

SHIFT838 newsletter

by Chris Schneider



shift838.99er.net

AUGUST 1, 2017

VOLUME 3 NO 2

This newsletter is dedicated to the ongoing support for the Texas Instruments TI-99/4A and Myarc Geneve 9640 user community and is published by SHIFT838.

Welcome to Volume 3 Issue #2 of the SHIFT838 Newsletter!

If you have not subscribed to the newsletter yet please go to the below link to subscribe. This is the first newsletter edition that I have sent out via the new site, hosted by 99er.net!

If you have not yet subscribed to the newsletter, follow the links below to register:

For the Italian version: <http://www.ti99iuc.it/web/go?TE27BR>

For the English version: <http://shift838.99er.net>

I have been working with **Ciro Barile** so that the newsletter can be released at the same time in Italian for the Italian TI users. If you have not visited his site please do so at <http://www.ti99iuc.it> .Ciro also created some of the graphics used in my PDF newsletters!

2017 is going to be an extremely busy year for me at my employer. I plan on still releasing the newsletters as scheduled but they may be a little later than usual due to major capital projects already underway that require my involvement.

Anyone wanting to submit a TI/Geneve article for publishing within the newsletter please send me an email. All participation in the newsletter is encouraged and appreciated.

In this edition of the newsletter there will be an interview with Quinton Tormanen. A hardware review for Paul Rickards WiFi232 Internet Modem and a walkthrough of my experience of building a WiFi modem for use with the TI using the ESP8266 WiFi Module and other components.

Monthly Highlights

32nd TI-TREFF



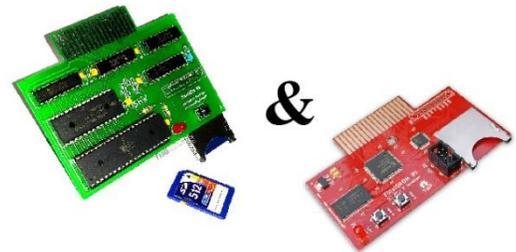
The 32nd TI-TREFF is about to arrive and will be held in Rome! Mark the date on your calendars! Start date fixed for the afternoon of September 29th. For those who want to participate, remember to fill out the participation form so that you can take part in the prize-winning game!! You can find all info by clicking on the following link:

<http://www.ti99iuc.it/web/go?UQ29WD>

All participants that plan on attending please fill out the 'Participation Form' at the below

<http://www.ti99iuc.it/web/titreff2017/>

Ralph Benzinger's FlashROM99 and FinalGROM99



If you have not followed this project, you can find out more from the link below. In my humble opinion the FinalGrom99 cartridge is the 'Be All, Must Have' cartridge for 2017! I have already ordered mine and they work great.

<http://atariage.com/forums/topic/260917-the-finalgrom-99/>

TI(ny)-99/4A Computer by Fabrice Montupet



www.ti99.com

Fabrice has developed a more compact version of the TI-99/4A. If you want to know the specifications, read the discussion on AtariAge. Fabrice has really outdid himself this time. I will certainly order an example when and whenever they will be available.

<http://atariage.com/forums/topic/266585-tiny-994a-computer/#entry3781704>

Legend of Tilda

PeteE has decided to work on a new game for the TI and it looks to be a very interesting game. I am sure it will get plenty of play. It is a top-down sword adventure reminiscent of a late 80's Nintendo game.



Princess Matilda assigns you the mission of finding

and gathering the 8 pieces of the "TI-Force" of wisdom. The ultimate goal is to defeat the evil magician Ganrom.



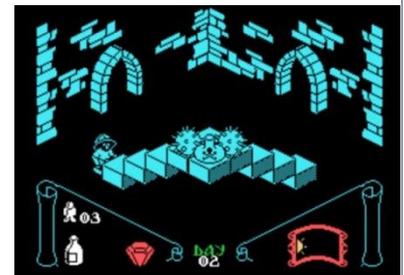
<http://atariage.com/forums/topic/265033-the-legend-of-tilda/#entry3752283>

Knight Lore



I bet you think an isometric game cannot be executed on our TI99? Well, I completely understand and I was also skeptical, but as usual Rasmus Moustgaard can still surprise us and challenge the most advanced programming techniques on the TI-99. A game that has been converted

line by line directly from the ZX Spectrum version. 99ers can finally add this new pearl to our collection of video games! In some screens, the game slows down a bit but remains very playable. The title is distributed free of charge and is compatible with the FinalGrom99 cartridge!



