Foglight Skills 101 Episode 3

#### My First 80 hours as a Foglight Admin

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**Software Sales Engineer** 

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#### You have just received the Foglight admin password. It's time to take the next steps...





- Discover essential support and community resources to enhance your experience.
- Conduct *version checks* to ensure optimal support coverage.
- Understand the upgrade requirements and steps for seamless operation.
- Learn how to validate your deployment and perform a thorough security audit.
- Review alarm settings, explore templates, and set up notification channels to stay informed.
- Get insights into *report setup* and *access to dashboards*

### Support and Community Resources



quest<sup>2</sup>com | confidential

#### **Support and Community resources**

#### https://support.quest.com/foglight

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── Support Portal	፵́ My Downloa	ads (0)
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Knowledge Base My Account Notifications & Alerts Product Support	Filter by Version or Model (Choose different product)   Filter to browse recommended product support content   7.1.0 (Latest Product Model/Version)    Notifications & Alerts View All Notifications    View All Notifications    Notifications & Alerts View All Notifications    View All Notifications	2
Software Downloads Technical Documentatio User Forums Video Tutorials	Most Popular Getting Started Benstall & Upgrade Maintain & Configure Troubleshooting Product Life Cycle & Policies	
RSS Feed Services Consulting Services	Foglight - Upgrading the Foglight Agent Manager         How to upgrade the Foglight Agent Manager https://support.quest.com/kb/4         Upgrading the Foglight Agent Manager (FgIAM)         For the foglight Agent Manager https://support.quest.com/kb/4         Upgrading the Foglight Agent Manager https://support.quest.com/kb/4         How to change Foglight Agent Manager (FgIAM)         How to change Foglight Management Server port after installation?         Security scan detects that autocompletion is allowed on password fi	

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#### **Support Account**

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• My Account – verify correct contact details, licenses, products, etc.

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Support Portal		Add To Favorites 🛛 🛒 My Downloads (0)
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Knowledge Base My Account Notifications & Alerts Product Support	Filter by Version or Model (Choose different product)         Filter to browse recommended product support content         5.9.5 (Latest Product Model/Version)	Notifications & Alerts View All Notifications Quest Support Product Advanced Notification - Foglight Security Advisory more
Software Downloads Technical Documentation User Forums	★ Most Popular le Getting Started le Install & Upgrade 👯 Main	ntain & Configure <b>?</b> Troubleshooting <b>A</b> Product Life Cycle & Policies
Video Tutorials What's New Services ^	Video Tutorials Foglight for Databases- How to migrate Migrating SQL Server and Oracle agents from Info	Knowledge Articles SQL Server Based PI Repository Migration Tool User Guide Installing and configuring a SQL Server based PI repository How to migrate SQL Server and Oracle database agents fr

#### **Support Notifications**

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• Notifications & Alerts – security alerts, new releases, etc.

📃 Support Portal		<i></i> ∰ M	y Downloads (0)
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Self Service Tools	Foglight - Notifications & Alerts		
Knowledge Base My Account Notifications & Alerts	Filter to locate your Notifications & Alerts (Choose different product)         All <ul> <li>All (Notification Type)</li> <li>All (Date Range)</li> <li> </li></ul>		
Product Support Software Downloads	<b>Critical Alerts</b> Quest Support Critical Product Notification Update - Foglight and the Apache log4j vulnerability	<b>Version</b> 6.0.0	<b>Date</b> 12/17/2021
Technical Documentation User Forums Video Tutorials	Quest Support Critical Product Notification - Foglight and the Apache log4j vulnerability         Quest Support Product Critical Notification - Foglight for Databases 5.9.7.x         Quest Support Product Advanced Notification - Foglight Security Advisory	6.0.0 5.9.7 5.9.5	12/14/2021 1/13/2021 3/18/2020
Contact Support ^	Critical Notification Foglight Management Server (Apache Struts vulnerability) Quest Software critical product notification - Foglight 5.7.5.4 Management Server	5.7.5 5.7.5	3/15/2017 6/3/2016
Search All Notifications	Product Release Quest Support Product Release Notification - Foglight 7.1.5	<b>Version</b> 7.1.0	<b>Date</b> 8/12/2024

#### **Product Life Cycle**

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• Verify current supported versions of Foglight and support end dates

