Commodore Free

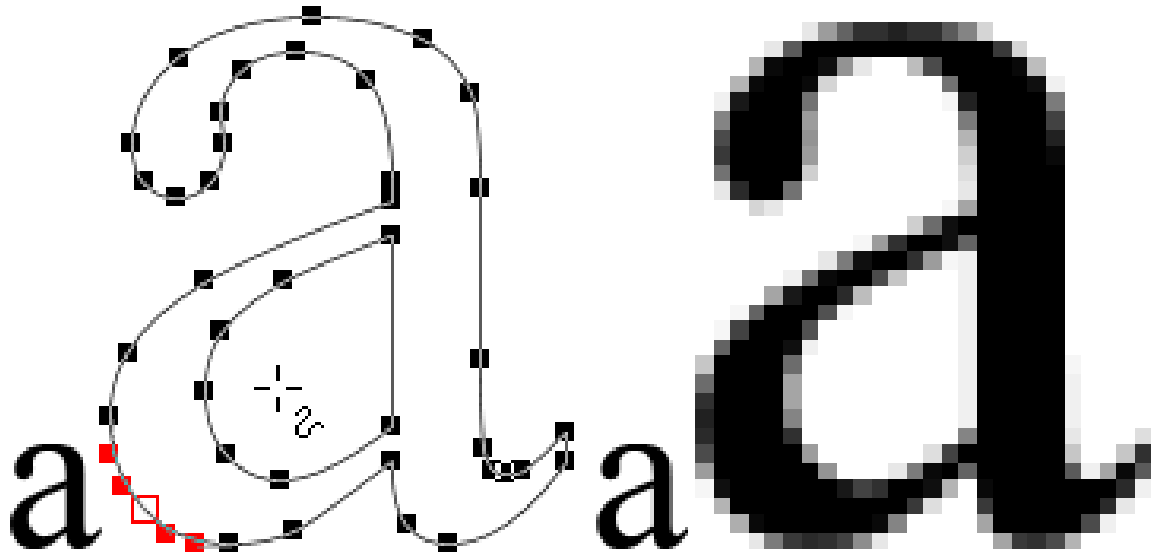## Issue 32 July/August 2009

Free to download Commodore magazine
Dedicated to Commodore Computers
Available as PDF Text SEQ HTML and D64 image
www.commodorefree.com

PostScript type

Bitmap type

Editor

My young son has gone mad about the "Banana splits"; If your reading this and remember the Splits from the 70`s then you may find it strange that a 3 year old wants to go and see them. Bearing in my son has never actually seen a single show staring the Banana splits, but the only thing he has is a cuddly toy we won in one of these coin operated arm grabbing machines. You know the one where it's impossible to actually win anything as the grabbers are so polished and the toys so heavy that the items just slip out before you get the item any ware near the win box.

Well it seems my wife has a built in ability to spot arcade machines that you could be able to win items from. She will look at the machine, and if the toy is on the top and clear from obstructions and the grab arms get a clear erm "grab" at the item then she can win it. We came away from holiday with about 15 toys in our suitcases; some were as big as my child! How with the weight she managed to get the toy is beyond my belief.

Anyway back to the "splits" well as I say my son has a banana split toy, after playing with the toy he asked, if he could watch them on TV. I explained they were on in the 70`s and to my knowledge no cable channel in the UK has replayed the series. I think there were around 36 episodes but as a child it seemed more like an infinite number. My Son said please "please" daddy, PLEASE then he asked me to sing the banana splits song; I remembered the song although not word perfect, he wanted this song sung at night for 2 weeks before he would go-to sleep.

Finally after I became so fed up with the pestering I found a MP3 of the original song, the Dickies released a "punk" version that was much faster than the TV show and I believe they sang both versions, (I have the yellow vinyl Dickies version in the attic on a 45, although no one knows what a 45 or single is now) I paid for the mp3 download of the TV series it lasts about one and a half minutes and copied it to a CD ROM to play in the Hi-Fi I also went on YouTube for the Banana splits and googled Banana Splits. It seemed that the video's were released but not the DVDs for some reason, they held it back. Now finally the Banana splits are to be released on DVD series 1 in October I have pre ordered but for the moment I sit with my son watching what we can of the show on YouTube

If you Google enough you will find a site called the banana splits and there is a DVD with all 36 episodes pirated from the video in all the fuzzy video glory, I would of course warn anyone away from supporting pirate software and advise you to wait for the original and far superior release on DVD in September/October I have pre-ordered this with Amazon

So; you may well be thinking "what has this got to do with Commodore" Well to be absolutely honest; "Nothing at all"

This month after much demand I have reprinted the Geos postscript article that appeared in one of the early issues of Commodore free issue 2 I think, and as it was penned by my god-self I think its an absolutely excellent article and ties in with Lord Ronin and his Postscript printing experiments.

Remember if you attempt to use postscript machines use the LW or Apple laser writer fonts as the Commodore bitmapped fonts will just print out jagged and look awful

I checked the issue for mistakes and didn't find any so added some at random to keep the usual Commodore Free standard of editorial-ship (erm not sure that's a word) in place to maintain usual standards

Thanks Nigel
www.commodorefeee.com

CONTENTS

HOW CAN I HELP COMMODORE FREE..
Ok the best way to help would be write something about
Commodore
articles are always welcome,..

WHAT ARTICLES DO YOU NEED..
Well they vary, contact me if you have an idea but I am
looking for..

Tutorials..
(beginners and Expert),..
Experiences..
with Commodore,..
Why I love Commodore machines,.
.**Interviews..**

maybe you have access to a power user.
News
Club meeting
General Commodore news

Commodore Free Helpers

Paul Badrick -	Spell checking
Paul Davis -	Conversion of text and Html versions
Al Jackson-	D64 Disk image

WANTED Can you help

"I have been looking around for my all-time favorite assembler for the C64 called the "C64 Assembler" by Panther Computer Corporation. I can find photos of the cover of the manual, but I cannot find either the manual or the software anywhere on the Internet. I have a specific project in mind (and it is related to the article I'm writing). If you could help me locate a copy of this assembler (the manual isn't absolutely necessary), I would greatly appreciate it and be forever in your debt. (Since I am currently unemployed, I can't afford to pay for it, so I must ask someone who has it to share their copy of it with me. The only problem is finding a copy of it.)"

Thanks
Arvid Hand

C64 Assembler by "panther Computer Corporation"
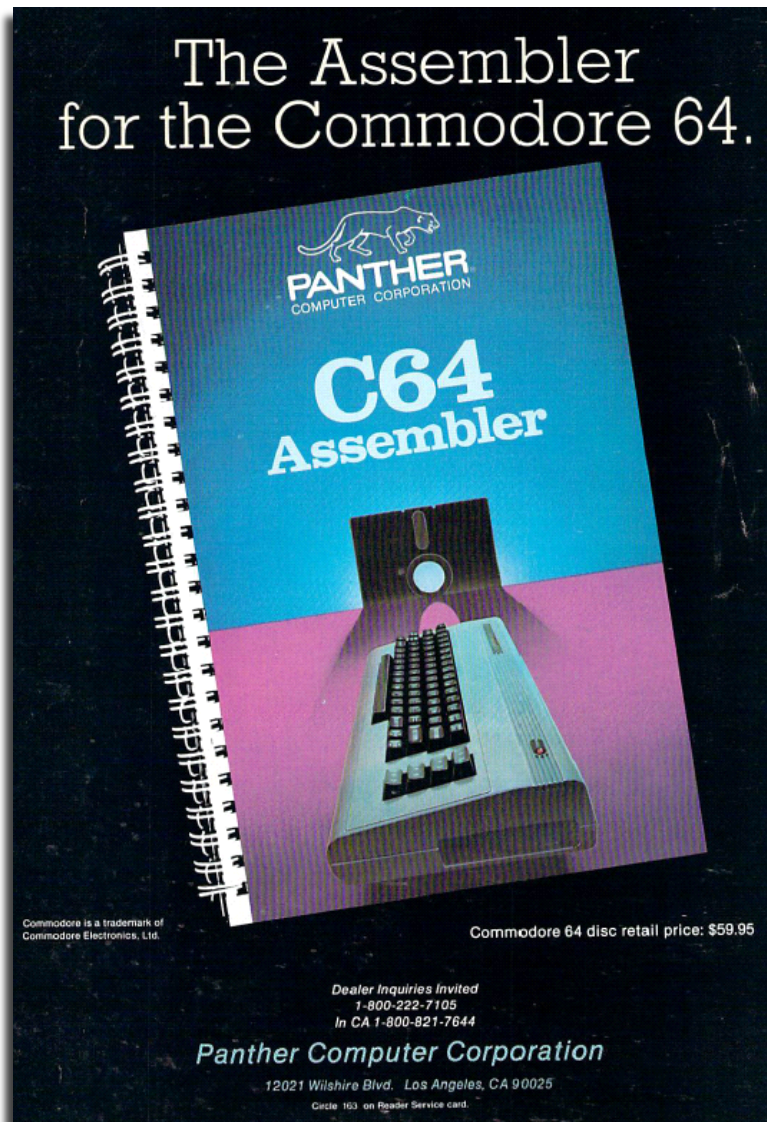
NEWS

NETsurf

NetSurf is an open source web browser for AmigaOS 3 and other platforms.

Minimum requirements:
 * AmigaOS 3.x
 * Ixemul 61.1 (included)
 * P96 / CGX
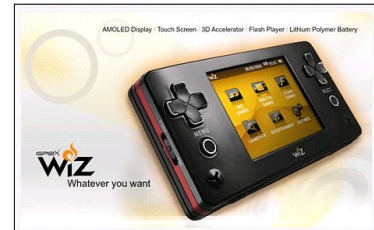 * usergroup.library in AmiTCP:Libs from AmiTCP package

Features missing but planned for the next release:
 * Bug fixes
 * Polish fonts in freetype version
 * Downloading

http://aminet.net/package/comm/www/netsurf-m68k

Modding the COLORS in JiffyDOS v6.01

Commodore Free
I found this very nice website, there is some general information and links take a look
http://www.n2dvm.com/info.html

Taken from the site
I couldn't find the contact details but here is an interesting article about changing the jiffy dos colours I have DONE this already so I KNOW it works as long as you do EXACTLY what I tell you to.

