9/29/97

If you'd like me to create a screen saver for your product or company, please contact me at:
flypeng@concentric.net

The Unofficial Quake™ Screen Saver for Windows 95/NT
Version 2.01
*Quake is a Registered Trademark of Id Software (Duh! Like you didn't know...)

Screen Saver Code Copyright 1996 & 1997 by Robert Osorio - The Flying Penguin
QuakeWorld Nickname: Flying Penguin (Mercenary)

(No rights reserved, give it away, I don't give a rat's behind!)

Direct all inquiries, concerns, complaints and death threats to: flypeng@concentric.net

PLEASE NOTE: This software is FREEWARE! There are no annoying nag screens or registration notices while the screen saver is running. Please feel free to distribute this software freely. I only request that no one make a profit distributing this software...

You can find the latest information and the latest version of this screen saver at the Flying Penguin Web Site of Love at:

http://www.brutality.com/flypenguin/qsaver.htm

INSTALLATION, REQUIREMENTS, IMPORTANT TECHNICAL & TROUBLESHOOTING CRAP, THE OTHER SHOE DROPS, AND A BALD FACED APPEAL FOR RECOGNITION

"WHAT THE HECK DID I DOWNLOAD NOW?"

One of the best Quake-theme screen savers in existence (I've downloaded all the others and they suck, but then again, I'm biased). When the screen saver is running you see a variety of views from the game, all fully animated just as they would appear if you were playing Quake. Torches flicker, damned souls squirm on the walls, fire balls get tossed out of lava lakes, lightning flashes (actually, that never happens in the game, but I thought it'd look too cool to resist) and, occasionally, a Quake gamer runs by on his way to wreak some mayhem elsewhere in the labyrinth (he might even take a shot at you). You have the option of having the authentic sound effects left on and at any volume, or turned off (some bosses just don't understand...), and you have, of course, the usual password protection that only prevents those non-Dilbertian dweebs from looking at your important stuff (like a coffee-break Quake game in progress, perhaps?).

REQUIREMENTS:

Windows 95/NT 4.0, 486/66 CPU and up (Pentium recommended). Minimum memory: 16 Mb for Win95, 32 Mb for NT 4.0. SVGA graphics card and display set at a color depth of at least 16-bits (also known as HighColor) - sorry, but 256 color mode is not supported. A PCI or VL bus graphics card is highly recommended, and DirectX compliance is a must. A Windows compatible sound card is not required, but improves the experience. Microsoft DirectX 2 or better must be installed in your computer, and you should have an insatiable love of Quake and anything to do with it.

> **NOTES:**
>
> - This screen saver will only run on Windows 95 and Windows NT 4.0. It will *not* work under Windows 3.1, so don't even bother trying. You will need to make sure that the Microsoft DirectX 2.0 (or higher) API is also installed on your computer (see **"IMPORTANT THINGS TO KNOW"** below for info on where to get it if you don't have it. Windows NT 4.0 already comes with DirectX installed, but it won't come with Win95 until the next major upgrade in '98).
>
> - To hear the sound effects, a Windows compatible sound card needs to be installed in your system. The screen saver can be used in systems without a sound card by disabling the sounds in the screen saver's settings window.

UPDATES:

Periodic updates, as well as any important technical information, will be available on my web site. Check in often at my web site for the latest news at:

http://www.brutality.com/flypenguin/qsaver.htm

ADDING NEW SCENES:

Do you want more scenes? Sure you do. Okay, here's the deal, you've got to contribute to the effort. I can't keep working on this screen saver for nothing, fun as it may be at times - my family and friends will disown me. So, I've decided to let you folks get involved. I don't expect to make any money off of this considering the number of hours I've already put into this project, but I would like to cover the money I've spent on the DirectX controls I purchased, and I'd like to save up to purchase Visual Basic 5 so my sick mind can continue to have a creative outlet.

Here's what I've decided to do:

For each $15 contribution I receive, I will add an additional scene and put the contributor's name in that scene as the sponsor. Sponsors can be nicknames or clan names, as long as they're not too vulgar (crap, I'm one to talk about vulgarity!). If you have a preference for a particular scene, send me a screen shot of it, and describe what episode and map it's in, and I'll try to comply. Scenes can be from Add-on Packs (I have most of them - the good ones anyway), CTF, Team Fortress, or whatever. If I don't have a custom map, I'll ask you for a copy of it.

Anything that would normally be animated within the scene in the game I would try and animate in the screen saver as well - within reason. There are some things that are too technically challenging - the sky, for instance, is very difficult to do unless it's only a small bit of it visible (as in the scene in the saver from E1M2 where you see a tiny bit of animated sky in the window). Water is also very tedious to do, and any animations that take up more than a quarter of the screen are also right out because it would waste too much memory to store all the animation frames.