	Knowledge Base									
	My Account		Filter by Versio	on or Model (Choose o	different product)		Notifications & Alerts View All Notifications			
	Notifications & Alerts		Filter to browse red	commended product supp	ort content		Quest Support Product Release Notification - Foglight 7.1.5 more			
	Product Support		7.1.0 (Latest Pro	oduct Model/Version)		~				
	Software Downloads									
	Technical Documentatio	on	★ Most Popular	Getting Started	🔒 Install & Upgrade	해 Maintain & Configure	? Troubleshooting	Product Life Cycle & Policies		
	User Forums									
	Video Tutorials		Product L	ife Cycle						
	RSS Feed		Software							
۰,	Services	^	Version	Full Support as of	f 🚺	Limited Support as o	of 🚺	Support Discontinued 🏮	C <sub>2</sub> -	
	Consulting Services		7.3.0	7-Oct-2024						
	Educational Services		7.1.x	10-Oct-2023						
	Support Services		6.3.0.x	13-Apr-2023						
			6.1.0.x	7-Apr-2022		10-Oct-2023		10-Oct-2024		
ප	My Account	^	6.0.0.x	28-Jul-2021		13-Apr-2023		13-Apr-2024		
	My Groups		5.9.7.x	30-Sep-2020		13-Apr-2023		13-Apr-2024		
	My License Assets		5.9.5.x	13-Jan-2020		28-Jul-2021		28-Jul-2022		
	My Products		Earlier product	versions not listed a	re considered discor	ntinued.				

#### **Quest Community**



Blogs: https://www.quest.com/community/blogs/b/performance-monitoring

Forum: https://www.quest.com/community/foglight



#### Demo





• Skills 101 has moved to a new location:

https://www.quest.com/data-management-skills-training/

• Webcasts have been archived since April 2017 and are organized by category:

https://www.quest.com/community/blogs/b/performance-monitoring/posts/foglightskills-101-webcast-series

#### **Get to Know Your Account Manager**

# 01

Your account manager is there to help you 02

Can provide details on the history of Quest in your organization 03

Can get project reports from PSO on customizations, recent work, any remaining hours, etc.

# 04

Can setup sessions on product "tips & tricks", etc.

Quesť

## **Versions and Upgrades**



#### Version check and upgrade planning

- 1. Verify the versions of the Foglight Management Server (FMS) (this is generally what is referenced on the product life cycle page, eg. 7.1.5)
- 2. Verify the cartridge versions for databases, etc. (these can be updated independently from the FMS and are generally performed to enable new functionality)

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#### **Verify FMS Version**





#### **FMS Configuration and Version**

Foglight <sup>- byQuest</sup>	PreSales Demo Environment	arch	٩		⊗ ≡
	Administration > Management Server Configura	ation		Monday, Oct 7, 2024 01:40:57 PM - Now 1 hour 🔻 🧑	Reports 🔻
Search <b>Q</b>	Mode	Standalone 0	Status Peers	-	• • • • • • • • • • • • • • • • • • •
Audit Log 👘 🅯	Server	_			
Query Insights 🛛 🛢	Version Build	7.1.5 <b>2</b> 7.1.5-202407090824-609b5882-39			
> 📣 Active Directory	Foglight Home Debug Level ETPS Mode	C:\Quest\Foglight Debug logging disabled  false			
🗸 🗙 Administration	Trust Store	C:\Quest\Foglight\jre\lib\security\cacerts			
> Agents	Federation	n/a			
> Cartridges	Max Alarm Update Delay (millis) Max System Time Difference (millis)	50000 60000			
Credentials	Topology Queries Topology Refresh Period (millis)	!TopologyObject 300000			
> Data	Database				
	Database Name Embedded	foglight 3 false			
<ul> <li>Integration</li> </ul>	Hibernate Dialect Host	com.quest.nitro.hibernate.SQLServerUnicodeDialect SQL1			
> Management Server	Port Secure Connection	false			
Rest API	Type User	Microsoft SQL Server 15.00.4382 foglight			
> Rules & Notifications	JVM				
> Schedules	Name Version Vendor	OpenJDK 64-Bit Server VM 4 17.0.11 (17.0.11+9-LTS) Azul Systems, Inc.			
> Setup Configuration 🗸 -	Architecture (bit) Options 5	64-bit -Xms9216m -Xmx9216m -Dquest.saml.hostname=presales.demo.fo	glight.com -Dfoglight.data_service.max_past	_timestamp_delta=10800000 -Dfoglight.alarm.notification.use.wcf.url=1	true 🔬 🗸