First off, Here is the table for the HEX Codes for each colour:

HEX / Colour
00 = black
01 = white
02 = red
03 = cyan
04 = purple
05 = green
06 = blue
07 = yellow
08 = orange
09 = brown
0A = pink
0B = grey1
0C = grey2
0D = light green
0E = light blue
0F = grey3

NOTE: Those are ZEROS and not O's.

To change Background & Border colours: Search for "0E0601020304" (2 Times), One is in the CBM Kernel and the other is in the JiffyDOS Kernel. "0E" is the Border Colour and "06" is the Background colour.

To change the Text Colour, search for "8C02A907" (2 Times). The 07 is what you want to change.

Hope you find this information of use, I used the file below to figure this out. Figured it would be easier for others to follow the instructions above than to try and figure out where everything is.

ENJOY!!!
http://www.n2dvm.com/mod-jd.html

Wiz Console emulator

Never heard of the console its an open source format with various emulators including Amiga Atari and The Commodore 64, nice looking unit from the picture. Maybe if you own one you could do a review.

http://dl.openhandhelds.org/cgi-bin/wiz.cgi?0,0,0,0,72
http://dl.openhandhelds.org/

Commodore 16 High score challenge

The Commodore 16 team have a new feature on there website. It has been running in the background on the forums for a while, but is proving to be a real hit with members.   The idea is simple, you just post your high scores for your favourite games, and everyone has the opportunity to beat you. Just for fun of course.

We have 14 games currently in the challenge, but if you want to add one, please feel free to do so.

The Rules
The rules are simple. Well just four of them really:

1. No Cheating
2. Screen shot of your score to be displayed
3. Can be any C16/Plus4 game, whether homebrew or commercial.
4. Most important, don't take it seriously and have fun

The link is here
http://www.commodore16.com/index.php/highscore.html

Games That Weren't updated

Games that weren't has uncovered some more gems, question is how many games weren't there then?

(*) Two new unseen findings, including a Mastertronic title ... 'Dr Bazair '92' (Preview) and 'Tidemarsh' (Full game)
(*) Two new entries and downloads for an Alligata and Firebird release ... 'Dartz', 'Proteus'
(*) Confirmation that 'Mission Shark' is a zeppelin title + added details
(*) Small updates to 'Battletoads', 'Gods' and 'Zone of Darkness'

http://www.gtw64.co.uk

Spot the Commodore

You are watching TV, and you spot a Commodore computer. In this article you can see these pictures. You can also read some background information about the TV-series, movie, music-video, arcade-game etc

This is a Fairly extensive website of Commodore computers on Television, with information and pictures.

http://www.richardlagendijk.nl/cip/article/index/spot_the_commodore/en

Knight 'n' Grail available

The epic arcade adventure 'Knight 'n' Grail' is finally complete and on sale now from Psytronik Software. The game is available on disk only in Premium, Budget and Digital flavours. All pre-orders are currently being posted as we speak.

This is one of the best games for a while on the C64, featuring some fantastic gameplay, a very large game map, neat touches throughout, excellent visuals and music throughout. It's been heavily play tested to ensure that players get a fantastic experience - and that they will. As well as getting a top notch game, you have the option to get the game as a professionally produced disk release (Premium / budget) to play on a real C64, or you can purchase just a digital copy to play on any C64 emulator.

For more details about the game, visit: http://www.psytronik.com
For ordering details, visit: http://www.binaryzone.org/retrostore/

Paul Allen Panks ("Dunric") Passed away

Panks, Paul Allen
The life of Paul Allen Panks literally came full circle when he passed away unexpectedly July 5, 2009 two days before his 33rd birthday. He was born three months prematurely at St. Joseph's Hospital in Phoenix on July 7, 1976, where he spent four months in the Neonatal Intensive Care Unit. It was this fighting spirit that endeared him to us from the start, and helped him with the challenges he would face in his later years. Growing up Paul spent hours drawing, writing & creating computer adventure games, hobbies he enjoyed all of his life. He graduated from Chaparral High School in 1995 and earned a BS degree in Sociology from Northern Arizona University. Paul was preceded in death by grandparents Allen and Lois Panks, and Jim and Ann Williams. He is survived by his parents Gary and Judy, brother Brian, Aunt Jan McLaughlin (Jim), cousins Ryan McLaughlin (Sharon), Tim McLaughlin (Leann), Ethan and Mia McLaughlin, and the Loeffler family. He is also survived by Aunts Shirley Przylucki (Chet), Sally Higdon (Don), and many other loving family members and friends. A celebration of Paul's life will be held 4:00 P.M. Wednesday, July 15, at Shadow Rock United Church of Christ, 12861 N. 8th Avenue, Phoenix. In lieu of flowers, the family suggests donations in Paul's memory to: The Marc Center East Village, 924 N. Country Club Drive, Mesa Arizona 85201, Attention: Cheryl Anderson. Life will never be the same without Paul, who left us way too soon. Arrangements by Messinger Indian School Mortuary

http://www.legacy.com/obituaries/azcentral/obituary.aspx?n=paul-allen panks&pid=129569950

Cloanto Releases Amiga Forever 2009

July 2, 2009 - Cloanto released today Amiga Forever 2009, the latest version of the award-winning Amiga preservation, emulation and support suite for Windows and other platforms.

Amiga Forever 2009 is the most refined update ever released in the Amiga Forever series. It again sets new references in usability while more than doubling the featured content and providing easier access to a universe of free downloads. Like its sister product C64 Forever, Amiga Forever 2009 introduces a synergistic combination of the RP2 retro-gaming file format, RetroPlatform Library to recognize content, and RP2 Manager to export and import to and from other file formats.

The 2009 version includes hundreds of enhancements and was tested to comply with "Compatible with Windows 7" requirements. New features include seamless, one-click integration of the AmiKit and AmigaSYS add-ons and new system ROMs (e.g. the 0.7 Kickstart required to run the software used by Andy Warhol's famous 1985 Launch of Amiga demo). The Plus Edition includes more than 100 games and a selection from the most beautiful demo-scene productions ever created. Tens of thousands of games, as well as other software ranging from the oldest to the latest Amiga releases are only a mouse click apart, and can run on powerful PCs and inexpensive netbooks alike.

When both Amiga Forever and C64 Forever are installed, the players share data and software modules with each other, uniformly playing back RP2 games of both 8-bit and 32-bit platforms. The same familiar user interface and settings are also applied to saved states, disk write undo, dual-monitor setups and other advanced functionality. "The way it brings back memories is amazing, and it feels as if Commodore and Amiga were united again," said Michael C. Battilana of Cloanto.

Dave Haynie, a long-time user of Amiga Forever and former Commodore International chief engineer on high end and advanced projects, added: "The past IS the future... Amiga Forever is the single best way to run AmigaOS today. Your PC is the fastest Amiga that will ever exist, and Cloanto does a wonderful job of packing the emulation technology, every AmigaOS ROM and Workbench version (most of which I've long since lost to data rot on my floppy collection), games, utilities, Web tools, graphics programs, most anything you would need, all in one place."

Amiga Forever 2009 is available now in three editions:

Value Edition (downloadable installer for Windows systems)

Plus Edition (downloadable CD ISO image with additional Windows and platform-neutral content)

Premium Edition (physical Plus Edition CD and two DVDs, plus instant download of the installer for Windows)

The Plus Edition includes the KX Light boot environment with barebone PC hard disk installation and online updates. The Premium Edition additionally contains more than five hours of videos.

http://www.amigaforever.com/shop/
http://www.amigaforever.com/

Paul Allen Panks Homepage

Commodore Free

I copied this text without permission However under the circumstances I didn't really want to upset anyone by contacting them.
The Website can be viewed here http://ppanks76.tripod.com/

"Welcome to my homepage. This page has evolved over the years to become more simplified and easier to use. I have on this page several interests of mine, including programming, personal hobbies (computers, reading, sports, etc.) and other interests. If you have any questions, please e-mail me at: l u m b e r j a c k s 7 6 @ l y c o s . c o m. For my most current thoughts and happenings, check out my Windows Live space: Paul's Space

Computers

My interest in computers goes way back -- back to the 1980's and the famous Commodore 64/128 line of home computers. I first became interested in computing in 1983, when my uncle brought home a Commodore 64. Way ahead of it's time, the 64 had a 320 x

200 resolution display, with 16 colours, 8 individual sprites and a built-in speech synthesizer providing up to 3 voices. Printing was done with the Panasonic KX-1080i printer. We had a lot of fun on the Commodore, spending countless hours playing video games,
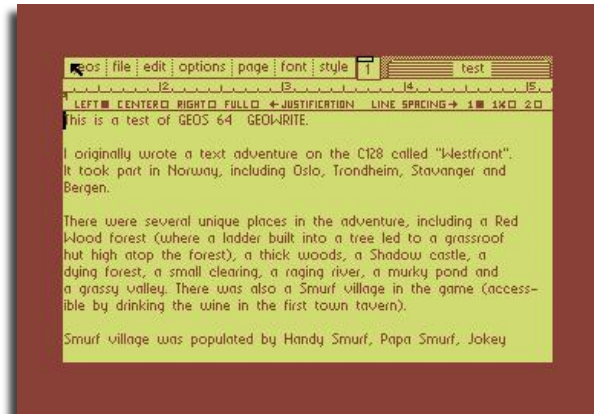
programming, writing -- and printing -- documents (via a word processor), and even typing in program listings from Commodore-specific computer magazines (e.g. Compute!'s Gazette, Run, Ahoy!, etc.).

Sooner or later, though, we all moved on to the IBM PC-line of computers. My first IBM PC-clone was a Packard Bell Legend 10CD in 1994. It had a 486 processor, 4 MB of RAM, a 340 MB hard disk drive, a 2X CD-ROM drive, a 2400 baud data/fax modem and a host of multimedia CDs, including the New Grolier Encyclopedia and Microsoft Works (which incorporated a Microsoft Word-compatible word processor and spreadsheet).