Given that, all other animations would be included. Spinning weapons, flickering torches, waving flags, etc are all fine.

I can record the ambient background sounds and any sound effects that apply to that scene as well, and have them played back while it's showing.

For a $30 contribution I'll also include a quake gamer posing in your or your clan's skin. I'd make him fidget a bit - look around and maybe peel off a few shots once in a while. I won't make him walk around only because of the incredible number of hours it takes to code free movement of a player. The runner in the first scene was a labor of love, but I shudder to think about doing it again. Want everyone to see your clan's colors? Why not? I know you're all hams at heart. If you have a clan logo, I can also work that into the scene too.

All scene updates will be freely available on my web site to anyone who wants to download them. I will add a scene of my own each time I add a contributor's scene, so in this way the screen saver will grow by at least two scenes for every update.

I think this is the fairest way to go and keep the screen saver freeware. If everyone's happy with the screen saver as is, well fine, I can go back to a normal life. If some of you want to stroke your own egos, I'll be happy to help you and I can use a few bucks as well.

If you have any questions or special requests, feel free to contact me at:
flypeng@concentric.net
(I'm available for weddings, barmitzvahs, and funerals...)

Please make checks out to:

Robert Osorio
12555 Biscayne Blvd, Suite 832
N. Miami, FL 33181

INSTALLATION:

If you're reading this file, that means you've already extracted all the installation files from whatever archive they were stored in (or you're the amazing Kreskin!).

NOTE: If you currently have an older version of this screen saver installed in your computer, <u>you should uninstall it first prior to installing this version.</u> See UNINSTALLING below.

You need to run the SETUP.EXE file buried amidst all those other files that were in the archive (use either the Win95 "START" button on the taskbar and select "RUN" then type in the directory path the files are located in followed by SETUP.EXE or view the directory the archive files are in using Explorer and double-click on SETUP.EXE - either way will work. Once the installer finishes doing it's thing, right click on the desktop, select "Properties" from the menu that pops up, and then select the "Screen Saver" tab on the Display Properties window. Scroll down through the list of screen savers until you find "Unofficial Quake Screen Saver" and select it, then click on the "Settings" button to set your sound and password preferences (don't use the password button on the Display Properties window - the password setup is in the screen saver's settings window). That's it! This screen saver works fine with Win95's monitor Power Saver feature (took me a while to figure out how), and basically the screen saver goes into idle when Power Saver mode kicks in.

UNINSTALLING:

This screen saver fully subscribes to Microsoft Win95 standards for uninstalling apps. To uninstall, first restart the computer (otherwise if you've been using the screen saver during that session, the uninstaller won't be able to delete some files because they'll be reported as "in use by another application". Then run the Win95 control panel, select "Add/Remove Programs", then highlight the screen saver in the list of programs installed in your computer (*Unofficial Quake Screen Saver*) and click on the "Install/Remove" button. All files installed by the screen saver will be removed from your hard drive, and we'll vacuum under the carpet for you before we go.

USE:

Not much to it, it's a screen saver, not an arcade game Dummy! There *are* a few keys you can use while the screen saver is running, though. ***The keypad plus (+) and minus (-) keys, on the right side of the keyboard, control the volume while the screen saver is running.*** There is also a volume control in the screen saver's settings window accessed via the Win95 display properties window, but I

thought you'd find this handy too (like when the boss walks into your office and your computer's screaming and making all kinds of weird noises - some bosses just don't understand...)

While the scenes normally change based on the scene timer setting in the screen saver's settings window, *you can also force the scene to change at any time while it's running by pressing the keypad's asterisk key (*)*, just in case you need a change of scenery (like when the boss walks in and there's zombie guts flying around the screen - again, some bosses just don't understand...).

The Unofficial Quake Screen Saver works just like any Win95 screen saver. To make it your default screen saver, right click on the desktop, select "Properties", then select the "Screen Saver" tab. In the combo list box on the left, select the "Unofficial Quake Screen Saver" from the drop down list.

Settings:

Now click on the "Settings" button to access the screen saver's setup window. From here you can determine whether you want to enable password protection and what the password will be. You can disable or enable the sounds and adjust the volume.

At the bottom of the settings window is a scroll bar control labelled **"Minutes Between Scene Changes:"** that allows you to select how many minutes will go by before the scene changes. If you set this to zero, the scene will never change (although you can still manually force a scene change using the asterisk "*" key). Use this feature if you want to keep your favorite scene up all the time for your friends to admire.

Below that is another scroll bar control labelled **"Begin With Scene Number:"**. You can select which scene the screen saver starts with, or select **"R"** to let the screen saver pick a random scene. After the initial scene, all scenes are shown in ascending numerical order (even if started randomly).