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#### **OS, Mail and Ports**



Hoglight byQuest	PreSales Demo Environment	Search	Q	⊗ ≡
	Administration > Management Se	rver Configuration	Monday, Oct 7, 2024 (	01:40:57 PM - Now 1 hour 🔻 👩   💷 Reports 🔻
Search Q	Name Version	OpenJDK 64-Bit Server VM 17.0.11 (17.0.11+9-LTS)		
Audit Log	Architecture (bit) Options	Azul Systems, Inc. 64-bit -Xms9216m -Xmx9216m -Dquest.saml.hostname=	presales.demo.foglight.com -Dfoglight.data_service.max_past_timestamp_delta=1080000	00 -Dfoglight.alarm.notification.use.wcf.url=true 🔏
Query Insights	os			
>  Active Directory	Type Patch	Windows Server 2022 amd64 10.0, x86_64		
Administration	WCF			
> Agents	Version Build	3.9.4.0 DeveloperBuild		
> Cartridges	Mail (Global Settings) Connection Timeout	Not Globally Configured		
	From SMTP Host	noreply@quest.com abc.com		
> Data	Recipient Socket Timeout	Not Globally Configured Not Globally Configured		
Management Server	User Use STARTTLS	apikey true		
Rest API	Ports	Not Globally Configured		ß
> Rules & Notifications	Cluster Mcast HTTP HTTPS SSI	45566 8080 8443		
> Schedules	Server Federation Port	1099		

#### **Verify Cartridge Versions**



Foglight byQuest	PreSales Demo Environment	Search	⊗ ≡
	♠ Cartridge Inventory		Monday, Oct 7, 2024 02:45:26 PM UTC 🔰 通 Reports 🔻
Search Q	📷 Cartridge Inventory		
Audit Log 🔋 ˆ	The Cartridge Inventory dashboard contains contr Installed Cartridges Core Cartridges	ols for installing, enabling, disabling, and uninstalling cartridges, as well as for viewing information about the installed cartridges.	
Query Insights	Install Cartridge 🛛 Uninstall 🔀 Enable 🔀 Disa	ble 🐷 Reset	Search Q 📮
	Status	Cartridge Name 🔺	Version
🔉 📣 Active Directory	DB_Global_View_UI		7.1.0.10
·	DB_Global_View_UI		7.2.3.10
🗸 🏏 Administration	DB_MySQL_PI		7.2.3.12
$\sim$	DB_MySQL_PI_UI		7.2.3.12
> Agents	DB_Oracle		7.2.3.12
, Agenes	DB_Oracle_UI		7.2.3.12
V Cartridges	DB_SQL_Server		7.2.3.12
	DB_SQL_Server_UI		7.2.3.12
Cartridge Inventory	DB_Sybase		7.1.0.10
Cartridge inventory	DB_Sybase		6.1.0.11
Components for Do	DB_Sybase		6.3.0.10
components for Do	Dependency-Administration		5.9.9
Cuedentiele	Dependency-Extension		5.9.9
Credentials	Dependency-Mapping		5.9.9
b. Dete	Dependency-Mapping-Help		5.9.9
	Dependency-Operation		5.9.9
	Docker-Swarm-Agent		7.1.0
Integration			7.1.0

#### **Upgrade Planning**



Determine what needs to be upgraded (FMS, Agent Manager, cartridges) and the urgency (see product lifecycle tab on support)

• There may be dependencies that a cartridge needs, etc.

Backup all relevant components including FMS and PI databases

Run through the upgrade in your test / green environment

Generally: run the "all-in-one" installer if it's a full upgrade of all components

• Use Agent Managers dashboard to upgrade the agent managers and some agents

• Use Databases dashboard for SQL Server, Oracle, DB2

### **Deployment Validation**



#### **Deployment validation**



Review	Validate	Check
Review deployment guide for compute resource requirements	Validate against your current implementation	Check Agent Managers dashboard for number of agent managers, agent count per manager, any alarms or disconnected agent managers

#### **Deployment Guide**



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Become a portal pro i Self Service Tools ^	Support > Technical Documentation > Foglight for Databases Foglight for Databases - Technical Documentation	
Knowledge Base My Account Notifications & Alerts	Filter to locate your release notes, guides or manuals (Choose different product)         7.1.0 (Latest Product Model/Version) <ul> <li>Deployment Guide</li> <li>Or Filter by Module</li> <li>Image: Choose different product</li> </ul>	
Product Support Software Downloads	Browse below by document title to locate, download or read online relevant product information Deployment Guide	
Technical Documentation User Forums	Foglight for Databases Shared 7.1.0 Deployment Guide 🚯 view p	odf
Video Tutorials RSS Feed		

