

---

# MySQL Enterprise Monitor 8.0 Release Notes

## Abstract

This document lists the changes to the MySQL Enterprise Monitor 8.0 product, beginning with the most recent release. Each release section covers added or changed functionality, bug fixes, and known issues, if applicable. For information about changes in a different MySQL Enterprise Monitor series, see the release notes for that series.

For additional MySQL Enterprise Monitor 8.0 documentation, see the [MySQL Enterprise Monitor 8.0.37 Manual](#).

MySQL Enterprise Monitor platform support evolves over time; please refer to <https://www.mysql.com/support/supportedplatforms/enterprise-monitor.html> for the latest updates.

For legal information, see the [Legal Notices](#).

For help with using MySQL, please visit the [MySQL Forums](#), where you can discuss your issues with other MySQL users.

Document generated on: 2024-04-15 (revision: 28211)

## Table of Contents

Preface and Legal Notices .....	1
Changes in MySQL Enterprise Monitor 8.0.38 (2024-04-30) .....	3
Changes in MySQL Enterprise Monitor 8.0.37 (2024-01-16) .....	3
Changes in MySQL Enterprise Monitor 8.0.36 (2023-10-25) .....	4
Changes in MySQL Enterprise Monitor 8.0.35 (2023-07-31) .....	4
Changes in MySQL Enterprise Monitor 8.0.34 (2023-04-18) .....	4
Changes in MySQL Enterprise Monitor 8.0.33 (2023-01-27) .....	5
Changes in MySQL Enterprise Monitor 8.0.32 (2022-10-27) .....	5
Changes in MySQL Enterprise Monitor 8.0.31 (2022-07-26) .....	6
Changes in MySQL Enterprise Monitor 8.0.30 (2022-04-27) .....	6
Changes in MySQL Enterprise Monitor 8.0.29 (2021-12-15) .....	7
Changes in MySQL Enterprise Monitor 8.0.28 (2021-12-14) .....	7
Changes in MySQL Enterprise Monitor 8.0.27 (2021-10-19) .....	8
Changes in MySQL Enterprise Monitor 8.0.25 (2021-05-11) .....	8
Changes in MySQL Enterprise Monitor 8.0.24 (2021-04-30) .....	8
Changes in MySQL Enterprise Monitor 8.0.23 (2021-01-28) .....	8
Changes in MySQL Enterprise Monitor 8.0.22 (2020-10-20) .....	9
Changes in MySQL Enterprise Monitor 8.0.21 (2020-07-14) .....	9
Changes in MySQL Enterprise Monitor 8.0.20 (2020-04-27) .....	10
Changes in MySQL Enterprise Monitor 8.0.18 (2019-10-30) .....	10
Changes in MySQL Enterprise Monitor 8.0.17 (2019-07-22) .....	11
Changes in MySQL Enterprise Monitor 8.0.16 (2019-04-25) .....	11
Changes in MySQL Enterprise Monitor 8.0.14 (2019-01-21) .....	12
Changes in MySQL Enterprise Monitor 8.0.3 (2018-10-16) .....	14
Changes in MySQL Enterprise Monitor 8.0.2 (2018-09-13) .....	15
Changes in MySQL Enterprise Monitor 8.0.1 (2018-07-24) .....	15
Changes in MySQL Enterprise Monitor 8.0.0 (2018-04-19) .....	17

## Preface and Legal Notices

This document lists the changes to the MySQL Enterprise Monitor 8.0 product, beginning with the most recent release.

## Legal Notices

Copyright © 2005, 2024, Oracle and/or its affiliates.

### License Restrictions

This software and related documentation are provided under a license agreement containing restrictions on use and disclosure and are protected by intellectual property laws. Except as expressly permitted in your license agreement or allowed by law, you may not use, copy, reproduce, translate, broadcast, modify, license, transmit, distribute, exhibit, perform, publish, or display any part, in any form, or by any means. Reverse engineering, disassembly, or decompilation of this software, unless required by law for interoperability, is prohibited.

### Warranty Disclaimer

The information contained herein is subject to change without notice and is not warranted to be error-free. If you find any errors, please report them to us in writing.

### Restricted Rights Notice

If this is software, software documentation, data (as defined in the Federal Acquisition Regulation), or related documentation that is delivered to the U.S. Government or anyone licensing it on behalf of the U.S. Government, then the following notice is applicable:

U.S. GOVERNMENT END USERS: Oracle programs (including any operating system, integrated software, any programs embedded, installed, or activated on delivered hardware, and modifications of such programs) and Oracle computer documentation or other Oracle data delivered to or accessed by U.S. Government end users are "commercial computer software," "commercial computer software documentation," or "limited rights data" pursuant to the applicable Federal Acquisition Regulation and agency-specific supplemental regulations. As such, the use, reproduction, duplication, release, display, disclosure, modification, preparation of derivative works, and/or adaptation of i) Oracle programs (including any operating system, integrated software, any programs embedded, installed, or activated on delivered hardware, and modifications of such programs), ii) Oracle computer documentation and/or iii) other Oracle data, is subject to the rights and limitations specified in the license contained in the applicable contract. The terms governing the U.S. Government's use of Oracle cloud services are defined by the applicable contract for such services. No other rights are granted to the U.S. Government.

### Hazardous Applications Notice

This software or hardware is developed for general use in a variety of information management applications. It is not developed or intended for use in any inherently dangerous applications, including applications that may create a risk of personal injury. If you use this software or hardware in dangerous applications, then you shall be responsible to take all appropriate fail-safe, backup, redundancy, and other measures to ensure its safe use. Oracle Corporation and its affiliates disclaim any liability for any damages caused by use of this software or hardware in dangerous applications.