SCENES:

Scene 1:   Introduction (Entrance to Quake)
Scene 2:   E1M3, Necropolis
Scene 3:   E1M2, Castle of the Damned (Dedicated to me!)
Scene 4:   E3M1, Termination Central
Scene 5:   CTF2, The Kiln (Dedicated to "Alibi")
Scene 6:   CTF2M4, The Ruins of Neominonk (Dedicated to "It's Loaded?")
Scene 7:   E3M7, "The Haunted Halls" (A Special Dedication to Dave 'Zoid' Kirsch)
Scene 8:   CTF2M7, "Gloom Castles"
             (Dedicated to Clan Lagitus - http://lagitus.stomped.com/)
Scene 9:   E4M2, "The Tower of Despair" (Dedicated to John Carmack)
Scene 10:   DM2, "Claustrophobopolis"
             (Dedicated to Clan RCQ - http://www.jacksonville.net/~mgjax/)
Scene 11:   E4M5, "Hell's Atrium"

At the bottom is a checkbox labeled **"Disable Bitmap Stretching"**. This will prevent the screen saver from being stretched to fill the screen - this will force the screen saver to show all scenes in their native 512 x 384 resolution. You should only need to do this if you have a slow computer and the screen saver runs slowly at your present resolution (this might also happen if you have a very large screen resolution - in excess of 1024 x 768 - and/or use 24 or 32 bit color modes). The more the bitmaps have to be stretched, the more demand that is placed on your CPU and graphics sub-system. This switch has also known to fix weird display problems on some systems.

TROUBLESHOOTING ("Why the &#%% doesn't this &$*@*%$ thing work?"):

THE PICTURE'S TOO FRIGGIN' DARK! (OR IT'S TOO FRIGGIN BRIGHT)

I did my best to choose a brightness that looked good on a variety of monitors, but I know that everyone uses the screen saver in different environments. Under office-type flourescents it'll get washed out pretty badly. I wish I could've come up with a simple gamma (or brightness) adjustment for the screen saver like there is in the game itself, but I found that wasn't too easy. The only solution I found involved a *very* expensive custom control, and I wasn't going to go for that for a freeware screen saver I'm not making any money on (I'm already in the hole for $200 for the DirectX controls!).

My solution was to make all the bitmaps available to you as BMP files. They're all located in the screen saver's directory (the default directory is C:\PROGRAM FILES\QSAVER\ if you didn't select a custom directory). Download the shareware version of a photo-paint retouching application, if you don't already own one, and use it to adjust the gamma in all the bitmaps to the same value. One I can recommend is JASC Image Robot, available at:

http://www.jasc.com/

Image Robot lets you apply a filter to a group of files automatically, which is perfect for this job. Do yourself a favor and make backup copies of all the original bitmaps first, just in case you goof. If you need to make it only a bit brighter, start with a gamma adjustment of 120% (or 1.2, depending on how it's measured in your photo-retouching app). For a lot brighter image, try 150%. Remember to apply the same gamma adjustment to all the BMP files in the screen saver's directory!

I know this is kind of a half-assed solution, but it's all I can think of. If there's anyone out there who knows of a method to adjust the gamma of surfaces in DirectDraw, please contact me!

INSTALLATION FAILS WHILE TRYING TO COPY A FILE OR YOU GET THE FOLLOWING ERROR:
"ERROR 367 - Can´t load (or register) custom control:´MHDDRAW.OCX` in InitSurfaces sub":
This is a rare problem caused by an outdated version of OLEAUT32.DLL in your \WINDOWS\SYSTEM folder. The screen saver's installer should update this file automatically, but in some rare instances it may fail. Please contact me if you have this problem at:
flypeng@concentric.net and I'll send Guido and the boys over to rough up your computer until it starts playing ball (a little intimidation always sets them straight).

YOU GET A "DIRECTSOUND" ERROR:
Assuming that you have DirectX installed (and that you have a sound card installed - Duh!), this may be caused by an outdated sound card driver. Here's the bad news: some of those really cheap sound cards that come bundled with cheap CD drives or come installed on budget computers may not be DirectSound compatible - which means you're going to have problems playing most of the new Win95 games and multimedia titles coming down the road. Check with your card's manufacturer or check out the drivers section at:

http://windows95.com

Also make sure you do not have a sound effect selected to play when Win95 opens a program. Click on the Sound icon in the Win95 Control Panel and make sure there is no wav file selected next to "Open Program". Otherwise a sound will play when you run the screen saver and tie up the sound device. When the saver tries to use the sound device as well, if finds it's busy and gives the error. Most people don't have their system setup to play a sound effect when a program runs (it's incredibly annoying), but it has been a problem on a few systems, though.