#### **Agent Managers Dashboard**



Foglight byQuest	PreSales Demo	o Environment		Search											8	
	🔒 Agent Ma	anagers										Mon	iday, Oct 7,	2024 02:53:0	1 PM UTC 🕴 💷	Reports 🔻
Search Q	📄 Age	ent Manage	rs													
	Use the	Agent Managers dashboa	ard to manage agent	packages	and create agents on Agent Managers.											
> ☐ Bookmarks (13)							🛃 Do	wnload	l Agent Ma	nager Soft	ware	🛓 Agent Ad	apters	Bisconn	ected Agent Ma	nagers (1)
> 📣 Active Directory	💼 Create Ag	ent 📑 Deploy Agent Pa	ckage 📑 Undeploy	Agent Pack	kage 📑 Upgrade 🛛 🧖 Restart 🛛 🔊 Edit Ta	gs								Searc	h	≔
🗸 🗙 Administration	Alarms State	Host Name 🔺	IP Address	Version	OS Name	OS Architecture	Upgra	adable Agent	Latest Log File	Support Bundle	Agents Count	Agents Agents Summary	Agent Status	Debug Level	Last Data Submission	JVM Config
		ec2amaz-m4dejf7	172.31.40.161	7.1.5	Microsoft Windows Server 2022 Datacenter	x86_64	No	No	-	<b>1</b>	16	Σ	Ð	2	2024-10-07 14:52:59	
✓ Agents		fglam.imdemo.local	10.2.0.10	7.1.5	Microsoft Windows Server 2022 Datacenter	x86_64	No	Yes			75	Σ	9	<i>.</i>	2024-10-07 14:52:53	
Agent Adapters Agent Managers		ukrglamqstt	10.240.88.5	7.1.5	Microsoft Windows Server 2016 Datacenter	X86_64	NO	No			1	Σ	9		2024-10-07 14:52:05	
Agent Properties		\$														
Agent Status	Tasks															

#### **Consider Additional Deployments**

There is no license cost for FMS when used for Database-only monitoring

Good practice to have a "nonproduction" install in order to validate upgrades, etc.

Consider installing a small, "vanilla" FMS (sandbox) Use it to check what is "out of the box" vs. customized

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I have one installed on a laptop with 2 cpu and 4 GB RAM.. And it works fine!

# **Security / Audit**



#### Security

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#### Security

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Foglight <sup>- byQuest</sup>	PreSales Demo Environment	Search	(	م		⊗ ≣
	Users & Security Management > User Ma	nagement		Monday, Oct 7, 2024 02:00:3	34 PM - Now 1 hour 🔻 🧑	Reports 🔻
Search Q	🤹 User Management					
> Tooling	Select the corresponding tab to manage users, g Users Groups Roles	roups, or roles. You can create users intern	aally or import them using LDAP. You can place a user in one or n	nore groups. Assign roles to a user using the Group	os tab.	
Users & Security	🔁 New Group LDAP groups 🤤 Remove Group	🖉 User Preferences			Search	् ।;
	Name 🔺		Roles		Users	Туре
> 🕑 Alarm Management	Cartridge Developers	Cons	sole User, Cartridge Developer	Contains 25 users	Buil	t-In 🔺
	DBA_LockDown	• A	Assign roles	database dar	rren 🗙 🕶	
› ⊡ AWS Hosts	Foglight Administrators	Take	e on 30 roles	Contains 1	User Names	
	Foglight Operators	Take	e on 7 roles	Contains 1 darren		
> ⊡ BMC Remedy	Foglight Security Administrators	Com	nmand Line Access, Security	Contains 9 🔽 Darren	n.Mallette@quest.com	
	Foglight Users	Take	e on 32 roles	Contains 8		
› ⊡ Capacity Director	SQL_App_DBA	App.	_DBA_Role	Contains 6		
유 Cloud Manager						
ළු Cloud Migration						
দ্ধি Consolidation Advisor						
Container						
> 🔁 Databases						

#### Audit





Use Audit dashboard for time period to show internal Foglight events/changes along with user interactions



