

---

# cPanel 11.25.0 Release Notes

Copyright © 2009 cPanel, Inc.

|             | Revision History |
|-------------|------------------|
| Revision 1  | Aug 8, 2009      |
| Revision 2  | Aug 19, 2009     |
| Revision 3  | Aug 19, 2009     |
| Revision 4  | Aug 20, 2009     |
| Revision 5  | Aug 21, 2009     |
| Revision 6  | Aug 24, 2009     |
| Revision 6  | Aug 26, 2009     |
| Revision 7  | Aug 27, 2009     |
| Revision 8  | Aug 28, 2009     |
| Revision 9  | Aug 31, 2009     |
| Revision 10 | Sept 8, 2009     |
| Revision 11 | Sept 10, 2009    |
| Revision 12 | Sept 11, 2009    |
| Revision 13 | Sept 14, 2009    |
| Revision 14 | Sept 15, 2009    |
| Revision 15 | Sept 17, 2009    |

## Table of Contents

|   |    |
|---|----|
| 1. Abstract .....                                 | 2  |
| 2. Feature Updates .....                          | 2  |
| 2.1. Account Transfers .....                      | 2  |
| 2.2. Account Backup and Restoration .....         | 2  |
| 2.3. Apache Configuration .....                   | 2  |
| 2.4. Bandwidth Statistics Generation .....        | 3  |
| 2.5. Customer Contact .....                       | 6  |
| 2.6. Database Soft Quotas .....                   | 7  |
| 2.7. DNS Clustering .....                         | 7  |
| 2.8. Email Addresses .....                        | 8  |
| 2.9. Email Accounts X3 Interface .....            | 8  |
| 2.10. Localization .....                          | 8  |
| 2.11. Mailman .....                               | 9  |
| 2.12. MX Editor .....                             | 10 |
| 2.13. Password Strength Validation .....          | 10 |
| 2.14. PostgreSQL .....                            | 10 |
| 2.15. Pure-FTPd .....                             | 11 |
| 2.16. Reseller Nameservers .....                  | 11 |
| 2.17. Roundcube .....                             | 11 |
| 2.18. VirtFS and Jailshell .....                  | 13 |
| 2.19. XML-API .....                               | 13 |
| 3. Added Features .....                           | 14 |
| 3.1. cPanel DNS Editors .....                     | 14 |
| 3.2. Custom MIME Types for cpsrvd .....           | 15 |
| 3.3. File and Directory Access Optimization ..... | 15 |
| 3.4. JSON API .....                               | 16 |
| 3.5. Security Improvements .....                  | 17 |
| 3.6. Task Queue .....                             | 18 |

|  |    |
|--|----|
| 3.7. Web Template Editor .....           | 19 |
| 4. Application Updates .....             | 20 |
| A. Issues Resolved in cPanel 11.25 ..... | 20 |

## 1. Abstract

Please refer to the cPanel 11.25 release notes [<http://docs.cpanel.net/twiki/bin/view/AllDocumentation/ReleaseNotes>] for the most recent version.

## 2. Feature Updates

### 2.1. Account Transfers

For cPanel to cPanel transfers, the single and multiple account transfer interfaces in WHM now provide the ability to skip the home directory when packaging an account. This allows you to reduce the amount of time a transfer takes and choose a more efficient method to transfer the user's home directory.

The cPanel version of the remote server is auto-detected for cPanel-to-cPanel account transfers. The *Remote Server Type* menu in the transfer interface is updated to reflect this change.

When transferring a mixture of reseller and non-reseller accounts using the **Multiple Account Transfer** interface, the resellers will transfer first. Prior cPanel versions would iterate through the users alphabetically.

Streaming support, introduced in cPanel 11.24, received various performance improvements. When the *Express Transfer* method is used with streaming, zone activation is deferred until the end of the account restoration process. This resolves an issue that occurs when transferring accounts among servers within a DNS cluster.

A **Select All** button was added to the **Express Transfer** column in the **Multiple Account Transfer** interface.

The transfer system now detects when the remote or local servers run out of disk space. The errors are captured and the administrator is notified.

### 2.2. Account Backup and Restoration

Bug #4090: [[http://bugzilla.cpanel.net/show\\_bug.cgi?id=4090](http://bugzilla.cpanel.net/show_bug.cgi?id=4090)] Added the ability for the `/scripts/pkgacct` utility to only **tar** accounts, rather than **taring** and compressing, via **gzip**. This option reduces the CPU load and overall time required to generate a full backup, with the trade-off of consuming more disk space.

When restoring backups from read-only media a working directory is created in a suitable, writable location. The location is determined by the same function used during account creation, based upon the **HOMEDIR** and **HOMEMATCH** values in `/etc/wwwacct.conf`. The backup is extracted into the working directory, then the restoration occurs. Afterwards, the working directory is cleared.

The `cpmove` file location is now output at the end of the packaging process. Prior versions displayed it earlier in the process, risking losing the location due to terminal scroll buffer constraints.

### 2.3. Apache Configuration

Directives used by the *Prefork MPM* are available in the configuration interface found at **WHM >> Service Configuration >> Apache Configuration >> Global Configuration**. These directives include:

- `MinSpareServers`

- MaxSpareServers
- MaxClients
- MaxRequestsPerChild

## 2.4. Bandwidth Statistics Generation

The bandwidth statistics system in cPanel uses RRDTool [<http://oss.oetiker.ch/rrdtool/>] to track the data and generate resulting graphs and meters. In cPanel 11.24 and prior versions, the way the RRDTool data was interpreted by the system could vary according to which subsystem was examining the data. This often resulted in inconsistent interpretations of the data, as well as missing data.

For cPanel 11.25, every aspect of the product that handled RRDTool data was overhauled and consolidated into a single subsystem. The end result is a consistent system that generates reliable and accurate statistics and data.

### 2.4.1. Changes in RRD Data files

The RRD data files are restructured for cPanel 11.25. Prior versions had several files in `/var/cpanel/bandwidth` for each domain and user as shown in Example 1, “cPanel 11.24 RRD and Summary Files”. There were files for each protocol (FTP, HTTP, IMAP, POP3, SMTP), an aggregate file (all) and a summary file. The summary file used the username or domain name.

#### Example 1. cPanel 11.24 RRD and Summary Files

A user called *example* whose primary domain is `example.com`, would have the following bandwidth files in cPanel 11.24:

```
example
example-all.rrd
example-ftp.rrd
example-http.rrd
example-imap.rrd
example-pop3.rrd
example-smtp.rrd
example.com
example.com-all.rrd
example.com-ftp.rrd
example.com-http.rrd
example.com-imap.rrd
example.com-pop3.rrd
example.com-smtp.rrd
```

In cPanel 11.25 the number of bandwidth data (RRD) files has increased. File names have also changed for clarity. There are now two files for each protocol and for the aggregate. See Table 1, “New RRDTool Files”.

**Table 1. New RRDTool Files**

| Name | Description |
|------|-------------|
| peak |             |

| Name | Description  |
|------|--|
|      | Rates file used for low-precision graphs of timespans of a month or greater.                         |
| rate | Rates file with a resolution of 5 minutes, for high precision graphs of timespans of a week or less. |

## Example 2. cPanel 11.25 RRD Files

A user called *example*, whose primary domain is `example.com`, would have the following bandwidth data files in cPanel 11.25:

```
example-all-peak.rrd
example-all-rate.rrd
example-ftp-peak.rrd
example-ftp-rate.rrd
example-http-peak.rrd
example-http-rate.rrd
example-imap-peak.rrd
example-imap-rate.rrd
example-pop3-peak.rrd
example-pop3-rate.rrd
example-smtp-peak.rrd
example-smtp-rate.rrd
example.com-all-peak.rrd
example.com-all-rate.rrd
example.com-ftp-peak.rrd
example.com-ftp-rate.rrd
example.com-http-peak.rrd
example.com-http-rate.rrd
example.com-imap-peak.rrd
example.com-imap-rate.rrd
example.com-pop3-peak.rrd
example.com-pop3-rate.rrd
example.com-smtp-peak.rrd
example.com-smtp-rate.rrd
```

In addition to the normal data files, there are several summary files. These summary files are maintained long-term, as they are usable for regenerating the RRD files in the case of data corruption. Refer to Table 2, “Bandwidth Summary Files Naming and Formatting in cPanel 11.25” for details. For data format details see Table 3, “Format Codes”.

