Release Notes for Release Dovecot Pro 2.2.25.1

1. Shipped Products and Versions

Dovecot Pro 2.2.25.1

Including; Object Storage Plug-In

2. Important Changes and Bugs fixed since previous Public Release

2.1.   Dovecot Pro 2.2.25.1 Core

- Virtual attachment support: https://documentation.open-xchange.com/7.8.2/middleware/components/virtual_mail_attachments.html
- Search MIME part: Searching messages by mime part file name/basename/extension and mime part content-type/subtype
- doveadm: added commands: doveadm user
- lmtp: Start tracking lmtp_user_concurrency_limit and reject already at RCPT TO stage. This avoids MTA unnecessarily completing DATA only to get an error.
- doveadm: Previously only mail settings were read from protocol doveadm { .. } section. Now all settings are.
- quota: Added quota_over_flag_lazy_check setting. It avoids checking quota_over_flag always at startup. Instead it's checked only when quota is being read for some other purpose.
- auth: Added a new auth policy service: http://wiki2.dovecot.org/Authentication/Policy
- auth: Added PBKDF2 password scheme
- auth: Added %{auth_user}, %{auth_username} and %{auth_domain}
- auth: Added ":remove" suffix to extra field names to remove them.
- auth: Added "delay_until=<timestamp>[+<max random secs>]" passdb extra field. The auth will wait until <timestamp> and optionally some randomness and then return success.
- dict proxy: Added idle_msecs=<n> parameter. Support async operations.

- Performance improvements for handling large mailboxes.
- Added lib-dcrypt API for providing cryptographic functions.
- Added "doveadm mailbox update" command
- imap commands' output now includes timing spent on the "syncing" stage if it's larger than 0.
- cassandra: Added metrics=<path> to connect setting to output internal statistics in JSON format every second to <path>.
- doveadm mailbox delete: Added -e parameter to delete only empty mailboxes. Added --unsafe option to quickly delete a mailbox, bypassing lazy_expunge and quota plugins.
- doveadm user & auth cache flush are now available via doveadm-server.
- doveadm service stop <services> will stop specified services while leaving the rest of Dovecot running.
- quota optimization: Avoid reading mail sizes for backends which don't need them (count, fs, dirsize)
- Added mailbox { autoexpunge_max_mails=<n> } setting.
- Added welcome plugin: http://wiki2.dovecot.org/Plugins/Welcome
- fts: Added fts_autoindex_exclude setting.
- v2.2.24's MIME parser was assert-crashing on mails having truncated MIME headers.
- auth: With multiple userdbs the final success/failure result wasn't always correct. The last userdb's result was always used.
- doveadm backup was sometimes deleting entire mailboxes unnecessarily.
- doveadm: Command -parameters weren't being sent to doveadm-server.
- If dovecot.index read failed e.g. because mmap() reached VSZ limit, an empty index could have been opened instead, corrupting the mailbox state.
- imapc: Fixed EXPUNGE handling when imapc_features didn't have modseq.
- lazy-expunge: Fixed a crash when copying failed. Various other fixes.
- fts-lucene: Fixed crash on index rescan.
- auth_stats=yes produced broken output
- dict-ldap: Various fixes
- dict-sql: NULL values crashed. Now they're treated as "not found".

2.2.   Object Storage Plug-In

- Removed metacache_obsolete_deleted_stamps setting. It's no longer possible to upgrade from obox v1.x.
- Index changes are now categorized into "important" and "unimportant" changes. Important changes imply data loss if the index file is lost (= if the backend server dies before uploading the index to object storage). These include for example message flag changes. Unimportant changes are some internal changes that aren't visible to users, such as updating dovecot.index.cache file. Index bundles are now normally created and uploaded only when there are important changes. Unimportant changes will be uploaded only when user's indexes are being cleaned or flushed (doveadm metacache clean, doveadm metacache flush, doveadm metacache flushall). This reduces the number of index bundle uploads when there is enough metacache available.
- Always use metacache-worker processes to do background work. Earlier behavior was to use the same user's existing imap/pop3/lmtp processes to do the background work if they were otherwise idling. This could have increased user-visible latency when the process wanted to stop idling but was performing the background work.
- doveadm obox user delete: Delete user's files directly bypassing lazy_expunge plugins. It also wasn't always deleting all the objects for the user.
- Delete old base bundles created by the same host immediately.
- fs-dictmap / Cassandra: Support asynchronous Cassandra operations. This improves performance for performing mass operations for saving, copying or deleting mails.
- Optimized POP3 UIDL lookups. Earlier pop3 may have attempted to do HEAD to each mail once after delivering it.
- Index bundle objects were listed unnecessarily many times: IMAP LIST command may have triggered listing them for each folder, which shouldn't have been necessary for LIST. The listing was performed again when actually opening the folder. Performing a STATUS still requires an object listing operation, but it's no longer done again after opening the folder.
- Maximum index diff bundle size is now limited to 1 MB (previously it was 10 MB).
- fs-dictmap / Cassandra: Support more than 256 buckets (= more than 2.56 million emails) per folder. The new limit is 16384 buckets (= 163.84 million emails) per folder.
- obox_fs setting: Added absolute_timeout_msecs parameter to specify the upper limit to how much time can be spent on a request before it's aborted. For example with timeout_msecs=60000&max_retries=4&absolute_timeout_msecs=120000 the request may be retried up to 4 times, but if the previous two were failing after the 60 second timeout, there won't be a 3rd request because the absolute timeout is reached at 120 seconds.
- Calculate fscache's total disk space usage more correctly using disk blocks.

- metacache master process wasn't always notified about latest disk space usage of index files with metacache_delay_uploads=yes. This could have caused it to not clean metacache early enough to keep it under metacache_max_space.
- Using metacache_upload_interval=0 means that all index changes are immediately uploaded to object storage to guarantee no data loss in any situation. For example changing a message flag with IMAP STORE command will trigger an index bundle upload before returning the STORE command's tagged reply to the IMAP client.

3. Tests

The Dovecot QA team has successfully verified all bug fixes that could be reproduced within a lab environment.

To avoid side effects, the shipped packages have gone through automated regression test on both, a Continuous Integration System and a dedicated server setup for system and integration testing.

All changes have been checked for potential side-effects and effect on behavior. Unless explicitly stated within this document, we do not expect any side-effects.