Data is stored in a user readable format.. Query the auditing\_log table in the FMS repository DB

#### Audit

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Foglight <sup>- byQuest</sup>	PreSales Demo Environment	Search		Q		⊗ ≡
	Audit Log					$\square$
Search <b>Q</b>	06.10.2024 11:02 AM - 07.10.2024 11:0	I2 AM i Apply				foglight 🛛 🔊
Credentials	DateTime↓	Name	User Name	Service	Action	Data
> Data	> October 7, 2024 9:56:18 AM	Jobs Failed. The SQL Server Job LiteSpeed	service	AlarmService	clearAlarm	
Integration     Management Server	> October 7, 2024 9:41:25 AM	Jobs Failed. The SQL Server Job LiteSpeed	service	AlarmService	clearAlarm	
Rest API	> October 7, 2024 9:32:30 AM	Login OK from 20.228.174.10	foglight	SecurityService	authenticate	User foglight successfully logged in from
<ul> <li>Rules &amp; Notifications</li> </ul>	> October 7, 2024 9:26:25 AM	Jobs Failed. The SQL Server Job LiteSpeed	service	AlarmService	clearAlarm	
> Schedules	> October 7, 2024 9:24:09 AM	Login OK from 20.228.174.10	foglight	SecurityService	authenticate	User foglight successfully logged in from
∽ Setup	> October 7, 2024 9:24:06 AM	Login OK from 20.228.174.10	foglight	SecurityService	authenticate	User foglight successfully logged in from
Audit Log	> October 7, 2024 9:24:02 AM	Login OK from 20.228.174.10	foglight	SecurityService	authenticate	User foglight successfully logged in from
Blackouts	> October 7, 2024 9:24:02 AM	Login OK from 20.228.174.10	foglight	SecurityService	authenticate	User foglight successfully logged in from
Connection Status	> October 7, 2024 9:24:02 AM	Login OK from 20.228.174.10	foglight	SecurityService	authenticate	User foglight successfully logged in from
Email Configuration	> October 7, 2024 9:24:01 AM	foglight	foglight	RestResourceAccess	Access REST resource through p	a

