CTech[™] ViPER[™] ANLYTX Software SQL Server Backup Procedure

Abstract:	This document provides detailed information on how to back up and restore the SQL Server database in relation to the CTech [™] ViPER [™] ANLYTX Software.
Applicability:	This article applies to the ViPER backup program and the SQL server database that contains all data related to the ViPER software.
Symptom:	N/A
Cause:	In the instance of a disaster recovery event, the SQL server database must be backed up and restored. It is the responsibility of the customer to implement a database backup procedure.

How to Back Up the SQL Server Database:

- 1. Start the ViPERDbBackup.exe application as an administrator.
 - a. If the following prompt appears, click No, download .NET Core 3.1 Desktop Runtime (v3.1.24) Windows x64 Installer (<u>https://dotnet.microsoft.com/en-us/download/dotnet/thank-you/runtime-desktop-3.1.24-windows-x64-installer</u>), and rerun the ViPERDbBackup.exe.



- 2. Once the application launches, click Verify.
 - a. It will attempt to retrieve the current ViPER connection settings where the user is allowed to change the settings if needed.

ViPER Database Bac	kup Setup			_		\times
Verify ViPER Connect	ion					
Server localhost	Database Name VPTData	Database Username ViPERUser	Database Password		Verify	

b. If incorrect information is provided, the following prompt will appear. The user can continue with the creation if they want to set up the backup prior to the installation of ViPER.

🔹 ViPER Database Backu	ıp Setup	_		×
Verify ViPER Connectio	n			
Server localhost	Database Name Database Username Database Password VPTData WRONGUSER ********		Verify	
	ERROR			
	Database was NOT detected. Would you still like to continue creating the task?			
	Yes No			

c. If correct information is provided, the following prompt will appear. Click OK to continue.

Success	\times
Database was successfully detected!	
ОК	

3. Once the database connection verifies, the following prompt to enter a backup location will appear. Manually enter a location or click Browse to choose a folder.

ViPER Database Backup	Setup			-		\times
Verify ViPER Connection						
Server localhost	Database Name VPTData	Database Username ViPERUser	Database Password		Verify	
Verify Backup Location						
Backup Location			Browse		Verify	

a. If a user attempts to enter a network drive, the following prompt will appear. SQL will not allow backups to a network drive, only to the local hard drive.

ViPER Database Backup Setup	– 🗆 X
Verify ViPER Connection	
Server Database Name CTISQSVR1 VPTData	Database Username Database Password ViPERUser ******** Verify
Verify Backup Location	ERROR ×
Backup Location G:\DevX	Network Drive Detected. Please choose a location on the PC!
	ОК

- 4. Once a valid location is chosen, the following prompt will appear stating that the application will test if it can create a temporary file. Click Yes to continue, and the temporary file will get automatically deleted after the backup restore is complete.
 - a. If the user clicks No, the application cannot continue.

Path Verification	×
To verify the path, this tool will attempt to create a tempor (viperDbTool.tmp) to the path and will then attempt to del Continue?	ary file ete it.
Yes	No

5. The following prompt will appear once the path gets verified. Click OK to continue.

Success	×
Backup location verified.	
ОК	

- 6. The following prompt will appear to set the frequency of the backup. Choose to repeat either daily, weekly, or monthly, set the start date and time, and click Create.
 - a. Daily: The backup will perform on the time provided. In the example below, it will perform at 10:27 a.m. every day.
 - b. Weekly: If set weekly, the backup will perform at 10:27 a.m. every Friday.
 - c. Monthly: If set monthly, the backup will perform at 10:27 a.m. on the 15th of every month.

Configure Task			
Repeat Every Daily ~	Starting On	Apr 15 2022 10:27	 Create

- 7. Once the task generates, the following prompt will appear asking if the user wants to start the backup. Click Yes to generate the file.
 - a. Clicking No will close the application.

Success	\times
Scheduled tasks was successfully created. Would you like to run now	?
Yes No	
Ļ	
VP TData_FUL L_04152022_1 03435.BAK	

How to Restore the SQL Server Database:

1. Open Microsoft SQL Server Management Studio 18 by searching in the Windows search box, and ensure the following prompt appears. Log in to the server by typing the password and clicking Connect. Use a sysadmin account such as "sa". The default password for "sa" is "Ctech685!".

🖵 Connect to Server		×
	SQL Server	
Server type:	Database Engine	\sim
<u>S</u> erver name:	localhost	\sim
<u>A</u> uthentication:	SQL Server Authentication	\sim
Login:	viperuser	~
Password:		
	Remember password	
	Connect Cancel Help Options >>	

2. Right-click on Databases folder and click Restore Database.

🖃 🐻 localhost (SQL	Server 14.0.1000 - RGEN\PLalo)
Databases	New Database
🕀 📁 Databi	Attach
	Restore Database
🗄 🗑 VPTDa	Restore Files and Filegroups
🕀 📄 VptDa	Deploy Data-tier Application
🕀 📄 VPTDa	Import Data-tier Application
🕀 🖬 VPTDa	
VptDa	Start PowerShell
🕀 🖬 VptDa	Reports +
🕀 📄 VptDa	Refresh
🗉 📕 Security 🖣	
🗉 📁 Server Obje	cts
🗉 📁 Replication	
🗉 📕 PolyBase	
🗉 📁 Manageme	nt
🕀 街 XEvent Prof	ïler

3. The following prompt will appear to restore the database. Select Device and click on the ellipses.

🔯 No backupset selected to be	restored.												
Select a page	D	Script -	😮 Hel	p									
∯ General ∯ Files ∳ Options	لية	Source Qat © Dav Destinatio Databa Restore pl Bagkup t Restore	abase: vice: Dgtabase n se: sto: an ets to res Name	tore :	Туре	Server	Database	Position	First LSN	Last LSN	Checkport L	Ime	v Tre
Connection													
ψΨ localhost [SA]													
View connection properties													
<u>Mew connection properties</u> Progress													

4. The following prompt will appear to select the backup. Ensure that the Backup media type dropdown is set to File. Click Add to locate the backup.