### Trademark Notice

Oracle, Java, MySQL, and NetSuite are registered trademarks of Oracle and/or its affiliates. Other names may be trademarks of their respective owners.

Intel and Intel Inside are trademarks or registered trademarks of Intel Corporation. All SPARC trademarks are used under license and are trademarks or registered trademarks of SPARC International, Inc. AMD, Epyc, and the AMD logo are trademarks or registered trademarks of Advanced Micro Devices. UNIX is a registered trademark of The Open Group.

### Third-Party Content, Products, and Services Disclaimer

This software or hardware and documentation may provide access to or information about content, products, and services from third parties. Oracle Corporation and its affiliates are not responsible for and expressly disclaim all warranties of any kind with respect to third-party content, products, and services unless otherwise set forth in an applicable agreement between you and Oracle. Oracle Corporation and its affiliates will not be responsible for any loss, costs, or damages incurred due to your access to or use of third-party content, products, or services, except as set forth in an applicable agreement between you and Oracle.

### **Use of This Documentation**

This documentation is NOT distributed under a GPL license. Use of this documentation is subject to the following terms:

You may create a printed copy of this documentation solely for your own personal use. Conversion to other formats is allowed as long as the actual content is not altered or edited in any way. You shall not publish or distribute this documentation in any form or on any media, except if you distribute the documentation in a manner similar to how Oracle disseminates it (that is, electronically for download on a Web site with the software) or on a CD-ROM or similar medium, provided however that the documentation is disseminated together with the software on the same medium. Any other use, such as any dissemination of printed copies or use of this documentation, in whole or in part, in another publication, requires the prior written consent from an authorized representative of Oracle. Oracle and/or its affiliates reserve any and all rights to this documentation not expressly granted above.

## **Access to Oracle Support for Accessibility**

Oracle customers that have purchased support have access to electronic support through My Oracle Support. For information, visit <http://www.oracle.com/pls/topic/lookup?ctx=acc&id=info> or visit <http://www.oracle.com/pls/topic/lookup?ctx=acc&id=trs> if you are hearing impaired.

## **Changes in MySQL Enterprise Monitor 8.0.38 (2024-04-30)**

- [Functionality Added or Changed](#)
- [Bugs Fixed](#)

### **Functionality Added or Changed**

- MacOS 13 is now supported.
- Updated the following components to the version listed: JRE 8u411.b09, MySQL Server v8.0.37, and OpenSSL v3.0.13.

### **Bugs Fixed**

- The "Tables Found with No Primary or Unique Keys" and "AUTO\_INCREMENT Field Limit Nearly Reached" advisors were not enabled by default nor available, but are now set to execute every 10 minutes. (Bug #36403132)

## **Changes in MySQL Enterprise Monitor 8.0.37 (2024-01-16)**

- [Functionality Added or Changed](#)
- [Bugs Fixed](#)

## Functionality Added or Changed

- Updated the following components to the version listed: Apache Struts v2.5.33, Apache Tomcat v8.5.97, JRE v8u401, MySQL Server v8.0.36, OpenSSL v3.0.12, and Spring Security v5.7.11.

## Bugs Fixed

- The [InnoDB Buffer Pool Usage Metrics](#) report was not being generated. (Bug #34679179)
- Selecting group assets on the **Groups Configuration** page would emit an error.

## Changes in MySQL Enterprise Monitor 8.0.36 (2023-10-25)

- [Functionality Added or Changed](#)
- [Bugs Fixed](#)

## Functionality Added or Changed

- Updated the following components to the version listed: Apache Struts v2.5.31, Apache Tomcat v8.5.93, Commons IO v2.13.0, Commons Math v4.0-beta1, Guava v32.1.2, Handlebars v4.7.8, jackson-annotations v2.15.2, jackson-core v2.15.2, jackson-databind v2.15.2, JRE v8u391, MySQL Server v8.0.35, OpenSSL v3.0.10, Spring Framework v5.3.29, Spring Security v5.7.10, and StackBlur v2.6.0.

## Bugs Fixed

- On the **Events** page, the **Advisors** filter did not show previously selected (actively filtered) advisors. (Bug #35770124)
- Executing an installation using an existing database would exit with an error about not finding libcrypto related files to unpack. (Bug #35742273)
- For **Metrics** tables, the "Show / Hide columns" popup would not reopen after opening and closing it. (Bug #35276379)

## Changes in MySQL Enterprise Monitor 8.0.35 (2023-07-31)

- [Functionality Added or Changed](#)
- [Bugs Fixed](#)

## Functionality Added or Changed

- Updated the following components to the version listed: Apache Tomcat v8.5.89, Commons Fileupload v1.5, JavaScript Extension Toolkit (JET) v13.1.15, JRE v8u381, MySQL Server v8.0.34, OpenSSL v3.0.9, and Spring Security v5.7.8.

## Bugs Fixed

- When assigning role permissions to a selected group, the selected group in the drop down box was ignored and error was emitted: "You must select a Group is Group-specific permissions is selected for Role test-role. If no Groups exist, you must create them. (U72E1)" (Bug #35225074)

## Changes in MySQL Enterprise Monitor 8.0.34 (2023-04-18)

- [Functionality Added or Changed](#)

- [Bugs Fixed](#)

## Functionality Added or Changed

- Updated the following components to the version listed: gettext v1.2.0, jQuery v3.6.3, jQueryUI v1.13.2, JRE v8u371.b10, moment-timezone v0.5.40, and MySQL Server v8.0.33.
- The OpenSSL libraries used by MySQL Enterprise Monitor installers have been upgraded to 1.1.1t.