**Table 2. Bandwidth Summary Files Naming and Formatting in cPanel 11.25**

| Filename              | Example          | Data Format   | Description  |
|-----------------------|------------------|---|--|
| [domain or user]      | example.com      | {m} . {d} . {YYYY} -<br>{type}={bytes}                  | Same summary file as in cPanel 11.24 and prior versions, maintained for backwards compatibility. |
| [domain or user].5min | example.com.5min | {yyyy} . {mm} .<br>{dd}T{hh} : {MM} -<br>{type}={bytes} | 5-minute summaries of the last month of bandwidth data   |

| Filename              | Example          | Data Format                                      | Description                        |
|-----------------------|------------------|--|------------------------------------|
| [domain or user].hour | example.com.hour | {YYYY} . {mm} .<br>{dd}T{hh} -<br>{type}={bytes} | Hourly summaries of bandwidth data |

**Table 3. Format Codes**

| Code   | Definition   |
|--------|--|
| bytes  | Amount of data transferred, in bytes   |
| {d}    | 1- or 2-digit day number   |
| {dd}   | 2-digit day number   |
| {hh}   | 2-digit hour   |
| {MM}   | 2-digit minute number  |
| {m}    | 1- or 2-digit month number   |
| {mm}   | 2-digit month number   |
| {type} | One of the following: <ul style="list-style-type: none"> <li>• all</li> <li>• ftp</li> <li>• http</li> <li>• imap</li> <li>• pop3</li> <li>• smtp</li> </ul> |
| {yyyy} | 4-digit year   |

**Example 3. Summary Bandwidth Files in cPanel 11.25**

A user called *example*, whose primary domain is `example.com`, has the following bandwidth summary files in cPanel 11.25:

```
example
example.5min
example.hour
example.com
example.com.5min
example.com.hour
```

Each domain and user now has a remainder file, i.e. *example.com.remainder* (the domain remainder file) and *example.remainder* (the user remainder file). These files store bandwidth data from the point at which the last summary interval ran, at the precision of 5 minutes for rate data and 1 hour for peak data. This file is necessary due to the way RRD databases work. During the next interval, the remainder data is injected into the processing.

## 2.4.2. Rebuilding RRD Data Files

RRD files can be regenerated from the various summary files by using the `/usr/local/cpanel/bin/rebuildwrrd` utility. The utility can regenerate the data for a specific user or all users. This utility accepts the following parameters:

|                           |  |
|---------------------------|--|
| <code>--all</code>        | Process all users on the system.   |
| <code>--dir={path}</code> | Used to specify the location of the RRD summary files and where to create the new RRD files. If not specified, uses <code>/var/cpanel/bandwidth</code> .     |
| <code>--gid={#}</code>    | The number specified with this parameter is used to set the GID on any created files. If not specified, the program uses the GID of the existing data files. |
| <code>prefix</code>       | The user or domain to process.   |

See Example 4, “Using rebuildwrrd” for a `rebuildwrr` usage example.

### Pre-cPanel 11.25 Data

While `/usr/local/cpanel/bin/rebuildwrrd` is usable on data generated by older versions of cPanel, the resolution of the data is not the same. Prior versions of cPanel generated the summary files with a resolution of one day. Files generated by cPanel 11.25 have a resolution of one hour. Since older files do not contain the same level of precision, graphs generated by older data will not have the same level of quality as the newer data.

### Data Loss Warning

`/usr/local/cpanel/bin/rebuildwrrd` completely replaces the existing RRD files for the prefix specified (or all files, when using the `--all` parameter). It is recommended to create a backup of the `/var/cpanel/bandwidth` directory (or the directory specified when using the `prefix` parameter) **before** executing `/usr/local/cpanel/bin/rebuildwrrd`.

### Example 4. Using rebuildwrrd

```
root@pxe [~]# /usr/local/cpanel/bin/rebuildwrrd example
Processing bandwidth for 'example' in directory '/var/cpanel/bandwidth'.
root@pxe [~]# /usr/local/cpanel/bin/rebuildwrrd example.com
Processing bandwidth for 'example.com' in directory '/var/cpanel/bandwidth'.
root@pxe [~]# /usr/local/cpanel/bin/rebuildwrrd --all
Processing bandwidth for 'example' in directory '/var/cpanel/bandwidth'.
Processing bandwidth for 'example1' in directory '/var/cpanel/bandwidth'.
Processing bandwidth for 'example2' in directory '/var/cpanel/bandwidth'.
Processing bandwidth for 'example3' in directory '/var/cpanel/bandwidth'.
Processing bandwidth for 'example4' in directory '/var/cpanel/bandwidth'.
Processing bandwidth for 'example5' in directory '/var/cpanel/bandwidth'.
Processing bandwidth for 'example6' in directory '/var/cpanel/bandwidth'.
root@pxe [~]#
```

## 2.5. Customer Contact

The **Customer Contact** feature replaces the **Support Request** system that exists in prior versions. Resellers may configure this feature to display contact details for support, billing and sales departments.

The feature retains the ability to allow contact submissions via email or external applications. A simplified branding editor in this interface allows the reseller to modify the cPanel interfaces used by this feature.

This feature is available to all resellers. Configuration and template data for each reseller is stored in the `cpanelbranding` directory in the reseller's home directory. For the `root` user this is `/var/cpanel/cpanelbranding`. Configuration data is stored in the `contactinfo.yaml` file while branding related changes are stored in one of the following:

**Table 4. Customer Contact Branding Files**

| File Name                             | Purpose  |
|---------------------------------------|--|
| <code>contactinfo_include.html</code> | Displays contact information in the <b>Contact</b> and <b>Help</b> cPanel interfaces.    |
| <code>supportinfo_include.html</code> | Displays a support request form in the <b>Contact</b> and <b>Help</b> cPanel interfaces. |

## 2.6. Database Soft Quotas

The file used to cache the number of databases owned by an account moved from `/home/user/.cpanel/datastore/mysql-db-count` to `/var/cpanel/datastore/user/mysql-db-count`. Likewise the PostgreSQL cache file is now `/var/cpanel/datastore/user/postgres-db-count`.

To keep the cache file current, a cron job executes the following command periodically: `/scripts/update_db_cache`.

cPanel 11.25 provides support for including the disk space consumed by an account's MySQL and PostgreSQL database in the disk usage for the account. To enable this feature toggle the following Tweak Setting:

*When displaying disk usage in cPanel/WHM include Postgresql and MySQL® disk usage.*

As with the database counts, the disk usage calculation is handled by `/scripts/update_db_cache` which executes every 4 hours. This script is executed upon enabling the Tweak Setting. Administrators may also execute this script to recalculate the figures. The disk usage figures are stored in `/var/cpanel/datastore/mysql-disk-usage` and `/var/cpanel/datastore/postgres-disk-usage`. The file contents are a colon (:) separated list of user names and figures in bytes. See Example 5, "mysql-disk-usage contents"

### Example 5. mysql-disk-usage contents

```
root@c5vm [~]# cat /var/cpanel/datastore/mysql-disk-usage
user1: 0
user2: 3190942
user3: 42519945
```

## 2.7. DNS Clustering

Certain `dnsadmin` operations are now performed in batches. This reduces both the memory needed during large operations, and the amount of time needed to perform the operation.