New to the group? TI-99/4a Hardware and software resources Follow this topic

Started by arcadeshopper, Sun 25 Jun 2017 5:10 AM

Ignore this topic Reply to this topic

18 replies to this topic

arcadeshopper Online #1

River Patroller Posted Sun Jun 25, 2017 5:10 AM

This is a work in progress.. will be happy to add anything missing - Greg

Web pages:
 FTP site: <ftp://ftp.whitech.com/>
 Gameshelf: <http://tigameshelf.net/>
 Tech Pages: <http://www.nouspikel...itechpages.htm>
 Mainbyte photos lists and projects: <http://mainbyte.com/ti99/>
 Fred Kaal's site: <http://www.ti99-geek.nl/>

2,344 posts

Are you new or old TI-99/4A users and are you looking for resources for your beloved computer? Then take a look:

ArcadeShopper has added this post to AtariAge.

The thread contains many precious resources for the TI.

<http://atariage.com/forums/topic/267055-new-to-the-group-ti-994a-hardware-and-software-resources/#entry3791726>

Interviews

Quinton Tormanen



Quinton's interview was performed by Dan Eicher and Quinton has given his consent to publish in the Ti-99 Italian User Group Newsletter and the SHIFT838 Newsletter.

Although Quinton is no longer active in the TI community he coded quite a few games that many of us know. Below are a list of his games and personal comments on each. (Interview to follow).

Pretty much all of my games were not really original ideas. I was young at the time and didn't think anything wrong with basing my games on photos of ads on games for other platforms (Commodore 64, etc.) or articles in magazines for the Commodore 64. However, I had a lot of fun making them work on the TI, and learned tons about programming in the process.

Here are a few thoughts on the games I had published:



War Zone was based on a magazine article on writing a game for the Commodore 64 written by a fan of the arcade game Xevious. I re-did the graphics to give it a new look.

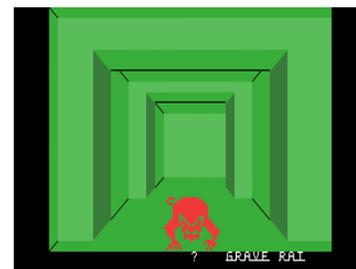


War Zone II was my personal favorite in terms of the technical challenges of the scrolling and multi-color sprites. It was inspired by the arcade game Xevious. By this time I had learned many nuances of the video chip and was able to take advantage of these to have multicolor vertical scrolling and overlay sprites in a prioritized manner to minimize the negative effects of the 4-sprites-per-line limitation. It was actually River Rescue that inspired me to figure out how to make this work. I wish I had put more

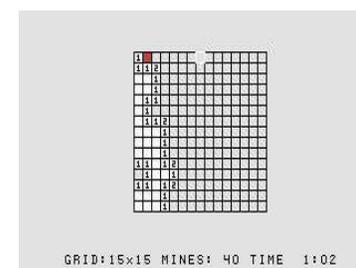
time into developing the levels themselves. I basically put them together, tried them out a little bit, and called it good.



Backsteine was based on a single-page magazine ad for Arkanoid II: Revenge of Doh. I largely lifted the graphics from that ad, and imagined from the text in the ad what the game play may have been like. I've never actually seen or played Arkanoid II. The inspiration was just the magazine ad.



Living Tomb was basically an unauthorized port to the TI a game in a Commodore 64 magazine article. There's really not much original in this game from me, other than the code to make it work on the TI. My humblest apologies to the original C-64 author! Actually, the hokey finale I did do myself, but I'd rather not take credit for that!



Mine Field is Mine Sweeper for the TI. Nothing else needs to be said there.

Other works that I had huge amounts of promise (IMHO) but were just too ambitious for one person to build:

Gold Vault was based on the classic Gauntlet arcade game and was something that I'd worked on off and on for some time. I was never very happy with the game play, and there was so much work required to make the levels be good, that I eventually lost interest.

Caves of Death was a role playing game based on my experience playing Might & Magic on a friend's PC. If I had help, this game would have been incredibly far ahead of what I have seen in terms of role playing on the TI. However, the sheer scale of the work that I was trying to do myself just wasn't practical. I had tons of graphics to do, tons of levels to develop, and so on. Needless to say, I finally lost interest.

By the end of these projects, I owned a PC, and had built an assembler on the PC so that I could edit and assemble my code on the PC and then send it back over a serial cable. These made development much faster than the 20+ minute builds using the TI floppy disks.

Q: How did you get started with the TI?

My father bought the TI-99/4A in about 1982, when I was in second grade. We only had the TI-99/4A, a TI monitor, a tape recorder, and a few cartridges. My siblings and I spent a lot of time with the basics such as Parsec and Munchman. My dad would write some simple Basic programs, mainly to play hymns with multiple lines of CALL SOUND. He also subscribed to COMPUTE! magazine, which had Basic programs for various computers, including the TI. I really enjoyed typing those in. It was a great way to learn how to program. There was just a lot of excitement seeing a screen shot for the program in the magazine, typing like mad to get it entered in, and then scouring the program for typos to make it work properly. And, of course, eventually, the temptation to modify the programs helped with the learning process.

Q: How did you make the jump from Basic to Assembler?