## Bugs Fixed

- Fixed layout of the Configuration->MySQL Instances table when not viewing in full screen mode.
- Fixed the "MySQL Instances Using EOL Versions" filter, which now inserts "<=5.6" into the "MySQL Version" search field.
- Enabled external role access to the Active Directory external authentication interface.

## Changes in MySQL Enterprise Monitor 8.0.33 (2023-01-27)

- [Functionality Added or Changed](#)
- [Bugs Fixed](#)

## Functionality Added or Changed

- The "Data Purge Behavior" values defined under "First Time Setup" were not saved; instead they reverted to their default values. The work around was to set them under Configuration->Settings.
- A user was not prompted to define their time zone and locale values upon initial login.
- Updated the following components to the version listed: Apache Tomcat v8.5.84, Guava v31.1, jQuery Migrate v3.4.0, JRE v8u371.b11, MySQL Server v8.0.32, OpenSSL v1.1.1s, Spring Framework v5.3.24, Spring Security v5.7.5.

## Bugs Fixed

- The control used to filter events based on the Advisors that generated them was not working. (Bug #35006372)
- Timeseries graph filters could not be saved and then reused reliably. (Bug #34919083)

## Changes in MySQL Enterprise Monitor 8.0.32 (2022-10-27)

### Functionality Added or Changed

- Removed the integrated My Oracle Support (MOS) functionality.
- The MySQL server bundled with MySQL Enterprise Service Manager was upgraded from version 8.0.30 to 8.0.31.
- The bundled JRE was updated to 8u351.b10 for both the Agent and Service Manager.  
For more information, see [JDK 8 Release Notes](#).
- Removed the "What's New" page and its associated settings.

- Updated many components, and listed here are the component names with their associated version in this release:

ANTLR v2.7.7, AOP Alliance v1.0.0, Apache Commons Daemon v1.3.0, Apache Struts v2.5.30, canvg v1.5.3, cglib v3.3.0, Commons Beanutils v1.9.4, Commons Codec v1.15-744c1c9, Commons Collections (v3.2.2 and v4.5-7998208), Commons Exec v1.3, Commons IO v2.11.0, Commons Lang v3.12.0, Commons Math v3.6.1, D3 v7.3.0, DataTables ColReorderWithResize v1.0.7, DataTables ColVis v1.0.8, DataTables v1.9.4, Ehcache v2.10.9.2, EZMorph v3.0.0, Flexmark-java v0.62.6-d05c68b, Fugue Icons v3.5.6, gettext.js v0.1.0, Google SMP patch v200806, Guava v30.1, Handlebars v4.7.7, handlebars-helpers v0.5.8, Hibernate ORM v5.6.1, highlight.js v11.5.1, html2canvas v1.4.1, HttpComponents Client v5.1.3, HttpCore v5.1.4, jackson-annotations v2.13.0, jackson-core v2.13.0, jackson-databind v2.13.3, JavaScript Extension Toolkit (JET) v11.1.5, Javassist v3.29.0-GA, jopt-simple v5.0.4, jQuery Sparklines Plugin v2.1.2, jQuery Templating Plugin vbeta1, jQuery v3.6.0, jquery-migrate v3.3.2, jQueryUI v1.13.1, JSON-lib v3.0.2, json2.js v2017-06-12, unixsocket v2.5.1, Log4J v2.17.1, lz-string v1.4.4, moment-timezone v0.5.33, Moment.js v2.29.4, Mustache for Java v0.9.10, open-sans-fontface, OpenSSL v1.1.1q, PersistJS v0.3.0, RGB color parser in JavaScript v2022-05-23, Rickshaw v1.7.1, SIGAR software, Agent software, Simple Logging Facade for Java (SLF4J) v1.7.36, SNMP4J v2.8.10, Spring Framework v5.3.19, Spring LDAP v2.4.1, Spring Security v5.4.8, StackBlur v2.5.0, Tomcat v8.5.82, and WebCola v3.3.8.

- Fixed the general tooltip width in multiple places.
- The agent list under Configuration->Agents was not showing information for Instance Uptime, Last Contact, and Data Dir. As a workaround, this information is available in the "MySQL Instances" tab.

## Changes in MySQL Enterprise Monitor 8.0.31 (2022-07-26)

- [Security Notes](#)
- [Functionality Added or Changed](#)

### Security Notes

- MySQL Enterprise Service Manager has been updated to use Apache Struts 2.5.30, which has been publicly reported as not vulnerable to [CVE-2021-31805](#). (Bug #34075416)

### Functionality Added or Changed

- The MySQL server, bundled with MySQL Enterprise Service Manager, has been upgraded to MySQL 8.0.30.
- The bundled JRE was updated to 1.8.0\_341 for both the Agent and Service Manager.  
For more information, see [JDK 8 Release Notes](#).
- The OpenSSL libraries used by MySQL Enterprise Monitor installers have been upgraded to 1.1.1o.
- The general data-binding package for Jackson, bundled with MySQL Enterprise Service Manager, has been upgraded to [jackson-databind](#) 2.13.3.