Each cPanel 11.25 cluster member may now configure a peer failure threshold. This option is found in the **Configure Cluster** interface in WHM. The threshold specifies how many **dnsadmin** commands a peer may fail to respond to before that peer is automatically disabled. The threshold is local to the server where it is stipulated.

By default, each cPanel 11.25 cluster member will notify the system administrator when peers are disabled due to reaching the failure threshold. The notifications are sent to the *High* priority destinations as set in the **Contact Manager** in WHM.

The amount of time between BIND restarts issued by **dnsadmin** is configurable via a new option in the WHM *Tweak Settings* interface. This option is labeled:

*Number of seconds dnsadmin will wait before restarting BIND. Additional restart requests during this time period will be silently discarded. On systems that process very frequent DNS updates a setting of 300 or 600 seconds is recommended. On systems with few DNS changes, the default setting of 0 is recommended. Note that DNS changes will not take effect until the restart is complete.*

Prior versions would use two separate **dnsadmin** calls to add a zone and reconfigure BIND. In cPanel 11.25, this common activity is reduced to a single **dnsadmin** call.

## 2.8. Email Addresses

cPanel 11.25 expands the range of acceptable characters in the local part of email addresses to be closer in line with RFC 5322. Addresses created and managed by cPanel have the following limitations:

- Disallowed characters that have special meaning to the shell: **&'^\*|/**
- Disallowed characters due to use as separators: **@:%**

Prior versions of cPanel only accepted the dash (-), underscore (\_), and period (.) in the local part of an email address.

Interfaces that accept an email address for contact purposes should accept all RFC 5322 characters in the local part.

When upgrading to cPanel 11.25, email accounts with quotas larger than 2 GB will be upgraded to *unlimited*. This is due to limitations with Exim and Courier in handling larger quota values.

## 2.9. Email Accounts X3 Interface

This interface is replaced with a new JSON-based AJAX interface. A limited Javascript version exists for users who disable or block Javascript. The new JSON interface consumes less memory in the browser and is more responsive.

The pagination and display of this interface now handles thousands of accounts quickly and efficiently.

## 2.10. Localization

cPanel 11.25 comes with a new localization system: `Cpanel::Locale`. This new system simplifies the translation and localization of cPanel, WHM, themes and command line applications. `Cpanel::Locale` is backwards-compatible with existing translation methods and language files.

Locales are identified in the system by the two-letter ISO 639 [[http://en.wikipedia.org/wiki/ISO\\_639](http://en.wikipedia.org/wiki/ISO_639)] code. Region-specific locales are indicated by the two-letter ISO 639 [[http://en.wikipedia.org/wiki/ISO\\_639](http://en.wikipedia.org/wiki/ISO_639)] code, followed by an underscore, then the two-letter ISO 3166 [[http://en.wikipedia.org/wiki/ISO\\_3166](http://en.wikipedia.org/wiki/ISO_3166)] code.

## Example 6. Locale Example

The regional locale for English as spoken in the United Kingdom is represented in the system as `en_uk`.

Prior cPanel 11 versions presented languages in two, or sometimes more, encodings: UTF-8 and Latin1 (ISO 8859-1). This caused unnecessary confusion and made translation more difficult. Locales used by `Cpanel::Locale` use UTF-8 unless there is a very specific reason not to.

`Cpanel::Locale` is more memory-efficient than the prior system, since phrases are only loaded when requested by the user interface.

Complete phrases are available for translation, a format more flexible than the prior method of translating phrase fragments.

The list of phrases in a locale, known as a lexicon, is distributed in YAML [<http://www.yaml.org/>] format and is subsequently compiled in GDBM [<http://www.gnu.org/software/gdbm/>] databases locally. This introduces a new dependency into the system, the `GDBM_File` [[http://search.cpan.org/perldoc?GDBM\\_File](http://search.cpan.org/perldoc?GDBM_File)] Perl module.

Although this is a core Perl module, it will only exist if `libgdbm` was present when compiling Perl, when Perl is installed from source. On systems where Perl is installed via a binary package, this module may still not exist unless `libgdbm` was also installed. For example, on Red Hat Enterprise and CentOS systems, if the Development Tools package group is installed, then the `GDBM_File` [[http://search.cpan.org/perldoc?GDBM\\_File](http://search.cpan.org/perldoc?GDBM_File)] module will exist.

To account for systems that do not have the `GDBM_File` [[http://search.cpan.org/perldoc?GDBM\\_File](http://search.cpan.org/perldoc?GDBM_File)] module installed, `/scripts/checkperlmodules` is updated to install `GDBM_File` [[http://search.cpan.org/perldoc?GDBM\\_File](http://search.cpan.org/perldoc?GDBM_File)]. If necessary, `libgdbm` will be built from source and installed to `/opt`.

If the error message "Can't locate GDBM\_File.pm in @INC ..." appears on a system, executing `/scripts/checkperlmodules` will resolve it.

## Developer Warning

Application and theme developers should no longer use `Cpanel::Lang::LANG` in their products, as it is no longer supported.

Further information about `Cpanel::Locale` is available at `locale.cpanel.net` [<http://locale.cpanel.net>].

## 2.11. Mailman

Mailman archives are now owned by the cPanel account at the file system level. This is accomplished by the following, new, script: `/scripts/mailman_chown_archives`. If `/usr/local/cpanel` is on a quota-enabled file system, then the mailing lists will be governed by the account quota.

`/scripts/mailman_chown_archives` outputs the mailing list and user names as it updates ownership as shown in Example 7, "Using `/scripts/mailman_chown_archives`". `/scripts/mailman_chown_archives` accepts no parameters, it always updates ownership for all mailing lists. The ownership of the *mailman* mailing list is not reassigned.

### Example 7. Using `/scripts/mailman_chown_archives`

```
root@pxe [~]# /scripts/mailman_chown_archives
Changing ownership of Mailman List Files in list1_example.com to example
Changing ownership of Mailman List Files in list2_example.org to example
```

## 2.12. MX Editor

The cPanel and WHM **MX Editor** interfaces and subsystems received an update in cPanel 11.25.

The cPanel interface is JSON powered, requiring Javascript to function.

The method of configuring how the local server routes mail is improved in cPanel 11.25. With cPanel 11.24 and prior versions a single check box, labeled *Always accept mail locally even if the primary MX does not point to this server* was the only control exposed in the **MX Entry** interface. This option could still be over-riden by various circumstances. This changed for cPanel 11.25. There are now the following options to configure how mail is to be handled by the local server:

- Automatically Detect MX Configuration
- Local Mail Exchanger
- Backup Mail Exchanger
- Remote Mail Exchanger

These options are presented in the **Email Routing** section of the **MX Entry** cPanel interface. A brief description of each option appears in the cPanel interface. The description includes how the option will change the way the local system handles email for the domain being modified. This setting may be changed independently from the action of modifying a MX record.

Modifying the Email Routing for domain changes, or adds, an entry to the cPanel user file, normally in `/var/cpanel/users/`. See Table 5, “Email Routing Configuration Directives”.

**Table 5. Email Routing Configuration Directives**

| Option               | Directive                     |
|----------------------|-------------------------------|
| Automatically Detect | Removes MXCHECK               |
| Local MX             | MXCHECK-example.com=0         |
| Backup MX            | MXCHECK-example.com=secondary |
| Remote MX            | MXCHECK-example.com=remote    |

Both **MX Editor** interfaces properly support multiple MX entries of the same priority.

## 2.13. Password Strength Validation

The algorithm used to rate the strength of a password is improved in cPanel 11.25. This may cause passwords that had high ratings with the prior algorithm to be rated as less strong.

The password validation used on various forms is now in sync with the server side algorithm. This eliminates inconsistencies that exist in cPanel 11.24 and prior versions.

