Release Notes for SAS® Fraud Management 4.1_M0, Hot Fix 10

Description	Component	Summary	Test Scenario
In Oracle implementations, the automatic-close batch process for alerts incorrectly populates user and timestamp values in the FCM_ALERT_ACTION database table.	BATCH	The automatic-close process for alerts, job 3003, incorrectly populates four fields in the FCM_ALERT_ACTION database table: • CREATE_USER • LSTUPDT_USER • CREATE_TIMESTAMP • LSTUPDT_TIMESTAMP These values should be copied from the FCM_ALERT table. Instead, the user fields are set to the user who is running the job and the timestamp fields are set to the current timestamp.	After you apply this hot fix, the automatic-close process correctly copies the CREATE_USER, LSTUPDT_USER, CREATE_TIMESTAMP, and LSTUPDT_TIMESTAMP values from the FCM_ALERT database table.
The column values for column properties that are longer than 11 characters do not export correctly into Microsoft Excel.	REPORTS	When you run reports from the **Reports** tab and you export a column with a property name that is longer than 11 characters to Excel, the characters do not render correctly. This problem occurs with any of the reports that you can select from the **Reports** tab.	After you apply this hot fix, the property name length is not an issue, and the information displays correctly on the report when it is exported to Excel.
In Oracle implementations, job 4020 miscalculates the `seconds_between` and the `lastHourSessionLength` values in the TIME_IN_STRATEGY_SECONDS column of the FCM_STRATEGY_SESSION_SUMMARY table.	REPORTS	Job 4020, which populates the work-time summary table and the strategy-session tables, does not handle the `seconds_between` and the `lastHourSessionLength` values properly. As a result, invalid information is displayed in the Agent Time Analysis report that uses the two tables in its reporting. The 4020 jobs uses the data in the FCM_STRATEGY_USER_AUDIT table to populate the FCM_STRATEGE_SESSION_SUMMARY_TABLE.	After you apply this hot fix, the values are accurately added to the tables, and the tables display correctly for the Agent Time Analysis report.

Description	Component	Summary	Test Scenario
In DB2 implementations, the rule history shows duplicate rows in some cases.	RULES	In the scenario described below, the rule history might contain duplicate rows in a DB2 implementation. • Create a rule at a lower-level multi-organization. • Promote the rule to production and deploy the rule. • Create a new version of the rule and promote to testing. • Click the **Show History** button.	After you apply this hot fix, the rule history no longer displays duplicate rows.
The build number is not set correctly in the user variable segments.	J-OSE	The build number is not set correctly in the user variable segments by the OnDemand Scoring Engine (OSE). This behavior causes an issue when a user variable is removed and the build number remains at the old values.	After you apply this hot fix, the build number is set correctly in the user variable segments.
The performance of various tasks on the **Rules** tab is negatively impacted by database queries that retrieve data from the FCM_ESTIMATE and FCM_LOOKUP_LIST_DEFINITION database tables.	DATABASE	Performance of various tasks on the **Rules** tab is negatively impacted by database queries that retrieve data from the FCM_ESTIMATE and the FCM_LOOKUP_LIST_DEFINITION database tables.	After you apply this hot fix, new indexes on the database tables should improve the performance of queries that are used by the **Rules** tab.
In an Oracle implementation, the set_xact_fraud_flag_rux stored procedure exits with an error.	DATABASE	The set_xact_fraud_flag_rux stored procedure uses an incorrect format for the parameters. This problem generates the following error: `ORA-00911: invalid character` This stored procedure is not called from any SAS® process. It is manually run by customers.	After you apply this hot fix, the set_xact_frauld_flag_rux stored procedure runs successfully.

Description	Component	Summary	Test Scenario
The database query for lookup list definitions and lookup list rules is inefficient.	RULES	The database query that is used to retrieve lookup list definitions and lookup list rules is inefficient. The query includes rules in all folders instead of only the rules in the testing and production folders.	After you apply this hot fix, the database query for retrieving lookup list definitions and lookup list rules is restricted to testing and production rules.
Sensitive data in fields such as alert_value, contact_value, and parent_alert_value are not masked in error messages that are contained in the Alert Generation Server (AGS) log.	AGS	Error messages in the AGS log might contain unmasked sensitive data when exceptions occur during the alert processing. When you start AGS in normal mode with the `ags_server.sh start` command, sensitive information is masked in the log. In trace (debugging) mode (using `ags_server.sh trace` if AGS is not started yet, or `ags_server.sh traceOn` if AGS is already running), all information is written to the log, including sensitive data. In production mode, tracing should never be on. You turn off trace mode with the command `ags_server.sh traceOff`.	After you apply this hot fix, sensitive data is no longer written to the AGS log when an exception occurs during alert processing. **Important:** The behavior of the `traceOn` AGS option is not modified by this fix.
A daylight-saving time issue can prevent alert servicing in an Oracle environment.	ANYLSTSWORK	A daylight-saving time issue can occur when the time-zone setting for the IBM WebSphere Application Server Java Virtual Machine (JVM) is not Coordinated Universal Time (UTC), When you click the **Alerts** tab, the last 10 alerts that worked are retrieved. If one of those alerts has a timestamp between 2 AM and 3 AM on the Sunday of the time change, then an error occurs. The time is not a valid time in the local time zone, and the following message is displayed: `An unexpected error has occurred in the application. Click Resume to continue working. If the problem persists, please contact an administrator.`	After you apply this hot fix, you can service alerts during the daylight-saving time change.

Description	Component	Summary	Test Scenario
The real-time firing metrics reported in rule estimation might be incorrect in some circumstances.	RULES	The real-time firing metrics for transactions might be incorrect in estimations. The fired count for all rules might be less than the sum of the fired count of the individual rules in the following scenario: • One rule calls %ACTION_FIRE. • Another rule calls %ACTION_DECLINE for some transactions and calls %ACTION_FIRE for other transactions.	After you apply this hot fix, the real-time firing metrics in rule estimation is accurate.
A warning message is received and subsequent steps in rule testing and estimation are bypassed when the multi-organization node key and the result variable for the %ShiftHistoryArray macro are both 1 character in length.	RULES	A warning message is received and subsequent steps in rule testing and estimation are bypassed when the multi-organization node key and the result variable for the %ShiftHistoryArray macro are both 1 character in length. In rule testing and estimation, a warning message is displayed and the abort flag is set when both of the following are true: • The multi-organization node key is 1 character in length. • The result variable name in the invocation of %ShiftHistoryArray is also only 1 character in length. The warning message that is received is as follows: `WARNING: Argument 2 to macro function %SUBSTR is out of range in %ShiftHistoryArray macro` Because the abort flag is also set, subsequent steps in rule testing and estimation are bypassed.	After you apply this hot fix, when the multi-organization node key value and the result variable for the %ShiftHistoryArray are both 1 character in length, no warning message is displayed. Rule testing and estimation will complete.