AvailabilityGuard ™

Configure Data Source for Automatic Import from CMDB

AvailabilityGuard allows you to configure business entities (such as services, divisions, and applications) and assign hosts, databases, and NetApp filers to them. It is highly recommended to configure business entities. The configuration of business entities enables AvailabilityGuard to present a high level HA/DR readiness view of the datacenter(s), guarantee SLA policies and shed light on the impacted business impact lines in each ticket opened by AvailabilityGuard.

If an application that manages business mappings exists within your organization, (referred to as "Business Management Application" along this document), you can configure it as an external data source for AvailabilityGuard. AvailabilityGuard will then automatically import the business mappings of your organization. In addition, AvailabilityGuard can automatically import the hosts and site configuration.

Configuring the Business Mappings Integration

In order to import business information from the Business Management Application, the AvailabilityGuard administrator should follow the following procedure:

1. Create a table or view (on this Business Management Application database) that contains the relevant information for AvailabilityGuard.
2. Create a database user for AvailabilityGuard, which has privileges to connect to the database and query the given table or view.
3. Configure the connection details on AvailabilityGuard.

The following sections describe the procedure in greater details.

Configure Integration Table on the Business Management Application

AvailabilityGuard integrates with the one of the following DBMS:

- Oracle
- DB2
- MS SQL Server
- Sybase

The database administrator should define the integration table (or view). The default name for this table is **MAPPINGS_INTEGRATION**.

The following section describes the columns that the table/view must have:

COLUMN NAME	COLUMN TYPE	DESCRIPTION
BUSINESS_ENTITY_NAME	STRING (4000)	The name of the business entity
PARENT_BUSINESS_ENTITY_NAME	STRING (4000)	The name of the parent business entity, if the business entity is a member of other business entity (hierarchical structure)
BUSINESS_ENTITY_TYPE	STRING (4000)	The type of the business entity. These type should be configured on AvailabilityGuard user interface (*Configuration module > Business Entities > Business Entity Types*)
HOST_NAME	STRING (4000)	The name of the host that you want to assign to the business entity (if you specify a database in the same row, only the database is imported)
HOST_OPERATING_SYSTEM	STRING (4000)	The Operating System of the host. The value must be one of the following: • Windows • Linux • Solaris • HPUX • AIX
HOST_POLICY	STRING (4000)	The policy of the host.
HOST_GROUP	STRING (4000)	The designated group of the host.
HOST_IP	STRING (4000)	The IP address of the host (The value for this field is not mandatory)
DATABASE_INSTANCE_NAME	STRING (4000)	The name of the database instance that you want to assign to the business entity
BUSINESS_ENTITY_ROLE	STRING (4000)	The role of the assign component (host/database) inside the business entity
SLA_POLICY_NAME	STRING (4000)	The SLA policy to assign to the component (host/database) inside the business entity. This policy should be configuration on AvailabilityGuard user interface (*Configuration module >SLA Definition*).
SITE_NAME	STRING (4000)	The site name where the host is located (as defined in AvailabilityGuard). The value for this field is not mandatory,

	unless host names are equal between sites, or if you want AvailabilityGuard to import the site configuration

Important notes:

- It is possible to configure different table/view name than the default (see below).
- It is also possible to configure different column names than the default. If you choose to do so, please contact our support center.
- Each row in this table/view represents a single association between host/database to business entity:
  - When a host name is provided without database instance name – the host is associated.
  - When both host and database instance name are provided – the database is associated.
- If a host is assigned to a business entity, all databases installed on this host are considered as members of the business entity, so there is no need to make sure that the table contains row for each one of them.

Configure AvailabilityGuard to Import Data from the Business Management Application

After you have created the table/view, you need to specify the connection details on AvailabilityGuard:

1. In **Configuration** module, select **System Properties** from the tree.

2. Open the **Automatic Import** section and configure the following properties:
   - Database connection:
     - Host name (or IP address)
     - Database type (Oracle, DB2, MS SQL Server or Sybase)
     - Instance name
     - Database name (for MS SQL Server/DB2)
     - Port
   - Database authentication
     - Username
     - Password

3. If you use different table/view name than the default (BUSINESS_ENTITY_INTEGRATION), you may configure it in the **"Integration table/view name"** property.

