#### مندرجات کا جدول

RAAS Client1

<u>1.1 تنصیب</u>

1.1.1 اعلی درجے کی ترتیبات

RAAS Server Configuration 1.2

<u>1.2.1 جنرل</u>

<u>1.2.2 ريموٹ شارٹ کٹس</u>

<u>1.2.3 تصورات</u>

<u>1.2.4 فائل ایکسپلورر ایکسٹینشن</u>

RAAS Client1.3

RAAS Client1.4 فائل ایکسیلورر ایکسٹینشن

RAAS Client Remote Desktop1.5

Search & Run1.6

RAAS Server2

<u>2.1 تنصیب</u>

2.1.1 اعلی درجے کی ترتیبات

2.2 تجویز کردہ ونڈوز کنفیگریشن

Search & Run2.3

<u>3 ورژن بنانا</u>

<u>4 سيورٹ</u>

4.1 عام مسائل

## **RAAS Client1**

دو اجزاء پر بنایا گیا ہے RAAS ClientRAAS اور RAAS Server. سرورز، یا میزبان کمپیوٹرز کو کنٹرول کرنے کے لیے، RAAS Server کلائنٹ کی طرف میزبان کمپیوٹرز کو استعمال کرنے سے پہلے میزبان کمپیوٹرز پر انسٹال کرنے کی ضرورت ہے۔ RAAS کو استعمال کرنے کے لیے Client ایپلی کیشنز یہ سیکشن انسٹال کرنے، ترتیب دینے اور استعمال کرنے کے لیے ہدایات پر مشتمل ہے۔ RAAS Client.

### 1.1 تنصیب

RAASClient\_[version]\_x64.msi فائن کو ڈاؤن لوڈ کرکے اور اسے RAASClient\_[version] فائن کو ڈاؤن لوڈ کرکے اور اسکتا ہے۔ اگر پہلے سے طے شدہ تنصیب کافی ہے تو صرف لائسنس کے معاہدے کو قبول کرنا اور انسٹال کو دبانا ہے۔

سسٹم کے تقاضے: ونڈوز 10 اور 11 پرو اور انٹرپرائز کے 64 بٹ ورژن کو سپورٹ کرتا ہے۔ .NET فریم ورک 4.8 کی ضرورت ہے۔

## 1.1.1 اعلی درجے کی ترتیبات

اگر پہلے سے طے شدہ تنصیب ناکافی ہے، تو اسے انسٹال کرتے وقت "ایڈوانسڈ" بٹن پر کلک کرکے اپنی مرضی کے مطابق بنایا جاسکتا ہے۔ پہلے حصے میں اسے مشین کی سطح پر انسٹال کرنے کے اختیارات ہیں، جو تمام صارفین کے لیے قابل رسائی ہوں گے، یا صارف کی سطح، جو صرف موجودہ صارف کے لیے قابل رسائی ہوگی۔ "اگلا" پر کلک کرنے سے صارف خصوصیات کے مینو میں آجائے گا۔ اس سیکشن میں انٹرفیس میں فیچرز کو فعال یا غیر فعال کر کے یہ منتخب کرنا ممکن ہے کہ کون سی خصوصیات کو انسٹال کرنا ہے۔ کسی خصوصیت کی تفصیلات اس باکس کے نیچے پیش کی جاتی ہیں جس میں اسے منتخب کرتے وقت کنٹرولز ہوتے ہیں۔

مشورہ: RAAS Client اس کے نوٹیفکیشن آئیکن پر دائیں کلک کرکے آپریٹ کیا جاسکتا ہے۔ ٹاسک بار میں ہمیشہ نوٹیفکیشن آئیکن دکھانے کے لیے، ٹاسک بار میں چھپے ہوئے آئیکن دکھائیں پر کلک کریں اور ڈریگ کریں۔ RAAS Client آئیکن سے مرئی آئیکنز ایریا۔

## **RAAS Server Configuration1.2**

RAAS Server Configuration شروع مینو سے شروع کیا جا سکتا ہے، فائل ایکسپلورر میں سرور پر دائیں کلک کر کے اور منتخب کر کے "RAAS Server Configuration یا دائیں کلک کرکے RAAS Client سسٹم ٹرے میں آئیکن اور یا تو منتخب کریں "RAAS Server Configurationروٹ مینو میں یا سرور مینو میں سے کسی ایک میں۔ یہ ان سیٹنگز کو کنفیگر کرنے کے لیے استعمال کیا جاتا ہے جو ہر سرور کے لیے لاگو ہونا چاہیے۔