#### **Audit**

	V****** Script for Selectl	opNRows command from SSMS ******/							
	SELECT TOP (1000) [id]								
	,[name]								
	,[service]								
	,[method]								
	,[entity_id]								
	,[user_name]								
	,[time]								
	,[data]								
	,[old_version]								
	,[new_version]						-	-	
	,[service_id]						]		
	FROM [foglight].[dbo].[a	uditing log]					-	_	
100	% 🔹 🔍								
	Results 🗊 Messages								
	id	name	service	method	entity_id	user_name	time	data	old_ve
1	8a8280898a91a2ea018b0d5f9b411e0a	Jobs Failed. The SQL Server Job Deadlock_Noise2	AlarmService	clearAlarm	27ceb59b-24c7-4626-9a78-3977ddeb21dd	service	2023-10-08 03:40:51.393	NULL	NULL
2	8a8280898a91a2ea018b0d5f9b9f1e0c	Jobs Failed. The SQL Server Job Deadlock_Noise3	AlarmService	clearAlarm	7537caff-ceb4-475b-a23e-0f7db43b044d	service	2023-10-08 03:40:51.487	NULL	NULL
3	8a8280898a91a2ea018b0d635b251e0e	Jobs Failed. The SQL Server Job SSIS - Currency Ma	AlarmService	clearAlarm	b17aa807-0220-4516-ba7f-0e0dbd145a33	service	2023-10-08 03:44:57.127	NULL	NULL
4	8a8280898a91a2ea018b0d635b731e10	Jobs Failed. The SQL Server Job Generate Deadlock	AlarmService	clearAlarm	c1405841-946b-4ac0-a51c-da02b117aff2	service	2023-10-08 03:44:57.203	NULL	NULL
5	8a8280898a91a2ea018b0d6d67e41e12	Jobs Failed. The SQL Server Job Deadlock_Noise2	AlarmService	clearAlarm	bc84f9f4-e831-4760-8f7a-c869d77e2ce5	service	2023-10-08 03:55:55.747	NULL	
6	8a8280898a91a2ea018b0d6d68511e14								NULL
-	000200000001020001000000011014	Jobs Failed. The SQL Server Job Deadlock_Noise3	AlarmService	clearAlarm	3b6a69ad-eb71-4d43-8305-57de2f4755e9	service	2023-10-08 03:55:55.857	NULL	NULL
/	8a8280898a91a2ea018b0d7120a61e16	Jobs Failed. The SQL Server Job Deadlock_Noise3 Jobs Failed. The SQL Server Job SSIS - Currency Ma	AlarmService AlarmService	clearAlarm clearAlarm	3b6a69ad-eb71-4d43-8305-57de2f4755e9 46e77d36-c4ef-4c57-83a9-9dd98bdfa746	service service	2023-10-08 03:55:55.857 2023-10-08 03:59:59.653	NULL	NULL NULL
8	8a8280898a91a2ea018b0d7120a61e16 8a8280898a91a2ea018b0d77edc91e1a	Jobs Failed. The SQL Server Job Deadlock_Noise3 Jobs Failed. The SQL Server Job SSIS - Currency Ma >> Failure: Cannot establish connection to SQLAG2:	AlarmService AlarmService AlarmService	clearAlarm clearAlarm clearAlarm	3b6a69ad-eb71-4d43-8305-57de2f4755e9 46e77d36-c4ef-4c57-83a9-9dd98bdfa746 27de0819-7a7b-46d6-bb53-d5673b94ed8a	service service service	2023-10-08 03:55:55.857 2023-10-08 03:59:59.653 2023-10-08 04:07:25.387	NULL NULL	NULL NULL NULL
7 8 9	8a8280898a91a2ea018b0d7120a61e16 8a8280898a91a2ea018b0d77edc91e1a 8a8280898a91a2ea018b0d77edc91e1a	Jobs Failed. The SQL Server Job Deadlock_Noise3 Jobs Failed. The SQL Server Job SSIS - Currency Ma >> Failure: Cannot establish connection to SQLAG2: >> Failure: Cannot establish connection to SQLAG1:	AlarmService AlarmService AlarmService AlarmService	clearAlarm clearAlarm clearAlarm clearAlarm	3b6a69ad-eb71-4d43-8305-57de2f4755e9 46e77d36-c4ef-4c57-83a9-9dd98bdfa746 27de0819-7a7b-46d6-bb53-d5673b94ed8a 43a08cfb-b55b-48e2-b500-a3a04fae6caf	service service service service	2023-10-08 03:55:55.857 2023-10-08 03:59:59.653 2023-10-08 04:07:25.387 2023-10-08 04:09:15.203	NULL NULL NULL	NULL NULL NULL NULL
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#### Quest

data old\_version

#### **Databases – User Level Access**

1. Check if User Level Access is being used on the Databases dashboard

2. If so, verify that users/groups are mapped correctly and still valid



Quest

#### Demo



#### Alarm Analysis and Review



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- The Alarm Analysis tab of the Alarms dashboard is very useful
  - What alarms have fired? How many times over the time interval?
  - What are the most frequent alarms?
  - What severities are firing the most?



#### **Alarm Analysis**

Quest

$\odot$	Foglight <sup>: byQuest</sup>	PreSales Demo Environment	Search						٩			⊗ ≡	
		♠ Alarms									Sep 30, 2024 - Now 7 days	▼ 👩 💷 Reports ▼	
		Alarms This dashboard shows the information of system ala	rms and changes, and fa	cilitates the investigat	ion of top	issues in you	environmen	t.					
> X	Administration	Alarms by Time Heatmap Alarm Ana	Ilysis Foglight T	oday Fogligh	t Now	Blackout	S						
		Alarms by Source								Counts by S	Severity		
~ Q	Alarm Management					Se	arch		٩ ::	<b></b> ₹			
	Alarms	Alarm Source		Alarm Count 🔻	Se <sup>r</sup> F	verities C W	A	larm Duratio Max	on Avg				
	Ale	DBSS - Jobs Failed	2,463	96.0	2463	4.9 min	3.1 d	1.5 hr		Fatal			
	Alarm Templates			768	000	768	2.9 min	8.0 min					
	Notification Managem	Memory Shortage Windows		758	30	01 627	48 sec	3.2 d	47 min		Warning		
	Notification Managem	Catalyst Database Latency Check		628	123	25 280	5.0 min	25 min	5.8 min				
<b>&gt;</b> 100	AWS Hosts	DBSS - Connection Time		587		89 198	4.8 min	3.2 d	1.1 hr				
_		DBO - Collection Status		441		441	1.0 min	1.0 hr	7.3 min				
> ⊡	BMC Remedy	Page In Rate		438	309	55 74	52 sec	6.2 hr	13 min	Sev Name	Count 🗮		
		Redshift CPU Utilization		387	4	.70 213	4.8 min	6.4 hr	25 min	🗼 Warning	7,464		
> ⊡	Capacity Director	DBSS - Replication Available		316		16	4.9 min	3.9 hr	32 min	Critical	3,014		
		Run Queue Length		292		292	45 sec	4.0 hr	22 min	E Fatal	1,887		
<u>ک</u>	Cloud Manager	DB2 - Database Response Time		286		286	4.8 min	21 min	6.4 min	March and Course	<b>T</b>		
		DBSS - Buffer Pages Free		235		.15 120	4.8 min	3.1 d	43 min	50000 App	aluated Alarms		
පි	Cloud Migration	Azure Virtual Machine Diagnostics Settings		222		222	10 min	3.2 d	1.6 d				
		DB2 - Database Overall Cache Hit Ratio		212		87 125	15 min	45 min	16 min				
G	Consolidation Advisor	DB2 - Member Overall Cache Hit Ratio		212		87 125	15 min	45 min	16 min				