The 486 wasn't fast enough to run Windows 95, but we installed it on the system anyway. It took forever to boot up. That was okay, though, because we spent most of our time in MS-DOS mode playing the latest computer games. One of the games I played religiously was X-Wing, a game taking part in the Star Wars universe. There was also a reverse-roll version which allowed the player to play as a Tie Fighter pilot. The graphics were truly amazing for the time and the missions were well thought out.

I also used the 486 to Telnet (via PRO COMM PLUS for Windows) to various online MUDs -- Multi-User Dungeons. These were multi-player online adventure games similar to Dungeons & Dragons, both in scope and design. One in particular was enjoyed for several years -- LustyMUD (and no, despite the rough sounding name, it was really a family MUD taking place on two continents, Melchior and Stormhaven). My screen name on that game was dunric, which I originally picked up as a nickname after playing the old NES game The Immortal by Will Wright and Electronic Arts (EA).

I discovered USENET newsgroups around that same time and read up on various game cheats for the Atari and Commodore, including a way to (finally!) win Raiders of the Lost Ark. I had been at that game for over a decade without finding a solution, and the newsgroup rec.games.video.classic provided one for me (solution: use the parachute, shovel and medallion, making sure to land on the tree branch with the parachute). There were also newsgroups

devoted to the Commodore (comp.sys.cbm) and the regular Sony Playstation (rec.games.video.sony).

After the 486 finally gave up the ghost, I upgraded in 1997 to a Hewlett Packard Pavilion 7360 PC, which had 32 MB of RAM, a 200mhz Pentium processor with MMX technology, a 3.8 GB hard disk drive, a 33.6 kbps Plug-N-Play modem and a 16X CD-ROM drive. The computer served me well throughout college until I upgraded to an e-Machines i400 with 32MB, a 400mhz processor and Windows 98 (in 1999).

With the new Hewlett Packard came an opportunity to finally get on the World Wide Web (WWW), and we did so by signing up for a Microsoft Network (MSN) internet account. While the host software wasn't the greatest, the cool "Darth Vader" look of the included MSN 2.0 browser and the associated "ding" sound whenever a certain amount of time passed online more than made up for it. Plus,
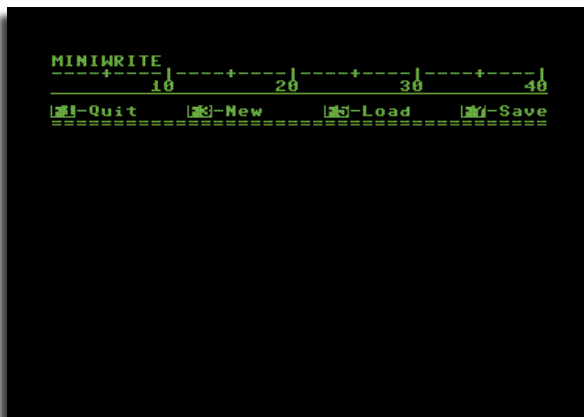
you could also check your email by merely clicking on a link from the desktop, a handy feature for the time.

I created homepages at Geocities, Fortunecity and Tripod before finally settling on Geocities in 1999. I was also heavily involved in the QBasic programming community during that time, producing games with tile-based sprite graphics and some text adventures as well (many of my adventure games can still be found over at the Interactive Fiction Archive -- www.ifarchive.org).

Today I am happy to report that I have since built two computers from scratch, including a 64-bit processor computer courtesy of Fry's Electronics. Although I am at present using a borrowed computer from my parents, I hope to get the 64-bit computer out of storage and insert a (working) video card. My hard disk drive and CD-ROM are also woefully out-of-date, and when I get enough money to put towards a brand new computer, you can bet I'll upgrade the system to something faster and more elegant. I am also working on getting my system Microsoft Windows Vista ready (requires at least 1 GB of RAM to run smoothly).

Programming

I have been programming on computers since I learned to type (about 1983 or so). Many of my early programs were quite simple and even laughable -- but they were indeed building blocks to improved programs and games later on down the road. One of my earliest programs on the Commodore was a text adventure named Enchanter: Westfront to Apse. 'Westfront', as I called it, evolved from a fairly spartan dozen or so rooms to a mammoth text adventure spanning over 80 rooms. The game was set in Norway and included a mythological Smurf Village. I incorporated several towns and villages into the game, including Oslo, Trondheim, Stavanger and Bergen. Additionally, I added a Flora Island just off the coast of Norway (complete with a functional lighthouse for incoming vessels).

The game included a sprite title
 -- WESTFRONT --
as well as a 3-D fractal map of the surrounding countryside (actually just 8 sprites joined together). Finally, I added a scrolling, WINDOWed text display and function keys for easier movement. All in all, the game occupied 206 blocks on disk, leaving approximately 7,000 bytes free (the game was written for the Commodore 128's 40-column mode). Although I lost the original version of this game some time ago -- due to the notorious SAVE-WITH-REPLACE bug -- I rewrote much of it from an earlier version that I found lying around. The result was a game very similar to the original version, albeit without some of the original rooms (Smurf Village was replaced with a 'golden elf' village), commands (a few misc. commands were removed) and a slightly different fighting engine (more balanced than the original).

More on the Story of Westfront to Apse - read about my long lost game, 'Westfront'. Another retrospective piece on Westfront to Apse - more on 'Westfront'. The Temple of Westfront - my thoughts and remembrances about 'Westfront'. The Unabridged Story of Westfront (updated December 1, 2007) - link says it all.

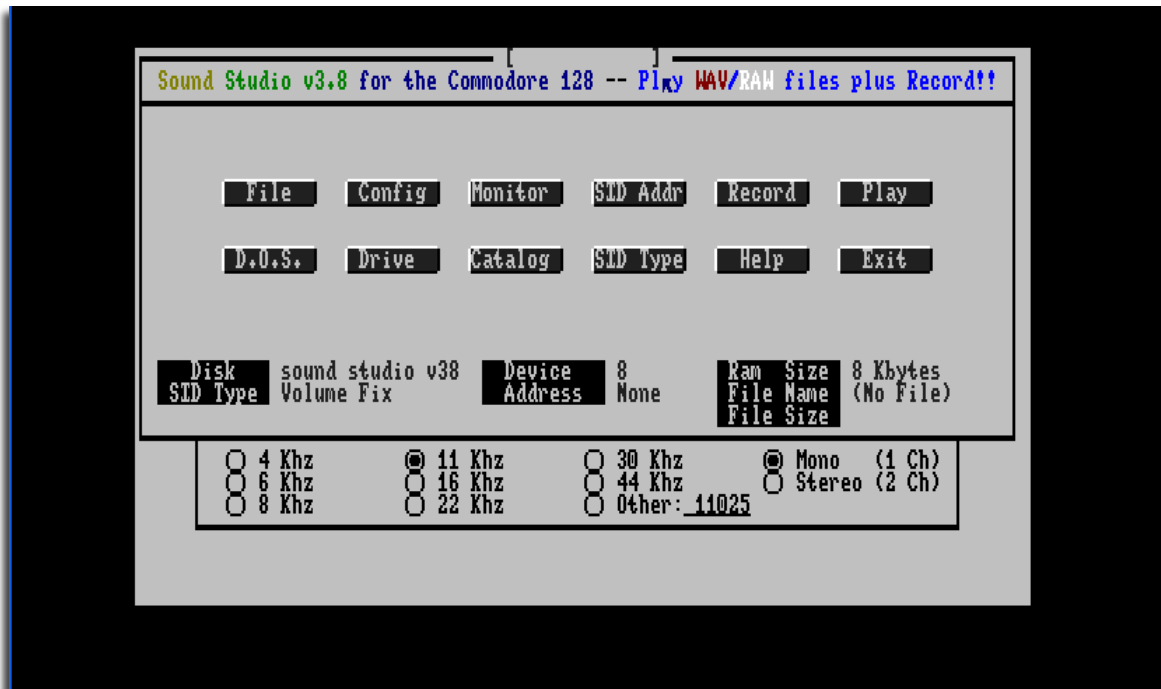**Text Documents**
In addition to programming, I am also a prolific writer. I enjoy writing and have even written a couple of books. For now, though, I will include here some of the more interesting documents that I have written which have yet to be published. Feel free to download them and check them out. The documents range from unusual dreams that I have had to a short story called 'The Golden Cat."

Interview with Vanessa Ezekowitz
Creator of the Commodore 128 Sound studio

Sound studio 128 version 3.8
http://noname.c64.org/csdb/release/?id=16382

Vanessa Ezekowitz webpage
http://starbase.globalpc.net/~vanessa/index.html

COMMODORE FREE
Please introduce yourself to our readers

Hi all, I'm Vanessa Ezekowitz. I'm 35, living with my husband Abe in Joplin, Missouri, and have been nosing around the C64 scene for about 23 years now.

> CF. Can you tell us a little history about yourself and your computing hobby

Early on, I had a propensity for tearing apart my toys (permanently breaking about half of them in the process!), just to see what makes them work. My first computer was actually a Timex Sinclair 1000, on which I learned the basics of BASIC, so to speak. I typed in programs from the manuals, hacked around a bit trying to learn, and otherwise just kind of tinkered. I even picked up a 16K RAM expander for it at one point. I used it for one or two years, until Christmas 1986, when I received a Commodore 64 as a gift. I took the C64 up to my bedroom and hooked it up to a TV. I realized immediately that she'd made a good decision, and with her standing there, I tossed the TS1000 aside onto the bed; mom wasn't too pleased with what I said about it *smile*. From then on, I spent the majority of my time parked in front of that C64, either typing in programs from magazines, learning to code, playing games, or trying to learn how to interface it to the outside world. It also served me well in school for reports and the like. I learned to code and hack around with the hardware

because I wanted to do something productive, something others might find useful some day.

Today, I spend most of my time reading, just trying to learn about general things (especially the sciences, and in particular, astronomy and a touch of quantum physics), and plenty of quality time with my husband.

> CF. Are you still actively using Commodore machines?

I do still hack around on my hardware now and then, but I'm not as active as I once was.