YOU GET A "DIRECTDRAW" ERROR:
Assuming that you have DirectX installed, this is almost certainly caused by an outdated video card driver. Check with your card's manufacturer or check out the drivers section at:

http://windows95.com

FRAME RATE ISSUES:
If you're getting a very poor frame rate (everything looks slow and jerky, kinda like a Francis-Ford Copola movie) and your video display is set for 800 x 600 resolution or higher, try checking the box in the screen saver's settings window called **"Disable Bitmap Stretching"**. This forces the screen saver to display all bitmaps in their native 512 x 384 resolution, irregardless of your desktop's actual resolution. This will improve the frame rate slightly on computers with slower graphics subsystems or systems with very large screen resolutions. The only bummer is that the screensaver's image will not be full-screen (it'll have a black border around it). From my experience, a average Pentium P-100 system with a PCI bus graphics card and 16 Mb should have no problems with frame rates up to 1024x768 resolution at color depths of up to 16-bit - your mileage may vary.
Frame rate is *very* dependent on the speed and bandwidth of your graphics subsystem, and to a lesser extent on CPU power. Also, the fastest frame rate will be at 640x480 as the stretching operation for higher modes takes longer to process. Here's some frame rate comparisons: on an AST Premmia 486/DX4 100, 16mB with ATI Graphics Xpression PCI video card I get a good frame rate at 800 x 600 16-bit color, but at 1024x768 16-bit it's very sluggish. I get a good a frame rate at 1024 x 768 16-bit on a P-120, 16mB with a Diamond Stealth 2000 3D PCI, and slightly better on a P-133, 32 mB with a Matrox Millenium PCI (I think the extra RAM is helping here more than anything else, although the Matrox is also a real screamer compared to the Diamond Stealth).
Memory can be an issue affecting performance as well. Win95 really sucks with anything less that 16 Mb in it (NEVER, EVER believe Microsoft's minimum memory requirements - yeah Win95 will *run* on 4 Mb, but who has all week to load a word processor?), and NT waddles like a pig with anything less than 32 Mb. More is always better. I've been using Norton's System Information app to check my system's memory use and believe it or not, the Win95 operating system alone takes up about

12 Mb all by itself! That means that on an 8 Mb computer, just running Win95 and nothing else, you're already using Virtual memory (disk drive memory swapping). Add a couple of 2 Mb apps in there, and the usual slew of wallpapers and utilities we all like running in the background, and you can see that memory gets tight in a hurry (I can't imagine why they're still selling Win95 notebooks with 8 Mb in them - it's a joke). The screen saver uses a lot of memory for storing bitmaps so if you hear the disk drive running all the time the screen saver is up and the frame rate is really jerky, you likely have less than 16 Mb in the computer, or else you're running a big application in the background. When the screen saver is not running, though, it's not using any memory or resources.

IMPORTANT THINGS YOU NEED TO KNOW:

- The Earth is round, trust me on this...

- This screen saver only works under **Windows 95 and NT 4.0** as it's a true 32 bit application (don't even try to run it under Windows 3.1 even if you have the Win32S API - it just won't work).

- You **must** have the Microsoft DirectX 2 (or better) API (which includes DirectDraw and DirectSound) installed in your computer and your graphics and sound card drivers must be DirectX 2 compliant (the DirectX 2 installer lets you know if they are or not, and will try to install replacement drivers for most popular hardware - that's why the friggin' DirectX installer is so big, by the way - although most current drivers are DirectX compliant now-a-days). DirectX is a Windows gaming API that allows very fast screen access under Windows 95 or NT. DirectX 3 and later versions should work fine as well. Both NT 4.0 and Windows 95B (OSR2) come with DirectX installed. If you have Win95 Release 1, chances are you already have DirectX installed if you play any Win95 action games, or it may have come with your video card. Otherwise, you can download it for free from any of the following sources. It's about a 3.5 Mb file:

  ftp://ftp.filefactory.com/FILEFACT/MISC/PLUGINS/dirx3a.exe

  http://www.microsoft.com/DIRECTX/RESOURCES/downloads/Dx3busa.exe

- This screen saver has been tested on a variety of computers including an aging 486/DX4-100 with 16 Mb of RAM and an ATI Graphics Xpression PCI video card (not exactly a screaming performance machine). It runs just fine on all of them. CPU speed is not a major concern, as the screen saver does very little number crunching. Of far more importance is the speed of your graphics subsystem, since a bottleneck at the graphics card will definitely affect the screen saver's frame rate. Consequently, this screen saver will run best on systems that have a PCI or VL-Bus graphics card installed (just about anything built after Jan. 1995).