#### **Alarm Management**



- Disable alarms that you're not going to respond to
  - No need for excess noise
- Turn down alarms that may be too noisy
  - Disable severity, adjust thresholds, add exclusions or scoping query
- Be mindful of the number of historical alarms in the alarms table
  - This can be a major impact on UI performance!
- Install the Alarm Automation Pack
  - <u>https://www.quest.com/community/blogs/b/performance-</u> monitoring/posts/new---foglight-alarm-automation---community-edition

#### **Alarm Automation Pack**



Split out the 2 rules for alarm management from the DB Expansion Pack



Clear alarms after 3 days

#### Delete alarms after 30 days

Can configure those via registry variables

#### **Alarm Automation Pack**



$\odot$	Foglight <sup>* byQuest</sup>	PreSales Demo Environment	Search									8	
		1 Rules						Monday, Oct 7, 20	024 02:21:55 PN	l - Now 1 hour	▼ 🔞	Repor	ts 🔻
	h Q	🚱 Rules											
>	Data	View, Manage and Investigate all the rules that ex default and can be shown or hidden again with the Cartridge DB_Expansion_Pack_Alarms	rist in your environment. Note that there is a link that allows access to the earlier e settings icon at the top right of the table.	incarnatio	ion of this vie	ew for cert	tain deprec	ated operations. Addit	tional table columr	ns that are useful	for investigatio	on are hidden	by
>	Integration	🕛 Enable 🕕 Disable 🤤 Delete								Search	1	(	२ ह
>	Management Server		Rule 🔺	0	۵ 🚯	Other	Alarms	<b>4</b>	<b>1</b>		Description		
		() DBEXP_AlarmClearArterDays				30	0	<b>N</b>		n/a n/a			-Ē.
	Rest API						1	•	~~				
~	Rules & Notifications												
	Check Registry Value												
	Create Rule												
	Manage Registry Va												
	Rules												







There are self-monitoring rules as part of the Core package



Monitor various conditions with the Foglight server, performance, licenses, agents, etc.