Being around 10-12 years old at the time, the money I could spend was limited. While I wanted to upgrade my TI with 32K of memory and disk drives to run other programs, I saw what I thought might be a less expensive option for upgrading at least the memory in the MiniMemory. I don't know if I ever understood what TI's intent was for the MiniMemory cartridge, but through some literature associated with that cartridge, I started to learn about assembly language. This led me to a book on TI Assembly Language, which was a real eye opener to me. It soon became apparent that the MiniMemory cartridge wasn't the best choice for programming in assembly language, so I ended up investing in the Editor/Assembler cartridge and finally convinced my dad for funding a CorComp expansion system with 32K RAM, RS-232, parallel port, and eventually dual DS/DD disk drives.

I believe that I started with some hybrid programming with Extended Basic programs loading subroutines written in assembly language, but I soon moved completely to assembly language. There just wasn't much that Extended Basic brought to the table, once I got going with assembly language. There were a

few hurdles however. For example, I couldn't figure out how to generate a random number in assembly language, and wrote a hand-written letter to Texas Instruments asking how it was done. Some kind soul at TI replied with a simple random number routine. Obviously this was prior to the Internet, and I was working at the time without the benefit of a user group either, so it was almost a complete vacuum.

Q: Did you ever consider buying and/or programming for the Geneve?

I coveted the Geneve. However, in addition to the price tag, I was also concerned about reducing the available audience for my games. That is, my understanding is that Geneve users could run TI programs, but programs written to depend on the faster Geneve wouldn't run correctly on the TI.

Q: What was the biggest technical hurdle that you ever overcome on the TI?

The program WarZone II was the culmination of a lot of tricks that I'd learned over the years. In this program I was finally able to work around many limitations of the video chip and create multicolor sprites and smooth multi-color vertical scrolling. I think it was the vertical scrolling that was the biggest technical hurdle that I overcame. When I started out, I had a vague vision for how to do it, but I didn't even know if the microprocessor had enough horsepower to pull it off. The basic idea was re-write a large portion of the character and screen maps every scroll cycle to an unused area of video memory, then flip the pointers to the start of the character and screen map at the same time to make a smooth transition. I believe this had to be timed to occur during the vertical refresh. That combined with careful planning so that I never ended up with 3 ground colors in a single character and it just worked! There might have been some celebratory whoops emanating from the computer room that night!

Q: What programming challenge gave you the biggest feeling of accomplishment?

That would be the vertical scrolling challenge described above.

Q: What was your favorite piece of TI hardware?

I don't think there is really any one piece. I worked with the CorComp 32KB memory/disk expansion unit with dual DSDD drives pretty much throughout my entire programming years. Later on I added a speech synthesizer, but I

never really got into using it much, except to add some pretty pathetic speech to the final victory scene in Living Tomb! I guess I have to say that I loved my CorComp disk controller and memory expansion unit.

Q: What was your favorite piece of software that you didn't write?

I think that would have to be DISkAssembler. I learned so much about programming by looking at other programmer's code. I don't know where they got their information from, but I was working in a vacuum and relied on looking at their use of undocumented (at least not in any documentation I had) tricks in the video controller and elsewhere.

Q: What tools did you use to during your development process (graphics, sound, fonts, compiling)?

I used the Editor/Assembler for my basic product building. Later on I built my own assembler for the IBM-PC to speed up the process and just used a terminal program to send the compiled results back to the TI for testing. I built a lot of little helper applications along the way. For example, the Backsteine level editor that ended up being included in the product was something I used myself. For War Zone II, I also made a level editor that let me build the levels graphically. It was fairly crude and never released for public use. As far as graphics, I used a lot of graph paper! Sound was generally borrowed from other programs. I would find a sound that I liked and then see how they made it. I didn't know of any sound libraries or anything like that for the TI.

Q: Do you have any favorite TI moments?

They were all wonderful moments. I've described some of the particular challenges and joys, but the whole process was just a wonderful discovery process. Whether it was trying out games that other people wrote to see what could be done, or disassembling them with DISkAssembler and poring over hundreds of pages of assembly language printed out on fanhold paper with my dot matrix printer, or coding up some of these ideas into my own programs, it was all great fun!

Q: How did you get your start for each program? Backsteine, Living Tomb, Mine Field, War Zone, War Zone II?

Backsteine started with a few screen shots from the Archanoid game on PCs in a magazine. I liked the rich look for a classic block-breaking game and imagined

how the game play might go from there. I then coded up that came from there.

Living Tomb and War Zone were pretty much rip-offs of programs written for a Commodore 64 in a magazine. The entire game play and look came from those programs. I wrote the TI versions from scratch, but there was nothing original about the games itself. I probably owe somebody the \$200 or so that I made from them!

War Zone II was the most mature game that I wrote. It was a attempt to bring some of the magic from the arcade game Xevious onto the TI. Sure, the idea was again not original, but the challenges were unique and I was really only borrowing on the memories of having played the game a handful of times in an arcade in the past years.