## Changes in MySQL Enterprise Monitor 8.0.30 (2022-04-27)

- [Functionality Added or Changed](#)
- [Bugs Fixed](#)

## Functionality Added or Changed

- The MySQL server, bundled with MySQL Enterprise Service Manager, has been upgraded to MySQL 8.0.29.
- The bundled JRE was updated to 1.8.0\_331 for both the Agent and Service Manager.  
For more information, see [JDK 8 Release Notes](#).
- The Tomcat server, bundled with MySQL Enterprise Service Manager, has been upgraded to 8.5.78.
- Log files now are managed with log4j2, which is configured using [log4j2.xml](#) rather than [log4j.properties](#). In case of an upgrade, the old [log4j.properties](#) file is kept for reference.
- The OpenSSL libraries used by MySQL Enterprise Monitor installers have been upgraded to 1.1.1n.
- As of this release, and as announced on the [EOL announcement page](#), macOS 10.15 is no longer a supported platform for MySQL products.
- The Rickshaw graph library bundled with MySQL Enterprise Monitor is upgraded to version 1.7.1.

## Bugs Fixed

- MySQL Enterprise Service Manager has been updated to use Apache Log4J 2.17.1, which has been publicly reported as not vulnerable to [CVE-2021-45105](#).
- The welcome message shown in the **What's New** section of the **Help** menu had the wrong version of MySQL Enterprise Monitor, but the correct version appeared in the status bar (lower right corner). Now, all of the versions shown are updated to the current version.
- Some edit actions were not visible on the Advisors page and the related settings could not be specified.

## Changes in MySQL Enterprise Monitor 8.0.29 (2021-12-15)

### Bugs Fixed

- MySQL Enterprise Service Manager has been updated to use Apache Log4j 2.16.0, which has been publicly reported as not vulnerable to [CVE-2021-45046](#).

## Changes in MySQL Enterprise Monitor 8.0.28 (2021-12-14)

- [Functionality Added or Changed](#)
- [Bugs Fixed](#)

### Functionality Added or Changed

- The Tomcat server, bundled with MySQL Enterprise Service Manager, has been upgraded to 8.5.72.

### Bugs Fixed

- It was not possible to create or edit Subjects on Event Handlers.
- MySQL Enterprise Service Manager has been updated to use Apache Log4j 2.15.0, which has been publicly reported as not vulnerable to [CVE-2021-44228](#).

## Changes in MySQL Enterprise Monitor 8.0.27 (2021-10-19)

MySQL Enterprise Monitor 8.0.26 was skipped. MySQL Enterprise Monitor 8.0.27 follows MySQL Enterprise Monitor 8.0.25.

### Functionality Added or Changed

- The MySQL server, bundled with MySQL Enterprise Service Manager, has been upgraded to MySQL 8.0.27.
- The Tomcat server, bundled with MySQL Enterprise Service Manager, has been upgraded to 8.5.70.
- The OpenSSL libraries used by MySQL Enterprise Monitor installers have been upgraded to 1.1.1l.
- The bundled JRE was updated to 1.8.0\_311 for both the Agent and Service Manager.

For more information, see [JDK 8 Release Notes](#).

## Changes in MySQL Enterprise Monitor 8.0.25 (2021-05-11)

### Functionality Added or Changed

- The MySQL server, bundled with MySQL Enterprise Service Manager, has been upgraded to MySQL 8.0.25.

## Changes in MySQL Enterprise Monitor 8.0.24 (2021-04-30)

- [Functionality Added or Changed](#)
- [Bugs Fixed](#)

### Functionality Added or Changed

- The MySQL server, bundled with MySQL Enterprise Service Manager, has been upgraded to MySQL 8.0.24.
- The OpenSSL libraries used by MySQL Enterprise Monitor installers have been upgraded to 1.1.1k.
- The Tomcat server, bundled with MySQL Enterprise Service Manager, has been upgraded to 8.5.63.
- As of this release, and as announced on the [EoL announcement page](#), FreeBSD is no longer a supported platform for MySQL Enterprise Monitor Agent. It is possible to remotely monitor MySQL servers running on FreeBSD, but not to install the MySQL Enterprise Monitor Agent on that platform.
- The bundled JRE was updated to 1.8.0\_291 for both the Agent and Service Manager.

For more information, see [JDK 8 Release Notes](#).

### Bugs Fixed

- The MySQL Enterprise Monitor console did not take the time zone into account and displayed an incorrect time.

## Changes in MySQL Enterprise Monitor 8.0.23 (2021-01-28)

- [Functionality Added or Changed](#)
- [Bugs Fixed](#)



## Functionality Added or Changed

- The OpenSSL libraries used by MySQL Enterprise Monitor installers have been upgraded to 1.1.1i.
- The bundled JRE was updated to 1.8.0\_281 for both the Agent and Service Manager.
- The MySQL server, bundled with MySQL Enterprise Service Manager, has been upgraded to MySQL 8.0.23.

## Bugs Fixed

- The documentation describing how to correct duplicate SSH keys was incorrect. (Bug #30735695)

## Changes in MySQL Enterprise Monitor 8.0.22 (2020-10-20)

### Functionality Added or Changed

- The MySQL server, bundled with MySQL Enterprise Service Manager, has been upgraded to MySQL 8.0.22.
- The bundled JRE was updated to 1.8.0\_271 for both the Agent and Service Manager.
- The Apache Tomcat server, bundled with MySQL Enterprise Service Manager, has been upgraded to 8.5.57.

## Changes in MySQL Enterprise Monitor 8.0.21 (2020-07-14)

- [Functionality Added or Changed](#)
- [Bugs Fixed](#)

### Functionality Added or Changed

- The OpenSSL libraries used by MySQL Enterprise Monitor installers have been upgraded to 1.1.1g.
- The Connector/J component was upgraded to 5.1.49.
- The bundled JRE was updated to 1.8.0\_261 for both the Agent and Service Manager.
- The MySQL server, bundled with MySQL Enterprise Service Manager, has been upgraded to MySQL 8.0.21.
- The supported cipher suite list in the Tomcat configuration file, `server.xml`, has been updated with those ciphers supported by TLSv1.2 and 1.3.



