Notes from the lab: NetScaler Secure Web Gateway

Finally had some time to test the new forward proxy functionality with the newly released NetScaler Secure Web Gateway, and that meant a new blog.

First things first all the information needed to deploy NetScaler Secure Web Gateway

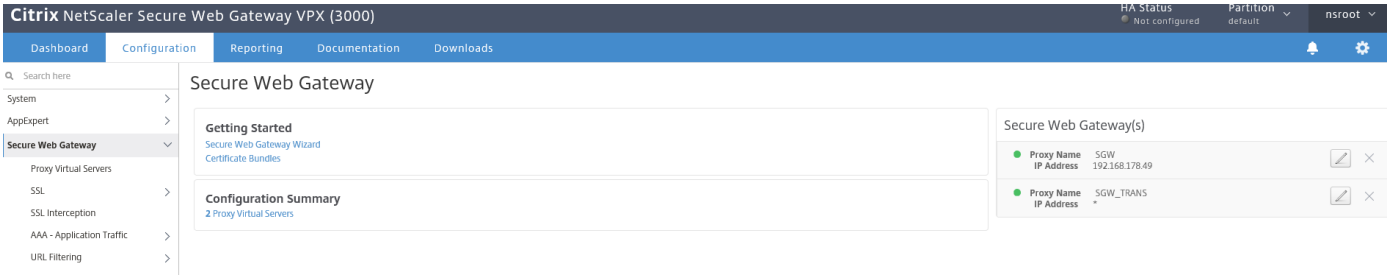
Documentation:
http://docs.citrix.com/en-us/netscaler-secure-web-gateway/12.html

Downloads:
https://www.citrix.com/downloads/netscaler-adc/ (it's the same appliance as the normal NetScaler ADC only locked down at the moment with the dedicated licenses for Secure Web Gateway and URL threat intelligence subscription. Sadly we cannot mix and match it just yet with the platform license. I believe this is an RFE for the end of this year)
https://www.citrix.com/downloads/netscaler-mas/ for the logging and visibility of outbound traffic and transactions

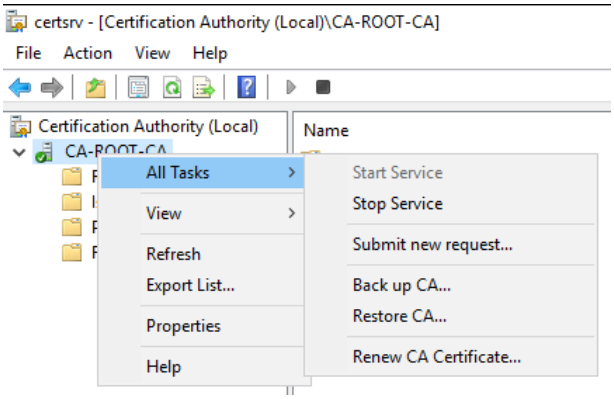
Licenses:
The following partner demo licenses can be allocated, I had help from the local Citrix Sales Engineer regarding allocation that will definitely safe you time.
Citrix Netscaler VPX 3000 Secure Web Gateway Edition - Eval 90 days
URL Threat Intelligence for MPX 5901, 5905, 8905 and VPX 200, 1000, 3000, 5000 , 90 Days

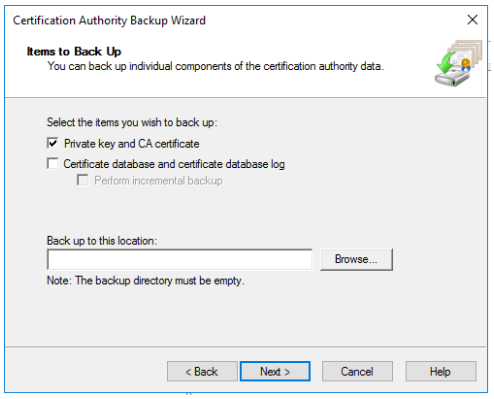
After download and import the allocation and installation of license files and basic setup is the same as any other NetScaler appliance.