Mine Field was just my attempt at re-creating Minesweeper from Windows 3.1. I just made it for myself, but then decided to toss it over the wall and let Comprodine sell it.

Q: What was your development process like? ex. Sketch out concept, do story board, etc?

As you can see, I usually started with ideas from programs on other computers. I feel that I was mostly a programmer and tinkerer and not so much of a game designer. I liked to see what other people were doing with the TI, and see how I could make those ideas work in my own programs, or maybe even more often, try to emulate what other people were doing on other computers. Some of those ideas ended up fitting into a game that I built, but I also had tons of little "experiments" that never made it into any games.

Q: It is very rare that someone is good at both assembly language and graphics and sound and creating an interesting and playable product - did you have others that helped with the development? (And your programs are extremely polished and show great attention to detail).

I worked alone on all of these programs, and actually received very little feedback in terms of game play. They pretty much came out as I wrote them and were released when I was happy with them. However, while I was working alone, I had a tremendous amount of help from programmers that went before. First, there were dozens if not hundreds of games that I played and tore apart to see how they worked; tools such as DISkAssembler were invaluable in this effort as well. Then, there were the magazines like COMPUTE! and Micropendium that published source code that helped with my

education, and gave me ideas if not the complete game play (see Living Tomb and War Zone above) for many of my projects.

In terms of the attention to detail, that's mainly a product of my nature. It works to the good and to the bad, at work and at home.

Q: How many hours did you spending working on each title?

I think the number of hours are long forgotten. Most took hundreds of hours, I'm sure, with the exception of Mine Field which was quite a simple game and doesn't fit the mold of the others.

Q: How did you come up with the word Backsteine, it is somewhat unusual?

I had been working on the Backsteine program itself, and was showing it to my dad. I didn't yet have a name for the game. He enjoyed the program and we talked about what it might be called. He suggested that since the game involved breaking bricks, that perhaps by looking up the work "bricks" in other languages I could come up with a catchy name for it. I had earlier bought an English-German dictionary because I came across so many quality TI programs with German interfaces. So, using that dictionary, I found "Backsteine" to be German for "bricks," and so named the game. My wife now accuses me of encouraging scores of people to butcher the pronunciation of the German word!

Q: What was your involvement in Copy-C from Germany?

Once I had finally become exposed to the TI users groups in our area (both in Portland and Vancouver), someone exposed me to the Copy-C utility, with its ability to copy seemingly any floppy disk on the TI. The one downside was that its interface was written in German. It seemed like a trivial enough task to me to poke around in the program binary and change the display strings from German to English. However, it turned out to be quite non-trivial. The first challenge was that I don't know German. I bought a small English-German/German-English dictionary and with the help of that figured out what each line of text must be saying, and somehow muddled through that step. However, the greater challenge was that the creators of Copy-C had encrypted the entire executable. Therefore, I couldn't find the German text, let alone replace it with English. I don't recall the exact steps that I took from here but it was something like this: First, I knew that the program ran, so the encryption logic must be unencrypted. Therefore, I used DSASsembler to disassemble the

program. The vast majority of the program disassembled to garbage, since it was encrypted, but this showed me the logic used to decrypt the program. I believe I next built a separate program that used the same algorithm to create a decrypted copy of the binary. I edited the text strings in this image, re-encrypted it, and had an unauthorized, but English version of Copy-C.

So, in summary, I have had no association with Copy-C other than that I found it to be in the wrong language, and therefore hacked an English version for my own use. I wasn't aware that my hacked copy had been distributed further. Recall that at the time I was a teenager in the pre-Internet age, so it wasn't practical to simply send an e-mail to the Copy-C folks asking them to provide the translation.

Q: It looked like you started with Asgard and switched to Comprodine, what brought on that switch?

I believe your information is incorrect on that point. I actually only went through Comprodine. I had met another programmer using Comprodine at our local TI users group, and he hooked me up with the folks at Comprodine (Steve Mehr and Rodger Merritt). So, I distributed all my games through them. There may have been something near the end of that relationship in which Comprodine passed some of their software to Asgard to keep the distribution going, but I wasn't directly involved other than agreeing to allow Comprodine to do that with my software.

Q: Would you be willing to provide a picture for us to include with the interview?

See attached.

Q: Which program are you most proud of and why?

War Zone II is the program of which I am most proud. This program required significant creativity to work around several limitations that the TI posed in terms of graphics. First, I used a method of overlaying multiple single-color sprites to build multi-color sprites, which the TI didn't support natively. Second, there was the problem in which the TI could only display four sprites per pixel row, which I had exacerbated by using multiple sprites per object to achieve multiple colors. I worked around this by prioritizing the sprites so that even if individual sprites disappeared, the overall objects would still be visible. Third, I wanted a multi-color smooth scrolling landscape in the background.

