BackupAgent Service Provider Deployment Guide

APS2.0 for Parallels Automation

Revision 1.2 (April 22, 2014)

Contents

Preface 6
Documentation Conventions 6
Typographical Conventions 6
General Conventions 7
Feedback 8
Introduction 9
About This Guide 9
Audience 9
Terms and Abbreviations 9
Business Model Overview 11
BackupAgent Services Provided 11
Service Hierarchy Exposed by BackupAgent 12
Customer's Workflow 13
The integration workflow looks as follows: 13
Customer's Lifecycle 14
Service Hierarchy Subscription Modification Options 14

Localization List 15
Revision History 15
Contractual contact information for BackupAgent 16
Support Expectations 16
Technical Integration Overview 17
General Architecture 17
BackupAgent Services Provided 19
BackupAgent Object Mapping 19
Integration Prerequisites 20
Prepequisites for BackupAgent Application 20
Prerequisites for APS Endpoint 21
Prerequisites for APS Controller 21
Deploying BackupAgent Application 23
Deploying BackupAgent APS 2.0 Package 24
Preparing Endpoint 24
Register Endpoint in POA 24
Install Additional Required Software 24
Mark Endpoint with Provisioning Attribute 24
Mark Endpoint as Ready to Provide 24
Importing BackupAgent Application 25
Creating an instance of BackupAgent Application 26
Configuring Services for Selling - POA 28
Resource Creation 29
Profiles 30
Branding Options 31
Service Template Creation 32
Configuring Services for Selling - PBA 33
Service Plans 33
Bundling or Composite Resource Creation ... **Error! Bookmark not defined.**
Adding to Order Forms ..... **Error! Bookmark not defined.**
Reseller options ..... **Error! Bookmark not defined.**

Index..... 34

CHAPTER 1

Preface

In This Chapter

Documentation Conventions 6
Feedback.....8

Documentation Conventions

Before you start using this guide, it is important to understand the documentation conventions used in it.

Typographical Conventions

The following kinds of formatting in the text identify special information.

Formatting convention	Type of Information	Example
Special Bold	Items you must select, such as menu options, command buttons, or items in a list.	Navigate to the QoS tab.
	Titles of modules, sections, and subsections.	Read the Basic Administration module.
Italics	Used to emphasize the importance of a point, to introduce a term or to designate a command line placeholder, which is to be replaced with a real name or value.	These are the so-called *shared VEs*. To destroy a VE, type `vzctl destroy` *`VEid`*.
Important	An important note provides information that is essential to the completion of a task. Users can disregard information in a note and still complete a task, but they should not disregard an important note.	**Important**: The device drivers installed automatically during Setup are required by your system. If you remove one of these drivers, your system may not work properly.

Note	A note with the heading “Note” indicates neutral or positive information that emphasizes or supplements important points of the main text. A note supplies information that may apply only in special cases—for example, memory limitations, equipment configurations, or details that apply to specific versions of a program.	**Note**: If Windows prompts you for a network password at startup, your network is already set up and you can skip this section.
`Monospace`	The names of commands, files, and directories.	Use `vzctl start` to start a VE.
Preformatted	On-screen computer output in your command-line sessions; source code in XML, C++, or other programming languages.	Saved parameters for VE 101
Preformatted Bold	What you type, contrasted with on-screen computer output.	**# rpm –V virtuozzo-release**
CAPITALS	Names of keys on the keyboard.	SHIFT, CTRL, ALT
KEY+KEY	Key combinations for which the user must press and hold down one key and then press another.	CTRL+P, ALT+F4

General Conventions

Be aware of the following conventions used in this book.

- Modules in this guide are divided into sections, which, in turn, are subdivided into subsections. For example, Documentation Conventions is a section, and General Conventions is a subsection.
- When following steps or using examples, be sure to type double-quotes ("), left single-quotes (`), and right single-quotes (') exactly as shown.
- The key referred to as RETURN is labeled ENTER on some keyboards.

Commands in the directories included into the PATH variable are used without absolute path names. Steps that use commands in other, less common, directories show the absolute paths in the examples.