And then it's time to run the wizard:



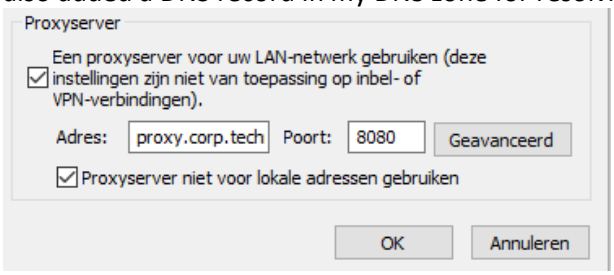
I've followed the "Use Case: Making Enterprise Internet Access Compliant and Secure" from the above link from docs.citrix.com and it's pretty much self-explanatory. The only caveat I found was with my internal Active Directory Certificate Services (ADCS) as Root CA. The proxy will need the **private** key of your CA to sign/intercept all the traffic. See the following figures for that process:





Afterwards import this certificate as a Root certificate on the NetScaler, I first installed it locally on my machine and exported it as PFX (because of the conversion on the NetScaler to PEM format)

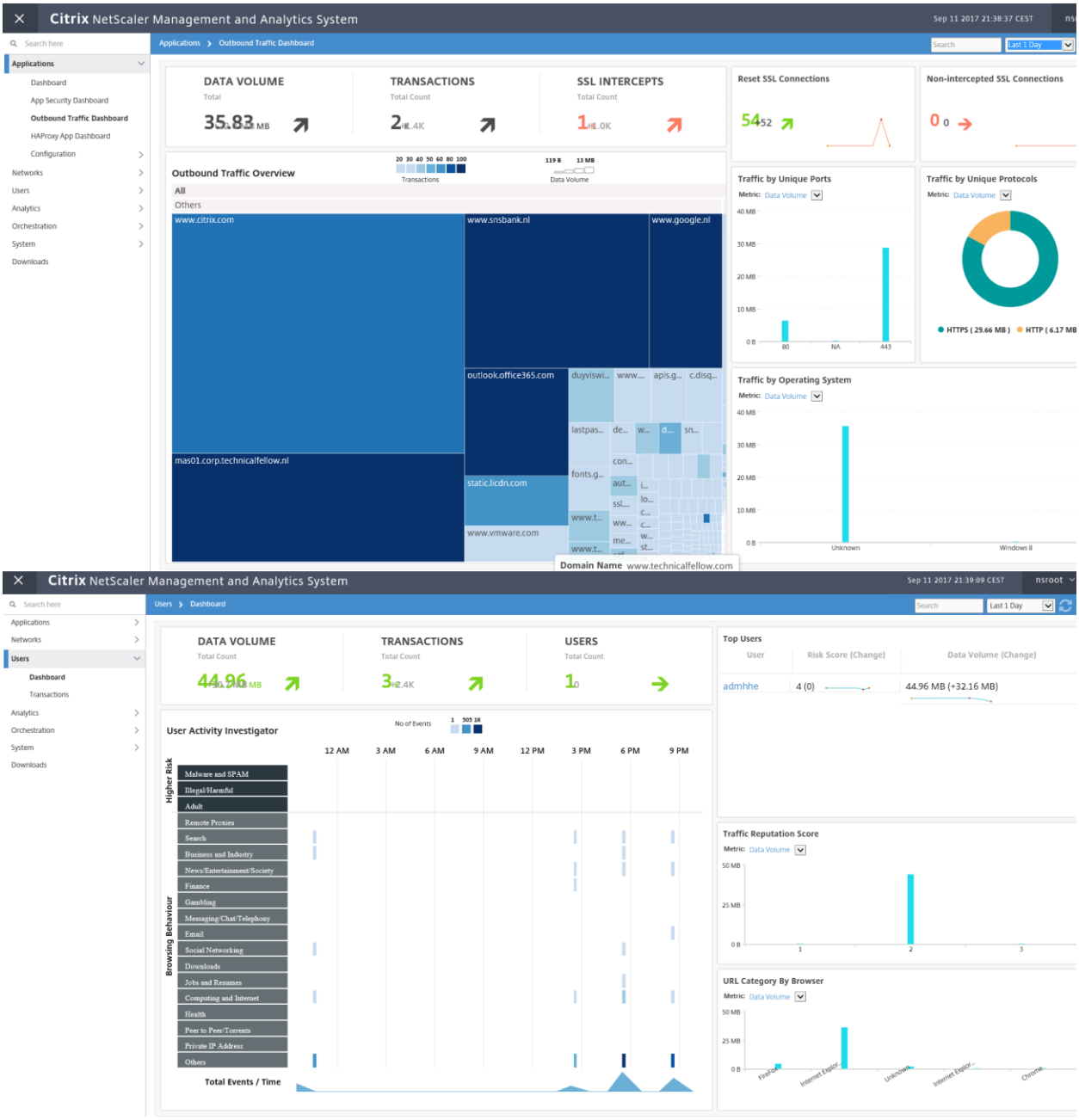
If you completed the article just as I did you will have an explicit proxy up and running, for simplicity I've also added a DNS record in my DNS zone for resolving the proxy VIP.



