Tiny Core Linux is installed on the partition sda2

After mounting the pendrive with MountTool, in a Terminal type:
cp mc.scm* /mnt/sda2/tce/optional/

Then with ScmApps -> Apps -> Maintenance -> OnDemand Maintenance select mc and press “Add Item”

An icon is added in the bottom bar. The program can also be launched by the mouse menu.

More Information:
http://tinycorelinux.net/download_howto.html
BASIC CONFIGURATION

Non-US keyboard configuration

http://youtu.be/0dvW8sWbTrg

If you have installed Tiny Core Linux with support for Non-US keyboard layout then the extension kmaps.tcz is already installed and launched as OnBoot. If not download it from http://distro.ibiblio.org/tinycorelinux/4.x/x86/tcz/ and add it Apps-Apps-Maintenance-OnBoot Maintenance Add Item

To see which keyboards are available have a look at the content of the subdirectories of /usr/share/kmap/
You can do that with a File Manager like mc (Midnight Commander)
Or in a terminal with:
cd /usr/share/kmap/
and then
ls qwertz

Once you have found the name of your keyboard for example “de-latin1” with the editor add the command

loadkmap < /usr/share/kmap/qwertz/de-latin1.kmap
to /opt/bootlocal.sh (without sudo because bootlocal is executed as root)

Reboot with back-up. If the keyboard still isn't the good one try another one for example de.kmap.

SWAP

A swap file or partition is needed so that when running out of memory (RAM) the system can use disk space as extended memory.

With Tiny Core Linux you don't need to create a special partition for that: you can use a swap file instead.

With the Swap File Tool located in the Control Panel choose on which partition to create a swap file. tcl.swp and its size in kilo bytes.

ControlPanel - Swap File Tool
Mounted Partition /mnt/sda1
tc.swp in k bytes

You can specify a FAT partititon, and on the partition on which Tiny Core is installed. Don't create a swapfile on a NFTS partition!

Usually specify a swap file size which is the double of the RAM size.
Sound

For the sound to work you can choose between two extensions: ALSA and OSS

**Advanced Linux Sound Architecture (ALSA)**

Download the extension alsa.tcz and its dependencies.
Add it as onBoot

Type
/usr/local/etc/init.d/alsasound start
then:
alsactl store

With the editor and the following two lines to /opt/.filetool.lst
opt/alsa
etc/modprobe.conf

With the editor add
/usr/local/etc/init.d/alsasound start
to /opt/bootlocal.sh

Reboot with a back-up
CONNECTING TO THE INTERNET

WIFI

If you have a WIFI you can connect with the icon at the bottom of the screen

Dial-up

```bash
##  pppsetup.tcz is for dial-up connection

pppoe-DSL connection

ppp = point to point
pppoe = point to point over internet
dhcp = dynamic host configuration protocol (yes if cable modem and DSL?)

Summary to setup a pppoe-DSL connection:

Download pppoe.tcz and its dependency pppd.tcz from
http://distro.ibiblio.org/tinycorelinux/4.x/x86/tcz/
(Remark: pppsetup.tcz is for dial-up connection and is not needed)
Copy them to /tce/optional/
In a terminal type: sudo ifconfig eth0 down
With Apps install pppoe.tcz as Load App Locally
pppoe creates the directory /etc/ppp/ with some files in it
The trickiest part is that the configuration file /etc/ppp/pppoe.conf is a read only symbolic link,
so if you run pppoe-setup you get an error at the end.
So first you have to open /etc/ppp/pppoe.conf with the editor
save it as /etc/ppp/pppoe.conf.sample
remove the symbolic link
sudo rm /etc/ppp/pppoe.conf
Replace it by the copy
you can do that with with the editor by saving the file pppoe.conf.sample as pppoe.conf
or in a terminal with: sudo cp /etc/ppp/pppoe.conf.sample /etc/ppp/pppoe.conf
Exit the Editor
now you can do the set up (as root):
sudo pppoe-setup
answer the questions
interface: default: eth0
DNS:
For the requested internet connection setup parameters if your connection is working under
Windows type: ipconfig /all in a MS-DOS window, this shows the right DNS server(s).
Firewall: 1
```
after the setup you can relaunch ethernet: sudo ifconfig eth0 up
and connect to the internet with: sudo pppoe-start
There are also the commands pppoe-stop and pppoe-status

Now you should be able to install applications from the cloud with Apps or ScmApps

If the connection is not working have a look at the outputs of:
ifconfig
cat /etc/hosts
cat /etc/resolv.conf
route

You can also test your connection with ping
For example: ping 8.8.8.8
or
ping www.google.com

To make the settings persistent, with a editor add the 2 lines (without leading or ending “/”)
etc/ppp
etc/resolv.conf
to /opt/.filetool.lst
This will backup the ppp directory and the resolv.conf file at shut-down.

