

Setting up your Laptop to Access Specify at the Herbarium Digitization Workshop

Installing and Using VNC for Remote Access to Amazon VM

Introduction

These are setup instructions for accessing Specify Software during the digitization workshop.

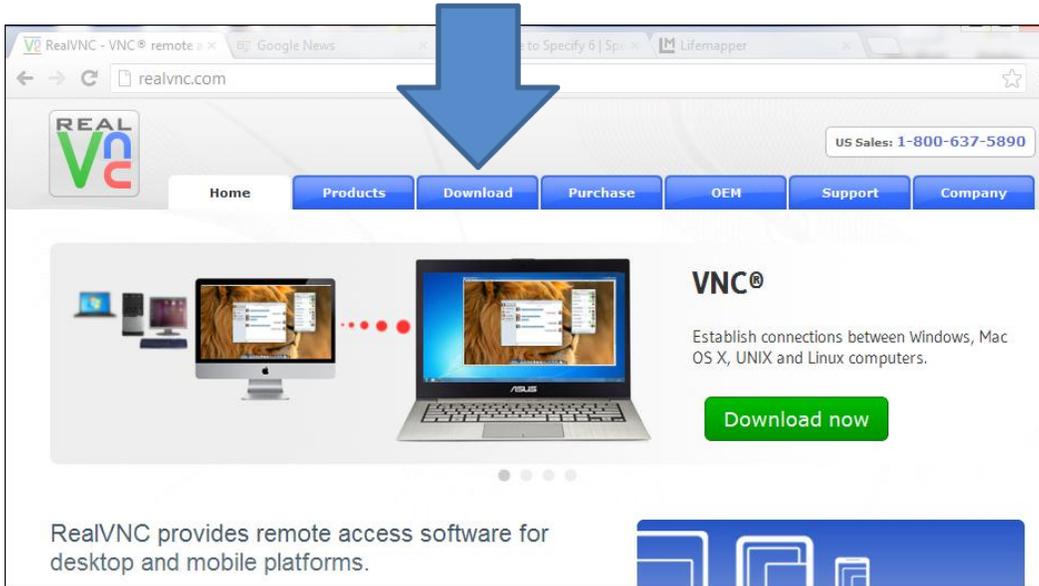
Specify is installed on two virtual computers running on Amazon's VM services in the cloud. Each of the two Amazon virtual machines has 15 distinct Specify databases and login accounts. Each workshop participant has his/her own copy of a sample botanical database and a guest login account as noted in the table of participants below.

Using these remote Specify servers does not require Specify or MySQL to be installed on your computer. But to access Specify you will need to install a small software program, VNC, which is a network application that allows you to operate a remote computer as if it were on your desktop. (Mac users may already have a VNC client or "viewer" installed on Macbooks, if you know that you do, you can skip the installation of RealVNC.) VNC is widely-used, open-source, and available from several internet sites for free. We've used RealVNC, TightVNC and others. VNC captures the desktop image of the remote computer and streams it to a window on your computer. Installation of VNC is pretty straightforward-- follow the steps below. Only the VNC "Client" or "Viewer" is all that is required for the workshop. If you see an option, do not install a VNC "Server" this would make your machine a computer that could be accessed by others, you do not need that capability for the meeting. You can un-install VNC after the meeting.