Spaces are no longer accepted in passwords.

## 2.14. PostgreSQL

Clicking the **PHPPgAdmin** link in cPanel now logs the user into **PHPPgAdmin** automatically.

The configuration of PostgreSQL within WHM is also more reliable.

## 2.15. Pure-FTPd

Version 1.0.22 of this popular FTP daemon allows the administrator to enforce TLS encryption on both the command and data channels of an FTP session. The **FTP Server Configuration** interface in WHM is updated to provide access to this feature.

The **Broken Clients Compatibility** directive is added to the WHM **FTP Server Configuration** interface. When enabled, this directive causes Pure-FTPd to ignore parts of the FTP protocol standards, to improve compatibility with some buggy FTP clients and firewalls.

## 2.16. Reseller Nameservers

Resellers may modify their nameservers using a new, simplified **Basic cPanel/WHM Setup** interface. This was available only for the root user in the **Edit Privileges/Nameservers** interface in the **Reseller Center** for cPanel 11.24.4 and prior versions. This feature is automatically available for all Resellers and is not governed by ACLs.

## 2.17. Roundcube

cPanel 11.25 adds support for using SQLite [<http://www.sqlite.org/>] as the RoundCube data store. When this option is enabled, each email account receives its own SQLite database file, which resides in `/home/user/etc/example.com/user.rcube.db`. The database file for the cPanel account is `/home/user/etc/example.rcube.db`.

This feature also changes the process ID of webmail logins for RoundCube sessions. Rather than being owned by the `cpanelroundcube` user, the process is owned by the cPanel system account that owns the email account. See Example 8, “User owned roundcube session”.

### Example 8. User owned roundcube session

The RoundCube session for the `<user@example.com>` account, owned by the *example* cPanel account appears as:

```
example 27245 0.3 1.8 20764 9340 ? Ss 22:10 0:00 webmaild - serving 10.250.0.10
```

### 2.17.1. Pre-conversion Considerations

Before performing the conversion, the following matters need considered:

- The upgrade affects the entire server. It is not possible to mix use of the MySQL database and the SQLite database method.
- RoundCube only supports SQLite version 2, which is the default version provided by PHP 5.
- SQLite version 2 databases are incompatible with SQLite version 3 utilities.
- No system utilities are provided for managing the SQLite databases. This means no **sqlite** binary is installed by which a system administrator may view or manage a SQLite version 2 database.
- Conversion is an elective process, with *no* support for returning to using MySQL for the database.
- As with any volatile system change, please ensure current, tested system and account backups exist.
- Each email account has its own SQLite database. This database is stored in the *etc* directory of the cPanel account home directory that owns the email account.

- Since the SQLite database is placed in `/home/user`, it is included in the disk usage calculations and file system quota.

## Disk Usage Warning

RoundCube stores information about each email message in the database. Tests show that, on average, 1 MB of disk space is consumed by the SQLite database per 10-15,000 messages in an email account.

If an account consumes its remaining disk quota during the conversion process, the remainder of the email addresses for the account are skipped. The conversion process will proceed with the remaining cPanel accounts. Once conversion is complete, the account(s) whose quota was consumed by the process will need disk space freed, or the quota increased. Then, conversion for the account may be completed using the `/scripts/convert_roundcube_mysql2sqlite` method described in Section 2.17.3, “SQLite Maintenance and Utilities”..

## 2.17.2. Converting to SQLite

The conversion to SQLite is accomplished by executing the command:

```
/scripts/convert_roundcube_mysql2sqlite
```

The `convert_roundcube_mysql2sqlite` script will first convert the MySQL RoundCube database to corresponding SQLite databases. Since the MySQL database contains all data for every email account that uses RoundCube, this part of the conversion can be a lengthy process. After database conversion, RoundCube is reconfigured to use SQLite, and the process completes. Any errors encountered are reported on the console. Problems converting individual accounts do not halt the conversion process.

After performing the conversion, the MySQL RoundCube database is no longer needed and may be dropped.

## 2.17.3. SQLite Maintenance and Utilities

Once the server is converted, individual cPanel accounts may be converted using `/scripts/convert_roundcube_mysql2sqlite`. This script accepts a single parameter: *user*.

```
/scripts/convert_roundcube_mysql2sqlite user
```

An SQLite configured RoundCube is updated using `/usr/local/cpanel/bin/update-roundcube-sqlite`. Calling `/usr/local/cpanel/bin/update-roundcube` on an SQLite configured system results in a warning message being displayed and the proper script being `execed`.

SQLite versions prior to 3.1 do not automatically **VACUUM** a database. As documented in the SQLite FAQ [<http://sqlite.org/faq.html#q12>] the **VACUUM** returns unused disk space to the operating system. To work around this a **VACUUM** routine is added to the logout sequence in RoundCube. Users that click the **logout** link in RoundCube will have their database automatically **VACUUMed**.

## Disk Usage Warning

The **VACUUM** command will temporarily consume twice the disk space consumed by the database file. As this happens in `/home/user/etc` it is possible for the process to consume the remaining disk quota of the cPanel account.

## 2.18. VirtFS and Jailshell

When terminating an account, the VirtFS mounts for the account are removed.

The VirtFS mounts for an account are cleared when changing the shell of the account. This only happens automatically when using the **Manage Shell Access** interface in WHM.

### Session Disruption

If a user has an active jailshell session when the Administrator changes the user's shell, the user's connection is terminated. This is necessary to allow successful removal of the bind mounts used in the jailshell environment.

Administrators may use the following script for clearing VirtFS mounts: `/scripts/clear_orphaned_virtfs_mounts`. This script only removes the mounts for users who no longer use jailshell or no longer exist. This script accepts the following parameters:

`--help`                    Outputs brief description of the command and accepted parameters.  
`--errorsonly`            Limit output to error messages.

Jailshell sessions now include the name of the logged-in account in the process table as demonstrated in Example 9, "Jailshell Login Name".

### Example 9. Jailshell Login Name

```
root@pxe [~]# ps ax | grep jail
20847 pts/2    Ss      0:00 jailshell (case899) [20953]
```

## 2.19. XML-API

The following functions were added to the XML-API in cPanel 11.25.0:

### 2.19.1. Account Functions

`domainuserdata`    This function displays information about a given domain, including addon and subdomains, whether CGI aliasing is enabled, log locations, and other details.  
`setsiteip`            This function allows you to change the IP address associated with a website, or a user's account, hosted on your server.

### 2.19.2. DNS Functions

`addzonerecord`        This API function allows you to add a zone record.  
`editzonerecord`       This function allows you to edit an existing zone record.  
`getzonerecord`        This function allows you to view DNS zone records associated with a given domain  
`removezonerecord`    This function allows you to remove a zone record from the server  
`resetzone`            This API function will reset a DNS zone to its default values

## 2.19.3. Reseller Functions

|                         |  |
|-------------------------|--|
| setresellerips          | This function lets you add IP addresses to a reseller's account.   |
| setresellerlimits       | This function lets you set limits on the amount of bandwidth and disk space a reseller can use.  |
| setresellermainip       | This function lets you assign a main, shared IP address to a reseller's account.   |
| setresellerpackagelimit | This function allows you to control which packages resellers are able to use. It also lets you define the number of times a package can be used by a reseller. |
| suspendreseller         | This function lets you suspend a reseller, thereby preventing the reseller from accessing his or her account.  |
| unsuspendreseller       | This function lets you unsuspend a reseller, thereby allowing the reseller to access his or her account.   |
| acctcounts              | This function lists the number of accounts owned by each reseller on the server.   |
| setresellernameservers  | This function allows you to define a reseller's nameservers.   |
| configureservice        | This function allows you to enable or disable a service, and enable or disable monitoring of that service, as in the WHM Service Manager                       |

Further information is available in the XML-API Documentation [<http://docs.cpanel.net/twiki/bin/view/AllDocumentation/AutomationIntegration/XmlApi>]

## 3. Added Features

### 3.1. cPanel DNS Editors

In cPanel 11.25, the X3 interface includes both a **Simple DNS Editor** and an **Advanced DNS Editor** feature. The Simple editor is enabled by default. The Advanced editor is disabled by default. Access to either editor is handled via the **Feature Manager** in **WHM**.

