



Manual Prepared by GalaxyVisions Customer Care Team

cPanel GameServers (cPGS)

This add on provides hosting companies the ability to offer popular game server hosting within the framework of cPanel®. What has been a traditionally tedious task has now been simplified for “point and click” simplicity.

Topics Covered

- Installing cPGS on a cPanel server and a remote satellite on a non-cPanel server
- Configuring both front and backend for WHM and cPanel cPGS interfaces.

TheWebsite

- <http://cpgs.cpanel.net/>
 - Link to the latest version of cPGS
 - Updates, news, errata
 - Voting Poll
 - Mirror sites for game server packages
 - Game server versions table to keep track of packages and server versions

Operating Systems

- For game servers, Linux with glibc-3 works “best”
- FreeBSD with Linux-compat enabled works for most games
 - Needs linux base-8 installed for most games
- cPGS developed on Centos 4 and FreeBSD 5.4 boxen

Server/Client split

- cPanel machines handle all the services related to normal webhosting
 - Usually have some load already
 - Subject to frequent load spikes
- cPGS split since it's not practical to mandate that game servers should run on already loaded machines
 - cPGSD runs on most any server the game servers do (not MS Windows), including OS not supported by cPanel
 - Only one cPanel server needed to control hundreds of remote game server machines
 - Provides single user interface Server
 - Server = cpgsd
 - handles almost every function
 - can run on remote servers without cPanel
 - runs on the servers that will run the game servers Client
 - Client is cPanel/WHM itself
 - One client cPanel server can control hundreds of remote game server machines



- Allows for a client to manage their website/normal cPanel stuff and their game server(s) from a unified frontend Server Installation
- Install server
- Download the latest version from the website
- Extract the archive and go to the newly created GameServerAddon directory
- Run the cpgsd_install script
- This will download the latest server daemon files and create the default config files, including generating a self signed pem for SSL.

Server Installation

- Edit /var/cpanel/cpgsd.cfg
- 'allowedips'
- Add your cPanel Server's main outgoing IP (the one that is licensed, usually.)
- You can add as many IPs as you like. Any connection from an IP not in the list will be refused.
- 'port'
- Leave the port at 2092 if at all possible
- 'savelocation'
- Set to the directory you wish to download game server files to
- Be sure this directory/partition can handle the often large game server files
- 'logfile'
- Location of the file to log messages to

Server Installation

- /var/cpanel/cpgsd.cfg (Cont'd)
- 'root'
- Location of cpgsd.pl itself. Leave at default if at all possible
- 'globalconf'
- Location of the main config file for users. Leave at default if at all possible
- 'secret'
- A password of sorts sent with every request. This must match on all server and client machines.
- 'sslpem'
- Location of the pem file for SSL. Leave at default if at all possible

Server Installation

- Try running the daemon
- `var/cpanel/cpgsd.pl`
- If you get a message about a missing perl module, follow the instructions on how to install it
- perl -MCPAN -e'force install IO::Socket::SSL`
- On a machine with cPanel installed, use `/scripts/perlinstaller IO::Socket::SSL`
- If you get a message about missing the cpgs.pem, try running the createpem.sh script in the GameServerAddon directory
- If all goes well, it should fork itself off into the background

Client Installation

- From the GameServerAddon directory, run the `./install` script`
- Answer the questions it asks
- No need to run the `cpgsd.pl` daemon on the cPanel server
- Log into WHM, find the Control Game Server Limits link in the bottom left menu

WHM Config

- Always set the core config for the user+game combination first.