- The color depth of your video display must be set, at a minimum, to 16-bit (also known as HighColor) mode. The screen saver will also work in 24-bit and 32-bit color depths. The screen saver does *not* support 256 color mode. Quite frankly, if you're using anything less than 16-bit color, you're being cheated anyway. Your apps (most especially your Internet Browser) will look a whole lot better, and the smoother color is a lot easier on the eyes.

  TO ADJUST YOUR VIDEO MODE IN WINDOWS 95:

Right click on the desktop and select "Properties" from the list. This puts you in the Display Properties window. Now click on the "Settings" tab. Click on the "Change Display Type" button and verify that your make and model of monitor is selected properly in the "Monitor Type" section. If it's not, click on the "Change" button next to it and find your monitor on the list. If it's not on the list then contact your monitor's manufacturer for a driver or a compatible monitor you can select.

Go back to the Display Properties window and adjust the screen size using the slider (if there's two sliders, set them both for the same size). Then change the color palette to True Color (16-bit). Click on the "Apply" button and Windows 95 will attempt to use the graphics mode you've selected. If the screen goes crazy, don't worry, Windows 95 will revert to the original settings after 15 seconds if you don't do anything. If your monitor did go crazy, you don't have the right monitor type setup or there are manual timing settings for your card that are overriding the Windows defaults. You may have to contact your monitor and graphics card manufacturers (in that order) to straighten things out. Give 'em hell.

- The password used by this screen saver is NOT the same password used by other Win 95 screen savers (haven't figured out how to do that yet). The password, along with other user preferences, is stored in the Win95 Registry under "Unofficial Quake Screen Saver". Don't mess around in the registry if you don't know what you're doing! If you forget the password, re-install the screen saver and this will change the password protected preference to NONE with a null string for the password.

WHO AM I AND WHY AM I DOING THIS?

Who am I? My name is Robert Osorio. I almost exclusively play ThreeWave Capture the Flag on QuakeWorld servers using the nickname "Flying Penguin (Mercenary)". Being a man, I've never experienced the pain of childbirth, so instead I tried publishing this screen saver. You know what? Childbirth has to be less painful...

I have learned a lot from this experience. One thing I've learned is to never get upset at customer support people - now that I've been on the other side of the fence. Another is that Microsoft's top brass must've been sweating bullets when Win95 was released. I know the feeling - I get cold sweats right before I upload a new version of my screen saver. Did I miss any bugs? Did I do something stupid? Did I leave a file out? This is all aggravated by the fact that testing an app on the computer you used to write it on really tells you nothing about whether the installation files are correct, because all the critical files are already installed on it. I've taken to temporarily installing a 400 mb hard drive on my computer every time I get ready to release a new version. I reformat it and install a virgin copy of Win95 on it each time, and then try installing the screen saver to see what happens. Tedious to say the least, and I still missed some bugs occasionally. And don't forget, this is just some piss-ant, puny little thousand lines of code screen saver! How the hell you push a major app, with a million lines of code, out the door and not bleed to death from an ulcer, I haven't a clue.

Why am I doing this? BECAUSE I NEED MY HEAD EXAMINED, THAT'S WHY! I'm not a professional programmer, I'm just doing this in my spare time for the fun of it. I don't represent a company and there's no big-time
publishing outfit behind me (otherwise you'd be paying thirty bucks for this screen saver at a computer store, instead of downloading it for free!). I do all the programming and answer all customer support questions myself, and I have a normal (well, sorta normal...) job I have to pretend to do fairly well

during the day to keep the real money coming in, so your patience and understanding is appreciated. If you really, REALLY like the screen saver, send me a couple of dollars, or a Quake shareware CD (I use 'em for coasters), or an AOL Installation disk (I can always use a blank floppy - that's all they're good for anyway). My address is listed below in the credits section.

A PLEA FOR RECOGNITION

I have no delusions that I'm going to make money off of this, besides I really wrote this screen saver for the fun of it. If you enjoyed this screen saver, drop me an E-Mail message and let me know what you think.

THE TECHNICAL STUFF

This screen saver was created using Microsoft Visual Basic 4.0, VideoSoft's VSDirect DirectX OCX control, Micrografx Picture-Publisher 7.0, and a great deal of patient cropping and retouching of several hundred screen-shots of the game I took the bitmaps from. I set out on this project as a way of learning to use the VSDirect OCX from VideoSoft which uses a wrapper OCX control to make accessing the DirectX API easier than using standard API calls. If you're a VB programmer who wants to code a game or any application that needs to do very fast screen writes, I highly recommend this package.

Please note: VSDirect was written by Brett Foster and originally marketed through MicroHelp as Game X-ponents. MicroHelp has since gone through a buy-out and restructuring which forced Brett and many other programmers to pull their licenses and find another publisher. VSDirect is now available through VideoSoft and you can get information on it at their web site at:

http://www.videosoft.com

The author of VSDirect, Brett Foster, can be contacted at: Brett_Foster@SquirrelSoftware.com

CREDITS

ENURESIS - A Quake player on TEN, for posing for the original screen shots of the quake player for me.