#### Important

TLS v1.1 is no longer supported. It is no longer set during installation and is removed during upgrades.

- As of this release, and as announced on the [Supported Platforms: MySQL Enterprise Monitor page](#), Solaris is no longer a supported platform.

## Bugs Fixed

- Under certain circumstances, the MySQL Enterprise Monitor Agent installation failed to connect to MySQL Server 8.0 if configured to use sockets. (Bug #27982408)

## Changes in MySQL Enterprise Monitor 8.0.20 (2020-04-27)

MySQL Enterprise Monitor 8.0.19 was skipped. MySQL Enterprise Monitor 8.0.20 follows MySQL Enterprise Monitor 8.0.18.

- [Functionality Added or Changed](#)
- [Bugs Fixed](#)

### Functionality Added or Changed

- It is now possible to check the blackout status of a MySQL Enterprise Monitor Agent or MySQL instance. For more information, see [Event Notification Blackout Periods](#).

This functionality is offered as a REST API and is accessible from the command line, using `curl`, for example, or by crafting custom URLs in the browser's address bar. (Bug #30543089)

- It is now possible to apply an Event Notification Blackout to an agent and all the MySQL instances it monitors. For more information, see [Event Notification Blackout Periods](#).

This functionality is offered as a REST API and is accessible from the command line, using `curl`, for example, or by crafting custom URLs in the browser's address bar. (Bug #20572895)

- The MySQL server, bundled with MySQL Enterprise Service Manager, has been upgraded to MySQL 8.0.20.
- The bundled JRE was updated to 1.8.0\_251 for both the Agent and Service Manager.
- The Tomcat server, bundled with MySQL Enterprise Service Manager, has been upgraded to 8.5.51.
- As of this release, the MySQL Enterprise Service Manager installer, on Microsoft Windows, checks for the presence of the Microsoft Visual C++ 2015-2019 Redistributable (x64) - 14.25.2850508™ or later and if it is not present, installs it.

MySQL Enterprise Service Manager installation on Microsoft Windows can not proceed without this redistributable.



#### Important

If you do not intend to use the bundled MySQL Server, but intend to use an existing, external repository, you must manually download and install this redistributable.

### Bugs Fixed

- The documentation lacked detail on how to work with and manage notification blackouts. For more information, see [Event Notification Blackout Periods](#). (Bug #23317261)

## Changes in MySQL Enterprise Monitor 8.0.18 (2019-10-30)

### Functionality Added or Changed

- The Tomcat server, bundled with MySQL Enterprise Service Manager, has been upgraded to 8.5.45.
- The bundled JRE was updated to 1.8.0\_231 for both the Agent and Service Manager.
- The MySQL server, bundled with MySQL Enterprise Service Manager, has been upgraded to MySQL 8.0.18.

- The OpenSSL libraries used by MySQL Enterprise Monitor installers have been upgraded to 1.1.1D.

## Changes in MySQL Enterprise Monitor 8.0.17 (2019-07-22)

- [Functionality Added or Changed](#)
- [Bugs Fixed](#)

### Functionality Added or Changed

- The OpenSSL libraries used by MySQL Enterprise Monitor installers have been upgraded to 1.0.2s.
- The MySQL server, bundled with MySQL Enterprise Service Manager, has been upgraded to MySQL 8.0.17.
- The bundled JRE was updated to 1.8.0\_221 for both the Agent and Service Manager.

### Bugs Fixed

- Under certain circumstances it was not possible to install MySQL Enterprise Monitor Agent on Solaris 11.4. The installer checked for the existence of `SUNWuiu8` and would not continue if the package was not present. This package is not required by MySQL Enterprise Monitor Agent and the check for its presence is now removed. (Bug #30004667)

## Changes in MySQL Enterprise Monitor 8.0.16 (2019-04-25)

MySQL Enterprise Monitor 8.0.15 was skipped. MySQL Enterprise Monitor 8.0.16 follows MySQL Enterprise Monitor 8.0.14.

- [Functionality Added or Changed](#)
- [Bugs Fixed](#)

### Functionality Added or Changed

- The OpenSSL libraries used by MySQL Enterprise Monitor installers have been upgraded to 1.0.2r.
- The bundled JRE was updated to 1.8.0\_212 for both the Agent and Service Manager.
- The MySQL server, bundled with MySQL Enterprise Service Manager, has been upgraded to MySQL 8.0.16.

### Bugs Fixed

- **Important Change:** It was not possible to validate the `MONITOR.MIB` file, it was not standards compliant. It contained a mix of SNMPv2- and SNMPv3-specific attributes.

As of this release, `MONITOR.MIB` is standardised and only includes such attributes as are common to SNMPv1, 2, and 3.



#### Important

If you have configured a 3rd-party trap receiver to use the `MONITOR.MIB`, you must upgrade the configured `MONITOR.MIB` to use the new file delivered with this version.

(Bug #29244578)

- It was not possible to select **MEM Built-in Agent** or **MEM Service Manager** and add them to the asset when creating an Event Handler. Selecting the **MEM Built-in Agent** added the **MEM Service Manager**, and vice versa. (Bug #29220504)

## Changes in MySQL Enterprise Monitor 8.0.14 (2019-01-21)



### Important

It is not possible to upgrade to MySQL Enterprise Monitor 8.0.14 from versions preceding MySQL Enterprise Monitor 3.4. To upgrade an older version, it is recommended you first upgrade to MySQL Enterprise Monitor 4.0 before running the MySQL Enterprise Monitor 8.0.14 upgrade process.