In addition you can also run the wizard again to create an transparent proxy, with all the same settings in place as the explicit one:

Regarding the configuration of Management and Analytics System (MAS) it's just adding the new VPX instance as a node in MAS an then data will show up as soon as you configured the proxy setup in your browser (explicit mode)

See the following screenshots for an overview: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Search here
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Dashboard
App Security Dashboard
Outbound Traffic Dashboard
HAProxy App Dashboard
Configuration
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www.citrix.com
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www.google.nl
outlook.office365.com
mas01.corp.technicalfellow.nl
static.licdn.com
www.vmware.com
Traffic by Unique Ports
Traffic by Unique Protocols
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Domain Name www.technicalfellow.com
Citrix NetScaler Management and Analytics System
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Finance
Gambling
Messaging/Chat/Telephony
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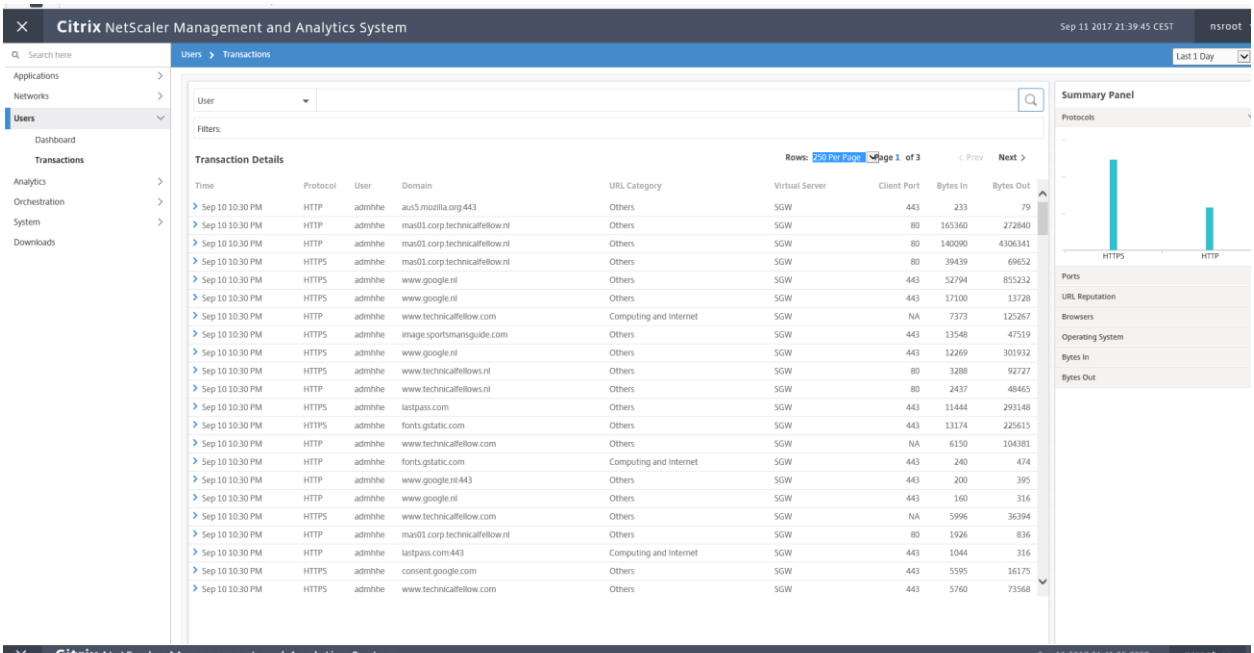
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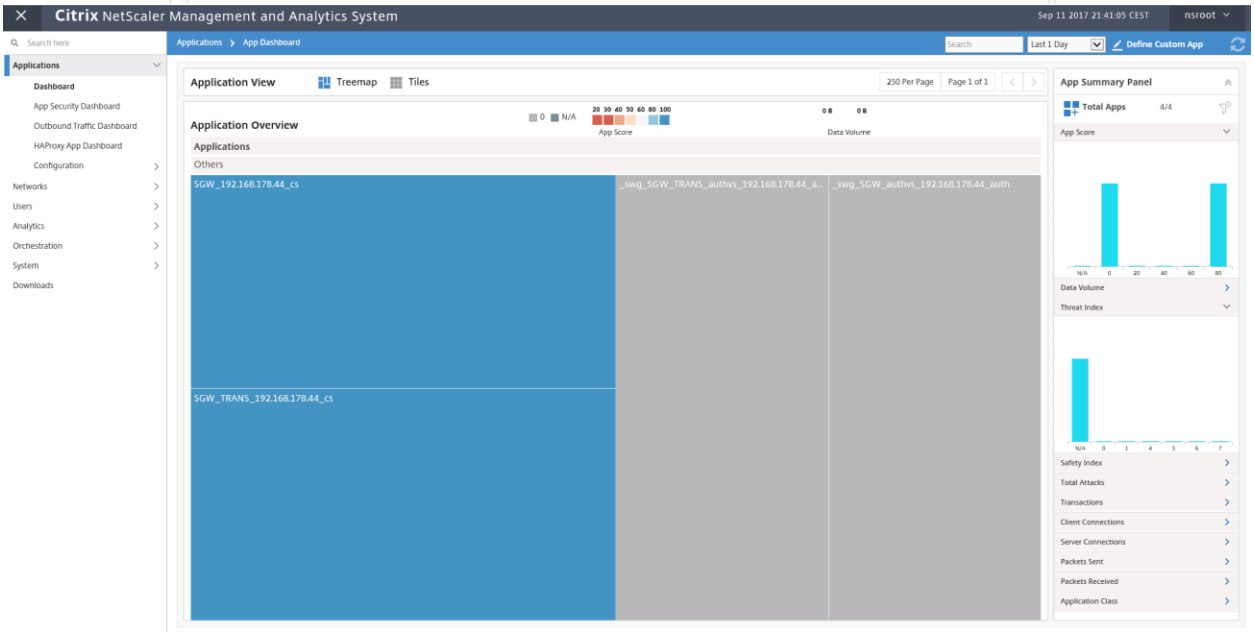
Summary Panel
Protocols
HTTPS
HTTP
Ports
URL Reputation
Browsers
Operating System
Bytes In
Bytes Out


Citrix NetScaler Management and Analytics System
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HAProxy App Dashboard
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Define Custom App
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250 Per Page
Page 1 of 1
Application Overview
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App Summary Panel
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Threat Index
Safety Index
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Transactions
Client Connections
Server Connections
Packets Sent
Packets Received
Application Class