Feedback

If you have found a mistake in this guide, or if you have suggestions or ideas on how to improve this guide, please send your feedback using support@backupagent.com. Please include in your report the guide's title, chapter and section titles, and the fragment of text in which you have found an error.

CHAPTER 2

Introduction

In This Chapter

About This Guide.....9
Audience 9
Terms and Abbreviations 9

About This Guide

This guide describes the integration of Parallels Automation with BackupAgent.

This document was developed by BackupAgent. For additional information, please contact sales@backupagent.com.

Audience

This guide is intended for:

- Providers that use Parallels Automation and want to sell BackupAgent services to customers.
- Technical support engineers that configure BackupAgent services.

Terms and Abbreviations

- *APS* – Application Packaging Standard, an open standard that was designed to simplify the delivery of SaaS applications in the cloud-computing industry.
- *PA* – Parallels Automation, which includes both POA and PBA.
- *PBA* – Parallels Business Automation.
- *POA* – Parallels Operations Automation.
- *APS Controller* – The software which executes all APS provisioning tasks.
- *Endpoint* – Intermediate host for converting endpoint APIs such as BackupAgent's to a REST interface. Previously such endpoints were referenced as Provisioning Hosts.

CHAPTER 3

Business Model Overview

This section contains an outline of how the integration of BackupAgent and PA is consumed by the end customer and the list of BackupAgent features that are supported within the integration package.

BackupAgent empowers MSPs, Hosting Providers, Telcos and Cloud Distributors to sell cloud backup to SMBs through a platform praised for its simplicity, private labeling, easy monitoring, scalability and extended plugins.

BackupAgent Services Provided

The APS 2.0 integration package automates and centralizes the provisioning, monitoring and the rebranding of BackupAgent's cloud backup services in Parallels Automation or any other APS 2 Controller available.

BackupAgent offers cloud backup services to SMBs for securing data of laptops, PCs, Mac OS-X, Windows Servers and Linux servers.

The BackupAgent APS package allows an SMB to purchase cloud backup services from the service provider. The SMB then has the ability to create service users accounts for each of their employees requiring the solution provided by BackupAgent. Each employee then has the ability to login to the CCP with the service user account credentials and deploy a new subscription of BackupAgent. After the service user deploys a new BackupAgent subscription, they must allocate a Profile with an allotment of disk space to that subscription out of the pool of available Profiles that has been assigned to them.

Each employee with then be able to use their instance of the BackupAgent product. The SMB will be billed for each subscription on a monthly basis. Any overages in disk space usage will result in additional charges to the SMB at the rate set by the service provider.

The SMB will have the ability to cancel individual subscription of BackupAgent when they are no longer needed to avoid unnecessary service charges.

Table of billable offerings of BackupAgent per service user

Attribute	Type	Period
Storage quota	Disk space	Monthly
Bandwidth	Kbps	Monthly
Is server profile	Yes/No	Monthly
Is trial	Yes/No	Monthly

Service Hierarchy Exposed by BackupAgent

- BackupAgent Application and Brand
    - BackupAgent SMB Account
        - BackupAgent service user account
            - BackupAgent Profile
                - Disk quota
                - Bandwidth (0 is unlimited)
                - Server / Workstation profile
                - Normal / Trial account

Customer's Workflow

The integration workflow looks as follows:

1. The customer purchases a subscription based on a BackupAgent service template
2. The subscription is automatically provisioned for the customer; a 'BackupAgent' tab appears in the customer POA environment
3. The 'BackupAgent' tab will show an empty overview of all available subscriptions
4. The customer clicks on 'New user' in which case he/she can assign a profile to an existing Service User
5. The Service User receives an email confirmation of the obtained subscription details
6. The Service User can now login and will see a 'BackupAgent' tab
7. The Service User can download the client software and install it on the machines it wants to backup.

Customer's Lifecycle

BackupAgent allows the customer to use the service after the initial setup workflow is complete. If the customer wishes to upgrade their profile allocation they can do so at any time in the billing cycle.