Client Configuration

- Core Config
 - Select a user and a game server and “Core Config” from the dropdown menus first, click on “Continue”
 - IP for cPGSD I/O
 - Set this to the IP you are running the `cpgsd.pl` server daemon on.
 - This will be the IP the user will be connecting to when managing the specific game server you selected.
 - Other functions use the IPs specified here, such as the server file download feature
 - If using the cPanel server itself to run the games/test with, use the IP 127.0.0.1
 - Do not use domain names
- Manage Game
 - After the Core Config has been set, select this option for the same user + game combination.
 - 'Server Allow'
 - Check “Allowed” so the user will have the game available in their cPanel
 - 'Remote Username'
 - If the local cPanel username is different than the user on the remote server, you can change it here.
 - Ex: cPanel user ``wickedclan`` could be set to control game servers on a remote machine as the system user ``wtclan``
 - 'Max Users'
 - Specify the max number of users allowed to play on this particular user's game server.
 - 'tickrate'
 - Available with games that support it, don't edit this unless you know what it does
 - 'Appended Command Line Options'
 - Lets you specify additional options to be run with the server every time it's started
- Manage IPs
 - Brings up a list of all IPs available on the server you set in “Core Config”
 - Select one or more IPs your client will be permitted to use for the game server
- Manage Ports
 - Allows you to assign one or more ports for the user+game.

- May be assigned one at a time, multiple's separated by commas, or in ranges using dashes
 - 27015
 - 27015,27016
 - 27015-27020
- “View Currently Assigned IPs:Ports”
 - Lists all ip:port combinations for each user+game combo, any conflicting IP:Port assignments show up in red
- “Manage Global Config File”
 - Select the IP of the server you wish to connect to
 - Edit the location of each game server file and save
- “Manage Resellers' cPGS Control”
 - Select which resellers have access to manage their own users' access to game servers
- “Download Gameserver Files”
 - Select the server to download the game server files to
 - The game server chart shows available files
 - Games already downloaded show with a blue background
 - Games that are missing show with a grey background
 - Select the game file and mirror to download from
 - You may want to follow the link to the mirror to see if the game file is really available on it
 - The game server download process will fork into the background
- “UnInstall cPGS”
 - Useless option, ignore if at all possible :)
 - Will prompt on confirmation page to be sure this is intended
 - “Update/Force Reinstall”
 - Updates to the latest available version directly from the website
 - Can reinstall itself if you think a file is corrupted

cPanel User Interface

- Dynamically shows the cPGS icon if:
 - cPGS is installed correctly
 - The user is using the “x” theme
 - The user has been “Allowed” at least one game server via the “Manage Game” controls in WHM
 - Will work with future themes which will be released at HostingCon
- Clicking on the cPGS icon takes the user to a list of all game servers they are allowed to run
 - If the game is installed, it's logo is available and clicking it takes the user to that games management page
 - If the game is not installed, it gives a link that alerts the user as to how much disk space is needed to install the game; clicking it takes them to the installer

cPanel User Interface

- If installing the game, the installer page is self explanatory as it simply shows the progress of the install

- If the client closes their browser, the install will continue on the server regardless
- Once the install is done, it shows a link that will take them to the primary management page for the game

cPanel User Interface

- Options are laid out roughly the same for each game
 - Basic flow of managing the game
- Configure the “simple config” items on the main page and save them
 - Includes selecting IPs, ports, mods, etc that are available
- Configure any advanced config sections if needed
- Start the game
- Stop the game when desired
- Configuration changes will not take effect until the server has been restarted
 - Some games like UT2004 will overwrite changes made to some config files if edited before the server is stopped.

Problems ?

- You **will** run across issues when dealing with game servers. Try this (in order preferably)
 - Check for obvious errors in the startup line reported when it's started
 - Make sure the firewall is allowing traffic for it
 - If the game has a log file link, check it for errors
 - Try starting it from the shell (via ssh) as the user. If it works via ssh and not via cPGS, send in a ticket
 - Search favorite search engines and popular forums for the game server in question with any errors you see
 - Post on cPanel forums
 - Email me

Down the Road

- Current plans for the future
- Support more games
- Allow user uploads
- Maps and Mods
- Support more than one install of each type of game per user
- Modularization
- Easier to manage
- Easier for community addons