This posted a number of its own challenges, and required drawing on what I'd learned over the years about the various graphics modes in the TI. I ended up re-building the landscape portion of the character and screen maps for every pixel scroll. I used two copies of each, selecting one to be active, re-writing the relevant portions of the other, and then selecting the newly updated maps. I'd repeat this for every pixel row of scrolling, giving me the smooth multi-color scrolling I was after. I also designed the tiles carefully so that I could use many colors in the overall landscape without hitting the limitation of two colors (foreground and background) per 8x8 pixel character. The game River Rescue by Thorn Emi was actually the inspiration for this scrolling. I never knew how he did it, but it showed me that it was possible.

Q: Do you have any great unfinished programs?

There were a number of projects that I had mocked up that I really think would have been cool if I had time to complete them. Two that stand out in my memory are Land of Quests and Gold Vault.

Land of Quests has the longest history. It was inspired by the Might & Magic series on a friend's PC with monochrome graphics. It was to be a role-playing game, in which the player controlled a band of up to six characters of various races (human, elf, dwarf, etc.) and professions (wizard, fighter, etc.). The player would move the band through 3D towns, dungeons, and outdoor areas, accepting quests, finding treasure and items, fighting monsters, buying items, and so on. I started the program under a different name using Extended Basic, but after my exposure to assembly language, I converted it and the product greatly matured.

Land of Quests was broken into areas, each essentially a 16x16 3D maze. The towns, castles, and dungeons had rock walls with torches spread throughout. Outside, the maze walls consisted of forest, mountain, water, and other textures. As the characters progressed in experience, they achieved higher levels including more spells, hit points, and so on, and found or bought and sold more advanced weapons. In all, there were to be about 5 towns, 20 outdoor areas, 5 castles, and several dungeons. Plus, I had large animated graphics for each monster the party encountered. I had approximately 100 monsters, sharing a pool of about 30 or so graphics. The technical challenges were achieved, but the sheer amount of content was more than I could maintain interest in. I had developed a cool method of quickly seeking the necessary components from the floppy disk by seeking to the exact sector on the disk, since the magnitude of the project required frequently overlaying code from the disk. For example, each area used 24KB for the main game engine for that area, plus 8KB for the 3D graphics. When a battle was joined I

replaced the area graphics with 6KB for the fighting logic, and 2KB for the monster graphics, if I remember correctly.

Gold Vault was my best effort at cloning the arcade classic Gauntlet. I had worked through the mechanics of scrolling in all four directions through levels many times the size of the screen, blasting ghosts and other creatures en route to find the keys and finally the exit. I had the mechanics essentially all working, but as with Land of Quests, it was apparent that I didn't have the time or creative energy to develop all the levels necessary to make it a complete product. Also, I never was satisfied with the quality of the game play, but perhaps the bar was set a little too high.

Q: If you had had unlimited time and money, what program would you have liked to have written for the TI?

Without a doubt, Land of Quests is a program that I sincerely wish I had been able to complete on the TI. It would have been far ahead of any other role-playing games I came across on the TI. However, I felt the pressure of a diminishing TI audience, outside interests arguably more appropriate to a teen-age boy, and the frustration that I was trying to do the work of what in the PC community was being done by a team of developers.

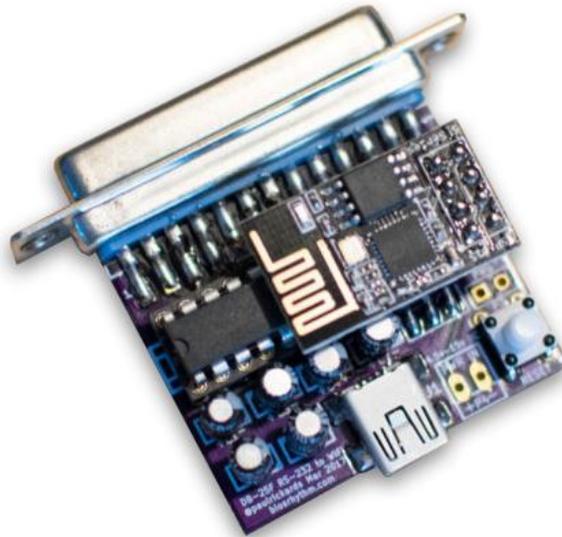
TI  **STARTER**

Hardware

WiFi232

An Internet Hayes Modem for Retro Computers

http://biosrhythm.com/?page_id=1453



Paul Rickards ([@paulrickards](#)) has designed a new Hayes Compatible modem that hooks up to retro computers like the TI-99/4A, Atari, Amiga and various other computers via the standard RS-232C connector (DCE) and utilizing the ESP8266 WiFi module.

Paul is releasing these in small batches currently and I was lucky enough to score one of his first batches and since then purchased another one in kit form that I put together easily and it functions as expected.