4. If you want the imported data to override changes made manually using the interface, change the following properties (otherwise, leave the default values):
   - **"Override (re-create) Business Entities manually deleted using the user interface" = No**
   - **"Override SLA policies, roles and associations that were manually configured using user Interface" = Yes**

5. If you want AvailabilityGuard to import the business entities automatically during the full cycle, set:
   - **"Automatically import business entities during full cycle" = Yes**

6. If you want AvailabilityGuard to import hosts automatically during the full cycle, set:
   - **"Automatically import hosts during full cycle" = Yes**

7. If you want AvailabilityGuard to import site configuration automatically during the full cycle, set:
   - **"Automatically import sites during full cycle" = Yes**

Example and Rules for Importing Data from the Business Management Application to AvailabilityGuard

Below please find the rules and restrictions which apply to the method the data is imported:

1. Databases should be imported through AvailabilityGuard only, importing databases through CMDB is not supported.
2. The host should be defined prior assigning BE to DB.
3. The value of DATABASE_INSTANCE_NAME in the row should be empty when assigning host to BE.
4. When importing a host, if HOST_POLICY or HOST_GROUP are incorrect or does not exist, the enire row will be ignored.
5. When importing a host, if HOST_OPERATING_SYSTEM is incorrect or does not exist, then the Host Operating System value will be set to N/A.
6. In order to handle a sub business entity:
    - A row which defines the sub-BE should contain only the name, parent and type fields
    - Hosts and databases should be added in separate rows
7. Hosts, BEs, Sites can be imported separately. If the same host appears in several rows, you should make sure its data is consistent.
8. Each row in this table/view represents a single association between host/database to business entity:
    - When a host name is provided without database instance name – the host is associated.
    - When both host and database instance names are provided – the database is associated.
    - If a host is assigned to a business entity, all databases installed on this host are considered as members of the business entity, so there is no need to define a row for each one of them.

Below please find some example for rows as described above, The first column denotes a task to be performed, other columns present the data required to accomplish this task

	BUSINESS_ ENTITY_ NAME	PARENT_ BUSINESS_ ENTITY_ NAME	BUSINESS_ ENTITY_ TYPE	HOST_ NAME	HOST_ OPERATING_ SYSTEM	HOST_ POLICY
To add only host				server1	Windows	ECC default policy
To add only site						
To associate a host and a site				server1		
To add business entity only	BE name		Application			
To add sub business entity	Sub BE name	BE name	Business Service			
To add host to business entity	BE name		Application	Server2	Windows	ECC default policy
To add	BE name		Application	Server2	Windows	ECC default

database to business entity	policy

The below table represents additional data required for each task:

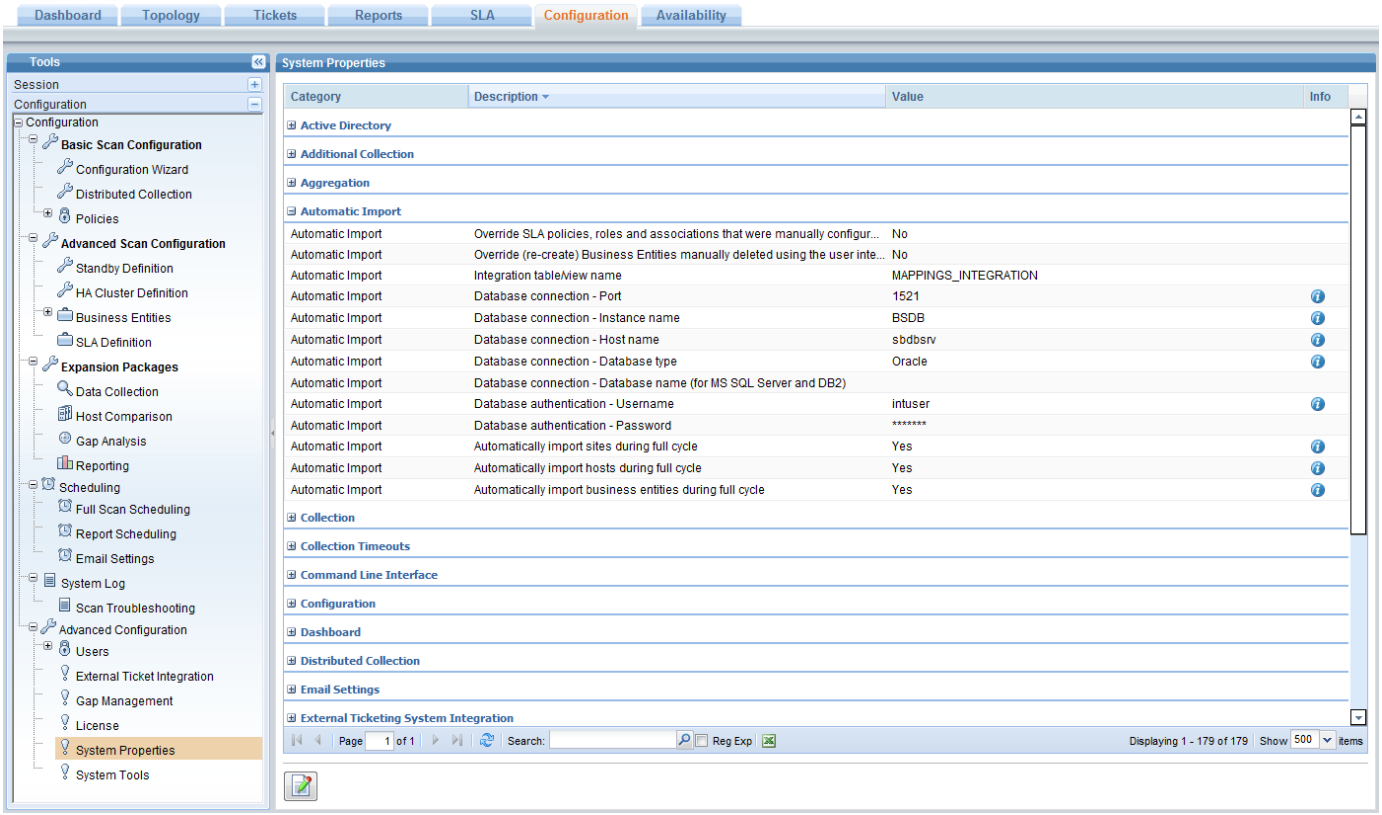
	HOST_ GROUP	HOST_ IP	DATABASE_ INSTANCE_ NAME	BUSINESS_ ENTITY_ ROLE	SLA_ POLICY_ NAME	SITE_ NAME
To add only host	Default	192.168.2.45				
To add only site						Site name
To associate a host and a site						Site name
To add business entity only						
To add sub business entity						
To add host to business entity	Default	192.168.2.45		Production	Tier 0 PRD	Site name
To add database to business entity	Default	192.168.2.45	Database name	Production	Tier 0 PRD	Site name