Indicate which services in the services hierarchy can be turned on or off and upgraded or downgraded

Service Hierarchy Subscription Modification Options

- BackupAgent SMB account (cannot switch Storage iD)
  - BackupAgent service user account (cannot switch Storage ID)
    - BackupAgent subscription
      - Disk quota
      - Bandwidth
      - Server / Workstation profile
      - Normal / Trial (Normal users cannot switch to trial account)

CHAPTER 4

Localization List

BackupAgent has been localized in the following languages for each category

1. Customer Interface
    a. EN
2. PA task manager error logging
    a. EN
3. BackupAgent API error messaging
    a. EN
4. BackupAgent external communication to customer
    a. (Linked to the customer's CCP locale)

Revision History

2.0 Build 25

- Changes

Contractual contact information for BackupAgent

Service Providers using Parallels Automation should enter into a BackupAgent SPLA or BackupAgent Cloud agreement to initiate the (reseller) account creation process by executing the required contracts before BackupAgent can be resold

Terms and conditions for the BackupAgent Cloud can be read here:

https://cloud.backupagent.com/terms

Support Expectations

BackupAgent's support expectations are as follows:

https://cloud.backupagent.com/terms (see tab Support)

BackupAgent's SLA for the Cloud is as follows:

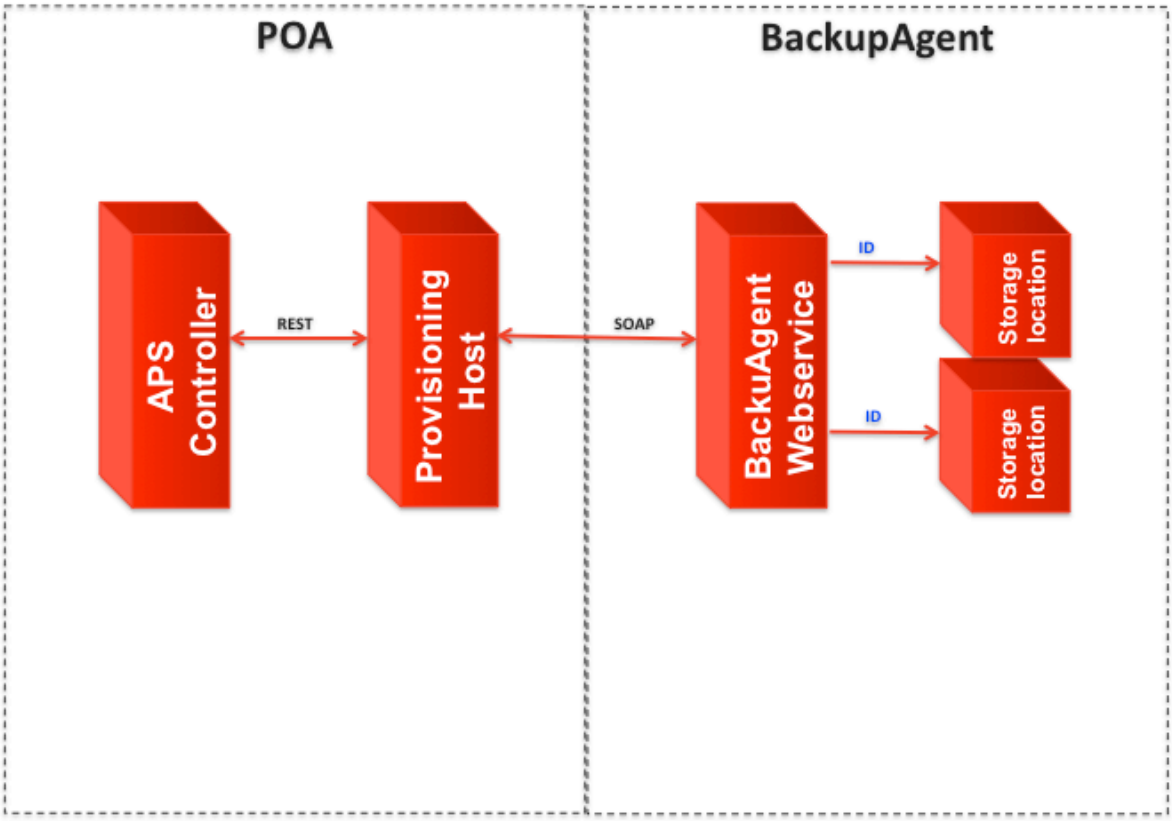
https://cloud.backupagent.com/terms (see tab SLA)

Technical Integration Overview

This section contains an outline of how the integration of BackupAgent and PA is performed and the list of BackupAgent features that are supported within the integration package.

