



Internet Connection Quality Troubleshooting

Virtual Desktop Service

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Table of Contents

Internet Connection Quality Troubleshooting	1
Symptoms	1
Cause	1

Internet Connection Quality Troubleshooting

Symptoms

Dropped users connections requiring a reconnect. Laggy interface response, general performance problems that don't appear to be related to resource (RAM/CPU) loads.

Cause

When users report performance issues, dropped user connections or a laggy interface, the most common cause is not resources at all but rather the network connections between the customer and the datacenter. These connections run through their ISP, various internet backbone carriers and ultimately into the datacenter. Along the way the data traverses multiple stops. Each of these hops can introduce network latency, lost packets and jitter, all of these can contribute to the perceived performance of the desktop computing environment in the virtual desktop.

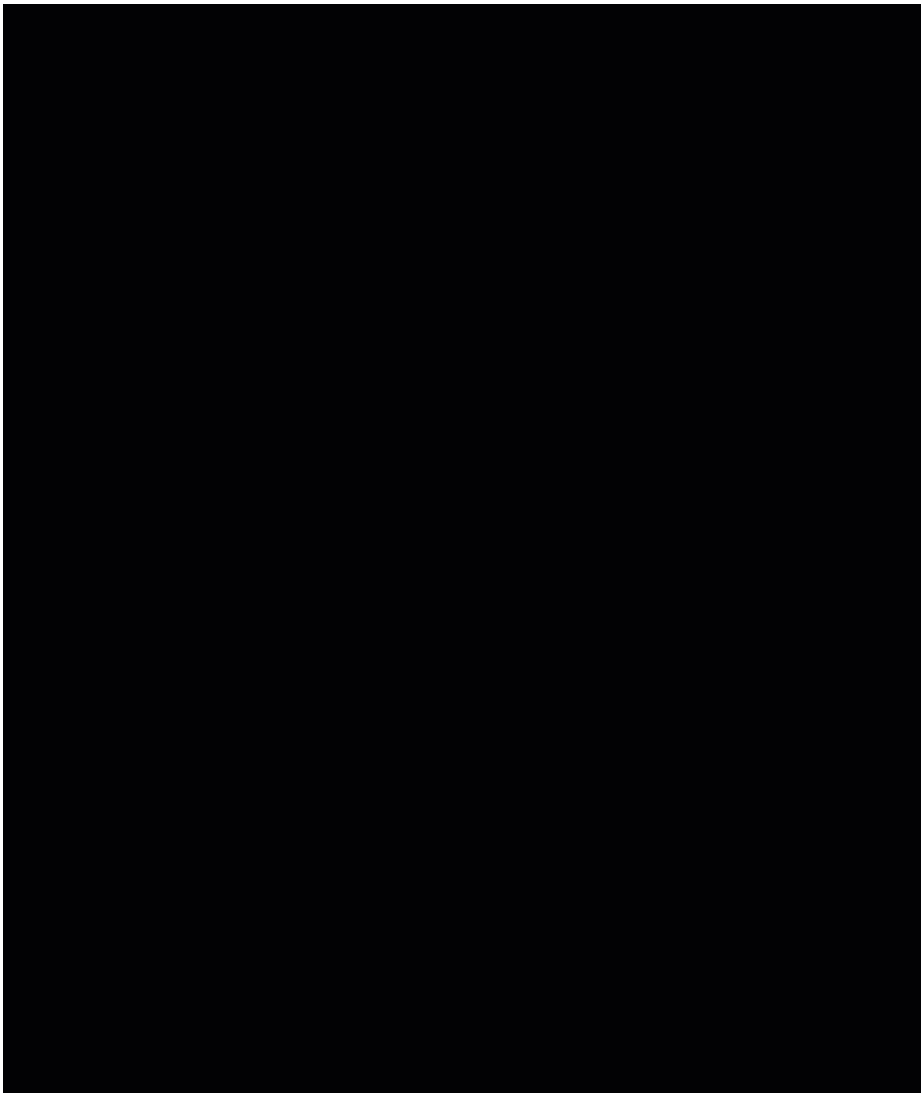
Tier 1 triage and troubleshooting will include basic steps like confirming resources (RAM, CPU and HDD Space) are sufficient but once that is completed, testing the network connectivity is a great next step in the troubleshooting process.

Resolution

Primary option: NetApp VDS Windows client has built-in diagnostic tools

The diagnostic test can be run and delivered to your email, all from within the virtual desktop Client.