> CF. Please explain the function of Sound studio

Originally, it was supposed to strictly be a RIFF/Wave player, since that file format was so popular in the PC world at the time. In fact, I had originally called it "Waveplay 128". As I worked on it, I added playback for Commodore RAW files, and changed the name. I also added a recording option, based on a gadget I called "8BSS", itself based on Russell Prater's "digi0820.sfx" instructions. The program operates in a sort of GUI, formed entirely by a custom character set, and can be controlled with a joystick, mouse, or keyboard.

Normally, you just instruct the program to load a file, after which a few pieces of information about the file would be displayed. You could then play it as-is or re-save it as a .RAW file. Among the

information displayed is the sample rate, which the program would let you alter. It was easy to, for example, record something and then play it back at twice the recorded speed, for chipmunk-like sounds. It only handles the 8-bit format of RIFF/Wave, but adding a 16-bit option wouldn't be very hard.

> CF. Sound studio was released as a 128 only program, was there ever a 64 version planned?

Not exactly... There were already a few programs for the C64 and 128 that could do the job, but I felt, at the time, that they lacked the "polish" that a good program should have. REU support was somewhat lacking - nothing I had found could handle very large files, as I recall, so I started on something to fill the gap.

Since my assembly skills were a little weak, and the C128's BASIC seemed to be powerful enough to do the job, I decided to let BASIC handle the UI and most everything that wasn't speed critical, and wrote the re-player routine in machine code.

Incidentally, it's also the C128's BASIC that set the program's limit to 1MB of storage, since the STASH and FETCH commands could only accept an REU "bank" value of less than 16.

> CF. I know the software supports 2 Sid chips is this just for stereo playback?

Yep, that's it.

> CF. Maybe for the none techy's can you explain how a Commodore machine can replay wav files, and also what wav files are

To explain this, I'll need to include a little audio theory: Everyone knows that a sound wave consists of vibrations in the air. When those vibrations strike a microphone, the receiver it is connected to sees a small voltage that varies rapidly with the sound wave, usually at thousands of variations per second.

On virtually every such receiver, there is another connection that can send what goes through it to another device, such as a tape recorder or an audio sampling device, called a digitizer. When instructed to do so by the controller or user, the digitizer will start making tens of thousands of measurements per second of the varying voltage coming off the receiver's output, and

translate each measurement into a binary value, called a sample, that is then sent to the computer.

A RIFF/Wave file is simply a short header followed by a long train of those samples.
In the simplest case, a C64 or 128 need only read the 44 byte header and store it somewhere. Then, just go into a loop, reading sample bytes and dividing them by 16. Store each result in memory, and keep looping until the file runs out.   Then, to play the sound back, simply start stuffing the converted samples into the SID volume register at regular intervals. Some details aside, that's all there is to it, and that's just what Sound Studio does.

There are higher quality digital audio methods possible, but I only knew about the volume register back then.

> Cf. Can you remember some of the Programming hurdles you had to jump to enable WAV file playback

The biggest problem I had was learning machine code well enough to get the re-player itself done. I had never before attempted any real machine code, and had to do so through the C128's built-in machine code monitor. Writing short bits of code with the monitor isn't too hard, but anything more than a hundred lines or so starts to get a little complicated even today. I didn't understand, at the time, just how to use an assembler, or even what the difference was between that and the monitor I was using.

The second problem was getting the whole program to run fast enough. For example, the part of the BASIC code that draws the buttons and base UI seemed a little slow. Similarly, the sample player, while fairly trivial, wasn't as fast as it could be at first. I was dead set on making sure the program could play back a 44.1 kHz file

The biggest problem I had was learning machine code well enough to get the re-player itself done

at full speed, so I tried to do whatever I could to trim cycles from the playback loop.

As I recall, I was never able to get the code to run smoothly enough at the higher sample rates, because I couldn't seem to get the idea out of my head that the REU needed to transfer bytes in large chunks in order to be efficient enough (at the time, I was using an 8K transfer buffer). I did some experiments streaming a byte at a time for maximum smoothness, with the intent of rewriting the player routine in a future release. I don't think I ever put that code in, as my initial experiments were only able to muster about 64 kB/sec, and I needed a little over 88 kB/sec.

> CF. What is the current status of the software, I believe the software was sold as shareware is this still true and if so where would our reader send the money to?

Originally it was shareware, yes. Today, the program is public domain.

> CF. The software utilises 80 column mode is this just for aesthetics of screen design?

I had three reasons actually. One, 80 column mode looks better than 40 column mode for this sort of thing. Two, I can use 2 MHz mode without having to argue with the VIC-II. Three, there just didn't seem to be a lot of 80 column software out there, and I felt I should add to that library if I could.

> CF. Does the software support other hardware like the CMD line of products?

I wrote Sound Studio before I got my hands on any CMD gear, but it works fine on the CMD HD. By extension, it should work on the FD 2000/4000, in addition to the usual Commodore 15xx drives. CMD's 17xx REU clones work for memory just like the originals. The SID Symphony cartridge should also work for stereo output, though I've never tried one myself (I've always used an internal stereo SID hack). The RAMLink is a special case. It can act as a normal storage device like it does with many other programs, so you can load files from it, but the memory therein can't be used as expansion RAM, simply because I wrote the program before I got a RAMLink. I.e. the program isn't aware of the existence of a RAMLink, much less whether one is present.

Now, the Super CPU is a trip -- it's been a while since I last tested to see what would happen, but I seem to recall that it technically does run. It doesn't crash, that is to say, but it also doesn't know anything about the SuperCPU, so it doesn't know how to adjust its timers to compensate. Sound files will play about an order of magnitude faster and higher pitched than they should -- talk about a chipmunk effect!

> CF. Also is the product now effectively dead or do you plan any updates? And Have you created any other software for Commodore machines?

I can answer these two together - the program isn't dead, but the update I have planned for it is still a long way off. I'm working off and on, on an update for an Amiga MOD player I wrote back in 1999 or so, and my intention is to include the ability to play a number of sample formats, including RIFF/Wave, as well as modules. In essence, I want to combine Sound Studio with the MOD player, and release the result as a new program.

The updated program is intended to look and operate just like XMMS, a now outdated media player for Linux/Unix systems. I still

like how it works and what it looks like, so I plan to stick to that. I haven't figured out yet how I will handle the record function, maybe just a menu item that calls forth a simple "Sound Recorder" dialog.

I have also written a handful of other programs, such as an unreleased animation player based on the Ohio Art "Etch-a-Sketch Animator" toy. I have an update in the works for this, which I will release. There's also a VDC demo of sorts that puts text on the bitmap (with full background/foreground colour control, flashing text, etc., which I originally targeted at terminal programs that do ANSI emulation), an 80 column sector editor modelled on the one found in the Maverick/Renegade disk utility package, and a few small programs for my own use.

One project I am particularly proud of was a Connectix QuickCam interface and demo/driver program (which I had a lot of help with).

I also experimented with MP3 playback via an external board, but my initial efforts did not meet with success. I still want to revisit this, as others have made some progress in this regard.

Most of my efforts today are aimed at the C64 first, with the C128 firmly in mind. I try to make my code able to run on both machines, with as little platform-specific code as possible (i.e. just enough code to account for 2 MHz mode, 80 column screen, etc).

> CF. Do you still follow the Commodore scene?

I do to an extent, yes. One of the most recent things that really caught my eye was the Vicious SID demo -- the authors of that program discovered a new way to make sampled music, and I am very interested in learning the details of it. As their re-player routine pretty much blows my previous efforts out of the water, I'd like to see if it is possible to put their method to use in the future.

> CF. Have you any other comments you would like to add

I've never been too sure how much demand there is for the sort of stuff I do on the C64 and 128, and I've actually seen some comments here and there in other venues that basically say that I'm wasting my time (comments which I generally disregard, of course). It is nice to know that there is still interest. I hope to be able to continue to contribute well into the future.

> CF. Feel free to add any technical documents or coding slices you feel would benefit the readers we cater for beginners to advanced machine code programmers

Due to the nature of the stuff I do, I can't really think of anything that would be short and still be useful to your readers, but I can say that that which I have already released is good fodder for review and commentary. I invite your readers, and anyone else interested, to look through my code, comment on it, re-write it, use some of it in another program, etc. Whatever software license might seem to be in place for any given program (i.e. shareware), I hereby rescind, as all of my software is public domain now.

C64 Forever Reviewed
by Commodore Free

After the hugely successful Amiga forever, Cloanto have finally released a "C64 forever" and as you can guess this title is amid at the world's best selling computer the Commodore 64.

What is C64 FOREVER?
C64 forever is emulation software designed to run on the Microsoft Windows platform. Upon running the software you are presented with a neat little menu system

Where you can
- Play the emulation from the disk so you don't need to install anything
- Run the installer and install the software to your machine
- Look at the documentation
- Browse the disk
- Or visit two website
        C64 Forever homepage
        Retroplatform Home Page

We start as all eager beavers by running the software or "playing from the Medium"
Once the software initializes you are presented with the main screen
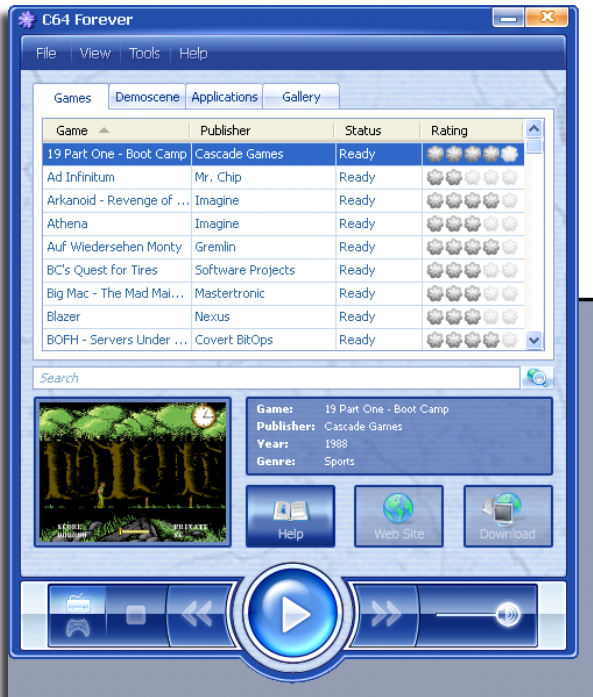
The main screen show 4 tabs across the top with the options of
Games
Demoscene
Applications
Gallery

The default state is Games, scrolling down the list of games shows a small screen shot of the game and the stats are updated for each game with publisher, game name, year and genre so sports shoot-em up etc scroll down the list to find the game you want to run and click the big > this starts an emulator with the application running

When running there are a number of option on the right hand side
1 x will set the screen to the standard Commodore size (small)
2 x will set the screen to 2 times the Commodore screen size
And the arrow star shape toggles full screen to return back from full screen hold ESC key, in full screen mode I lost the left and right borders of the Commodore screen.