MySQL Enterprise Service Manager 8.0.14 bundled repository is MySQL Server 8.0.14.

- [MySQL Product Versioning](#)
- [Functionality Added or Changed](#)
- [Bugs Fixed](#)

## MySQL Product Versioning

- **Important Change:** Beginning with version 8.0.14, MySQL Enterprise Monitor is now aligned with the version number of the MySQL product line. Version numbers 8.0.4 to 8.0.13 are skipped.

## Functionality Added or Changed

- **Important Change:** It is now possible to delete obsolete or unused assets from the MySQL Enterprise Monitor inventory using the user interface.



### Important

Deleting assets from the inventory does not delete or uninstall assets from their installed locations. The delete process removes all record of an asset or group of assets from the internal record of MySQL Enterprise Service Manager, only. This enables you to remove entries for clusters, topologies, agents, hosts, and instances which were monitored, but are no longer in use.

For more information, see [Deleting Assets](#) (Bug #26805727)

- **Important Change:** The MySQL server, bundled with MySQL Enterprise Service Manager, has been upgraded to MySQL 8.0.14.



### Important

It is strongly recommended you backup your existing MySQL Enterprise Monitor repository, and test the backup, before upgrading to MySQL Enterprise Monitor 8.0.14.

The following MySQL 5.7-specific configuration parameters have been removed from the MySQL configuration file included with the bundled repository. These parameters were removed because they are either obsolete and no longer used by MySQL 8, or because the values defined by them are now defaults in MySQL 8.

- `default_storage_engine=INNODB`

- `default_tmp_storage_engine=INNODB`
- `event_scheduler=ON`
- `explicit_defaults_for_timestamp=1`
- `sql_mode=STRICT_TRANS_TABLES,NO_AUTO_CREATE_USER,NO_ENGINE_SUBSTITUTION`
- `innodb_file_format=Barracuda`
- `innodb_file_per_table`
- `innodb_support_xa=0`
- `innodb_adaptive_flushing=1`
- `innodb_locks_unsafe_for_binlog=1`
- `skip_external_locking`
- `local_infile=0`
- `--skip-symbolic-links`
- `performance_schema`

For more information on parameters added, changed, deprecated, or removed in MySQL 8, see [What Is New in MySQL 8.0](#).

The MySQL X plugin is disabled by default. If enabled in an existing configuration, the upgrade process disables it.

`log-bin` is disabled, by default, by setting `--skip-log-bin`. If you enabled `log_bin`, your setting is preserved by the upgrade process.

It is recommended you backup your configuration before upgrading.

- **Important Change:** New asset views are added in this release. These asset views enable you to examine, in detail, the configuration and status of Agents, Hosts, and NDB Clusters.

For more information, see [Asset Management](#)

- **Important Change:** As of this release, to install MySQL Enterprise Monitor on Solaris platforms, you must install the Oracle Developer Studio 12.6 Runtime libraries first. If the installer does not detect those libraries, the installation displays an error and cannot proceed until the prerequisite libraries are present.
- A new configuration view filter form is added in this release. It is used by the **Query Analyzer**, and the **Agent**, **Hosts**, and **NDB Cluster** asset views.

These views enable you to define default viewing options such as graphs, filtering, and sorting.

For more information, see [Configuration Views](#). (Bug #18203424)

- The user interface of the Query Analyzer has been completely redesigned. Building upon Oracle's JavaScript Extension Toolkit (JET) framework, this new design improves navigation in the Query Analyzer and introduces advanced configuration options which enable you to customize, sort, and filter the data displayed.

For more information, see [Query Analyzer User Interface](#). (Bug #18203339)

- The bundled JRE was updated to 1.8.0\_202 for both the Agent and Service Manager.
- As of this release, `performance-schema-consumer-events-statements-history-long` is enabled on the bundled repository. If you are using an external repository, you must enable this consumer by adding the following to your MySQL configuration file:

```
performance_schema_consumer_events_statements_history_long=ON
```

- The OpenSSL libraries used by the MySQL Enterprise Monitor installers and have been upgraded to 1.0.2q.

## Bugs Fixed

- The documentation describing the Active Directory configuration incorrectly stated that a port was required in addition to the hostname. The port is 389 and cannot be altered. (Bug #29173152)
- In certain circumstances, MySQL Enterprise Service Manager did not start after upgrading from version 3.4 to version 8.0. The error `cannot determine singular foreign key name for normalized_statements_by_server_by_schema` was logged. (Bug #28938022)
- The documentation describing the logic of replica promotion to source was incorrect. (Bug #28905972)
- It was not possible to remove the **CPU Utilization - Mysql Server - CPU** graph from the **Overview** if only a single instance was selected. (Bug #28794385)
- Several Advisor tooltips contained broken links and links pointing to outdated content. (Bug #28171028)
- The graph range selection controls (Cancel selection and Query Analysis) were visible through any menu or dialog which overlaid the selection. (Bug #17555151)
- It was not possible to use the percentage character (%) in filter names. The filter was saved and was displayed in the list of available filters, but did not display the configured data when selected.
- Automatic page refresh did not pause if an asset was selected.
- Null Pointer Exceptions were logged relating to Query Analysis and Explain Plan when monitoring MySQL 8. These exceptions were caused by the removal of `EXPLAIN EXTENDED` in MySQL 8.

As of this release, MySQL Enterprise Monitor checks which MySQL version is being monitored and only attempts to use `EXPLAIN EXTENDED` on versions which support it.