#### 3.1.1. Simple DNS Editor

The cPanel **Simple DNS Editor** permits users to add and remove A and CNAME resource records for existing zones. No editing of records is permitted via this interface. To edit a record, the existing one must first be deleted. Duplicate A records are permitted.

**A Record:** The user is permitted to supply the name of the record and an IP address. The TTL specified in the WHM **Basic cPanel/WHM Setup** interface is used.

**CNAME Record:** the user is permitted to supply the name and CNAME of the record. The TTL specified in the WHM **Basic cPanel/WHM Setup** interface is used.

#### 3.1.2. Advanced DNS Editor

The **Advanced DNS Editor** lets users add, edit and delete A, CNAME and TXT resource records. The user may specify the TTL when creating or modifying the record.

Both editors automatically append the name of the domain being modified to new records. To provide a fully-qualified name, terminate the name with a period. Refer to Figure 1, “Using A Fully Qualified Name in the DNS Editor”.

**Figure 1. Using A Fully Qualified Name in the DNS Editor**

#### Add a Record

The screenshot shows a form titled "Add a Record" with the following fields and values:

- Name:** name.example.org. (with a green checkmark)
- TTL:** 14400 (with a green checkmark)
- Type:** TXT (dropdown menu)
- TXT Data:** "A Sample Record" (with a green checkmark)

An "Add Record" button is positioned below the form fields.

## 3.2. Custom MIME Types for cpsrvd

Administrator defined MIME-types may be added to cpsrvd. This is accomplished by adding entries to `/var/cpanel/config/cpsrvd/custom_mime_types`. Each entry must be on its own line. Entries are in a **key=value** format. The **key** represents the file extension. The **value** represents the MIME type. Please see Example 10, “Custom MIME Types”.

### Example 10. Custom MIME Types

```
xls=application/vnd.ms-excel
txt=text/plain
```

## 3.3. File and Directory Access Optimization

A common tack administrators use to improve file system performance is to use the `noatime` **mount** option for a mount point. The `ext` family, beginning with `ext2`, supports disabling `atime` for individual files and directories. This can be accomplished with the following command:

```
root@pxe# chattr +A /path/to/file/or/directory
```

cPanel 11.25 uses `/usr/local/cpanel/bin/optimizefs` to disable the `atime` attribute for a specific list of files and directories. A cronjob is created to perform this optimization periodically. As of cPanel 11.25.0, the list of files and directories modified by this cron job are:

### Files and Directories Modified by `optimizefs`

Files

- `/etc/relayhosts`

- /etc/wwwacct.conf
- /etc/wwwacct.conf.shadow
- /etc/wwwacct.conf.shadow.cache
- /etc/wwwacct.conf.cache
- /etc/relayhostsusers
- /etc/cpbackup.conf
- /etc/cpbackup.conf.cache
- /etc/exim.pl
- /etc/exim.pl.local
- /etc/passwd
- /etc/shadow
- /etc/group
- /etc/termcap
- /etc/fstab
- /etc/localtime
- /usr/local/cpanel/cpanel.lisc
- /usr/local/cpanel/cpsanitycheck.so
- /usr/local/cpanel/base/frontend
- /etc/valias
- /etc/vfilters
- /etc/vdomainaliases
- /var/cpanel/adminsessions
- /usr/local/apache/domlogs

Directories

## 3.4. JSON API

cPanel 11.25 adds support for JSON output from an API call. As discussed in the JSON [<http://docs.cpanel.net/twiki/bin/view/AllDocumentation/AutomationIntegration/XmlApi>] documentation, developers can activate this by using `/json-api/` in the API call, rather than `/xml-api/`.

Long running JSON initiated processes appear in the process table as ( example truncated for display purposes ):

```
22410 ?          D          0:03 /usr/local/cpanel/cpanel --json-fast-connect --stdin
```

## 3.5. Security Improvements

Cross-site request forgery (CSRF or XSRF) attack prevention is improved with the addition of several options in the WHM *Tweak Settings* interface.

### 3.5.1. Referrer Checks against Destination URL

Along with the blank referer check that existed in prior versions, server owners may now require the domain and port (or IP address and port) combination in the referer to match the destination URL. To enforce this, enable the following **Tweak Settings** option:

*Only permit cpanel/whm/webmail to execute functions when the browser provided referrer (Domain/IP and Port) exactly matches the destination URL. This will help prevent XSRF attacks, but may break integration with other systems, login applications, and billing software. Cookies are required with this option enabled.*

### 3.5.2. Security Tokens

The new security token feature prevents XSRF attacks by injecting a token unique to the session into the URL. Use of this feature is strongly recommended. Enable this feature with the following option in **Tweak Settings**:

*Require security tokens for all interfaces. This will greatly improve the security of cPanel and WHM against XSRF attacks, but may break integration with other systems, login applications, billing software and third party themes.*

#### **Product Incompatibility Warning**

The Security Tokens feature will break third party applications, scripts and themes that are not updated to work with Security Tokens. Information regarding the Security Token feature was sent to Third Party developers in advance. Please ensure any third party products integrated with cPanel are fully updated before enabling this feature.

#### **Backwards Incompatibility Warning**

Active cPanel, Webmail and WHM sessions will generate 404 errors if the security token feature is enabled and the system is subsequently downgraded to cPanel 11.24.4. Active sessions will need to log out manually, then re-log in. Manual logouts are accomplished by changing the URL to /logout/

### 3.5.3. Disabling Basic HTTP Authentication

Prior versions of the product allowed disabling the use of Basic HTTP Authentication with the product. This method is strongly encouraged as a means of preventing XSRF attacks. In 11.25, the description of this existing option in **Tweak Settings** has been clarified to include this information.

### 3.5.4. IP Address Validation

To improve security of cookie based logins server owners can opt to record the client IP Address in the server and client side cookies. The IP address is subsequently validated for each request during the session. This option is enabled via the following **Tweak Setting**:

*Validate the IP addresses used in all cookie based logins. This will limit the ability of attackers who capture cPanel session cookies to use them in an exploit of the cPanel or WebHost Manager interfaces. For this setting to have maximum effectiveness, proxydomains should also be disabled.*

## 3.5.5. Other Security Improvements

### 3.5.5.1. Disabling Root Login to cPanel

Server administrators can prevent root login to the cPanel interface. This is a refinement of the existing reseller override feature, wherein both the reseller and root user may access a cPanel account by using the account name and the root or reseller password.

To restrict root access, enable the following option in **Tweak Settings**:

*Only allow reseller to log in to users' cPanel interface with reseller password*

### 3.5.5.2. Require SSL Authentication for Remote Logins

It is now possible to disable all authentication and access on the non-SSL ports used by `cpsrvd`. These ports are:

- 2082
- 2086
- 2095

This is accomplished by setting the following configuration item in **Tweak Settings**:

*Require SSL for all remote logins to cPanel, WHM and Webmail. This setting is recommended.*

When enabled, accessing the non-SSL ports produces a page containing a link redirecting the user to the SSL port. Logins that originate from localhost are still allowed with this setting enabled.

### Incompatibility Warning

Since this **Tweak Settings** option disables access on the non-SSL ports, custom scripts and third-party applications that access the server remotely must use the SSL ports.

Bookmarked URLs that use the non-SSL ports will need to be updated to use the SSL port. When a user clicks a bookmark that uses the non-SSL port, the link is not carried through the manual redirect to the SSL port.