MY WIFE - For allowing me get lost in the computer most evenings for the past year (and probably for many more to come).

ID SOFTWARE - For writing an awesome game that's (almost) as entertaining as Duke Nukem 3D, and certainly far more visually appealing (except for that funky brown-on-brown color palette).

DAVE 'ZOID' KIRSCH - For creating the Capture-the-Flag mod for Quake, without which Quake would just be Doom on steroids.

BRETT FOSTER - For creating a great OCX control for handling the DirectX API from Visual Basic, and for all his great technical support.

VIDEOSOFT - For marketing Brett's great DirectX OCX (VSDirect).

MICROGRAFX - For writing one of the best 32-bit photo retouching apps available (blows Corel Photo-Paint away!).

MICROSOFT - For writing an excellent successor to Visual Basic 3.0, despite the fact that they're all retarded over there in Redmond...

Robert Osorio
12555 Biscayne Blvd, Suite 832
N. Miami, FL 33181
flypeng@concentric.net

QuakeWorld Nickname: Flying Penguin (Mercenary)

Version history (all my screwups):

0.09.0002
- Preliminary Beta. Added volume control, workable API code to force window to be top most, About box version code

0.09.0014
- Fixed problem with saver ignoring /P win95 preview command line argument and spawning multiple copies of the saver.
- Reworked INI code

0.09.0035
- Failed attempt at making use of Win95 Display Properties Preview window - will come back to this later.

0.09.0045
- Fixed shifting palette problems in 8 bit color - remade all monster bitmaps so they use same palette.
- Corrected problem where About & Order box would close upon running - made them modal.

0.09.0051
- Preliminary Beta Release version.
- setup to install using VB Setup Installer (note, at present must be installed in default directory: c:\program files\qsaver or will not find support files - will correct this later)
- fixed error msgboxes that hid behind windows (made them modal)

0.09.0052
- Changed so that uses Win95 system registry instead of WIN.INI to store preferences. Eliminated INICON32.OCX control.
- customized setup app to set registry sound preferences to defaults.
- customized setup app to save application path so screen saver can be installed in any directory now
- Eliminated Intro Chord sound - it was slowing down initial draw of screen saver because of load time.

0.09.0053
- FINALLY fixed multiple spawning problem (used API call to detect multiple occurrences of the main form's caption)

- added API call to prevent Win95 from accepting CTRL-ALT-DEL during screen saver operation

0.09.0055
- Added error checking for not installed or old version of DirectDraw and DirectSound
- Cleaned up keyboard hysteresis problem
- Changed file name of screen saver to 8+3 dos filename format to avoid hassles caused by long filenames (setup utility renames it to long filename after installation so name appears properly in screen saver list)

0.09.0057
- Corrected problem with monitor power saver function which would generate a DirectDraw surface busy error. Screen saver now detects error and waits in idle during power saver.
- Added top most window disable for debugging

0.09.0059
- Initial public Beta release

0.09.0060
- Fixed typo in readme file for web page URL (Doh!)
- Added lava ball animation
- minor corrections to debugger to detect missing bitmap & audio files

0.09.0061
- Changed readme file to Word Pad document for easier reading
- Added development-time warning to remind me to enable error checking prior to compiling exe file

0.09.0064
- Added forced 800x600 mode to settings window for improved frame rate on slower systems
- Added development-time frame rate display
- Added dynamically adjusted delay timer to main loop to maintain 11-12 fps frame rate
- Fixed Lavaball animation bitmap so was not larger than 800 x 600 (prevented screen saver from working in 800 x 600 resolution)

0.09.0067
- Added support for 640 x 480 resolution
- Fixed Right Souls animation bitmap so was not larger than 640 x 480 (prevented screen saver from working in 640 x 480 resolution)

0.09.0069
- Public release patch that updates version 0.09.0059 to 0.09.0069.

0.09.0070
- Changed OpenSound so that no duplicate sound buffers are created (hope and pray this fixes sound problem some people are having!)
- Added a line number reference to OpenSound error message to help me track down the sound problem since I can't duplicate it.
- Fixed "Reward the Author" button in settings window (was placed off screen when I resized the form for 640x480 screens - DOH!)

0.09.0073
- added a wait loop to Play sub in Sound class to prevent DirectX 3 from cutting off shotgun and scream sounds.
- eliminated form on top (set flag to false) as this would also allow DirectX 3 to cutoff shotgun and scream sounds - doesn't seem to be necessary anyway
- added error handling to OpenSound

0.09.0074
- Corrected a serious bug in last version that prevented saver from working at all if you have the Sound Blaster bug, even with the sound disabled (restored basic error handler in InitSound) - DOH!