The last icon a camera takes a snapshot or picture of the running Commodore Screen

Closing the screen gives a small menu to save the current state, Remember the choice and don't show this menu option again
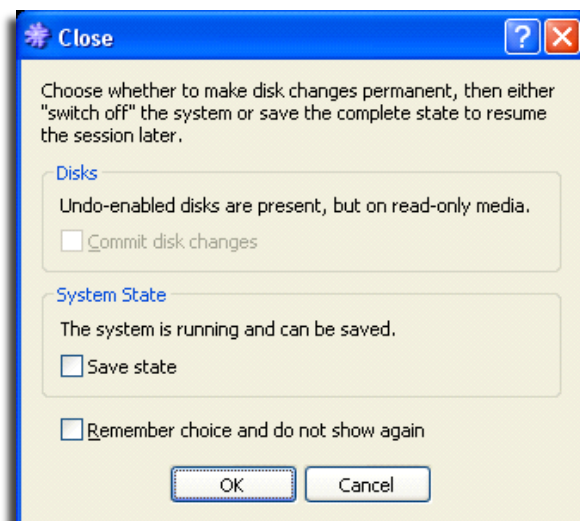
Looking at the help file all copyright holder are mentioned as can be expected from Cloanto all the files are licensed to use, rather disappointing is the use of Cracked versions of the software, with the crackers intros where you see a mini demo then usually have to press space key to continue. Maybe the originals should have been used and just the copy protection removed. (of course these are my personal thoughts)

The main player looks well and suitability styled with various information and a screen shot of the game more about this later

I couldn't find any Llamasoft or Jeff Minter games as these are not listed in the menu and from Jeff issuing a no copyright hassles are stated if you distribute or copy any of his older games, this seems odd. Jeff minter and Llamasoft are one of my hero's I find this a little disappointing. I will also comment here that I feel TMR (Jason Kelk`s) (COSINE) games would have been welcome too because of the playability aspect, but you could go on an on, what about xyz adding games is however easy and will be explained later in this review)

The next tab along Is Demoscene, again a list of demos to select and run with information about the date and Demo coders

Moving to the next tab is Applications; this is just a front end to run the various emulators for example to run a Commodore 64 emulator or vic20 emulator or pet emulator etc.

The Final tab is entitled gallery, here are PDF versions of the Computer magazine from 1982 covering the Commodore 64 a picture in JPEG version of the Commodore 64 the old breadbox version in a stylised pose the Commodore 64 SID Patent documentation and finally an MPEG version of the tool box audio tape about Commodore that was presented with some compilation boxes "congratulations you are now the owner of the worlds most popular home computer" it starts

I am sure Cloanto could have bundled more photos and information about Commodore and the Commodore 64. Maybe part of the Amiga forever series of videos could have been bundled with this like the Jay miner interview and inside Commodore for user who haven't seen or purchased the Amiga forever version. Also the death bed

The folder would then contain 3 or more depending on how many disk images were needed files
The D64
arkanoidrevenge.D64

the PNG preview picture
rp2-preview.png

and a text file or html file with the help text inside
rp2-help-en.txt

Arkanoid for example contains the following text

"Inspired by one of the most famous arcade games in history. Use the paddle and the bouncing ball to destroy the walls and collect bonuses. At the crack intro screen press the spacebar to continue. Then press H or T to enable High Score saver or Trainer. The game is joystick-controlled."

There are two versions available of c64 Forever a plus version downloadable and on CD and also an Express version, these are purchasable straight from the Cloanto website.
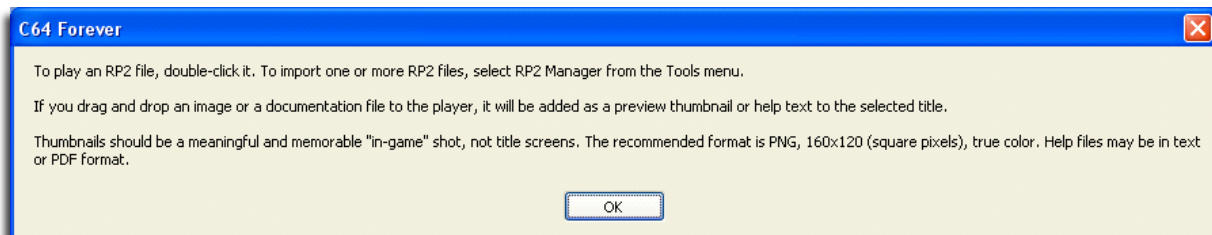
From the manual
"Manual Playback of RP2 and other Media Image Files

C64 Forever includes support for RP2 (from RetroPlatform Player), which is a file format designed to "wrap" all disk and other media images that may be part of an application into a single ready-to-run archive. RP2 files are already compressed, and may contain multiple media images, so it is not necessary to further store them into ZIP archives for storage or distribution.

When C64 Forever is installed on Windows, it becomes possible to double-click RP2 and other popular disk and tape file images (e.g. a downloaded game on one or more .d64, .t64, etc. files) to play the content. After the Manual Playback Options dialog appears you can drag-and-drop additional disks, and rearrange them if necessary.

For additional information, please refer to:
RP2 File Format Information
http://www.retroplatform.com/kb/15-122

C64 Forever

To play an RP2 file, double-click it. To import one or more RP2 files, select RP2 Manager from the Tools menu.

If you drag and drop an image or a documentation file to the player, it will be added as a preview thumbnail or help text to the selected title.

Thumbnails should be a meaningful and memorable "in-game" shot, not title screens. The recommended format is PNG, 160x120 (square pixels), true color. Help files may be in text or PDF format.
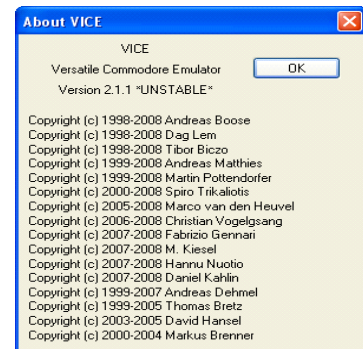
OK

---

vigil and David Hyne interviews. Although Die hard Commodore users will have seen these the more casual user will not.

Options exist to import to and from the Native rp2 format if converting to RP2 format and you drag the file to the menu you receive the following information dialogue (above)

Creating a file for conversion to rp2 format involves the following process Making a folder with the relevant details for example Arkanoid would be
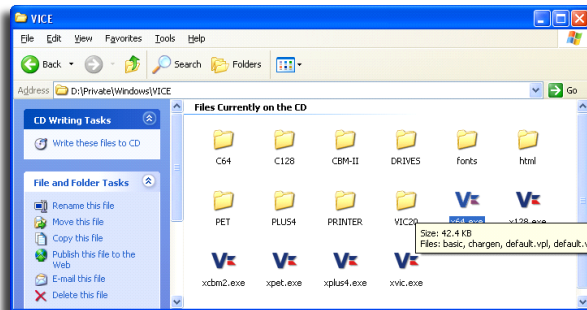
Arkanoid - Revenge of Doh (Imagine, 1988, C64)

Commodore Free:
The emulation seems to be a customized version of VICE

About VICE

VICE
Versatile Commodore Emulator
Version 2.1.1 *UNSTABLE*

OK

Copyright (c) 1998-2008 Andreas Boose
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Copyright (c) 2005-2008 Marco van den Heuvel
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Copyright (c) 2007-2008 Daniel Kahlin
Copyright (c) 1999-2007 Andreas Dehmel
Copyright (c) 1999-2005 Thomas Bretz
Copyright (c) 2003-2005 David Hansel
Copyright (c) 2000-2004 Markus Brenner

Running version 2.1.1
Looking on the CD in the private \windows folder shows a vice Folder

From the main screen selecting help – about- plug-in reveals Viceplugin.dll version 2.0.3.0
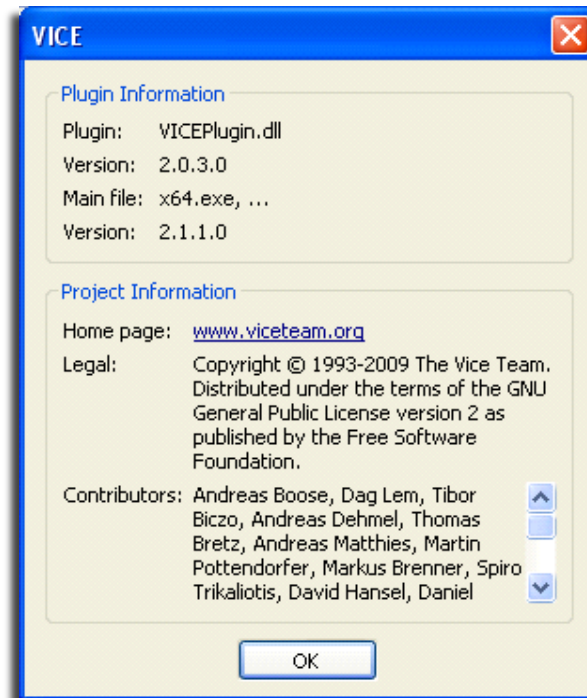
Again from the Help File
"Top Benefits
C64 Forever shares the same RetroPlatform family player, database and content management components as the very successful Amiga Forever series. As such, it also embodies more than 12 years of experience and refinements and a tradition of innovation and long-term continuity and support.