Bigger topic around automation and self-monitoring

#### **Core Alarms**



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	Cartridge: Core-Mor	nitoringPolicy 🔹									
> Integration	() Enable () Dis	isable 🦲 Delete								Search	Q 15
		Rule 🔺	8		Â	Other	Alarms	-	<b>1</b>	Description	
> Management Server	C U Agent I	Health State	· · · · · · · · · · · · · · · · · · ·	unset	unset	o unor	0	4	6	This rule checks that all agents are in a good health state	
	C () Agents	s and Other Foglight Admin Issues					0	1	-	Weekly email on broken agents and other Foglight admin issues.	
Rest API	Catalys	rst Agent Type License Checker			>		0	1	1	Rule to check whether the cpu count of an agent type has exceeded the licensed a	
	Catalys	st Available Database Connections Che	ck 🔊	>	>	unset	0	1	-	No database connections available for use by the server.	
<ul> <li>Rules &amp; Notifications</li> </ul>	Catalys	vst Credential Check				5	0	1	1		
	Catalys	st Database Latency Check	50.0	20.0	10.0		3	1	1	High latency between Catalyst database and Catalyst server.	
Check Registry Value	Catalys	vst Database Maintenance Check		>	>		0	1	1	Checks that the nightly database maintenance activities are completing within th	
	Catalys	vst Database Query Execution Time Che	ck		1.0E8	unset	0	1	1	Throws a WARNING alert when a sample query against the Catalyst database is taki	
Create Rule	Catalys	vst Database Space Checking	98	90	75		0	1	1	Rule to check whether catalyst database will be running out of space.	
	Catalys	st Data Service Discarding Data			>		0	1	1	Rule to check whether any data is being discarded by the Data Service.	
Manage Registry Va	Catalys	st Free Database Space Checking	200	500	200		0	1	1	Rule to check whether the Oracle tablespaces or SQL Server database still have/h	
	Catalys	vst Garbage Collector Check	90	30	10		0	1	1		
Rules	Catalys	st License Monitoring	2	7	30		0	1	1		
	Catalys	st Memory Usage Check		unset			0	1	1	Rule to check whether the memory available to the management server is criticall	
> Schedules	Catalys	rst Number of Alarms Check			100		1	1	1	Checks whether the total number of alarms stored in the database exceeds a prede	
	Catalys	st Number of Topology History Versions	s Check		5000		0	1	1	Check if the number of topology history versions is bigger than threshold.	
✓ Setup	Clear C	Old LogFilter Alarms					0	1	1		
	Oreate	e SupportBundle Rule					0	×	×	This rule is to create support bundle periodically based on CreateSupportBundleS	
Audit Log	🗌 🕛 Discon	nnected Agent Manager Clients			unset		1	1	1	This rule checks whether all Agent Manager Clients (e.g. FgIAM) on a particular	
	🗌 🕛 FMS H	ITTPS Certificate Expiration Checking			30		0	1	1		
Blackouts	🗌 🕕 Idle Ag	gents					0	×	×	This rule checks periodically whether there are idle agents. An agent is conside	
	🗌 🕛 NoLogi	jinUser Check					0	1	1	Check if there is a user named NoLoginUser.	
Connection Status	Phone	home Service Connection Check	5	2			0	1	-	This rule detects a lost connection between Foglight and the mandatory on-line p	

5

#### **Notification Channels**



Foglight by Quest PreSales Demo Environmen	Search		٩	)	
□ 2 × × Search Q > □ Bookmarks (13)	Notification Channel Contacts	nent		Critical Alerts - Production  Email Channel description	×
> 🕼 Active Directory	+ Add notification channel 🌼 Manage gl	obal mail server settings Alarm Template	Date c	Define recipients and email details for <b>Critical Alerts - Product</b>	on
> 🗙 Administration	Demo Amit	2	28 AL	Subject (i) Foglight has generated a \${severity} alarm for \${targetName} :	
✓ ① Alarm Management	Critical Alerts - Production	4	7 Sep	\${ruleName}	
Alarms	N			Body prefix ① Type introductory text here	
Alarm Templates	N N				
> ⊡ AWS Hosts					
> ⊡ BMC Remedy					
> [편 Capacity Director					
유 Cloud Manager					
S Cloud Migration					
Consolidation Advisor				Cancel	ave

# **Report Setup**



- Get input from user community on the reports that they would like to have
- Verify the reports that are scheduled are valid and being used
- Verify the schedules for reports
  - Tracked down a severe performance issue to having multiple reports set on the "every 5 minutes" schedule!
- Cleanup the saved reports

#### Manage Reports



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	Storage Sample report	Disk Space Usage Report		Business hours	5	true		l.	*		
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#### **Clean up Generated Reports**



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#### **Dashboard Access**



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#### **Dashboard Access**



#### Verify what custom dashboards are out there

My Dashboards for current logged in user
Configuration -> Definitions for other users' dashboards

Start a list of additional audiences for Foglight data – beyond the Database team

• Developers, Operations, Management, Application Owners, etc.

#### **Dashboard Access**



💮 Foglight <sup>:</sup> <sup>byQuest</sup>	PreSales Demo Enviror	nment	Search			<u>्</u>	्  	<u> </u>	<u>्</u>	<u> </u>	<u> </u>	< ⊗ ≡	  ⊗ ≡	  	<u> </u>
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# If you still have time...



**A** confidential



## Thank You



Looking Forward to Seeing You There Register Today! Foglight 101 Series: Episode 4 Mastering SQL Server Performance Janis Griffin

Dec. 18<sup>th</sup> 2024