- The vertical scroll bar did not behave as expected in Microsoft Internet Explorer 11. No other browser was affected by this issue.

## Changes in MySQL Enterprise Monitor 8.0.3 (2018-10-16)

- [Functionality Added or Changed](#)
- [Bugs Fixed](#)

### Functionality Added or Changed

- The Tomcat server, bundled with MySQL Enterprise Service Manager, has been upgraded to 8.5.34.

## Bugs Fixed

- It was not possible to use the percentage character (%) in filter names. The filter was saved and was displayed in the list of available filters, but did not display the configured data when selected.
- Automatic page refresh did not pause if an asset was selected.
- Under certain circumstances, Out Of Memory errors caused the MySQL Enterprise Monitor Agent to restart. In the previous release, the default agent heap size, defined by the `MEM_AGENT_JAVA_OPTS` parameter in the `setenv.sh/bat` file, has been increased to 128MB.



### Important

In the previous release, this issue was corrected for new installations. As of this release, this issue is also corrected for upgrades.

If you changed `MEM_AGENT_JAVA_OPTS` to a value greater than 128MB, the value is not changed by the upgrade. If you changed `MEM_AGENT_JAVA_OPTS` to a value lower than 128MB, the upgrade process updates the value to 128MB.

- Null Pointer Exceptions were logged relating to Query Analysis and Explain Plan when monitoring MySQL 8. These exceptions were caused by the removal of `EXPLAIN EXTENDED` in MySQL 8.

As of this release, MySQL Enterprise Monitor checks which MySQL version is being monitored and only attempts to use `EXPLAIN EXTENDED` on versions which support it.

## Changes in MySQL Enterprise Monitor 8.0.2 (2018-09-13)

- [Security Notes](#)
- [Bugs Fixed](#)

## Security Notes

- MySQL Enterprise Service Manager has been updated to use Apache Struts 2.3.35, which has been publicly reported as not vulnerable to [CVE-2018-11776](#). (Bug #28577924)

## Bugs Fixed

- Under certain circumstances, Out Of Memory errors caused the MySQL Enterprise Monitor Agent to restart. As of this release, the default agent heap size, defined by the `MEM_AGENT_JAVA_OPTS` parameter in the `setenv.sh/bat` file, has been increased to 128MB.



### Note

The new default is set for new installations only. If you are upgrading from a previous version, you must edit the `setenv.sh/bat` manually.

If you have already customized this value, ensure the custom value is at least equal to 128MB.

## Changes in MySQL Enterprise Monitor 8.0.1 (2018-07-24)

- [Functionality Added or Changed](#)
- [Bugs Fixed](#)

## Functionality Added or Changed

- The usability of the Context and Target selection fields has been improved. As of this release, you can select a group or asset from the list or by searching for the name of a group or asset.

The view is no longer refreshed after making a selection in the **Global Summaries** field. As of this release, the filter is not applied until you select an asset from the **All Targets** field. (Bug #27019694)

- It is now possible to delete entries from the MySQL Enterprise Monitor inventory. Deleting assets from the MySQL Enterprise Monitor inventory does not delete or uninstall assets from their installed locations. The delete process removes all record of an asset or group of assets from the internal record of MySQL Enterprise Service Manager, only. This enables you to remove entries for clusters, topologies, and instances which were monitored, but are no longer in use.

Ensure the asset or group is either not running, or not installed, before attempting to delete it from the MySQL Enterprise Monitor inventory.

For more information, see [Deleting Assets from the Command Line](#). (Bug #26981023)

- The Oracle JavaScript Extension Toolkit (JET) is upgraded to version 4.2.0 in this release.
- The installers were updated with improved Japanese and Chinese translations.

Also, to better support Japanese installations, the `configuration_report` files, generated by the installer, now use the `utf8` character set.

- The OpenSSL libraries used by MySQL Enterprise Monitor installers have been upgraded to 1.0.2o.
- The MySQL server, bundled with MySQL Enterprise Service Manager, has been upgraded to MySQL 5.7.23.
- The bundled JRE was updated to 1.8.0\_181 for both the Agent and Service Manager.

## Bugs Fixed

- Several Advisor tooltips contained broken links and links pointing to outdated content. (Bug #28171028)
- Changes to the **Query Analysis Reporting** advisor's configuration were ignored by the built-in agent of MySQL Enterprise Service Manager. The changes were created correctly, but the built-in agent continued using the default schedule and configuration.



### Important

This issue affected the built-in agent of MySQL Enterprise Service Manager only. It did not affect the standalone MySQL Enterprise Monitor Agent.

For information on this distinction, see [MySQL Enterprise Monitor Component Overview](#).

(Bug #27986851)

- MySQL Enterprise Service Manager always used the default data purge values, regardless of what values were specified. (Bug #27869486)
- The Query Analyzer's **Configure Query Analyzer** link did not link to the Query Analyzer advisors. (Bug #27844552)



- It was not possible to add or remove sparkline graphs from the **Global Overview**. Also, an error was logged if the **Reset to Default** button was clicked. (Bug #27733748)
- MySQL Enterprise Monitor Agent parsed all `name=value` pairs, even if they were inside comments, or outside legal config sections in a Cluster `config.ini`.

As of this release, only configuration values in legally defined sections are parsed. (Bug #27575904)

- If a range was selected on the graph for a single instance, and the Query Analyzer was opened from the selected range, the single instance selected was replaced by **All Targets** context selection when the view reloaded. (Bug #27268314)
- The plus character (+) was added to search criteria on the Query Analyzer filter's **Value** field. These characters were added if a search was performed, the **Details** page was opened for one of the search results, then the Query Analyzer page was opened again.