- سرورز کو سرور لسٹ باکس کے ذریعے منتخب کیا جا سکتا ہے، کسی خاص سرور کی ترتیب کو تبدیل کرنے کے لیے۔
- سرور شامل کرنے کے لیے "شامل کریں..." بٹن پر کلک کریں اور اس کے بعد سرور کا نام یا سرور آئی پی داخل کریں اور "شامل کریں" بٹن پر کلک کریں۔
  - کسی سرور کو ہٹانے کے لیے ہٹانے کے لیے سرور کو منتخب کریں اور "ہٹائیں" بٹن پر کلک کریں۔

ترتیب کو ٹیبز میں ترتیب دیا گیا ہے، اور ہر ٹیب کے نیچے دستیاب ترتیبات کو درج ذیل حصوں میں پیش کیا گیا ہے۔

## 1.2.1 حنرل

سرور کو فعال کریں: سرور کو فعال بناتا ہے اور سرور کی تمام
 ترتیبات کو لاگو کرتا ہے۔ سرور کو اس وقت تک فعال پر سیٹ نہیں کیا
 جانا چاہیے جب تک کہ تمام سیٹنگز کنفیگر نہ ہو جائیں۔

#### ترتیبات:

- عرف: اس بات کا تعین کرتا ہے کہ سرور میں کون سا عرف ہونا
   چاہیے۔ RAAS Client انٹرفیس
- اکاؤنٹ: سرور کے ساتھ رابطے کے لیے استعمال کرنے کے لیے ونڈوز اکاؤنٹ کا تعین کرتا ہے۔
- **Password**: Determines the password to the windows account .to use for communication with the server

- **Domain**: Determines the domain for the windows account to

  .use for communication with the server
- **RDP authentication**: Determines which authentication rules to use when connecting though RemoteApp to the server, using .the RDP protocol
  - **Auto reconnect**: Determines if RemoteApp should be reconnected to automatically if it was connected to before .lock, sleep or hibernate etc
  - Autostart startup programs: Determines if applications which are configured to start automatically during startup on the server should start automatically through RemoteApp .when first connecting
  - **Keep alive agent**: Determines if a keep alive agent should be started through RemoteApp on the server when first connecting, to prevent the connection from automatically .disconnecting when no applications are opened
- **Redirect clipboard**: Determines if clipboard redirection should .be on or off
- **Redirect devices**: Determines if devices should be redirected. This option requires additional settings to be active, which are .documented by Microsoft
- **Redirect printers**: Determines if printer redirection should be on or off
  - **Show notifications**: Determines if the user should receive a balloon tip notification when connecting or disconnecting RemoteApp. Notifications need to be activated in Windows .settings for notification to work

#### :Connection RAAS Server

- Status: Displays information about the servers current communication status. "No contact" indicates that no communication is present, "Contact" indicates that the server is reachable, "Available" indicates that communication with the RAAS Server service on the server is present and "Connected", which indicates that the server is connected to .through RemoteApp
- version: This information is only present if RAAS Server
   communication with the RAAS Server service on the server is present, and indicates the installed version of RAAS Server on .the server
- **Connect/Reconnect**-button: Used to connect or reconnect to

  .the server through RemoteApp

**Disconnect**-button: Used to disconnect the server from • .RemoteApp

#### Remote Shortcuts 1.2.2

**Enable remote shortcuts**: Makes remote shortcuts active and • applies all remote shortcuts settings

#### :Remote Shortcuts Settings

- Create start-menu shortcuts: Determines if start-menu shortcuts on the server should be transferred to the current user of the local computer, to be started through RemoteApp.