Compared to other solutions for different systems, C64 Forever stands out for features which include the following:

Smooth setup: it takes only a few mouse clicks to install and run (no additional downloads required)

Intuitive, simple and refined user interface, in which player, content, database and search are seamlessly integrated (not a "front end" that launches an external emulator)

Built-in RetroPlatform Library database featuring thousands of titles, with online updates

As some projects kept adding options year after year, C64 Forever strived to keep options to a minimum, as RetroPlatform components take sophisticated decisions behind the scenes

If you know how to use Amiga Forever you are instantly familiar with C64 Forever, and vice versa

Support for revolutionary RP2 format (one click to play, one file per title, no need to zip or unzip games or manage multiple disk images, etc.)

Support and recognition of other popular disk, tape, cartridge and save state formats, with options to identify un-catalogued similar variants (not a simple "checksum" approach)

Built-in search-as-you-type for installed content and custom one-click internet search for games and demo scene productions

Tested on Windows 7 (both x86 and x64)

Features of C64 Forever include:

Emulation of C64 hardware (allows you to run C64 software on your PC)

Additional emulation of related systems: PET 2001, CBM 3032, CBM 4032, CBM 8032, VIC 20, CBM 610, C16, Plus/4 and C128

More than 200 pre-installed games and demo scene productions

One-click play support for thousands of downloadable C64 and other 8-bit games, demos and applications

Retro Platform Library includes title and configuration data for more than 5,000 C64 games, with online updates

RP2 Manager to convert between RP2 and other popular formats (D64, T64, etc.)

Preconfigured and enhanced VICE emulation engine with auto-updates

Special features and gallery of items of historical interest

Commodore Free
A nice approach to the Commodore Emulation scene, the new file format is interesting especially for transportation however you would need to convert the file back to native d64 format to enable you to play the games on a real machine.

The vice emulation seemed to be very stable for me during testing even with the "unstable" version of the software, I would have liked to see more files included in the version and maybe a walkthrough to convert the file to the new format For new to emulation users this could be a welcome purchase but to old time Commodore users who will already own a copy of vice then I feel there is little to entice you to part with your hard earned cash. I feel the product will sell to the more casual users and if more games are available for free or small charge download then the product could do well.

As expected it's a slick presentation from Cloanto, however I don't feel the same energy went into this product as did the Amiga forever version. Of course Hardcore Commodore users will stick to using the real machine rather than Emulation that never works as well as the real machine. "

Doing Postscript output from Geos
## Lord Ronin from Q~Link

Actually this isn't 100% Geos or Commodore. More like 99.99% originally this was planned to be sent to Nigel after I sent a long lamer beginner's look over the Geos manual series. Good news, some pipe smoking long haired, bearded hippy freak broke one of the basic rules. I didn't back things up! Meaning that I have to do it over again. At least this time I can take a few JPEGs of screen shots with an old camera that saves the image to disk.

Which is what prompted me to do this one. OK one of the things for this one. Now there should be an image installed, the choice was either the top hat wearing freak with the pipe or the Constable for the A.C.U.G. #447. The cat won out, she has claws! Those reading this on the fantastic .D64 file that Al Jackson of 5C's makes,

(EDITOR AL many thanks for the work with the D64 image)

like my users group, won't be able to sec that image of the black cat posing for her snap. Not too worry she won't be upset, though there is some way to make the JPEG show on the disk; this was done by a long distance member for us once. I don't know how, and it would cat up too much space for Commodore Free.

(EDITOR Juddpeg can display JPEG images on the C64 you can download it from here http://www.ffd2.com/fridge/jpeg/)
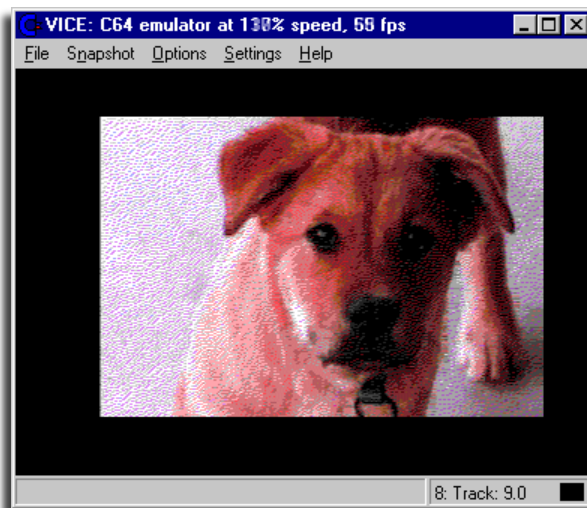
Let's cover the title; no it isn't a misprint or fanciful dreams on my part, You can actually and really make a file that can be converted to a PDF on the C=. Got a long story so pour yourself one, and light up, this may make it easier to read my dream.

The story goes like this; I knew that we could get postscript files that would and could be opened in postprint in Geos. I did that with a file Maurice sent me and other post print users. I wondered how to make one and send it to another types of PC platform, other than Geos on the C=. My adopted son Lord Alberonn a.k.a. sho-vah now <132S blocks of rant deleted for content was going to do the experiment with me on his Amiga, but seems to not have had the right programmes installed. A local member said he would help with the test, and that never came about.

My son who gifted me with the camera mentioned above said he would give it a try* but hey, he got married and a new job. The old man sort of got pushed to the back burner. Well he did give me his Commodore stuff, long distance member said he would help too; And yeah destined/weirdwolf/#8 did help me. Now then that

paragraph covers about 9 years of events! So this has been a bit of a time in becoming a reality.

> **I write the drivel that I put out here in GeoWrite**

OK the steps are this way.
I write the drivel that I put out here in GeoWrite, I use Times Roman from Dale Sidbottoms laser lovers disk, I understand is still available. That is the easy part; as that font is set to work with postscript things. Some of the normal GeoFonts are not recognized by post print or are a bit too jaggy.

I have tried some of the LQ fonts, and they arc a bit smoother. Though I am not using the Perfect Print programme any more. So then lets say that I have a bunch of drenn written and am ready to do the next step.

That is put the GeoWrite file into PostPrint. I use the B3.8 one for most things. But I have the B4 one, which is fine it even has some nice additives and cuts of about 4 lines at the top of a GeoPaint image even on the HP printer that I am using. Which is a lower model than what I understand Maurice was using. Embarrassing story on this part; Sec there arc no-docs that I have ever seen for the use of Post Print, my thanks go to Sunfish from COPS mail list. He told mc how to use an imported font, which is what I do for the print edition of the newsletter.

I would never have figured that out, nor how to convert a pfb postscript font to the needed pfa for post print. He sent me to a site and I grabbed the programme that works on a 128. Currently on that hard drive with Maurice awaiting repair.

OK back on track. I had found the pull down options in post print for installing the information. GcoPub* GcoWrite* Complaint. pegs. Those are the first four that can be done with hot keys, the C= and one of the numbers 1-4. Now 5 and 6 are also listed, but the way they are listed is obscure to my literal mind. I didn't understand what they meant. So for about 9 years, 1 never messed with them.

Instead I just put in the pages one by one, like the 20 page newsletter. Make a page, and then press C= and 2 for GeoWrite. Select the page number, press return, then a mouse click. Followed at times by sizing the page of text to the size of the postprint page. I feel like the south end of a north bound mule. when I discovered that C= and 6 will put in the entire document. C= and does the same for a GcoPub document. Lets just say that I use that method now and my work load is a lot smaller in my Desk Top Publishing duties.

Well that is good so far; I could then print it out for some one to read assuming there arc any that hard up for reading material. Ah but for the print edition of the newsletter, That isn't going to happen! I now exit the layout and go to the print icon, There I select the print job. First thing I do is send via GeoCable the font I want. BTW it is called Village Plain, the font from the Prisoner TV show of the 60s. That is I25kb. What it is in normal blocks I don't remember.

Oh I am looking to replace a font. LowWeRegular if any one has a copy. Anyway after that is sent to the printer. Next is to make a disk file. That is done by selecting the output in the print options* Here instead of selecting GeoCable or the other to printer stuff. I select disk file. That will send the output to the RAM in the SCPU.

Now there are a collection of option screens, like where is it going and the name that I want to give that file. The main one is the setting file, here I can select to send it as a GeoWrite, or something for

Linux, Amiga and Mac Or for the heretic system. Tell you right now that in my experiments; all but the heretic format for the disk file will fit on a 3 1/2" floppy. Heretic one was too bloated, though it was the same file.

For the print work that I do; I make the GeoWrite disk file, followed by going into GeoWrite.,Where I go to page #10. Again thanks to Sunfish for that information. Where I just substitute/Times-Bold with /VillagcPlain, then out of that and back to print options; Where it is just a simple change of direction for the output from disk file to GeoCable right to my laser printer. In a few minutes out comes the booklet edition of the users group newsletter, or what ever I am printing at

postscript to PDF thing, take pretty much all the steps above,

the time. Ground work laid for the next part; which is that postscript to PDF thing, take pretty much all the steps above, Save for the font change.

I haven't figured that out yet. Change the output option to disk file; but at this point, I select the Linux option. In a short spate of time, There is a file in the RAM that is in Linux style and in postscript. Of course I can't read the smegger on my Commodore system. If I put it on a disk, how could the Linux system read it? Here we have the use of another Geos tool. GcoDos, and that is a powerful tool, that I am still learning about. Grabbed it to do just one thing; copy files from heretic formatted disks to the Commodore, Docs require the FD-2000 for that work.

Also it will not only read a heretic formatted disk, but will format them as well. OK then I fire up GcoDos, I wish it would tell me that I need to switch to 40c. But it doesn't, and the first few times I thought something was wrong. Anyway I make the copy from the RAM to the heretic formatted disk. This is where the problem with the heretic OS being bloated happened on a test. Next is take the disk out of the drive, tell it to go back to desktop, yeah 8 out of 10 times it locks up and 1 have to reset the 128. Disk in pocket and taken to the little cheap Linux system.

Most readers know that I don't know a lot about PCs, even the sacred and most holy Commodore. Tell you about Role Playing Games for hours. But very* lame at best on computers. So this part is going to be a bit convoluted in explanation. The file that I make goes into the drive on the Linux system; I copy it

10 times it locks up and I have to reset the 128.

over and (here is the front page as an Icon. My first tests where bad for many reasons; One was that I still had bold face on for the document, as that is needed for the print one for spacing of the replacement font.