Appendix A: CREATE TABLE statement sample for Oracle database

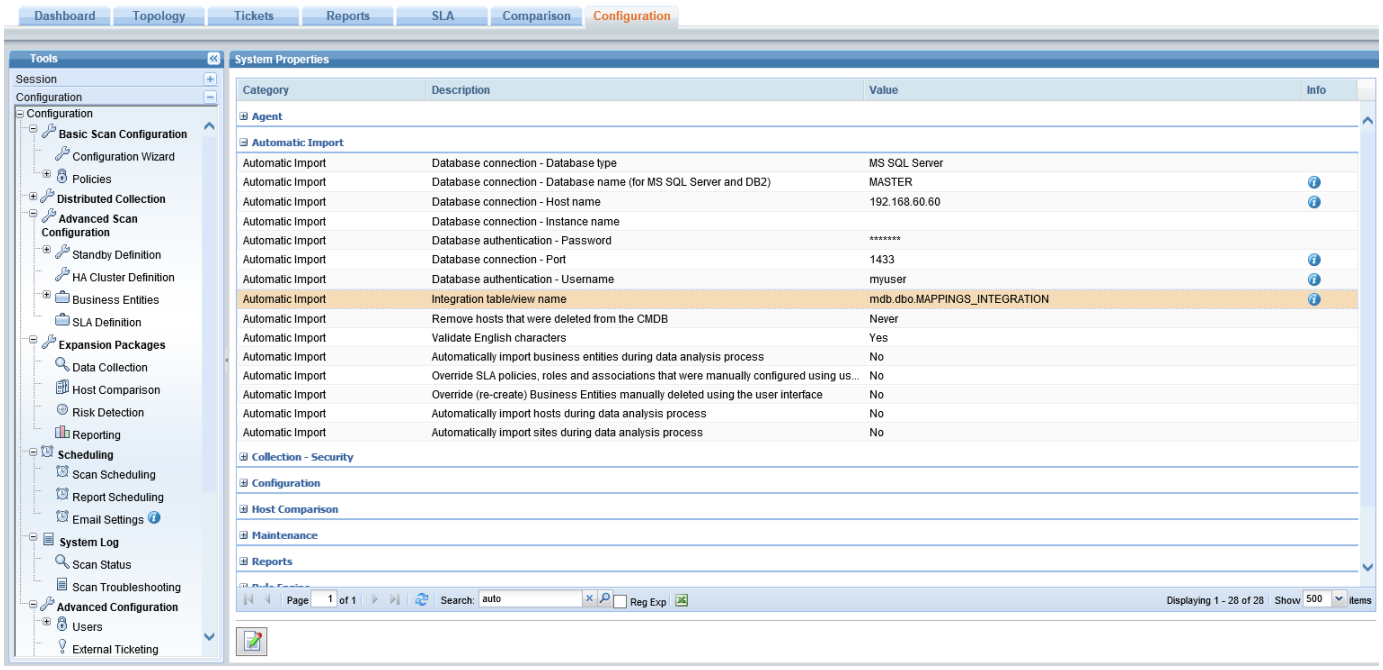
```
CREATE TABLE MAPPINGS_INTEGRATION (
    BUSINESS_ENTITY_NAME          VARCHAR2(4000 BYTE)  DEFAULT '',
    PARENT_BUSINESS_ENTITY_NAME   VARCHAR2(4000 BYTE)  DEFAULT '',
    BUSINESS_ENTITY_TYPE          VARCHAR2(4000 BYTE)  DEFAULT '',
    HOST_NAME                     VARCHAR2(4000 BYTE)  DEFAULT '',
    HOST_OPERATING_SYSTEM         VARCHAR2(4000 BYTE)  DEFAULT '',
    HOST_POLICY                   VARCHAR2(4000 BYTE)  DEFAULT '',
    HOST_GROUP                    VARCHAR2(4000 BYTE)  DEFAULT '',
    HOST_IP                       VARCHAR2(4000 BYTE)  DEFAULT '',
    DATABASE_INSTANCE_NAME        VARCHAR2(4000 BYTE)  DEFAULT '',
    BUSINESS_ENTITY_ROLE          VARCHAR2(4000 BYTE)  DEFAULT '',
    SLA_POLICY_NAME               VARCHAR2(4000 BYTE)  DEFAULT '',
    SITE_NAME                     VARCHAR2(4000 BYTE)  DEFAULT ''
);
```

Appendix B: AvailabilityGuard configuration sample

Oracle:



MS SQL:


Dashboard
Topology
Tickets
Reports
SLA
Comparison
Configuration
Tools
Session
Configuration
Configuration
Basic Scan Configuration
Configuration Wizard
Policies
Distributed Collection
Advanced Scan Configuration
Standby Definition
HA Cluster Definition
Business Entities
SLA Definition
Expansion Packages
Data Collection
Host Comparison
Risk Detection
Reporting
Scheduling
Scan Scheduling
Report Scheduling
Email Settings
System Log
Scan Status
Scan Troubleshooting
Advanced Configuration
Users
External Ticketing
System Properties
Category
Description
Value
Info
Agent
Automatic Import
Automatic Import Database connection - Database type MS SQL Server
Automatic Import Database connection - Database name (for MS SQL Server and DB2) MASTER
Automatic Import Database connection - Host name 192.168.60.60
Automatic Import Database connection - Instance name
Automatic Import Database authentication - Password *******
Automatic Import Database connection - Port 1433
Automatic Import Database authentication - Username myuser
Automatic Import Integration table/view name mdb.dbo.MAPPINGS_INTEGRATION
Automatic Import Remove hosts that were deleted from the CMDB Never
Automatic Import Validate English characters Yes
Automatic Import Automatically import business entities during data analysis process No
Automatic Import Override SLA policies, roles and associations that were manually configured using us... No
Automatic Import Override (re-create) Business Entities manually deleted using the user interface No
Automatic Import Automatically import hosts during data analysis process No
Automatic Import Automatically import sites during data analysis process No
Collection - Security
Configuration
Host Comparison
Maintenance
Reports
Page 1 of 1
Search: auto
Reg Exp
Displaying 1 - 28 of 28
Show 500 items