Exit-reboot with a backup

You have to back-up the whole etc/ppp directory.
At boot pppoe recreates /etc/ppp/ but it is then replaced by the backup one.
Pppoe must be OnBoot and not OnDemand because you would always lose the content of /etc/ppp/
when launching it.

http://youtu.be/RXQOSXry0dc

working:
http://youtu.be/I3LeCo5v2CI

Sometimes it helps to do:
sudo ifconfig eth0 down
sudo ifconfig eth0 up

Not sure if and when you have to do something with ControlPanel->Network

In this case it was set to DHCP yes
MISCELLANEOUS TIPS

See hidden files in Emelfm

With the file manager emelfm press the “H” button to see the hidden files

Shutdown from the command line

The shutdown command doesn't exist in Tiny Core Linux
To shut down the system from the console use: sudo poweroff
To reboot the system from the console use: sudo reboot
To shut down the system from a terminal in the graphical interface: exitc

Default login and password

The default login is: tc with no password

Cut and paste

To cut and paste in Linux one simply highlights the text with the left mouse button and then press the middle button to paste. If you have a two button mouse you would paste by pressing the left and right button together. Cutting and pasting takes a little practice, but is very efficient after one gets used to it.
Many terminals and apps also support **shift-insert** to paste.

Useful Linux terminal commands

<table>
<thead>
<tr>
<th>Command</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>ls</td>
<td>lists the files in a directory</td>
</tr>
<tr>
<td>ls -ail</td>
<td>the same with more details</td>
</tr>
<tr>
<td>cd</td>
<td>move to the parent directory</td>
</tr>
<tr>
<td>cd ..</td>
<td>move to the home directory ($HOME)</td>
</tr>
<tr>
<td>cd ~</td>
<td>move to the home directory ($HOME)</td>
</tr>
<tr>
<td>pwd</td>
<td>display the path of the current directory</td>
</tr>
<tr>
<td>cp</td>
<td>copies a file</td>
</tr>
<tr>
<td>df .</td>
<td>displays the space left on the current partition</td>
</tr>
<tr>
<td>clear</td>
<td>clears the screen</td>
</tr>
<tr>
<td>sudo</td>
<td>execute the command as super-user (root)</td>
</tr>
</tbody>
</table>

In a terminal while typing a file name, pressing TAB gives the end of the name
How to switch between the graphical mode and the text terminal:

ctrl+alt+f1 (terminal) / f2 (graphical environment)

How to use a floppy disk

install and launch mtools.tcz
then you can use commands like:
mdir a:
mcopy a:f1 f2
MD5 Check sum

With Windows:
.md5 (remove .txt) check in total commander
If you have Total Commander you can use it check the MD5 checksum. All you need to do is create
a simple text document (shift+F4) with .md5 extension, enter name of the file and paste md5
checksum
(e.g. setup_fallout.exe b8ba91ff4ebfb17ab77ded493da273d5). Save this file, double click it and TC
will do the check-up.

With Tiny Core Linux
Open a terminal
Go to the directory where the file is located: cd d1/d2/
Type md5sum filename
compare the result to the number given (contained in the file ...tcz.md5.txt for extensions)

http://wiki.tinycorelinux.net/wiki:md5sum

Getting help

First of all read the following

http://wiki.tinycorelinux.net/wiki:getting_started
http://wiki.tinycorelinux.net/wiki:start
http://tinycorelinux.net/faq.html
http://distro.ibiblio.org/tinycorelinux/screenshots.html

Search the forum for your problem. Maybe it was already answered there. If not ask a question
there.

http://forum.tinycorelinux.net

You can also use the canal #tinycorelinux on IRC Chat https://webchat.freenode.net/
To connect
/join #tinycorelinux
http://www.mirc.com/servers.html
http://www.technerd.net/irc-commands.html
http://www.ircbeginner.com/ircinfo/m-commands.html

Linux links

http://www.tuxfiles.org/linuxhelp/shortcuts.html
http://www.tuxfiles.org/linuxhelp/linuxcommands.html
The Linux Documentation Project:
http://tldp.org/
APPENDIX

