Anti-Virus Measures for Instruments with Windows Operating System
# Table of Contents

1. Introduction .......................................................................................................................... 3

2. Anritsu’s Effort ..................................................................................................................... 3

3. Anti-Virus Measures by Customer .......................................................................................... 3
   3.1. Configuring Windows Firewall Settings ........................................................................... 3
   3.2. Installing Windows OS Updates ..................................................................................... 4
   3.3. Anti-Virus Software ......................................................................................................... 4

4. In Case of Virus Infection on Instrument ............................................................................... 4
1 Introduction

We take measures to protect Anritsu instruments that run Windows operating systems from computer viruses. This white paper provides ways of protecting your instrument from computer viruses.

* This paper provides only Anritsu's recommended anti-virus measures and is not intended to force customers to take measures against computer viruses. Please decide whether or not to adopt the recommended measures, depending on the customer’s situation.

Note that some models do not support the measures introduced herein.
For more information on the anti-virus measures, refer to the operation manual that came with the instrument.

2 Anritsu’s Effort

Anritsu is making a continuous effort to maintain and enhance information security through its information security management system.

As measures against computer viruses, we have configured Windows Firewall settings and installed anti-virus software on all client PCs and servers used within Anritsu office and always keep the virus definitions of anti-virus software to the latest version. Additionally, we are concentrating on managing the application of security patches for high-risk software and implementing initiatives for applying newly updated software to all PCs within a week after it becomes available.

Anritsu has established security management regulations for the entire process from developing and manufacturing to maintaining instruments, and conducts security training for all Anritsu personnel.

In addition to the actions mentioned above, instruments will never be connected to the LAN in Anritsu before shipment. Also, customers' instruments are scanned when Anritsu receives them.

3 Anti-Virus Measures by Customer

The customer is required to take appropriate measures to protect the instrument from virus infection when using it.

Scan an external storage device (e.g. USB memory stick) for computer viruses before connecting it to the instrument. Make sure that the measures have been taken to protect a network from computer viruses when connecting the instrument to it.

The recommended measures to protect the instrument from virus infection are:

- To turn on Windows Firewall on the instrument
- To regularly install critical Windows Updates
- To regularly scan the instrument with anti-virus software

3.1 Configuring Windows Firewall Settings

When your Anritsu's instrument is equipped with Windows 7 or later operating system, it is recommended to turn on Windows Firewall to protect it from attacks via the network. For how to configure the firewall settings, refer to the operation manual that came with the instrument.
3.2. **Installing Windows OS Updates**

Until the end of Microsoft extended support, important updates such as security updates are provided for each version of Windows. It is recommended to install important updates (Windows Update) on Anritsu instruments. For the version of Windows installed on Anritsu instruments, please refer to the operation manual of each model.

Microsoft ends extended support for Windows on the following dates:

<table>
<thead>
<tr>
<th>Windows version</th>
<th>Extended support end date</th>
</tr>
</thead>
<tbody>
<tr>
<td>Windows 7</td>
<td>1/14/2020</td>
</tr>
<tr>
<td>Windows Embedded Standard 7 (WES7)</td>
<td>10/13/2020</td>
</tr>
<tr>
<td>Windows 10 IoT Enterprise 2019 LTSC</td>
<td>1/9/2029</td>
</tr>
</tbody>
</table>


Note that the performance of the instrument could decrease while downloading and installing Windows Updates. It is recommended to manually download and install Windows Updates on a regular basis, avoiding the operating hours of the instrument.

Anritsu periodically checks for proper operation of the instruments to which Windows Updates have been installed. For information on operation-checked Windows Updates, refer to the latest release notes of each model.

3.3. **Anti-Virus Software**

When your Anritsu's instrument is equipped with Windows 7 or later operating system, it is recommended to regularly scan the instrument with installed anti-virus software. Also, it is important to regularly update the virus definition files to keep the latest virus definitions.

Note that the performance of the instrument could decrease if anti-virus software updates virus definition data automatically or runs full scan in the background. It is recommended to manually update virus definition data and run full scan on a regular basis, avoiding the operating hours of the instrument. For information on anti-virus software that has been checked for proper operation on each model, refer to the operation manual that came with the instrument.

It is recommended to use anti-virus software installed on a separate computer or a USB-drive shaped anti-virus tool for scanning Anritsu's instruments equipped with Windows XP or Windows Embedded Standard 2009.

4 **In Case of Virus Infection on Instrument**

If virus infection is detected when you are using the instrument, it is recommended to initialize the instrument to the factory default settings to ensure a recovery. You can initialize the instrument by yourself if the model has the system recovery feature.

**Caution**

Initialization will lose all the applications, updates and data added after factory shipment. Create a backup of necessary data before initialization.

Some models of Anritsu's instruments equipped with Windows XP or Windows Embedded Standard 2009 do not have the system recovery feature.

Additionally, you may not recover some Anritsu instruments by initializing to factory default settings yourself when they are infected, for example, by a virus that infects or destroys the boot sector, even if they have system recovery features. If you want to initialize these to the factory default settings, contact an Anritsu Service and Sales office.