Some of the features (I will not list them all) are:

- Standard RS232C connector
- Support for 300 to 115000 baud rates
- Hayes command set emulation
- Storage of up to 10 speed dial addresses
- Accepts inbound connections
- Customizable busy message (I like this one!)
- Hardware and Software flow control support
- Firmware updates via Internet with one command issued via a terminal
- Built in web server

Currently it does not have DCD (data carrier detect) or a Ring Indicator

Also, with the TI even though I have been able to successfully connect to both FuSiON BBS and Heatwave at 38400 bps with no drop in characters. However, the baud rate I have been able to connect to on both systems are referenced below:

BBS	Download Transfer Rate (MAX Baud Rate)	Upload Transfer Rate (MAX Baud Rate)
FuSiON BBS	38400	38400
Heatwave	38400	9600

The only difference between FuSiON BBS and Heatwave is that Heatwave is ran on real hardware where FuSiON is completely on an emulated Geneve 9640 but the UDS device is physical. Both Insane Multitasker and myself or working through testing to try and find out why the baudrates are different for uploads. But hell, downloads work flawlessly!

All in all this device is a great little unit and on to top it off it is very affordable and allows the TI to go WiFi.

I am very pleased with my purchase.

DIY ESP8266 WiFi Modem

An Internet Hayes Modem for Retro Computers



I first want to start off by stating this is in no way better than the **WiFi232** project by Paul Rickards. However it does use a very early version of his code which he has made public on Github. This unit has **some** of the same features but has some that are not present as well.

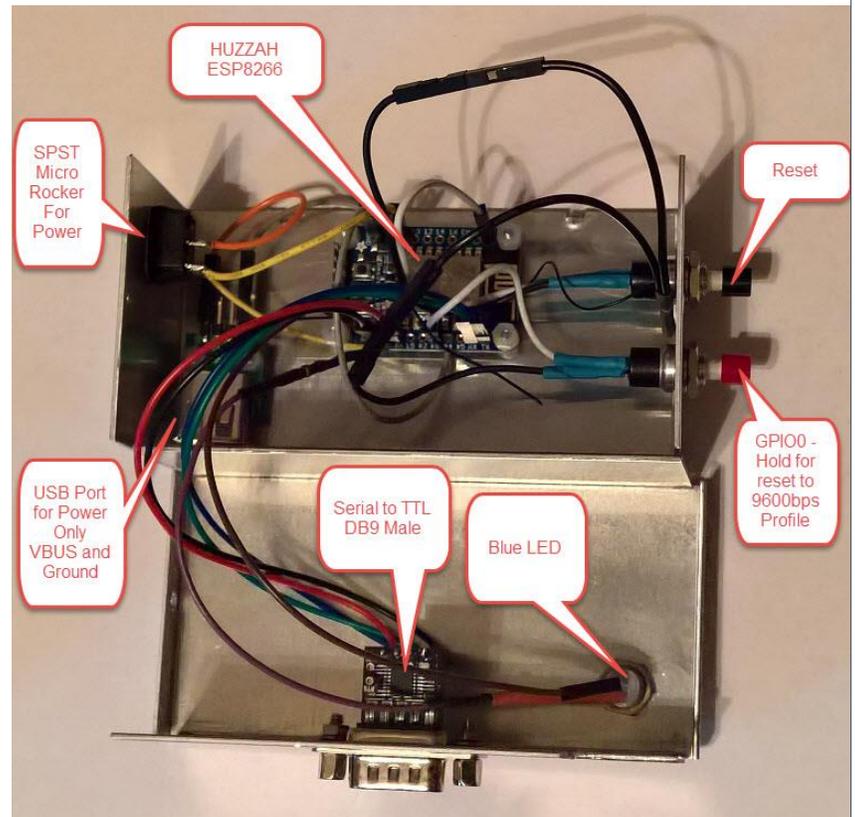
I will not be posting the full procedure in the newsletter, but a link to a PDF that shows how I actually did it with all the requirements and build instructions.

I have made a small modification to the code to default it to 9600 when pressing the GPIO button but this is easily changed.