Links

**English**

http://wiki.tinycorelinux.net/wiki:getting_started
http://wiki.tinycorelinux.net/wiki:start
http://tinycorelinux.net/faq.html
http://distro.ibiblio.org/tinycorelinux/screenshots.html
http://forum.tinycorelinux.net
https://webchat.freenode.net/
/join #tinycorelinux
http://kmattox.hubpages.com/hub/TinyCore-Linux-The-Biggest-Little-Operating-System-In-The-World
http://www.parkytowers.me.uk/thin/Linux/TinycoreFB.shtml
http://partedmagic.com/doku.php?id=creating_the_livedvd_with_nero
http://www.linux.com/Distros/osIntroToTinyCore.php
http://gr8idea.info/os/tutorials/tiny-core/install.html
http://distro.ibiblio.org/tinycorelinux/faq.html#bootcodes
Remote desktop
http://itekblog.com/tiny-core-linux-remote-desktop-kiosk/

Tiny Core Linux File Architecture and Boot Process
http://www.youtube.com/watch?v=IFxXeDKgymM

**In Hungarian - Magyar**

http://tinycore.hupont.hu/3/elso-lepesek-telepites-utan

**In German - Deutsch**

FAQ
http://forum.tinycorelinux.net/index.php/topic,1638.msg9055.html#msg9055
Programming

**Freebasic**

Download:
freebasic.tcz and dependencies

install and run the extension

then in a terminal type:
sudo usr/local/bin/FreeBASIC-0.23.0-linux.run install

after that you can use
fbc myprog.bas
to compile a program
and
./myprog to run it

With the editor copy the long command after “sudo” above in a file called basic located in the
directory .local/bin/ (subdirectory of $HOME)

chmod +x basic

sudo basic

so next time you just have to type « basic » instead of the ling command.

Documentation and examples are located in /usr/local/share/freebasic/

**Java**

openjdk-7.tcz and its dependencies

In a terminal type
sudo editor /etc/profile.d/java.sh
add the following lines
export JAVA_HOME=/usr/local/openjdk-7
export PATH=$PATH:$JAVA_HOME/jre/bin
save it

Then type editor /opt/.filetool.lst and add line
tc/profile.d/java.sh
save it

You now have the export path set in the /etc/profile.d/java.sh file
**For system wide amendments (i.e. all users including 'root') all /etc/profile.d/*.sh**
files will be sourced from the system-wide profile (i.e. /etc/profile).

Reboot

To check that it is installed correctly in terminal type:

echo $JAVA_HOME

and

echo $PATH

Type

djavac myprog.java

to compile a program

and

djava myprog

to run it

To run a .jar java program use: java -jar

For example in your file manager associate .jar files with “java -jar”

Scripting

Usually the name of scripts files end with .sh

and the first line is

#!/bin/sh

to be able to execute a file use:

dchmod +x script1.sh

To execute it type:

./script1.sh

To be able to run a program without the «./» they must be located in a directory in the PATH.

PATH is a system variable to specify where executable programs are located. If you type
decho $PATH their list will be displayed. You can put your scripts into /home/tc/.local/bin

There are several different files that can be used for executing commands at startup:

- /opt/bootlocal.sh is executed as 'root' (so does not need commands to be preceded with sudo) before any user process (e.g. the X server) is running. Since it gets called in an asynchronous way there is a small chance of a race condition. It is typically seen as the best place to start services like a web server or set up WLAN.
- files in ~/.X.d (e.g. ‘~/.X.d/wbar’) are executed as the respective user (e.g. ‘tc’) after the X server and the WM are running. This would be a suitable place for GUI applications run by the user (e.g. a clock applet).
- ~/.profile (and ~/.ashrc) can be used to include settings (or execute commands) that are user-specific and apply to each shell used by the user. For system wide amendments
(i.e. all users including 'root') all /etc/profile.d/*.sh files will be sourced from the system-wide profile (i.e. /etc/profile).

http://www.siteduzero.com/informatique/tutoriels/reprenez-le-controle-a-l-aide-de-linux/read-demander-une-saisie

http://www.siteduzero.com/informatique/tutoriels/reprenez-le-controle-a-l-aide-de-linux/echo-afficher-une-variable

More configuration

**Flash**

**Skype**

**The Java browser plugin**

To enable the java in browsers (mine are Epiphany and Chromium) do the following.