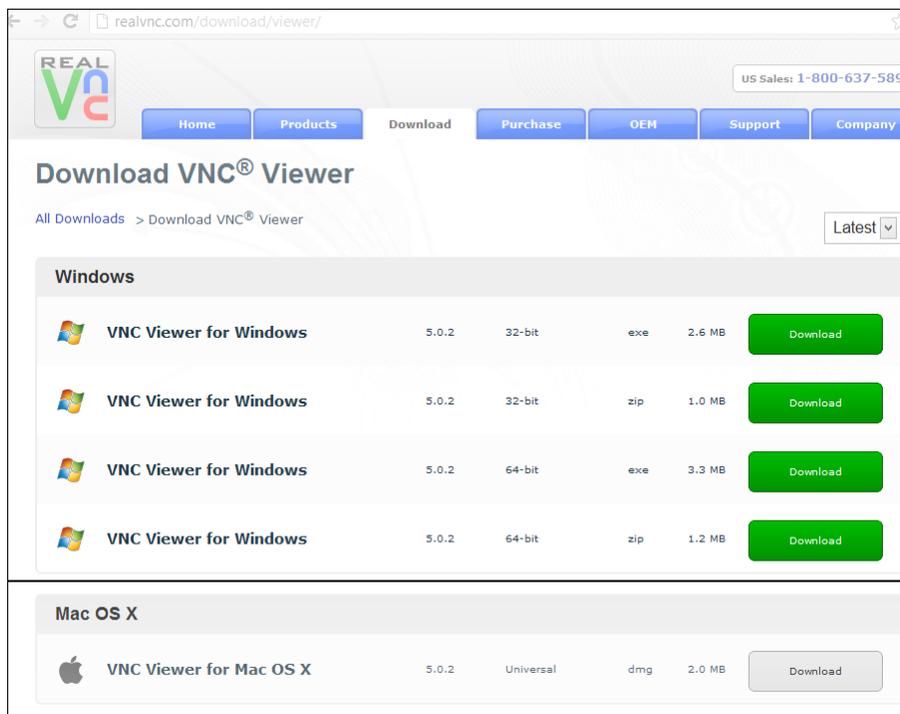
Installing RealVNC

To obtain RealVNC, point your browser at: <http://www.realvnc.com/>

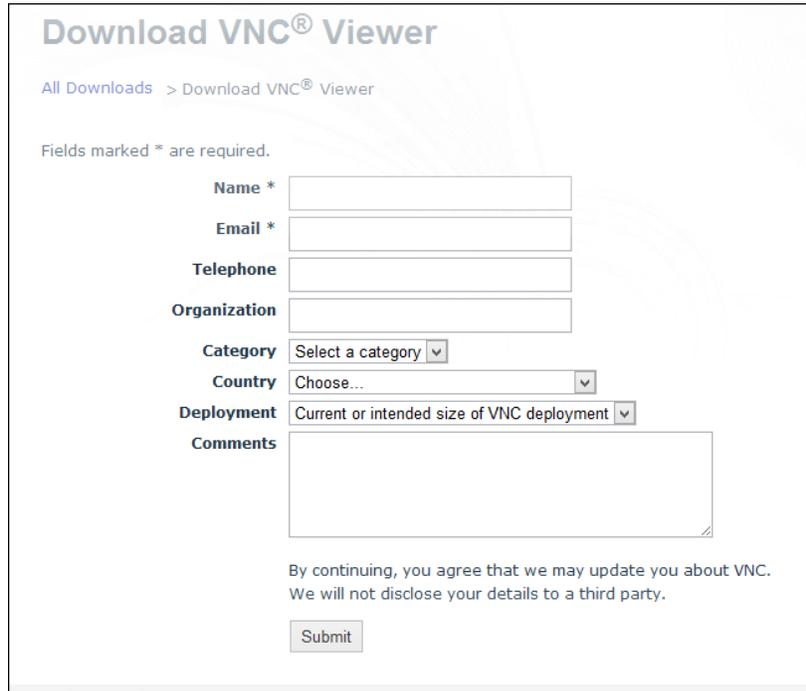
Then click the Download tab (not the green button)



Choose “VNC Viewer”, not “VNC”, as you only need the Viewer. Windows users should choose the Windows 32-bit exe file. (If you know your PC is running a 64-bit version of Windows, you can choose the 64-bit exe file.) Mac users need to choose the Mac OS X dmg file.



Offer your name and contact info. Accept license conditions. Click the “Submit” button. Download. Save it to somewhere you will be able to find it.



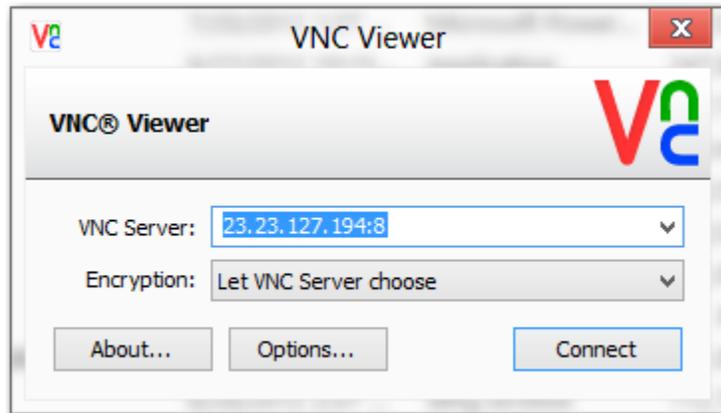
The screenshot shows a web form titled "Download VNC® Viewer". At the top, there is a breadcrumb trail: "All Downloads > Download VNC® Viewer". Below this, a note states "Fields marked * are required." The form contains the following fields:

- Name ***: A text input field.
- Email ***: A text input field.
- Telephone**: A text input field.
- Organization**: A text input field.
- Category**: A dropdown menu with "Select a category" as the selected option.
- Country**: A dropdown menu with "Choose..." as the selected option.
- Deployment**: A dropdown menu with "Current or intended size of VNC deployment" as the selected option.
- Comments**: A large text area for additional information.