1. Click on the preferences icon (four horizontal lines on the top menu bar)
2. Click Help
3. Click Network Test
4. Enter the user name experiencing the issues, click Run
5. Once complete, enter your email address to receive an email report
6. Review the report to troubleshoot potential connection issues



Network Test Results (03/19/19 08:52:06) - Inbox

Message

Delete Archive Reply Reply All Forward Move Junk Rules Move to Other Read/Unread Categorize

Network Test Results (03/19/19 08:52:06)



cloudworkspaceclient

Toby vanRoojen

Tuesday, March 19, 2019 at 8:52 AM

[Show Details](#)

Network Test Results:

API address resolved successfully

API is reachable

Username: toby.vanroojen@cloudjumper.com

Gateway: fcf-rds.fcf.cloudworkspace.app

Tenant: rjb5.fcf.cloudworkspace.app

Gateway resolved to: 13.82.216.254

Gateway is reachable

fcf-rds.fcf.cloudworkspace.app	90.02ms
fcf-rds.fcf.cloudworkspace.app	96.65ms
fcf-rds.fcf.cloudworkspace.app	93.32ms
fcf-rds.fcf.cloudworkspace.app	90.35ms
fcf-rds.fcf.cloudworkspace.app	88.85ms
fcf-rds.fcf.cloudworkspace.app	91.81ms
fcf-rds.fcf.cloudworkspace.app	91.39ms
fcf-rds.fcf.cloudworkspace.app	95.21ms
fcf-rds.fcf.cloudworkspace.app	92.3ms
fcf-rds.fcf.cloudworkspace.app	92.2ms
fcf-rds.fcf.cloudworkspace.app	90.68ms
fcf-rds.fcf.cloudworkspace.app	93.51ms
fcf-rds.fcf.cloudworkspace.app	93.08ms
fcf-rds.fcf.cloudworkspace.app	1019.5ms
fcf-rds.fcf.cloudworkspace.app	90.74ms
fcf-rds.fcf.cloudworkspace.app	3109.41ms
fcf-rds.fcf.cloudworkspace.app	92.28ms
fcf-rds.fcf.cloudworkspace.app	90.4ms
fcf-rds.fcf.cloudworkspace.app	88.61ms
fcf-rds.fcf.cloudworkspace.app	90.88ms
fcf-rds.fcf.cloudworkspace.app	93.46ms
fcf-rds.fcf.cloudworkspace.app	92.99ms
fcf-rds.fcf.cloudworkspace.app	95.7ms
fcf-rds.fcf.cloudworkspace.app	90.11ms
fcf-rds.fcf.cloudworkspace.app	92.49ms
fcf-rds.fcf.cloudworkspace.app	94.54ms
fcf-rds.fcf.cloudworkspace.app	89.77ms
fcf-rds.fcf.cloudworkspace.app	94.84ms
fcf-rds.fcf.cloudworkspace.app	91.9ms
fcf-rds.fcf.cloudworkspace.app	91.62ms
fcf-rds.fcf.cloudworkspace.app	94.07ms
fcf-rds.fcf.cloudworkspace.app	92.1ms
fcf-rds.fcf.cloudworkspace.app	91.91ms
fcf-rds.fcf.cloudworkspace.app	99.07ms
fcf-rds.fcf.cloudworkspace.app	93.89ms
fcf-rds.fcf.cloudworkspace.app	89.78ms
fcf-rds.fcf.cloudworkspace.app	92.65ms
fcf-rds.fcf.cloudworkspace.app	92.26ms
fcf-rds.fcf.cloudworkspace.app	94.82ms
fcf-rds.fcf.cloudworkspace.app	92.64ms

Average Latency: 191.04ms

Secondary option: Manual analysis using PingPlotter

To confirm the client's network connection is the culprit you can run the free utility PingPlotter. This utility sends a ping every few seconds and reports on the speed (latency) of the round trip of that ping. It also notes the packet loss (PL) percentage at each hop along the route. When high latency and/or high packet loss is observed it is a good indication that the performance issues are caused by the quality of the internet connection at the hop that is displaying those issues.

1. Download and install [Ping Plotter](#) (Available for MacOS, Windows and iOS).
2. Enter the gateway of the data center in which the tenant is deployed.
3. Let it run for several minutes. Ideally while the performance issues or disconnections are being experienced.
4. Capture the data by choosing "Save Image..." from the File Menu if it is needed for additional troubleshooting.

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