0.09.0076
This version not distributed. Source code was given to Brett Foster for debugging of Sound Bug on 2/14/97
- Added three additional runner colors
- Screen saver is now unusable in 8 bit color (it looked terrible in this mode anyway)
- Added OLEAUT32.DLL to distributables and added dependency to installer application. This corrects the Error 367 control registration bug in earlier versions. Suggested by Brett Foster.

0.09.0077
Not a distributable version. This version was compiled as QTest.exe and sent to several people with the Sound Bug. At Brett Foster's suggestion I enabled error trapping in InitSound to see what error was being generated in this procedure when the DirectSound is first initialized.

0.09.0078
Not a distributable version.
- Added auto-detection of Sound Device. Saver will now disable sound support automatically if sound device does not respond, instead of giving an error and exiting screen saver. Also added one check box to settings form for disabling/enabling of sound. When sound disabled, all other sound controls are grayed out.

0.09.0079
Not a distributable version.
- Added more helpful error message to Main procedure when DirectX video device cannot be detected.

0.09.0080
Distributable version.
- Cured the sound bug (I hope!). Included a new version of MHDsound.ocx with the distributables to fix this problem.

0.09.0081
- Added extra surfacebusy error detection in UpdateSurface module to help prevent this error in power saver mode
- Added detection for error 367 in InitSurface with custom message box to recommend downloading fix from web site.
- Added $(DLLSelfRegister) to installer setup.lst entries for MHDSOUND.OCX and MHDDRAW.OCX as per Brett Foster to avoid error 429 sound bug due to MHDSOUND.OCX not being registered.

0.09.0082
- Added AXDIST.EXE to installation files. Executed by installer at end of installation. This updates OLEAUT32.DLL and some other associated files if needed. Corrects the error 367 problem.

1.00.0000
Work in progress
- Added brick textures to all windows and message boxes
- Added scenic background with animated torch to Settings Window
- Added 5 second display hold for about box on initial start

1.00.0011
Work in progress
- Re-enabled "Always on Top" - may make this a user option later
- Added Scene 2: E1M3 Zombies
- Added animated curtain effect between scenes

1.00.0014
Work in progress
- Added new runner animation to Scene 1 with better looking bitmaps.

1.00.0015
Work in progress
- Added new variation to runner animation in Scene 1. Runner 1/3 of the time stops at bottom of steps, turns to camera, and shoots twice, before continuing on.
- Replaced larger lightning bitmap with two smaller ones so effect can occur on systems running in 640x480 resolution

1.00.0017
Work in progress
- Replaced larger lava bitmap with two smaller ones so effect can occur on systems running in 640x480 resolution
- Fixed bug that prevented curtain scroll effect from working in 640 x 480 resolution (forgot to make LogoScaleX & Y single precision - made them integers - oops)
- fixed flaw in curtain scroll effect that dragged part of the revealed image up along with it (only showed up at lower resolutions)

1.00.0020
Initial in-house Beta
- Added all animations for Scene 3

1.00.0021
Test version with surfaces all created at once in beginning - last version ran out of memory overnight during testing. Believe that surfaces are not being properly deleted between scenes

1.00.0025
Test version with surfaces destroyed each time a scene changes. Found 2 surfaces (Sky1 & Sky2) that weren't being destroyed properly which may have caused the out of memory problem.

1.00.0027
Test using bitmaps to replace EntrPass and WrngPass forms

1.00.0029
In-house beta-test
Full working version with three scenes (except I forgot to set the scene random number generator to 3!)

1.00.0058
Work in progress.
Experimenting with displaying bitmap in Win95's screen saver preview window. This version has the preview window properly working, but no animation is running yet just a green background color is shown

1.01.0000
In-house beta-test
- Got Win95 mini-preview working properly without multiple spawning of screen saver.

1.01.0002
In-house beta
- Added gate sound to between-scene curtain raising effect
- Resolved problem with saving recorded sounds using Cool Edit. MHDSound crashes without explanation when loading WAV files using Cool Edit because of compression. Safest thing to do is save them using Creative Wave Studio

1.01.0007
In-house beta
- Changed ControlForm so mini-preview animation timer is only enabled once background is drawn. Hope this cures long delay time before preview appears when run on P-133 system with Matrox Millenium
- Both Zombies and Buffer1 surfaces are being destroyed and re-created as a test to see if this causes memory leak problem. Eventually I want to be able to destroy all surfaces not being used to save memory.