At the bottom of the form, there is a disclaimer: "By continuing, you agree that we may update you about VNC. We will not disclose your details to a third party." Below the disclaimer is a "Submit" button.

Find the file in your download directory or wherever you put it. Click on it to run VNC Viewer.

You should see this window:



In the “VNC Server” field enter the Server URL associated with your name in the table below. Enter either 23.23.127.194 or 184.72.218.85, followed by a colon and your user number from the User Name column—as shown in the table.

Then click on the Connect button.

Tribe	User Name	Workshopper	Specify VNC Server URL	VNC Login Password	Specify Password
			<i>Type into VNC URL window</i>	<i>Use for VNC Login</i>	<i>Use for Specify Login</i>
Blue Team	Guest1	Gil Nelson	23.23.127.194:1	spguest1	demouser
	Guest2	Andrew Miller	23.23.127.194:2	spguest2	demouser
	Guest3	Ann Kelsey	23.23.127.194:3	spguest3	demouser
	Guest4	Ashley Morris	23.23.127.194:4	spguest4	demouser
	Guest5	Audrey Clark	23.23.127.194:5	spguest5	demouser
	Guest6	Austin Mast	23.23.127.194:6	spguest6	demouser
	Guest7	Bonnie Amos	23.23.127.194:7	spguest7	demouser
	Guest8	Dale Kruse	23.23.127.194:8	spguest8	demouser
	Guest9	Dawn Roberts	23.23.127.194:9	spguest9	demouser
	Guest10	Debra Trock	23.23.127.194:10	spguest10	demouser
	Guest11	Don Trisel	23.23.127.194:11	spguest11	demouser
	Guest12	Dorothy Allard	23.23.127.194:12	spguest12	demouser
	Guest13	Alan Harvey	23.23.127.194:13	spguest13	demouser
	Guest14	Jimmy Triplett	23.23.127.194:14	spguest14	demouser
	Guest15	Janet Bala	23.23.127.194:15	spguest15	demouser
Red Team	Guest1	Herrick Brown	184.72.218.85:1	spguest1	demouser
	Guest2	Katherine Mathews	184.72.218.85:2	spguest2	demouser
	Guest3	Larry Schmidt	184.72.218.85:3	spguest3	demouser
	Guest4	Laurie Hannah	184.72.218.85:4	spguest4	demouser
	Guest5	Lisa Ann Kelly	184.72.218.85:5	spguest5	demouser
	Guest6	Lucile McCook	184.72.218.85:6	spguest6	demouser
	Guest7	Melanie Link-Perez	184.72.218.85:7	spguest7	demouser
	Guest8	Melissa Islam	184.72.218.85:8	spguest8	demouser
	Guest9	Rebecca Dolan	184.72.218.85:9	spguest9	demouser
	Guest10	Richard Carter	184.72.218.85:10	spguest10	demouser
	Guest11	Stephanie Harvey	184.72.218.85:11	spguest11	demouser
	Guest12	Sule Oygur	184.72.218.85:12	spguest12	demouser
	Guest13	Tharangamala Samarakoon	184.72.218.85:13	spguest13	demouser
	Guest14	Cassandra Quave	184.72.218.85:14	spguest14	demouser
	Guest15	Pam Soltis	184.72.218.85:15	spguest15	demouser

When you see this VNC login window:



Type in "spguest#" as the password where # is your assigned number as shown in the table, in this case "spguest10", then click "Unlock".

You should then see the desktop with the Specify logotype:



Find the Specify link icon as shown above and double click on it to launch Specify.

You will then see the window below.