As a postscript file or a PDF it looks like bold on a quad print printer that was stuck. Took me many attempts to find out the problem, I also had a problem with sending the file to people. Linux users could see it but not other PC platforms. Oh and the biggest problem was that there may have been 20 pages, but only the first one would show up in any reader.

OK our long distance member that was helping mc out. Had an idea. Convert the file to PDF, more people could see that on different computer platforms. Right and this is done how?

So he told me about something called "imagemagick" I found it, downloaded it, and after he told me how to use it. The file came out as a PDF And by some miracle that I don't understand, all the pages could be seen. Well there was still the too black of the test part, but hey I got that fixed and it came out in a form that people could read.

So then the next part; Creating the newsletter for those long distance members that wanted it in electronic format. Or as we termed it the CyberSpace edition. Not hard to do at all, In fact for several months we have been sending CommodoreFree the CyberSpace issues. Ah but there have been some comments about how to make it better, like installing some JPEGs. Yes postprint will let you install them, So would make a page of colour images and try to plant text in the right places.
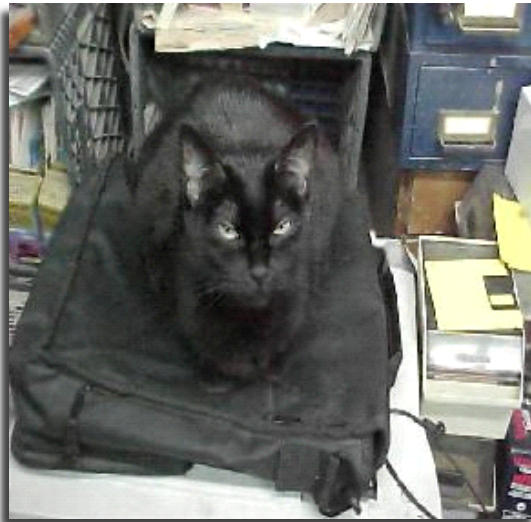
As it is installed in the layout part of postprint. Hey you can install a border and how thick and how far away it will be around the image. I think that one can also adjust the levels of colour etc, As I tried that out and well; came up with some ugly results. No documentation like I said earlier. Well I sent a test to Nigel at Commodore Free. Asking if it was a good way to send submissions, he said it looked OK as it seemed to be bitmapped.

I sort of got lost at that point. Said I was a lamer. (EDITOR the text in the postscript file seems to be a picture rather than text so this whole part of the document had to be OCR`d Optical Character Recognition to use the text in the magazine, normal text is usually selectable or saveable in a PDF however these files appear to have the text as pictures, this means the quality is less sharp, I am working to find out why this is the case it could be the software that converts the PS file to PDF)
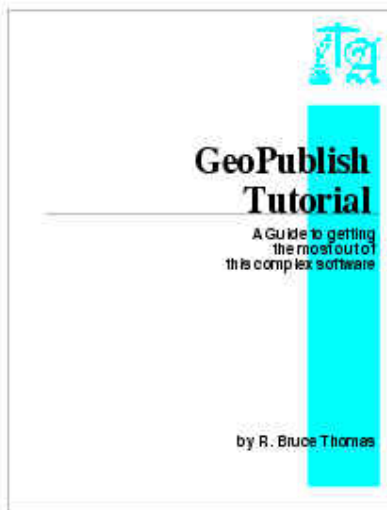
Well recently I scored up a copy of GcoPub. Replacing the one that corrupted on mc. Been experimenting with it in adding colour into the pages, and then installing JPEGs in the text areas. As this is written that is still a project that needs more training on my part. But sample CyberSpace issues have gone out. Mind you a 45kb or 1902 block post script file with 4 JPEGs and some colour added. Becomes 5.2mb when converted to a PDF Don't ask, I haven't a clue as to why.)

Now you may think that I sat down and scrawled this out in one sitting. Be almost right, does seem to read that way doesn't it? Ah but I have dabbled in other things as well. Recently received some of that feedback I had asked for on the sample issues. Complaints on some of the colour choices, I mean in what was the box colour and what was the text colour. I can't see them till the issue is converted

GeoPublish
Tutorial

A Guide to getting
the most out of
this complex software

by R. Bruce Thomas

as the text and box patterns use the 32 fill patterns to represent the colours, it's hard to see if they are clashing till the work is finished.

The other thing is that in one report the colours mentioned by the submitter, didn't match what I saw on the copy on my screen. This is a new thing to me and I have not got the theory at this time.

Using Bruce Thomas's tutorial, http://members.shaw.ca/cue64/geopindex.html or really bits and pieces, I learned how to make some circles and elongate them for a

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Problem here is that I have so many ideas flooding in my mind. Well OK I admit, what is left of my mind

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sort of Egyptian Cartouche. Still needs practice with the size and with the colour choices, I learned how to make a shadowed box, and install text in it for the page. Much more of course for me to learn to present the layout right as 1 stumble along for the newsletter.

Problem here is that I have so many ideas flooding in my mind. Well OK I admit, what is left of my mind. Monographs on different things for the C=. Which I will probably torment Nigel with and you the readers as well. But not all the colour stuff, just the text with attached images for the work. CDs of C= things in monographs with all this colour and JPEG stuff. Now that is something that can come about. Like for our yearly MossyCon CD. OK many readers are waiting for it from me. Yeah that CD fanzine idea. Having the adventures and articles in colour for the Role Playing Games, but hey done on the Commodore, in Geos with GeoPub, PostPrint and GcoDos.

I Just convert that postscript file to PDF on the Linux system. Seems so logical in retrospect that I wonder why others haven't done the same? Or if they have, why I haven't heard about it yet? Then I look at the lack of information presented to us. I mean there arc no documents that I know of for postprint. COPS mailing list has been very silent over the past few months. How to find out the information on that Linux tool, let alone the fact that it existed is also past me. And no "google" is not my friend. I don't speak it's language. OK I don't speak search engine language at all.

So wrapping this up on page #4 in GeoWrite. We can make PDF files 99.99% on the Commodore. 0.01% on another PC platform. Allowing us to make and share with non C= users our work and interests. We can add colour to the document and add JPEGs. You can also add GIF and EPS (encapsulated post script) images as well. Just takes some practice to gain the experience for a pretty document, something that I lack at this time.

Still it blows the minds of other PC users than C=. When they sec the output! That is worth all the hours I spent making the first colour with JPEGs issue of our newsletter. Also learned from T&E. Oh in parting, since you are seeing this. Just have to tell you that I wrote this in GeoWrite (as if you hadn't guessed already) Ran it through postprint and added the kitty picture at the bottom. Converted it to PDF all as described in the preceding pages. In case the image fails to come out, I'll attach it as well to the email that I will send to Nigel. Fingers, toes and eyes crossed that this works for CommodoreFree.

GeoPublish Tutorial copies available for purchase
updated February 17, 2006

I am ready to make hard copy versions of the geoPublish Tutorial available to those who want to buy one.

The masters for the printed version were printed on a high-end Color Laser Printer and will be photocopied and cerlox bound with a clear front cover (so you can see the cover page) and a blue back cover.

The entire publication is 110 pages. 15 pages have color.

Mounted inside the back cover will be your choice of either one FD-2000 disk or two 1581 disks. The disk(s) will contain all of the files created/used in the Tutorial along with the GEOS PD programs that were used.

The disk labels and the jackets they are mounted in are also laser printed. The jackets were designed in geoPublish and printed with

PS.Processor to fit more than one on a page.

Price for a photocopied edition will be US$26 plus US$6 for shipping anywhere in North America. Please e-mail me for shipping price outside of North America. I prefer PayPal but will take cheques or International Money Orders in US Funds but have to add an extra $2 to cover the service charge my bank charges me for these items.

Here is a bit of a bonus if you want one of these now.

I have 21 copies of the geoPublish Tutorial that are all original prints. I am keeping number 1. The remaining 20 (all sequentially numbered 2/21, 3/21, 4/21....) are available while they last for the price of US$26 (this includes shipping in N. America).

Not only are these first copies all original Laser Printed Editions but they have a total of 31 pages with color (16 more than the regular editions will have).
So far, 16 of these original Laser Printed Editions have been ordered leaving only 4 more to go.

After these are gone the rest of the hard copy versions will be photocopies with only 15 pages with color and you'll have to pay extra for shipping.

Send your PayPal payment to rbthomas59(at)shaw.ca or contact me via e-mail to request the address to mail your payment to.

EnGEOy!

Bruce Thomas

http://members.shaw.ca/cue64/geopindex.html

Postscript Output From Geos

Originally printed in one of the early issue of Commodore free but reprinted here due to requests about Postscript printing

Clear professional printed output is a requirement for any computer systems; especially one Supporting a word processor. There is a way using just the standard version 2 of the Commodore Geos operating system to print to any Postscript laser printers, the process has been available for some time, but the cost of a postscript printer may have deterred some people from trying.

Quickly looking on eBay, many of these postscript printers are being disposed of very cheaply by there owners, eager to upgrade to the latest standard, or better models. If you are looking for a printer ensure its not a winprinter and works from dos and Linux Expect to pay anything from a few pounds to £50 I managed to save an old LaserJet 4v PS (PS standing for postscript) and all it cost me was a car drive to collect. (this must be the only stroke of luck I ever had) remember some models needed and extra Postscript interpreter to work and are sold as compatible you need to check it Will print postscript output and the cartridge is installed, otherwise you could be looking at more expense.

POSTSCRIPT PRINTERS
Of course if you don't want to go to the expense of buying a postscript printer we can use the one connected to your P.C. any printer will work with this method. True the process is a little more complicated and needs a copy of the Geos postscript file (created in the DISK section) copying to a "foreign" computer platform. Once copied to the foreign platform we can then print the file using whatever printer we have, postscript or none postscript, inkjet, laser almost anything..

GEOS
If you don't have a copy of Geos already you need to buy or even download the free Geos version files from www.cmdrkey.com, this version cant use any of the commercial add on software but does allow the use of public domain applications and has a built in word processor. At the time of writing the full download link was http://cmdrkey.com/cbm/geos/geos1.html select the version best for you, both the 128 and 64 Versions can be downloaded as individual parts or disk images in d64 or d81 disk formats. For the tutorial I have downloaded the full version as a 1581 disk image.