For example, searching for `INSERT INTO `mem__quan`` resulted in the string `INSERT+INTO +`mem__quan``.

- The agent upgrade option, `--ignore-old-proxy-aggr` was present in the MySQL Enterprise Monitor Agent and documentation. The upgrade from MySQL Enterprise Agent Proxy Service 2.3 is no longer supported.
- If the configuration of the **Query Analysis Reporting** advisor was changed, for example by disabling, then re-enabling, the Example Query or Explain, the **Auto-Explain Threshold** value was set to zero instead of to the default value of 100 milliseconds. This resulted in an error and no new queries were displayed on the **Query Analyzer**.
- The **Example Statements** configuration message, displayed if EXAMPLE/EXPLAIN query was not enabled, incorrectly referenced `performance_schema_events_statements_history_size` instead of `performance_schema_events_statements_history_long_size`.
- The bottom of the Query Analyzer Details dialog was truncated by the bottom of the screen if the **Graphs** tab was selected, making it impossible to close the dialog.
- The graph range controls on the Query Analyzer graphs, **Cancel selection**, **Query Analysis**, and **Zoom to selection** were visible, overlaid on the Statement Details dialog.
- If the data retention policy was set to zero, or a negative value, and MySQL Enterprise Service Manager was upgraded, the upgraded MySQL Enterprise Service Manager failed to start.

## Changes in MySQL Enterprise Monitor 8.0.0 (2018-04-19)



### Important

It is not possible to upgrade to MySQL Enterprise Monitor 8.0 from versions preceding MySQL Enterprise Monitor 3.3. To upgrade an older version, it is recommended you first upgrade to MySQL Enterprise Monitor 4.0 before running the MySQL Enterprise Monitor 8.0 upgrade process.



### Important

MySQL Enterprise Service Manager 8.0's bundled repository is MySQL Server 5.7.22.

- [Functionality Added or Changed](#)

- [Bugs Fixed](#)

## Functionality Added or Changed

- MySQL Enterprise Service Manager supports monitoring of MySQL 8.



### Important

Due to password plugin changes in the server, only MEM 8.0 and later support monitoring MySQL 8.0.11, or higher.



### Note

If you intend to use MySQL 8 as an external repository, the installer no longer checks for `innodb_file_format` or `innodb_locks_unsafe_for_binlog` as they are deprecated in MySQL 8.

For more information, see [Prerequisites](#).

Several system and status variables used by the MySQL Enterprise Service Manager's advisors were deprecated in MySQL 8. As such, some advisors do not evaluate for MySQL 8. Instead of presenting advice, as they do for earlier versions of MySQL, a warning is displayed, advising you that the advisor does not evaluate against MySQL 8, or higher.

The following advisors do not evaluate for MySQL 8:

- **InnoDB Not Using Newest File Format**
- **Insecure Password Authentication Option is Enabled**
- **Next-Key Locking Disabled For InnoDB But Binary Logging Enabled**
- **Warnings Not Being Logged**
- **Query Cache Has Sub-Optimal Hit Rate**
- **Query Cache Is Excessively Fragmented**
- **Query Cache Potentially Undersized**

The **InnoDB Undo Logs** graph is not displayed for MySQL 8 instances.

For more information on the variables added and removed in this release, see [Server and Status Variables and Options Added, Deprecated, or Removed in MySQL 8.0](#). (Bug #25877130)

- System variables introduced in MySQL 8 are available in MySQL Enterprise Monitor views such as the per-instance drilldown on the MySQL instance dashboard. For more information on the variables added and removed in this release, see [Server and Status Variables and Options Added, Deprecated, or Removed in MySQL 8.0](#).
- The MySQL server, bundled with MySQL Enterprise Service Manager, has been upgraded to MySQL 5.7.22.
- **Memory Usage** report enables you to view how memory is allocated within the MySQL Instance.  
For more information, see [Memory Usage Report](#).
- Query Analyzer Statement Details view is updated in this release.

For more information, see [Detailed Query Information](#).

## Bugs Fixed

- The documentation did not clearly state that the GUI-based advisors could not be copied as the basis for custom advisors. Only expression-based advisors can be copied in this manner. (Bug #27731494)
- The **Time Span** and **Graph From:** labels did not display multibyte characters correctly. The character codes were displayed instead of the characters themselves. (Bug #27695440)
- The **Zoom** links on the **Query Analyzer** page did not alter the graph time range. (Bug #27410942)
- The columns of the **Current Emergency & Critical Events** list, on the **Overview** page, contained chevrons, indicating it was possible to sort the events. It is not possible to sort the events of this list, the emergency events are always listed first, and the list is sorted by **Current** and **Time**. (Bug #27011755, Bug #27720503)
- Retrieving Query Analyzer data for the Statement details report resulted in resource-intensive index scans on the `normalized_statements_by_server_by_schema_data` table.

As part of the Query Analyzer performance improvements in MySQL Enterprise Monitor 8.0, this index scan is no longer performed. (Bug #17731793)

- On Windows platforms, the agent service description contained an incorrect version number.
- The emailed links were incorrect for events generated by the **SQL Statement Generates Warnings or Errors** and **Average Statement Execution Time Advisor** advisors.
- It was not possible to edit any notification groups other than the first 10 displayed. The remaining groups were displayed as inactive.
- The link to the **Settings** page, in the **Important Product-Related Announcements** section of the **What's New** page, did not link to the **Settings** page.