In terminal: cd /usr/lib/mozilla/plugins (or path to your plugin dir/symlink)
sudo ln -s /usr/java/jdk1.6.0_21/jre/lib/i386/libnpjp2.so (or path to plugin you need)

editor /opt/.filetool.lst add line

usr/lib/mozilla/plugins/libnpjp2.so (or path to your plugin dir/symlink)

and save

Reboot and visit http://www.javatester.org/version.html to check if it is working.

http://forum.tinycorelinux.net/index.php?topic=7397.0
Partitioning

# to come

http://www.maximumpc.com/article/howtos/how_to_repartition_your_hard_drive_for_free_without_formatting_or_losing_data

Gparted on Puppy LiveCD
http://puppylinux.org/wikka/InstallationFullHDD

Partedmagic
Note: 64 and 32 bit kernels are both included by default. Other download locations are at the bottom of this page.
Includes: i586 without PAE/SMP and i686 only build.
http://digitalincursion.net/parted-magic/
If the Extlinux bootloader is used, it needs to be in a primary partition.
A swap partition, which may be called swap area or Linux swap, enables part of the hard drive to be used like extra RAM. A suggested size is double the amount of RAM. Any partition, primary or logical, can be used for swap. However, it is common practice to use the first logical partition.
When using Extlinux, the partition containing Extlinux needs to be Active or Boot.

When using Grub, the partition containing Windows needs to be Active or Boot.

Only primary partitions can be set as Active or Boot. So both Extlinux and Windows need to be in a primary partition.

The Active or Boot partition can be changed after installing operating systems, by running GParted, selecting the partition, and setting the flag. This can be done with Parted Magic.

gparted.tczo
parted.tczo
gtkmm.tczo

Experienced users may use fdisk, mkfs.ext4 and mkswap, instead of GParted.
http://tldp.org/HOWTO/Partition/fdisk_partitioning.html
In versions of the Windows NT operating system line from Windows 2000 onwards, fdisk is replaced by more advanced tool called diskpart
Most DOS fdisk programs, including the fdisk program that came with the original Windows 95, are only capable of creating FAT partitions of types FAT12, FAT16 and FAT16B.

A derivative of the MS-DOS fdisk was provided with Windows 95, Windows 98, and later Windows Me. Only those fdisk versions shipping with Windows 95B or later are able to manipulate FAT32 partitions. Windows 2000 and later do not use fdisk, they have the Logical Disk Manager feature, as well as DiskPart.

Unlike the fdisk programs for other operating systems, the fdisk programs for DOS and Windows 9x/Me not only alter data in the partition table, but will also overwrite many sectors of data in the partition itself.[citation needed]
(However, to create an extended partition any partition editor must put extended boot records before each logical drive on the disk.) Users must be sure the correct disk/partition has been chosen before using a DOS/Windows fdisk for partitioning. The fdisk /mbr switch is undocumented but well known for repairing the master boot record.

The implementation of fdisk in FreeDOS has many advanced features and is free software.
http://www.fdisk.com/fdisk/
FDISK not good for NTFS

http://partitionlogic.org.uk/download/index.php
  • Cannot resize FAT or EXT filesystems.
  • No hardware support for serial mice

http://www.techsupportalert.com/content/best-free-partition-manager.htm
http://www.zeleps.com/
http://www.ranish.com/part/

Knoppix sudo parted

**ABBREVIATIONS**

<table>
<thead>
<tr>
<th>Abbreviation</th>
<th>Description</th>
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<tbody>
<tr>
<td>ALSA</td>
<td>Advanced Linux Sound Architecture</td>
</tr>
<tr>
<td>dhcp</td>
<td>dynamic host configuration protocol</td>
</tr>
<tr>
<td>FAT</td>
<td>File Allocation Table. File system for older version of Windows</td>
</tr>
<tr>
<td>NTFS</td>
<td>New Technology File System. File system for Windows since Windows NT</td>
</tr>
<tr>
<td>OSS</td>
<td>Open Sound System</td>
</tr>
<tr>
<td>ppp</td>
<td>point to point</td>
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<tr>
<td>pppoe</td>
<td>point to point over internet</td>
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<tr>
<td>SCM</td>
<td>Self-Contained Mountable (extensions)</td>
</tr>
<tr>
<td>TCE</td>
<td>Tiny Core Extensions. The name of the directory where the extensions are located</td>
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<tr>
<td>TCL</td>
<td>Tiny Core Linux</td>
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<td>TCZ</td>
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