Once the files are downloaded use whatever method you are comfortable with to extract the D64 or d81 image to floppy disk or disks (depending on the version selected). While we are in the download mode I suggest you should also head over to http://members.shaw.ca/cue64/ and download "Jim Collette GEOS software" this has been given out as Public Domain, and again at the time of writing the direct link was http://members.shaw.ca/cue64/coll util.html you should find two disk images, while the software is free I suggest downloading both files, again they will need extracting from

d64 images to real disks. Of course you can use these on an emulator if required but nothing is as good as real hardware.

SETTING UP
Using Geos is quite painful with 1 disk drive so my system has 2 drives connected, although It's possible to run from 1 disk I would suggest a minimum specification be 2 disks. If you are out shopping a mouse would also be an advantage, although Geos will work with a joystick, but you may find most of the time you will be pulling out your hair out trying to navigate with a joystick.

So here is my suggested minimum setup
Drive 1 1581 Drive (or 1541)
Drive 2 1541 Drive
Mouse 1 commodore mouse

First thing is to load Geos and set the relevant preferences, so tell the system you have a mouse and what size and number of disk drives you will be working with. This isn't a Geos tutorial but C= + I (commodore key and I) will bring up the input preferences use the cursors to move around and return to OK. You also need to look in the Configure and select the number and type of drive, ensure you save the settings.

You can purchase a Geo cable from www.cmdrkey.com directly. (of course good luck as Maurice is Years behind with orders)On the Geos disks are some fonts named LW_fontname these need to be used in place of the standard GEOS fonts as they are apple laserwriter fonts (scalable fonts built into all postscript printers, these will produce the crisp output we need) The other (none LW) fonts are bitmaps see the diagrams below the fonts supplies with Geos Are

LW_roma
LW_cal
LW_greek
LW_Barrows.

The BSW font below is a bitmap notice how blocky this is compared to the other postscript fonts .
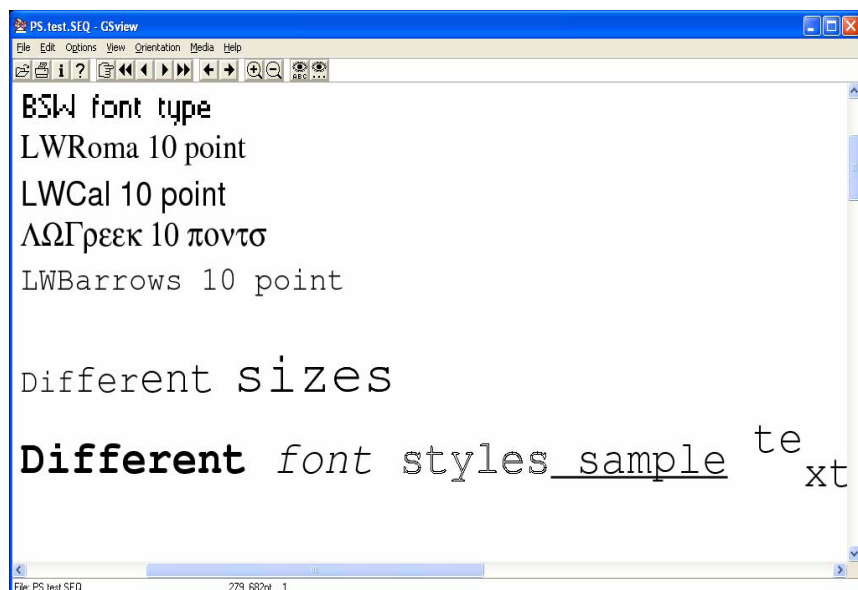
The Lw fonts are substituted for the printers own internal scalable postscript fonts.

Some more LW fonts are downloadable from http://www.zimmers.net/anonftp/pub/cbm/geos/graphics/fonts/postscript/index.html

Also I found some from here http://cmdrkey.com/cbm/genie/GEOSFontsListing.html find the files named 13369 and 13368

Geos also contains some LW fonts, but remember only the first 8 fonts are available so you will need to rearrange or delete some of the bitmap fonts for Geos to be able to use the LW fonts. Most magazines just use 4 fonts for the entire publication so I will go out on a limb and suggest 4 fonts is enough for anyone, remember you can use bold, italic, outlined and underline sub and superscript to enhance the document as well as font sizes. Using too many font variations make a publication look tired and amateurish.

PATCHING

This procedure will outline how to patch GEOS so you can create postscript file to transfer them to another system and print files from the "foreign" system. Also how to Patch geos to print directly using a Geo cable. Are we sitting comfortably; good then we can begin!

Start Geos, now from the disk B of our collete utilities you need to run the file "ps.patch (disk)" as shown below, If using the Geocable you need to run the PS_PATCH (GC) the

process is more or less identical for both of the versions.

The application will then start to run and display a splash screen

Once the utility has initialised itself (here we are using the print to disk PS.Patch (disk))you need to go to the patch menu and click to drag down the menu.


This gives 2 options one is to patch Geo publisher printer output and the other is for Geolaser, as we are using the Free download of Geos we cant use Geo-publish so we must use the Geo-laser option, this will allow printing to a postscript file from the standard Geos applications, the postscript file will be saved on the disk from where the original document is loaded, so ensure you have a disk with enough room.

Select the Disk where the Geos system files are to patch

The system will run and after a few seconds, you should see the complete dialogue box Appear. Now we just need to test the patch to ensure everything worked OK
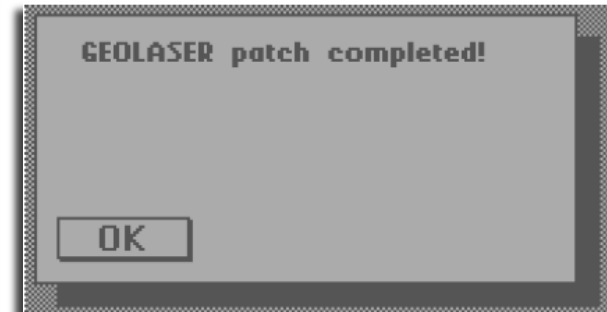

One thing for the disk version is that we need to download a copy of Ghostscript (or similar) to allow viewing of postscript files check out the link. Versions of Ghostscript are available for a Variety of machines Apple-mac, Amiga ,Linux, os2 and Windows pc amongst others. Ensure you download a copy of Ghost View this is needed to view the files on screen, and makes the process easier http://www.cs.wisc.edu/~ghost/ once downloaded read the Documentation and get to know the programme.

I am working on a Windows PC so I would do the following after the installation of ghostscript and ghostview

Testing Geolaser patch disk output
Start the Geowrite application and write something inspirational to print out
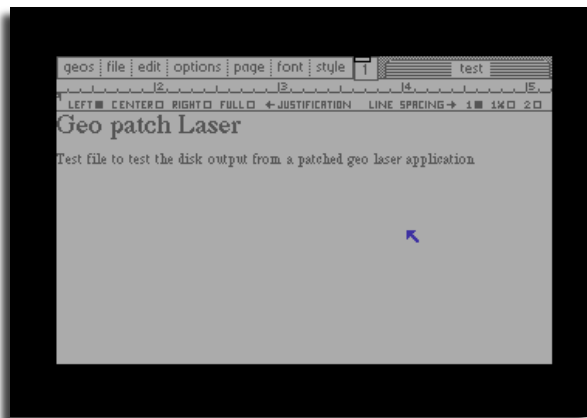
Save the text and close GEOwrite we don't print from this we have to use Geolaser, Run GEOlaser application it will initialise and provide us with an options box
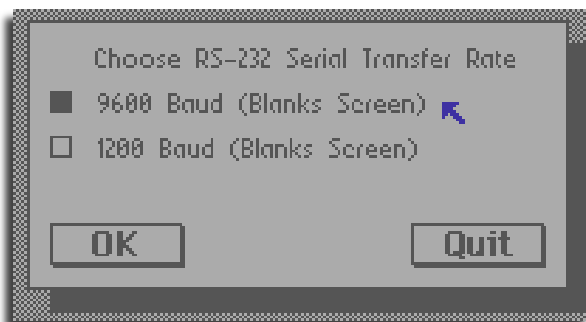

Don't change the settings as we are printing to a file and not a Serial printer so they don't make any difference. Then click OK

Work begins formatting the original document to a postscript file, this is quite a lengthy process even for a few lines of text, if your working on something a page in length I suggest making a good cup of strong tea and maybe a short-ish book or magazine.

The postscript printed files now need Extracting from commodore disks to a pc compatible format so use whatever process you are comfortable with to do this procedure.
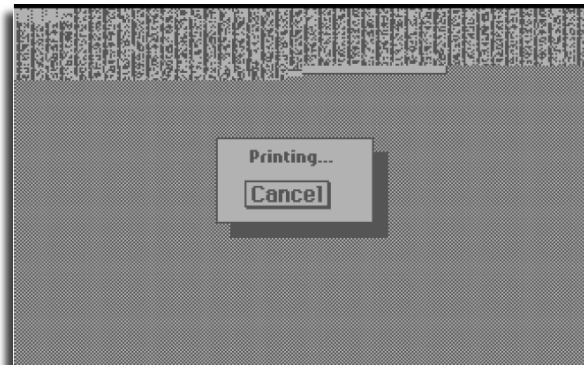
Start the Ghostview application and drag the geos postscript file onto the ghostview screen as shown below a preview will appear of the text

From the File menu you can even convert the file to a PDF for distribution on the internet. Of course clicking File and print will print the Text to your PC`s attached printer, whatever make or model you have, that is of course assuming you have installed the required printer driver for the model.

GEO CABLE
Of course you will need a special cable for this option called a Geo cable they are available
from Maurice Randel www.cmdrkey.com , the cable connects the Commodore 64 to any
standard Centronics printer interface .The process is simpler as your file will be sent directly to the printer as a postscript document. The printers processor will interpret the commands and format the page, then print out a sharp quality document direct to your postscript connected printer that could have been produced from any machine.

Another other useful website
Foreign characters output from Geos
http://web.mit.edu/randy/www/antigrav/laserpatch.html
Writer Commodore Free
Written originally for Commodore Scene magazine © 2006 (updated 2009)