### 3.5.5.3. Session Handling

Sessions that are inactive for 8 hours or more are now invalidated. Subsequent use of such session will force re-authentication. Invalidated, or inactive, session files are purged from the system every 20 minutes.

## 3.6. Task Queue

Events in cPanel often cause one or more services to be restarted. For example, a user adding a subdomain causes a restart of Apache and the nameserver daemon. On busy servers, such restart requests can cause quality of service issues.

To handle these requests, cPanel 11.25 comes with a task queueing and processing system. cPanel subsystems that are aware of the task queue submit their requests to it, rather than issuing the restart ( or other request ) directly.

A primary benefit of the task queueing system is that multiple requests for an outstanding request are handled as a single action. At this time, only the Apache restarts issued by the WHM *Tweak Settings* interface are task queue-aware.

There are two aspects of the task queueing system: the queueing mechanism and the queue processor. Queueing of tasks is handled via `/usr/local/cpanel/bin/servers_queue` which has the following usage:

```
/usr/local/cpanel/bin/servers_queue [queue command] [unqueue task id]
```

**queue *command***      The queue parameter requires a command string as an argument. The command string should be quoted. See Example 11, “Queueing Tasks”. Only commands known to the task queueing system are accepted. Providing an unknown command returns an error. See Example 12, “Queueing an Unknown Task”.

**unqueue *id***          Requires a task ID number. This is output when queueing a task. It may also be obtained by examining the `/var/cpanel/taskqueue/servers_queue.yaml` file. See Example 13, “Unqueueing A Task”.

Queued tasks are stored in YAML files in `/var/cpanel/taskqueue`.

The task queue is processed periodically by a new daemon `queueprocd`. This daemon resides in `/usr/local/cpanel/libexec` and is started by the cPanel start up process. It may be managed using `/scripts/restartsrv_queueprocd`. The daemon is monitored by `chkservd`.

### Example 11. Queueing Tasks

```
root@example [~]# /usr/local/cpanel/bin/servers_queue queue 'apache_restart'
Id: TQ:TaskQueue:4
```

### Example 12. Queueing an Unknown Task

```
root@example [~]# /usr/local/cpanel/bin/servers_queue queue 'buildapacheconf'
ERROR: No known processor for 'buildapacheconf'. at /usr/local/lib/perl5/site_perl
```

### Example 13. Unqueueing A Task

```
root@pxe [~]# /usr/local/cpanel/bin/servers_queue queue 'apache_restart'
Id: TQ:TaskQueue:8
root@pxe [~]# /usr/local/cpanel/bin/servers_queue unqueue TQ:TaskQueue:8
1 tasks unqueued
```

## 3.7. Web Template Editor

This new WHM interface presents a unified method of modifying various templates used by Apache. Some of these templates were available for editing in prior versions of cPanel. This interface is automatically available to all resellers.

The templates available are:

- Default Web Page
- Suspended Account Page

- Account Moving Page
- Connection Detection Page

Template Toolkit provides the template processing engine.

The following CGI binaries in `/usr/local/cpanel/cgi-sys` handle displaying of the templates:

- `defaultwebpage.cgi`
- `movingpage.cgi`
- `suspendedpage.cgi`
- `templatepreview.cgi`

This initial implementation only supports creation and serving of templates in English. Future versions of this interface will support more languages.

## 4. Application Updates

The following applications are upgraded as part of cPanel 11.25:

- glib to 2.20.0
- Mailman to 2.1.12
- PHPMyAdmin to 2.11.9.5
- Pure-FTPd to 1.0.22
- RoundCube to 0.2.2
- SquirrelMail to 1.4.19

## A. Issues Resolved in cPanel 11.25

The following issues are resolved in cPanel 11.25.0

### **Resolved in build 39459**

- Addon domains were not backing up properly when using Incremental backups
- Create init scripts for Ruby on Rails when it is installed
- Fixed typo in Server Info interface
- MySQL user grants were not backing up properly when using Incremental backups
- Resolved authentication issue between Exim and cPHulkd
- Resolved compatibility issue when certain Perl versions that prevented Exim authentication when using Courier
- Resolved compatibility issue with cPHulkd and older versions of MySQL

### **Resolved in build 39428**

- Resolve issue with mail authentication and webmail

### **Resolved in build 39424**

- Resolve compatibility issue with WebDisk and Snow Leopard
- Resolve compatibility issue with WebDisk and Windows Vista

### **Resolved in build 39399**

- `/scripts/restorepkg --force` will now overwrite existing MySQL users and databases
- `/scripts/sysup` created dangling symlink on MySQL 4+ systems
- Account Level Filtering was not propagated to domains/addons created after the filter
- Add default virtualhost when first virtualhost is created on a shared IP address
- Added ability for `/scripts/fixperlscrip` to detect and correct more than a single problem in a script
- Added blank indexes to `cgi-sys`, `java-sys` and `img-sys` directories
- Added `cphulk.log` to list of logs to rotate
- Added error handling for zone template fetching
- Added note to EXIM config editor indicating that `**` denotes new configuration options
- Allow MySQL to be installed from packages on 64bit FreeBSD
- Allow use of empty SSH pass phrases during account transfer
- Always install Ruby from ports on FreeBSD
- Automatically create 'maildirfolder' file when creating folders under Courier.
- Automatically fix `authProg` symlink during courierup
- Automatically remove broken installation of Freetype libraries, headers and binaries
- 1971 [[http://bugzilla.cpanel.net/show\\_bug.cgi?id=1971](http://bugzilla.cpanel.net/show_bug.cgi?id=1971)]
- Bug 4850 [[http://bugzilla.cpanel.net/show\\_bug.cgi?id=4850](http://bugzilla.cpanel.net/show_bug.cgi?id=4850)]: Delete all associated bandwidth files upon account termination
- Bug 553 [[http://bugzilla.cpanel.net/show\\_bug.cgi?id=553](http://bugzilla.cpanel.net/show_bug.cgi?id=553)]: Added header to CSV generated by Fetch CSV in List Accounts
- Bug 5626 [[http://bugzilla.cpanel.net/show\\_bug.cgi?id=5626](http://bugzilla.cpanel.net/show_bug.cgi?id=5626)]: MX Editors handle multiple entries with same priority.
- Bug 7949 [[http://bugzilla.cpanel.net/show\\_bug.cgi?id=7949](http://bugzilla.cpanel.net/show_bug.cgi?id=7949)], 8365 [[http://bugzilla.cpanel.net/show\\_bug.cgi?id=8365](http://bugzilla.cpanel.net/show_bug.cgi?id=8365)]: Preserve Pure-FTPd SSL Certificate while updating
- Bug 8117 [[http://bugzilla.cpanel.net/show\\_bug.cgi?id=8117](http://bugzilla.cpanel.net/show_bug.cgi?id=8117)]: Value for Day was not being provided when requesting Bandwidth report