  Shortcuts will be placed in a dedicated folder in the start.menu with the name format [Server alias]
- Create Windows Apps shortcuts: Determines if Windows

  Apps shortcuts on the server should be transferred to the
  current user of the local computer, to be started through
  RemoteApp. Shortcuts will be placed in a dedicated folder in
  the start-menu with the name format [Server alias]. For
  Windows Apps shortcuts to be tranferred after an installation
  Update Shortcuts need to be chosen for the server from
  .the RAAS Client notification area
- **Create desktop shortcuts**: Determines if desktop shortcuts on the server should be transferred to the current user of the local .computer, to be started through RemoteApp
  - Place desktop shortcuts on desktop root: Determines if transferred desktop shortcuts from the server should be placed on desktop root of the current user. The alternative is to place them in a dedicated folder on the desktop with the .name format [Server alias]
  - Append server alias to shortcut names: Determines if shortcuts that are transferred from the server should be given .names that are appended by the server alias
- **Server language for shortcut names**: Determines if shortcuts that are transferred from the server should be given names .according to the installed language on the server

#### Visualizations 1.2.3

**Enable visualizations**: Makes visualizations active and applies • .all visualizations settings

:Visualizations Settings

- **Main color**: Determines the main color to use for all .visualizations
- **Text color**: Determines the color of text used for all .visualizations
- **Line color**: Determines the color of lines used for all .visualizations
- **Frames**: Determines if RemoteApp windows for applications on the server should have a frame decorization. The frames can be used to indicate to the user which applications belong .to the server
- **Connection bar**: Determines if a connection bar should be present when a RemoteApp window for an application on the server is active. The connection bar can be used to indicate .that an application on the server is receiving input
- **Connection bar opacity**: If "Connection bar" is set, this setting .determines the opacity of the connection bar

## File Explorer Extension 1.2.4

Enable in File explorer extension: Makes the server visible in • the RAAS Client File explorer extension and applies all .effective RAAS Client File explorer extension settings

Visible Folders: Use these options to determine which user folders that should be visible for the server in the File explorer extension

Visible Devices and Drives: Use these options to determine which types of devices and drives that should be visible for the server in the File .explorer extension

#### **RAAS Client 1.3**

The RAAS Client application is reached through its system tray icon. When right-clicking the icon in system tray a context menu will appear.

The menu items of this context menu will be described in this section.

- **Remote Desktop**: Opens the RAAS Client Remote" ."Desktop application, with no server selected
- Opens the RAAS Server : **RAAS Server Configuration** ."Configuration application, with no server selected
  - .Help (pdf): Opens a pdf with help concerning RAAS •
  - **About**: Opens a window with information about the .RAAS Client installed
    - .RAAS Client Exit: Closes •

The context menu contains one sub menu for each enabled server. A red circle before the server name indicates that the server is offline, a yellow circle before the server name indicates that the server is available and a green circle before the server name indicates that a connection through .RemoteApp to the server exist

#### :Server sub context menu

- **Connect**: Creates a connection to the server through .RemoteApp
- .**Disconnect**: Disconnects the server from RemoteApp •
- **Reconnect**: Reconnects the RemoteApp connection to the .server
  - .Loggoff: Logs out all logged in users from the server
    - .Reboot: Reboots the server •
- **Update Shorcuts**: Updates all remote shortcuts from server. •

  This action is required when installing Windows Apps

  .shortcuts
- **Remote Desktop**: Opens the "RAAS Client Remote Desktop" .application with the server selected
  - Opens the "RAAS Server : RAAS Server Configuration .Configuration" application with the server selected

## File Explorer Extension RAAS Client 1.4

If shell namespace extension is installed for ,RAAS Client there will be a section in File explorer called "RAAS Client" in the treeview of File explorer root level. This section can be used to handle files and folders for each server which has File explorer extension active in settings. It is designed to function just as normal handling of files and filders in File Explorer, with some additional options which are described in this .section

#### :Right-clicking a server

- **Remote Desktop**: Opens the RAAS Client Remote" ."Desktop application with the server selected
- Opens the "RAAS Server : RAAS Server Configuration .Configuration" application with the server selected

#### :Right-clicking a file

- **Open on remote host**: Opens the file on the remote host .through RemoteApp
- **Create remote shortcut**: Creates a shortcut which starts the file on the server through RemoteApp when activated. The file

is created in the current folder.