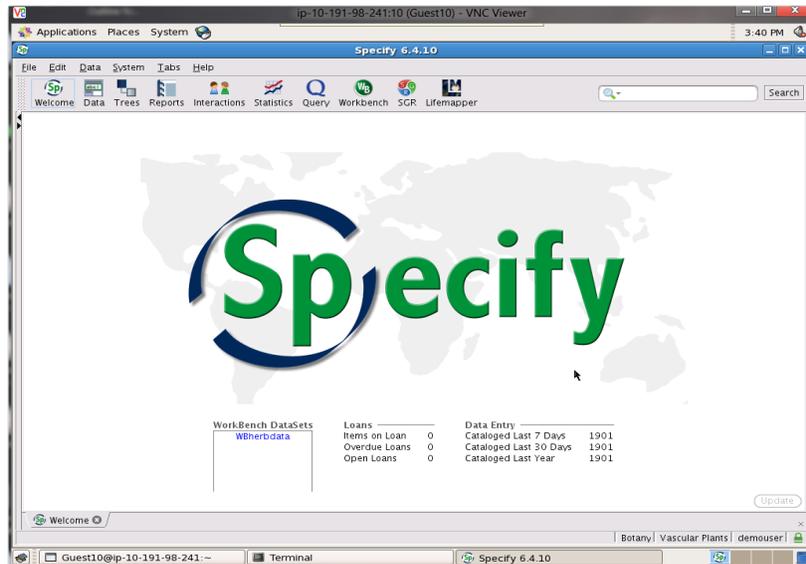
Click the "Run" button. Specify will then start up.



Then log into Specify with the password 'demouser'.

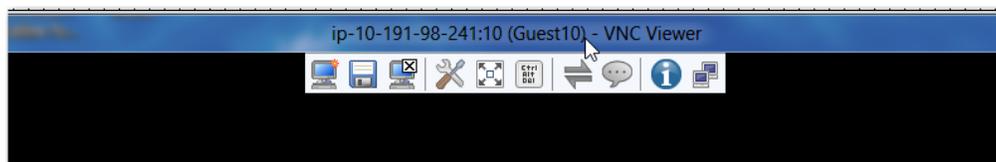


Click the Login button, and the Specify home page will appear:



VNC Tool Bar

RealVNC has a tool bar at the top of the window which can be accessed by clicking on the very small gray border that sticks out along the top edge of the terminal window. Click on that and you will see:



The third icon with the small X in the PC display will close the VNC connection to the remote machine. Or you can just close the PC or Mac Window. It is usually best to logout of Specify before ending your VNC connection.

Sample Data

Specify Database

Data in this sample plant database were kindly provided by Dr. Rui Figueira, Instituto de Investigação Científica Tropical, Lisbon.

This database uses formatted catalog numbers with a 4 letter prefix "LISC" followed by six numerals. Catalog numbers in the database range from: LISC000305 to LISC014076.

When querying this database on the catalog number field, you must type the full catalog number to obtain an exact match. For example, to find records with catalog number values greater than 400 you would open a query form and in the Catalog Number field choose the "Greater-Than" operator (>) and enter the string: LISC000400. Similarly, to search for records with catalog numbers between 400 and 500, you would use the "Between" operator and enter the strings: LISC000400 and LISC000500 in the query form.

Searches and Queries also support the wild card character (*).

Specimens were all collected in Africa, particularly in Angola, Mozambique, and Tanzania. There are specimens from localities named: Belize, Buco Zau, Hombe, Mueda, and Vila da Ponte.

There are a number of specimens in the genera: *Ozoroa*, *Crotalaria*, and *Memecylon*.

Specify WorkBench Sample Data

The WorkBench contains a sample DataSet which you can upload into the Specify database. The WorkBench validation checker will flag any suspect or bad data. Feel free to edit bad data values; databases will be flushed for the next set of victims. There are records in the WorkBench with locality descriptions but no latitude or longitude coordinates, which can be georeferenced with the embedded GeoLocate plug-in.

Sample Spreadsheet of Data for Uploading

There is a Microsoft Excel format spreadsheet file "SampleHerbDataset.xls" available in the directory: /specify/demo_files/ which can be imported into a new Specify WorkBench and then uploaded into the Specify database as a demonstration of how to get specimen data into a Specify database from an external file. The spreadsheet deliberately contains common data errors including invalid dates, missing preparation types, incorrect preparation types, invalid catalog numbers and missing locality names, to illustrate how Specify flags and restricts uploading of incomplete or *nasty* data.

Ouch! Avoid the Lifemapper Plug-in!

The Lifemapper plug-in (upper right on the top menu bar) does not function properly because the embedded NASA WorldWind visualization module depends on graphical computations which are not available on the virtual machine. We recommend avoiding the Lifemapper plugin, using it will likely hang Specify. The Lifemapper plug-in works great when Specify is installed directly on PC, Mac or Linux workstations-which all have graphic processors.