- Bug 8485 [[http://bugzilla.cpanel.net/show\\_bug.cgi?id=8485](http://bugzilla.cpanel.net/show_bug.cgi?id=8485)]: Single quotes were removed from Rewrite Rule URLs
- Bug 8689 [[http://bugzilla.cpanel.net/show\\_bug.cgi?id=8689](http://bugzilla.cpanel.net/show_bug.cgi?id=8689)]: Use 'all' to display all accounts in List Accounts
- Bug 8705 [[http://bugzilla.cpanel.net/show\\_bug.cgi?id=8705](http://bugzilla.cpanel.net/show_bug.cgi?id=8705)]: Process Trusted Host ACLs before RBL ACLs
- Bug 8761 [[http://bugzilla.cpanel.net/show\\_bug.cgi?id=8761](http://bugzilla.cpanel.net/show_bug.cgi?id=8761)]: Incorrect domain names were used in the Mailman welcome message
- Bug 9037 [[http://bugzilla.cpanel.net/show\\_bug.cgi?id=9037](http://bugzilla.cpanel.net/show_bug.cgi?id=9037)]: Clarify forged HELO note in EXIM config editor
- Bug 9097 [[http://bugzilla.cpanel.net/show\\_bug.cgi?id=9097](http://bugzilla.cpanel.net/show_bug.cgi?id=9097)]: Report that the A record will be used when no MX records exist
- Bug 9173 [[http://bugzilla.cpanel.net/show\\_bug.cgi?id=9173](http://bugzilla.cpanel.net/show_bug.cgi?id=9173)]: Frontpage extensions break after transfers due to the ownership of `_vti_pvt` being improperly configured
- Bug 9661 [[http://bugzilla.cpanel.net/show\\_bug.cgi?id=9661](http://bugzilla.cpanel.net/show_bug.cgi?id=9661)]: Allow domain owner login override to work properly with Courier
- 900 [[http://bugzilla.cpanel.net/show\\_bug.cgi?id=900](http://bugzilla.cpanel.net/show_bug.cgi?id=900)]
- CVE 2009-0642: Ruby - Improper return value checking
- Change Compress::Zlib hold back to 2.015
- Change IO::Compress::\* hold back to 2.015
- Change dnsuniqid syntax of multi-step dnsadmin commands to work properly with queue system
- Changed `/scripts/pkgacct` to display location of `cpmove` file after creating the archive
- Changed `/scripts/pythonup` to install to `/usr/local/cpanel/3rdparty` to prevent conflicts with system Python
- Changed bandwidth graph generation to convey accurate date
- Changed `bin/roformgr` to not fork with account has no Rails applications installed
- Changed how `/scripts/ensure_vhost_includes` regenerates `httpd.conf`
- Changed log processing interval to hours, rather than days, in Tweak Settings and Statistics Software Configuration interface
- Changed to print cycle time in hours instead of days on Raw Access Log screen
- Changed transfer process to perform DNS Zone changes after account is fully restored
- Check DNS Cluster during account creation for existence of zone
- Check account ownership before allowing resellers to install SSL Certificates
- Check boxtrapper whitelist before checking for self-addressed email to allow for whitelisting own email address

- Check exit running status of BIND after restart
- Check for broken /bin/pwd during account creation and modify permissions appropriately
- Check for timeouts on all remote dnsadmin commands
- Clean up symlinks associated with a dedicated IP address when terminating an account
- Cleanup /home/virtfs when changing from Jailshell shell in WHM >> Account Functions >> Manage Shell Access
- Cleanup /home/virtfs when terminating an account
- Corrected standard X3 footer comment for mozilla compatibility
- Corrected the ownership of counters file counters after a transfer
- Corrected tracking of bandwidth data rates
- Corrected usage info for xferpoint
- Delete bandwidth files upon account termination
- Delete cpmove archive on source server when transfer fails
- Detect and report incorrect SSH key passphrase during Transfer login
- Detect kvm virtual environment properly
- Detect whether PostgreSQL is active before attempting to package user databases
- Disable Dovecot authenticator in EXIM when mail services are disabled
- Disallow IP addresses as MX records
- Disallow spaces in passwords
- Disallow zone transfers by default after rebuilding named.conf
- Discard RRD data older than 10 years
- Display global feature lists when modifying packages
- Display proper message in bin/unregister\_cpanelplugin when uninstalling plugin
- Display proper path of Perl installation in the CPAN Module installer
- Don't require session cookie for HTTP AUTH connections when referrer checks are disabled
- Dropped all support for Neomail
- Email filters with multiple rules would fail to update when modifying a rule
- Email quotas exceeding 2 GB will be treated as unlimited due to limitations in Courier and Exim
- Ensure all stored versions of 2 GB email quota have one byte subtracted
- Ensure backup error messages are properly retained when backup is executed via cPanel

- Ensure libXpm-devel is installed
- Ensure no modified 3rdparty/etc/php.ini is published
- Ensure only resellers can download branding packages
- Ensure passwords are not HTML encoded when received from a web form
- Ensure python-devel is installed on Linux systems
- Ensure rndc.key and rndc.conf are owned by user 'named'
- Ensure suspension status is always output when calling resellerstats via XML-API
- Ensure wildcard domains are allowed for SSL Certificate installation
- Explicitly install libX11-devel.x86\_64 package on 64bit systems
- Fall back to manual BIND restart when init script restart fails
- Fix timeouts of dnsadmin quickzoneaddremote commands
- Fixed FTP access to access logs
- Fixed NSD init script incompatibility with chroot configuration
- Fixed Ruby On Rails Redirects to now redirect
- Fixed broken headers on language editor
- Fixed broken links in the WHM Theme Manager Addon themes
- Fixed condition that caused erroneous "Sorry, the given email address is invalid" message when importing email accounts via CSV
- Fixed displaying of hidden files (i.e. 'dot' files) in language listings
- Fixed incorrect argument being passed to /scripts/legacypostkillacct when terminating an account
- Fixed incorrect parameter displayed in rebuild\_phpconf's help output
- Fixed issues related to InnoDB, Routines and data safety when modifying the username using Modify an Account
- Fixed listing of user added Apache handlers
- Fixed parsing of API1 tags with 0 arguments
- Fixed problem with Frontpage extensions breaking after transfers due to ownership of \_vti\_pvt being improperly configured
- Fixed problem with being able to create a routine in MySQL, but not being able to execute it
- Fixed problem with login theme downloads and Tidy
- Fixed problem with wredirect sending requests to /cpanel rather than /webmail
- Fixed regular expression typo in /scripts/installruby that prevented upgrades

- Fixed text field alignment on login form
- Fixed typo in Webmail login message
- Fixed warnings related to Apache restarts
- Frontpage credentials are now updated when account name is modified during transfer
- Frontpage credentials were not updated when account name is modified during transfer
- Have destination server's package limits take precedence over those defined on the source server
- Have fixmailman execute check\_perms
- Improved Exim syntax output when building exim.conf
- Improved Handling of zone template errors so they do not encounter an infinite loop when a template variable is not used
- Improved IMAP IDLE for systems using Dovecot
- Improved Signal handling in cPHulk to reduce unpredictable behavior
- Improved ability for rrdinstaller to install on older systems
- Improved accuracy of service checks performed by the RestsrtSrv system
- Improved clarity of error messages in Apache Global Configuration interface
- Improved cpsrvd handling of large file uploads
- Improved detection of slow query log setting when using sqloptimizer
- Improved performance when moving large files with the File Manager
- Improved the Fetch CSV function in List Accounts to include every field listed
- Include Domain Keys files in account backup
- Install correct version of pureauth on FreeBSD in /scripts/ftpup
- Install user gem executable as 'gem' rather than 'gem18' on FreeBSD
- Invalidate the bandwidth cache when changing package values
- Language cache was not updated when .local file changed
- Leave /etc/exim.conf in place during eximup
- Limit Resellers to parking domains on domains they own
- Limit file system usage checks to 5 minute intervals
- Limit redundant bandwidth notification emails
- Log processing will now stop, rather than pause, when blackout hours occur
- MX Editor updates correct zone file when modifying sub-domains that lack a dedicated zone