:Right-clicking a file and dragging it to another location before release

**Create remote shortcut here**: Creates a shortcut which starts • the file on the server through RemoteApp when activated. The .file is created in the location which the file was dragged to

## **RAAS Client Remote Desktop 1.5**

can be started by right-clicking a server "RAAS Client Remote Desktop" in the File explorer extension and choosing "Remote Desktop" or by right-clicking the RAAS Client icon in system tray and either choosing "Remote Desktop" in the root menu or in one of the server menus. It is used to connect to a server with remote desktop using the stored .RAAS Server Configuration credentials, which can be configured using

**Server**: Choose the server to connect to using remote • .desktop

#### :Settings

- **RDP authentication**: Determines which authentication rules to use when connecting though remote desktop to the server, .using the RDP protocol
- **Redirect clipboard**: Determines if clipboard redirection should .be on or off
- **Redirect devices**: Determines if devices should be redirected. This option requires additional settings to be active, which are .documented by Microsoft
- **Redirect printers**: Determines if printer redirection should be on or off
- **Fullscreen**: Determines if remote desktop should be started in .fullscreen mode
  - **Connection bar**: Determines if a connection bar should be .present in fullscreen mode
- **Pin connection bar**: Determines if the connection bar should .be pinned initially
- **Dektop width**: Determines the desktop width for the remote .desktop session
  - **Desktop height**: Determines the desktop height for the .remote desktop session

## Search & Run 1.6

provides an easy way to search for installed applications Search & Run on the server and then run the applications. It is installed on the server but is inteded to be used as a RemoteApp application through RAAS Client on the client computer. It functions as a replacement for Windows search, which is not accessible through RAAS Client. Searching for files is performed by looking for files which begin with the provided string in the search field. "\*" in the string matches any string and "?" in the string .matches any character

## **RAAS Server 2**

In order to control servers, or host computers, through RAAS .Client , RAAS Server needs to be installed on the host computers

## **Installation 2.1**

is installed by downloading RAASServer\_[version]\_x64.msi RAAS Server to a server, or host computer, and opening the file. If default installation is sufficient the only actions which need to be taken is accepting the .licence agreement and hitting install

In order use RAAS Server from a RAAS Client computer, you need to login once through the desktop interface once the program is installed .with the user you wish to control the server with through RemoteApp

System requirements: Supports 64 bit versions of Windows 10 & 11 Pro and Enterprise as well as Windows Server RDS. .NET Framework 4.8 and ...NET 8 are both needed

## Advanced settings 2.1.1

If default installation is inadequate, it can be customized by clicking the "Advanced" button when installing. In this section it is possible to choose which features to install by enabling or disabling features in the interface.

Details of a feature is presented underneath the box containing the .controls when selecting it

If installed on Windows Server for RDS access it is recommended to disable the ability to reboot the server from the RDS clients. This can be configured by clicking the "Advanced" button on the installation and selecting "Entire feature will be unavailable" for the feature named "Can ."Reboot

## Recommeded Windows 2.2 configuration

- It is recommended to allow password protected authentication to the computer shares on the server to allow access through the RAAS Client File explorer extension on the client computer.

  Documentation to provide password protected authentication to the computer shares on the server is documented by

  .Microsoft
  - It is recommended to disable User Account Control, UAC, on
    the server to be able to install programs on the server
    through RAAS Client RemoteApp. User Account Control and
    privilage escalation are not supported by RAAS
    Client RemoteApp. Documentation to disable User Account
    .Control is provided by Microsoft
- Remote desktop connections need to be allowed on the server .RAAS Client for Microsoft RemoteApp to work with
- communicates with RAAS Server through port RAAS Client 43000, this port need to be allowed through firewalls. An entry in Windows firewall is automatically created on installation .RAAS Server of
  - An initial connect to the server with the user you wish to control the server with through RemoteApp is required for shortcuts to be created
- If used with connection bar from RAAS Client, it is recommended to disable the Multi-tasking setting "Show snap layouts when I drag a window to the top of my screen", which is accessible in Windows system settings. That function comes in conflict with the RAAS Client connection bar when used simultaneously. Changing this will make the remote applications run more smoothly

#### Search & Run 2.3

provides an easy way to search for installed applications Search & Run on the server and then run the applications. It is installed on the server but is inteded to be used as a RemoteApp application through RAAS Client on the client computer. It functions as a replacement for Windows search, which is not accessible RAAS Client. Searching for files is performed by looking for files which begin with the provided string in the search field. "\*" in the string matches any string and "?" in the string .matches any character

## **Versioning 3**

New versions of RAAS Client and RAAS Server should be published at the same time with the same version number corresponding to the version tag in GitHub. RAAS Client and RAAS Server should be compatible as long as the major version number is the same i.e. the first of the numbers .in the file names

# Support 4 Common issues 4.1

File explorer may take longer time to start due to network locations being automatically added to quick access by Windows. In that case the .problem will occur if the network location is unreachable

To resolve: Change open location for File explorer setting from • .""Home" to "This PC