1.01.0009
In-house beta
- Apparently there is a memory leak when destroying surfaces so restored old memory wasteful method of creating all surfaces once at beginning. Will contact Brett about this.
- Adjusted volumes on clunk.wav and sc1back.wav
- Cleaned up extraneous code for full screen Direct Draw surface in InitSurfaces
- Made Debug Warning and Frame-rate counter bitmaps resident so I don't have to worry about carrying these files around during development.

1.01.0010
In-house beta
- Obtained updated copy of MHDDraw.ocx from Brett Foster. He says that the latest version cures the memory leak problem. This version destroys and creates Buffer1 and Zombies surfaces as a test to see if memory leak is gone.
- Disabled SceneTimer while receiving a DDERR_SURFACEBUSY error to prevent an old scene's animation from being drawn over a new scene when Power Saver mode turns the monitor back on.

1.01.0011
In-house beta
- Memory leak tests seems to indicate that the problem is resolved. This version incorporates full creation and destruction of all DirectDraw surfaces as needed to save memory.

1.01.0013
In-house beta
- Added ability to allow user to adjust the volume while the screen saver is running using the keypad + and - keys

1.01.0015
In-house beta
- Added ability to allow user to change the scene manually while saver is running by pressing the keypad asterisk key.

1.01.0018
- Fixed problem where password prompt would come up (if enabled) when displaying About box from settings window.
- Added version number of screen saver to error messages to improve customer support.

1.01.0021
- Added Quake font text and player icon to about box.
- Increased time that about box is visible when screen saver first starts to 15 seconds

1.01.0028
- Fixed random scene generator do 1st scene comes up more often.
- Added new Order window.

1.01.0032
- Added scenes 4 and 5

1.01.0036
Public Release
- Touched up graphics in all new scenes.
- Added dripping blood to Scene 5

1.01.0045
Public Release & patch
- Royally screwed up somewhere. Last release won't properly register MSGHOO32.OCX on most systems so I may have failed to include a DLL. Want to fix this in a hurry so this version just disables the Win95/NT Display Properties mini preview code (removed CONTROL.FRM and bypassed it's call). This is the only thing that MSGHOO32.OCX is used for so this cures the problem for now, there's just no mini-preview. Sigh... and all the effort I put into that preview... oh well. Maybe I'll get it fixed later.
- removed MSHOO32.OCX from distributables

1.01.0049
- Added random first scene choice
- Added scene titles
- Installed background for scene 6

1.01.0050
- Fixed bug in scene title display in 640x480 resolution

- Added error trap to InitSound to trap error generated by DirectSound when another app is using the audio device, such as the Real Audio Player, when saver kicks in. Instead of generating an error msg, sound is temporarily disabled for that session.
- Added error trap to InitSound to trap error generated by DirectSound when it can't find the audio device (sound card not installed or driver not installed)

1.01.0054
- Removed tiling API calls for password windows - used new bitmap background instead. Not convinced of stability of routines
- Installed falling slab, oozing blood and simple player animations for scene 6

1.01.0056
- Completed scene 6

1.01.0059
- Added scene 7

1.02.0003
Update release version
- repeated a loop in scene 7 to extend the length of the scene
- retouched Zoid's sign in scene 7 to make the bottom dark to match the shadows

1.02.0004
Full release version

1.02.0005
- Added most animations for Scene 8 except lightning lit windows

1.02.0006
- Completed Scene 8

1.02.0007
- Added player in my skin to scene 3

1.02.0010
- Added ability to rebuild Qsaver registry entry if corrupt - will only work if Qsaver was installed in default directory. This also cures the probelm of not being able to access the saver's registry settings from another user's account on the same computer.
- Scene timer can be set to zero to keep the first scene up indefinately

1.02.0011
- Added scene 9.

1.03.0000
- Update patch release

1.03.0003
Full & patch release
- fixed minor bug that prevented scene 1 from being selected as the first scene - would act as random setting.

2.00.0048
- Added scene 10 graphics
- Recompiled in Visual Basic 5.0
- Restored Win95 Screen Saver mini-preview (VB5 eliminates the need for HHOOK32.OCX and all it's problems)
- Bypassed RestoreAll procedure - this is what was causing mysterious error 91's

2.00.0050
- Added sounds for scene 10

2.00.0051
- Disabled individual sound effects controls (outdated) and forced all sound effects on.
- Fixed installer so it only installs saver in c:\program files\qsaver

2.01.0005
- In-house beta

2.01.0016
Full Release
- Finished scene 11
- Fixed bug in scene 7 and 11 where Play calls to array indexed sounds when sound was disabled was causing an error 91

2.01.0017
Full Release
- Fixed problem where screen saver would not be able to find screen saver files if installed on system with a Windows directory other than C (was causing an error 76). Added test to ReadINIFile that detects \WINDOWS path and uses drive letter for saver path.