- Made BoxTrapper always accept mail from trusted transports if the user is not on the ignore or black lists
- Make /scripts/rrdtoolinstall a symlink to /usr/local/cpanel/bin/rrdtoolinstall
- Make /scripts/userdirectl more tolerant of variations in userdir syntax
- Make certain that a timestamp of 0 does not display bandwidth pie chart
- Obtaining a list of MySQL users would cause database privileges be updated
- Package the XML version of bandwidth data as the binary version is platform specific
- Pass on errors reported by usermod/pw in Manage Wheel Group users within WHM
- Patch Freetype to build on systems with older versions of GNU make
- Preserve exim configuration and revert to preserved version when syntax check fails
- Preserve hostname when configuratin cluster relationship to allow for proper display of trust paths
- Prevent email filters from using 'new', 'cur' and 'tmp' as folder destinations
- Prevent local hostname from appearing in accounts that are sub domains of the hostname
- Prevent running of Rails applications when in Demo mode
- Prevent search engines from indexing login pages
- Prevent setting of values to 0 in Pure-FTPd Configuration where 0 is not allowed
- Prevent spurious errors on email validation for multiple accounts
- Prevent the use of user names that could be potentially be required for cPanel managed services
- Prevent unnecessary queueing of commands for disabled hosts
- Prevent use of 'tmp', 'cur' and 'new' as Maildir delivery destinations when creating a filter
- Prevent use of spaces in passwords when creating FTP accounts
- Prevent using Modify an Account from changing domain name to a wildcard domain
- Prevent xml-api from stacking two errors resulting in invalid xml
- Provide error message when attempting to extract from an unsupported archive in the File Manager
- Put cursor focus on username field on webmail login form
- Recreate Frontpage configuration files for Sub and Addon domains after transfer
- Refactored update-horde as a Perl script
- Reload Chkservd configuration at the beginning of each check so that changes made via WHM, CLI, etc always work as expected
- Reload chkservd.conf at the beginning of each check
- Remove Zone Load check from named init script

- Remove all appropriate `/var/cpanel/bandwidth` files upon account termination
- Remove display of 'Hit enter...' message during mailing list creation
- Remove `setuid` bit from `suphp` binary when not in use
- Remove the legacy `cppop` POP3 entry from Service Manager when Maildir is enabled
- Removed `/scripts/bandwidth`
- Removed `/scripts/fixpop`
- Removed `/scripts/mailman212`
- Removed `/scripts/pkgacct2`
- Removed HTML markup error from displaying on screen
- Removed RC4+RSA from non-email cipher lists
- Removed Tweak Setting "Automatically setup `/etc/localdomains`, `/etc/remotedomains`, `/etc/secondarymx` based on where the mx entry is pointed." as that system is replaced by the Email Routing system
- Removed call to `/scripts/kernelcheck` in `/scripts/upcp`
- Removed call to `/scripts/mailscannerupdate` from `/scripts/eximup`
- Removed calls to `/scripts/grpck`
- Removed `compat3x` from `sysup`
- Removed condition that caused a PostgreSQL Role Error during account creation
- Removed `installzendopt-freebsd`
- Removed misleading warnings from the PostgreSQL restoration output
- Removed obsolete scripts relating to install/uninstall of MySQL 4.1
- Removed obsolete scripts `/scripts/fixmysqlbsd`
- Removed redundant home directory streaming checks that produced un-necessary errors
- Removed `trackbandwidth` router as bandwidth tracking is handled by `eximstats`
- Removed unnecessary `&nbsp;`; which caused off-center check boxes in Tweak Settings
- Removed usage of `/scripts/installcpbsdpkg` from `/scripts/ftpup`
- Removed 'nouserbackupwarn' in TweakSetting
- Report correct protocol when error is encountered during home directory streaming
- Report created certificate as 'saved' rather than 'installed' when creating a SSL Certificate in the SSL/TLS Manager
- Report database creation failure in the X3 interface

- Report skipping portions of backup when feature is disabled
- Resellers will be transferred first, when transferring multiple accounts
- Reset FreeBSD package cache when FTP server is updated
- Resolve EDGE-only issue with Zone records not being updated after transfer
- Resolve conditions causing 'grep: writing output: Broken pipe' on FreeBSD systems
- Resolve issue with "post" responses to CustomEventHandler missing the dataref
- Resolve issues with --force on restorepkg
- Resolve various errors with /scripts/restorepkg --force
- Resolved Multi Account Transfer UI problem with Internet Explorer
- Resolved issue with IP Deny Manager updating .htaccess when the account's primary domain is a subdomain of the hostname
- Resolved issue with IP Usage not accounting for unallocated IP Addresses
- Resolved issue with PostgreSQL users being granted inadequate permissions on tables
- Resolved issue with express transfer not updating zones for addon and parked domains
- Resolved issue with stopping MySQL on FreeBSD via /scripts/restartsrv\_mysql --stop
- Resolved issue with subdomain domain documents failing to restore when the document root contains the username
- Resolved issue with the default wildcard redirects causing a loop condition
- Resolved issue with transferring accounts with email addresses with local part consisting solely of 0
- Resolved ownership conflict when restoring accounts with domains that are already owned by other accounts
- Resolved race condition when obtaining MySQL version number
- Restart FTP server when conf file is updated by one-time fixup
- Restart cPHulkd when settings are changed
- Restoring accounts on FreeBSD would not place the cron tabs in the proper location
- Reuse dnsunqid with queued dnsadmin requests
- Revert .htaccess of Addon and Sub Domains to non-suspended version during transfer
- Selecting 'Does not match' for email filter action did not set the appropriate Exim rule
- Send priority 3 notification when encountering long-lived zero length lock file
- Services now stopped and checked for running state using restartsrv scripts
- Set "UseDNS no" in sshd\_config when cPHulkd is enabled

- Setup `pg_hba.conf` during PostgreSQL install to allow local logins
- Skip nameserver restart when no changes are made during `dnsadmin removezone(s)` commands
- Solved problem with being unable to login to mail after suspending and unsuspending accounts
- Store all EXIM configuration settings so that unselected options are not marked as new on future runs of the configuration editor
- Suppress spurious output from PostgreSQL and MySQL when terminating an account
- Suspend `chkdsk` monitoring while switching nameserver
- Update 'Referrer Safety' and 'Referrer Blank Safety' tweaksetting notes to indicate that cookies are required when these options are enabled
- Update Dovecot templates for 1.2
- Update IP addresses in the proxy sub-domain `virtualhost` during a transfer
- Update MySQL procedure and function definers when changing username during a transfer
- Updated `/scripts/generate_maildirsize` to obey 2GB-1byte maildir quota size limitation
- Updated `/scripts/pkgacct tar` error code handling to ignore exit codes generated when archiving an unreadable file
- Updated `/scripts/restartsvr_httpd` to observe the `apache_update_no_restart` setting
- Updated `/scripts/securemysql` to use `datadir` from `/etc/my.cnf` if defined
- Updated `Cpanel::SimpleSync` to resolve bugs and add error reporting and better verification of files in need of syncing.
- Updated clamav scanning, replacing the deprecated `--disable-summary` flag with `--no-summary`
- Updated `cpanelsync` to more safely handle removal of old files
- Updated usage of zone templates during account creation to display errors properly
- Use Reseller's nameservers for transferred accounts if reseller exists on the destination server
- Use UTF-8 for emails sent via WHM
- Use actual disk usage when determining whether to reuse a UID during account creation
- Use `calendar_id` to retrieve kronolith data during backup
- Use `gmake` when installing RRD Tool on older FreeBSD systems
- Use proper configuration setting when calculating bandwidth processing interval in Statistics Software Configuration interface
- VPS Optimizer will no longer restart cPanel
- Validity checks are now done for imported forwarders
- When logged in to WHM via SSL, do not show Insecure link redirecting to non-SSL session

- When normalizing email usernames, don't create multiple @ characters
- When prompted to over write files in the file manager, an incorrect time stamp was displayed
- XML-API accountsummary returned OK status on non-existent account
- XML-API passwd function now requires the user name parameter
- cpbackup did not backup the cron tabs during the system-level backup on FreeBSD
- pkgacct neglects to archive custom apache userdata files for add-on domains
- rsyslog and syslog are now mutually exclusive options in Service Manager