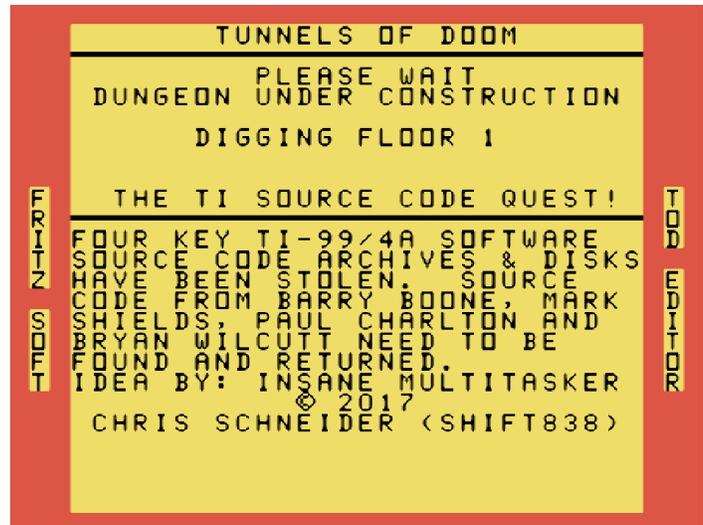
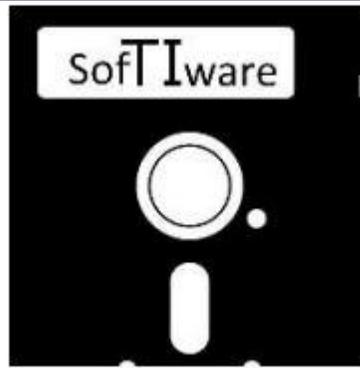
My end result is shown below and I have tested it with the 99/4A and as the WiFi232 it is solid up to 38400 for terminal access via BBS but the file transfers work at 9600bps for both FuSiON and Heatwave.

The complete documentation is 28 pages, which is why instead of publishing it into the newsletter, I have provided a directly link to a PDF file on my site.

To download the PDF please click on the link below.



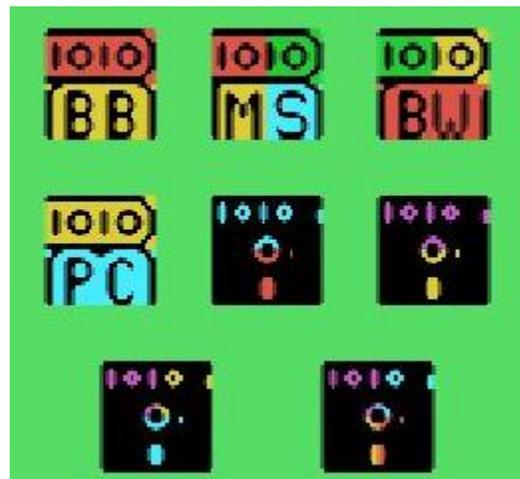
http://shift838.99er.net/Projects/Docs/ESP8266WIFI_DIY.pdf



TI Source Code Quest

This newly released game is for the Tunnels Of Doom cartridge. The idea was actually by Insane Multasker during an email exchange we had over the last few days. I decided it would be fun for a Tunnels of Doom game, so here it is.

The game actually has 8 different quest to complete in order to win the game. There are 4 source code folders along with 4 source code diskettes to find.



Please remember once you find all the items you must exit back all the way to the main store to win the game.

This time was the first time I actually used the Tunnels of Doom editor by Fritz Soft on the PC for the TI file. I must say this piece of software is very easy to use and if there was a TOD editor like this years ago then there would be a hell of a lot more Tunnels of Doom games.

This game was actually pounded out within about 8 hour's total so please take that in mind when you play it. I also put a handful of new monsters & graphics in there from some of our very own favorite video games.

I would like to hear feedback on the game, so please drop me a line if you play it with your thoughts.

I have a few others in mind since I did this one, but they will take substantially longer as I want to change quite a few monster graphics.

You can download '**TI Source Code Quest**' in TI disk image format from my site in the '*Software*' section.

<http://shift838.99er.net>

You can find the tunnels of the new Tunnels of Doom Editor by Fritz Soft at the below AtariAge thread:

<http://atariage.com/forums/topic/238859-new-ti-994a-tunnels-of-doomtod-game-and-game-editor/#entry3247221>

Calling All GAMERS!

**GAME OVER YOU GOT A
HIGH SCORE
ENTER YOUR INITIALS**

Owen Brand (**Opry99er**) has started a TI Gaming competition on AtariAge where a TI-99/4A game is chosen every month and TI'ers can compete to see who can get the highest score. At the months end the person with the highest scores receives some type of prize.

If you want to read the message thread in its entirety and possibly participate in the friendly competition then click below:

<http://atariage.com/forums/topic/241547-official-ti-994a-hi-score-competition/page-1>

Please join me in congratulating the last few month's winners.

Month	Game Title	Winner (AtariAge User Names)	Score
April 2017	Hen House	globeron	32180
May 2017	Frogger / TI-TOAD	jwild	37350/ 17900 Total: 55250
June 2017	Defender	jwild	836800

July 2017 game is '**Shamus**'



Solve my below cipher:

G T Y O R J O T E O U I A B G T

I am also am still waiting for someone to find my Easter egg in my adventure, 'The Stafford Predicament' that is used with the Adventure module. This adventure game can be downloaded off the FTP site, FuSiON BBS and soon will be offered on my website.



Resources

Contact information

To contact me please feel free to visit my website and click on the 'Contact' tab.

<http://shift838.99er.net>

Newsletter Topics

If you would like to participate in the writing of this newsletter or provide any topics for this newsletter please contact me via my web site.

