

VirtualBox List Installed VMs

A cool feature of VirtualBox is the COM Objects that it exposes for use with external applications such as PowerShell. I am still playing around with the basics here so bear with me.

My first challenge for myself was to get a list of all the installed VMS on my computer using the VirtualBox COM Object. This was made simple with PowerShell thanks to the Get-Member (gm) command, which enumerates all the methods and properties of any object (in this case the VirtualBox.VirtualBox object).

To get a list of all the methods and properties available I ran this command.

```
New-Object -ComObject VirtualBox.VirtualBox | gm
```

Which gave me the following back.

```
TypeName: System.__ComObject#{3f36e024-7fed-4f20-a02c-9158a82b44e6}
```

Name	MemberType	Definition
-----	-----	-----
CheckFirmwarePresent	Method	int CheckFirmwarePresent (FirmwareType,...
CreateAppliance	Method	IAppliance CreateAppliance ()
CreatedHCPServer	Method	IDHCPServer CreatedHCPServer (string)
CreateHardDisk	Method	IMedium CreateHardDisk (string, string)
CreateLegacyMachine	Method	IMachine CreateLegacyMachine (string, s...
CreateMachine	Method	IMachine CreateMachine (string, string,...
CreateSharedFolder	Method	void CreateSharedFolder (string, string...
FindHCPServerByNetworkName	Method	IDHCPServer FindHCPServerByNetworkName...
FindDVDImage	Method	IMedium FindDVDImage (string)
FindFloppyImage	Method	IMedium FindFloppyImage (string)
FindHardDisk	Method	IMedium FindHardDisk (string)
FindMachine	Method	IMachine FindMachine (string)
GetDVDImage	Method	IMedium GetDVDImage (string)
GetExtraData	Method	string GetExtraData (string)
GetExtraDataKeys	Method	SAFEARRAY(string) GetExtraDataKeys ()
GetFloppyImage	Method	IMedium GetFloppyImage (string)
GetGuestOSType	Method	IGuestOSType GetGuestOSType (string)
GetHardDisk	Method	IMedium GetHardDisk (string)
GetMachine	Method	IMachine GetMachine (string)
OpenDVDImage	Method	IMedium OpenDVDImage (string, string)
OpenExistingSession	Method	void OpenExistingSession (ISession, str...
OpenFloppyImage	Method	IMedium OpenFloppyImage (string, string)
OpenHardDisk	Method	IMedium OpenHardDisk (string, AccessMod...
OpenMachine	Method	IMachine OpenMachine (string)
OpenRemoteSession	Method	IProgress OpenRemoteSession (ISession, ...
OpenSession	Method	void OpenSession (ISession, string)
RegisterCallback	Method	void RegisterCallback (IVirtualBoxCallb...
RegisterMachine	Method	void RegisterMachine (IMachine)

RemovedDHCPServer	Method	void RemoveDHCPServer (IDHCPServer)
RemoveSharedFolder	Method	void RemoveSharedFolder (string)
SetExtraData	Method	void SetExtraData (string, string)
UnregisterCallback	Method	void UnregisterCallback (IVirtualBoxCal...
UnregisterMachine	Method	IMachine UnregisterMachine (string)
WaitForPropertyChange	Method	void WaitForPropertyChange (string, uin...
DHCP Servers	Property	SAFEARRAY(IDHCPServer) DHCP Servers () {...
DVD Images	Property	SAFEARRAY(IMedium) DVD Images () {get}
Floppy Images	Property	SAFEARRAY(IMedium) Floppy Images () {get}
Guest OSTypes	Property	SAFEARRAY(IGuestOSType) Guest OSTypes ()...
Hard Disks	Property	SAFEARRAY(IMedium) Hard Disks () {get}
Home Folder	Property	string HomeFolder () {get}
Host	Property	IHost Host () {get}
Machines	Property	SAFEARRAY(IMachine) Machines () {get}
PackageType	Property	string PackageType () {get}
PerformanceCollector	Property	IPerformanceCollector Performance Collec...
ProgressOperations	Property	SAFEARRAY(IProgress) ProgressOperations...
Revision	Property	uint Revision () {get}
SettingsFilePath	Property	string SettingsFilePath () {get}
SharedFolders	Property	SAFEARRAY(ISharedFolder) SharedFolders ...
SystemProperties	Property	ISystemProperties SystemProperties () {...
Version	Property	string Version () {get}

From there I made use of the Machines property to get a collection of all the virtual machines on my computer, the finished script looks something like this.

```
# Check if VBox is installed
if( (Test-Path -Path hklm:\SOFTWARE\Oracle\VirtualBox) -eq $false ){
    Write-Host "Virtual Box is not installed!"
    Exit
}

# Create the VBox COM Object
$comVB = New-Object -ComObject VirtualBox.VirtualBox
$arrVMS = $comVB.Machines
$counter = 1

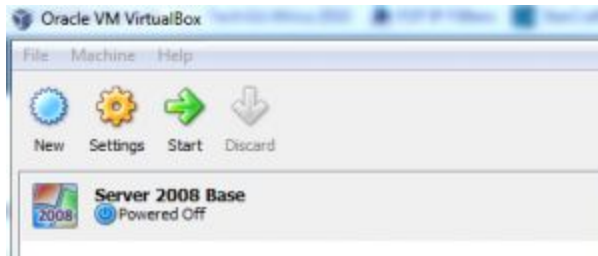
# Count found VMs
if( $arrVMS.Length -eq 0 ){
    Write-Host "There are no VMs installed"
    Exit
}

# List the names of the VMs
foreach( $vm in $arrVMS ){
    $info = "VM" + $counter + ": " + $vm.Name + " (" + $vm.OSTypeId + ")"
    Write-Host $info
    $counter++
}
```

The following was written to my console.

VM1: Server 2008 Base (Windows2008)

Just checking to ensure this is valid...



I am starting to like PowerShell :)