 Select backup devices 					×
Specify the backup media an	d its location for your resto	re operation.			
Backup media type:	File	~			
Backup <u>m</u> edia:					
				Add	
				<u>R</u> emove	
				Con <u>t</u> ents	
	<u>(</u>	K Car	ncel	Help	

5. The following prompt will appear to find the location of the backup. Once it has been found, select the backup file, and click OK.



6. The following prompt will appear to select the backup device. Click OK once the device has been verified.

- Select backup devices					×
Specify the backup media and i	ts location for your restore operation.				
Backup media type:	File	\sim			
Backup media:					
C:\MATTWUZHERE\VPTData	_FULL_05112022_143000.BAK			Add	
				Contents	
	ОК	Cance	1	Help	

7. The following prompt will appear verifying that the backup is complete. Click OK to close the window, and close Microsoft SQL Server Management Studio 18.

O Database:							
Device:	C:\Program File	es\Microsoft S(L Serve	r\MSSQL14.I	MSSQLSERV		L\Backup
Database:	VPTData						
Destination							
Database:	VPTData						~
Restore to:	The last backu	ıp taken (Friday	, Septer	ber 17, 2021	10:46:52 AM)	Timeline
Restore plan							
Dealers and the sectors							
backup sets to restore:							
Restore Name		Component	Type	Server	Database	Position	First LSN
Backup sets to restore: Restore Name	Database Backup	Component Database	Type Full	Server SOFT-L01	Database VPTData	Position 1	First LSN 40000000389001
osocup esta to redore: Restore Name ✓ VPTData-Ful	Database Backup	Component Database	Type Full	Server SOFT-L01	Detabase VPTData	Position 1	First LSN 4000000389001

How to Edit the Scheduled Backup:

1. Open the Task Scheduler by searching in the Windows search box and ensure the following prompt appears.

Task Scheduler		-		\times
File Action View Help				
🗢 🄿 🔲 🔽 🔽				
 Task Scheduler (Local) Task Scheduler Library 	Task Scheduler Summary (Last refreshed: 4/27/2022 8:32:21 AM)			_
	Overview of Task Scheduler • <	her Comp ng Tasks History Int Confi <u>c</u>	puter	•
	Task Name Run Result ⊞ .NET Framework NGEN v4.0.303 ⊞ .NET Framework NGEN v4.0.303 ∐ Adobe Acrobat Update Task (las × ×			

2. Click on the Task Scheduler Library tab and ensure that the backup is captured.

Task Scheduler				
File Action View Help				
🌩 🖄 📰 📝 🗊				
		_		_
Task Scheduler (Local)	Name	Status	Triggers	^
Agent Activation Bunt	④ GoogleUpdateTaskMachineCore	Ready	Multiple triggers defined	
	(B) GoogleUpdateTaskMachineUA	Ready	At 8:49 AM every day - After triggered, repeat every 1 hour for a di	
> 📫 Microsoft	MicrosoftEdgeUpdateTaskMachineCore	Ready	Multiple triggers defined	
Mozilla	MicrosoftEdgeUpdateTaskMachineCore1d720fdbff10cd8	Ready	Multiple triggers defined	
PowerToys	MicrosoftEdgeUpdateTaskMachineUA	Ready	At 8:28 AM every day - After triggered, repeat every 1 hour for a de	
	IUpdateServiceStartupTask	Ready	At log on of any user	
	🕒 npcapwatchdog	Ready	At system startup	
	Oser_Feed_Synchronization-{0555BC55-5BE2-452B-9E1D-9892A30C9761}	Ready	At 1:41 PM every day - Trigger expires at 4/15/2032 1:41:21 PM.	
	🕒 ViPER Daily Backup	Running	At 10:11 AM every day	
	WiPER Monthly Backup	Running	At 10:27 AM on day 15 of January, February, March, April, May, Ju	۷
	<		>	

- 3. Right-click on the backup and then click Properties to edit the backup.
 - a. Other options include Run, End, Disable, Export, and Delete.

	ers Actions Conditions Settings History	
Na <u>m</u> e:	ViPER Weekly Backup	
Location:	N N	
Author:	Repligen	
Description:	ViPER Database Backup - Weekly	
Security ont	ons	-
When runn	ng the task use the following user account:	
SYSTEM	Change User or Group	
O Run only	when user is logged on	
Run wheeler	ther user is logged on or not	
🗌 Do n	ot store <u>p</u> assword. The task will only have access to local computer resources.	
	highest privileges	
Run with		

4. To edit the date/time, click on the Triggers tab and click Edit. This window gives the user advanced settings to configure the backup.

Edit Trigger	×
Begin the task: On a schedule Settings ○ Oge time ○ Daily ● Weekly ○ Monthly ○ Sunday □ Thursday □ Saturday ○	
Advanced settings Delay task for up to (random delay): 1 hour Repeat task every: 1 hour Stop all running tasks at end of repetition duration Stop task if it runs longer than: 3 days	
Expire: 4/27/2023 11:04:38 AM Synchronize across time zones Image: Synchronize across time zones OK Cancel	

Note: Changing the date/time of the backup, that contains the same frequency (daily, weekly, monthly), overwrites the original backup. If the frequency of the backup changes, the name remains the same. To avoid confusion, it is best to create a new backup if the frequency needs updating.

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