Sites

There are a few of sites that I think should get their own list below. These are for the TI Hall of Fame and TI-99ers Unsung website. Please visit these below sites as both have great information.

<http://www.ti99hof.org/index.html>

<http://www.ti99ers.org/unsung/>

New to the TI-99/4A then check out the below message thread for a slew of TI resources (Information compiled by **Arcadeshopper**):

<http://atariage.com/forums/topic/267055-new-to-the-group-ti-994a-hardware-and-software-resources/#entry3791726>

Floppy Days

Randall Kindig's Floppy Days: A great resource for PODCASTERS to listen about information about old computer systems!

These are the links available for '**Floppy Days Podcast**' covering the TI-99/4A that have been done over the last year.

Episode #49: <http://floppydays.libsyn.com/webpage/2015/11>

Episode #50: <http://floppydays.libsyn.com/webpage/2015/12>

Episode #51: <http://floppydays.libsyn.com/webpage/2016/01>

Episode #52: <http://floppydays.libsyn.com/webpage/2016/02>

Episode #56: <http://floppydays.libsyn.com/webpage/2016/03>

The main web site to Floppy Days:

<http://floppydays.libsyn.com/>

Remembrance

Also the below site has a list of all the TI-99ers that have passed. Please be sure to check them out.

<http://ti99ers.org/modules/Inspire/remember.htm>

Below resources are just a handful of sites that support the TI-99/4A and/or Geneve 9640 computers. It is in no way a full list. This section will be included in all future newsletters. If there is a site that you think should be mentioned then please contact me.

Web sites / FTP Sites

<http://shift838.99er.net>

<http://www.99er.net>

<http://www.ninerpedia.org/>

<ftp://ftp.whtech.com>

<http://www.ti99-geek.nl/>

<http://www.mainbyte.com>

<http://www.atariage.com>

<http://www.harmlesslion.com>

<http://www.ti99iuc.it>

<http://www.turboforth.net>

<http://www.ninerpedia.org/>

Yahoo List Groups:

<https://groups.yahoo.com/neo/groups/TI99-4A/info>

<https://groups.yahoo.com/neo/groups/TI994A/info>

<https://groups.yahoo.com/neo/groups/Geneve9640/info>

<https://groups.yahoo.com/neo/groups/turboforth/info>

Active BBS'

FuSiON BBS

Access: Telnet

System: Emulated Geneve 9640 via MESS

Software: FuSiON BBS Software powered by S&T Assembly code

Location: Texas

Content: TI and Geneve file libraries, message bases. Full ANSI support, Text 40 and 80 Column modes and BBS E-mail.

Telnet to: **fusionbbs.ddns.net** port **9640**

HeatWave BBS

Access: Telnet

System: Geneve 9640

Software: S&T BBS Software

Location: Houston

Content: TI and Geneve file libraries, message bases, door games and e-mail.

Telnet to: **heatwave.ddns.net** port **9640**

The Hidden Reef

Access: Dial-Up

System: TI-99/4a Modified

Software: S&T BBS Software

Location: New York

Content: TI and Geneve file libraries, message bases, door games and e-mail.

Dialup : **718-448-9402 @ 8-N-1**

The Keep

Access: HTTP and Telnet

System: Pentium 4 running Windows 2000

Software: Worldgroup BBS Software (up to 256 user connections)

Location: Tigard, Oregon

Content: TI and Geneve file libraries, message bases, door games, multi-user and multiplayer games and e-mail.

Telnet : www.thekeep.net port **23** Web browser to <http://www.thekeep.net>

The Keep can now be connected to via telnet directly from the web page!

<http://web2.thekeep.net/telnetme.html>

The Keep has TI File libraries, Message bases, e-mail, door games, multi-user and multiplayer games. The keep also has a modem line connected for anyone that would like to contact The Hidden Reef BBS from the internet through The Keep. Simply telnet to www.thekeep.net on port 23, login to The KEEP and then type **/GO DIALOUT** at the main menu, then **D1** to dial out to **The Hidden Reef**. It's that simple.

Vendors

SHIFT838 – Provides used TI equipment as acquired. Check with me often. A lot of the items need rehomeing from other TI Users.

Arcade Shopper – Provides old and new TI equipment, upgrades and new runs of PCBs at www.arcadeshopper.com

Hummingbird EPROMS – Provides EPROM burning services for various TI/Geneve related EPROMS for original code and modified code. Contact Bob Carmany at Rmcarmany@aol.com for pricing and availability.

Repair Centers

Richard Bell

Repairs available on limited basis, please contact Richard at swim4home@verizon.net for wait-time before sending any repairs

Tim

Myarc-related hardware repairs on a limited, as-available basis. Contact Tim at insane_m@hotmail.com for wait times or to request service.

Chris Schneider (SHIFT838)

<http://shift838.99er.net>

English Version

TI-99 Italian Users Club

<http://www.ti99iuc.it>

Italian Version