General Architecture

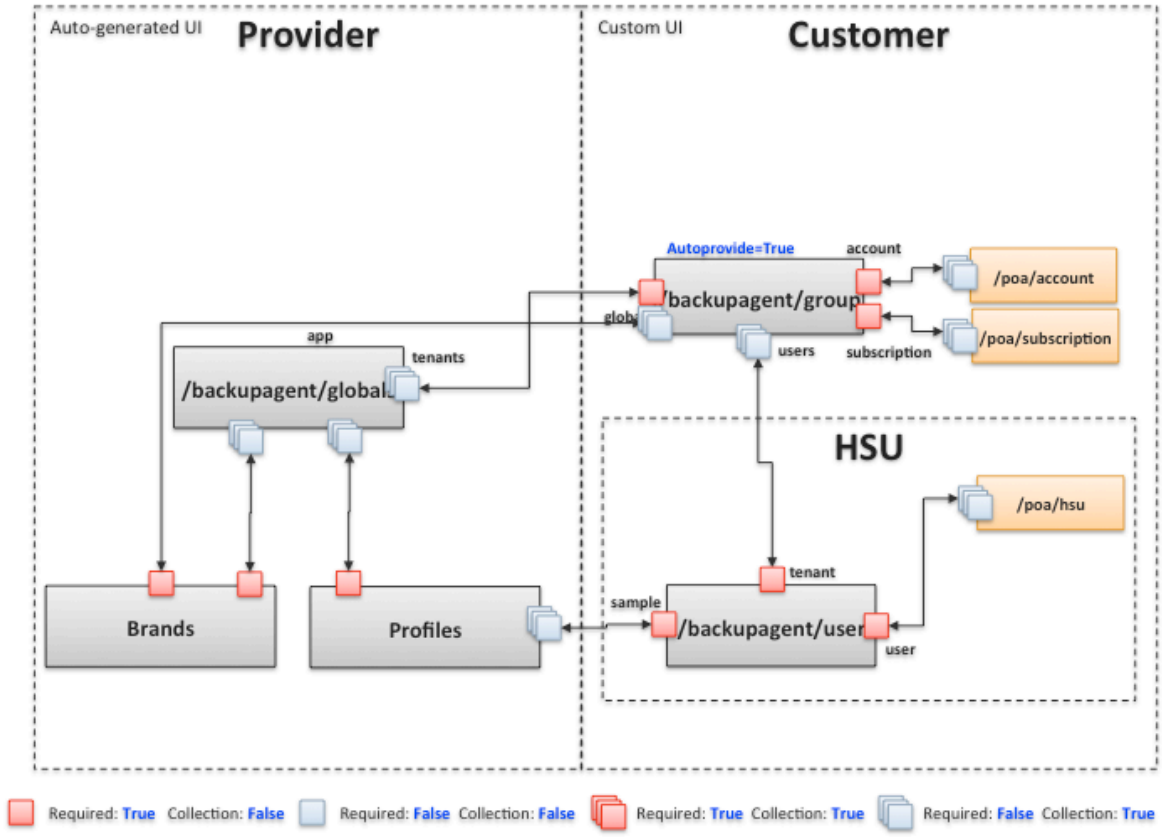
The following scheme represents the architecture of POA and BackupAgent integration:



The integration scheme comprises the following parts:

- APS Controller (part of POA)
- APS Provisioning gateway (REST Endpoint Server)
- BackupAgent Server (with Webservices API endpoint – SOAP/XML)
- BackupAgent storage locations (has unique ID for provisioning)

The integration workflow looks as follows:



BackupAgent Services Provided

BackupAgent offers these available services per service user:

- Workstation backup on Windows and Mac OS-X
- Server backup on Windows Server and Linux

Each service user will have a profile with specific service resources. The most important service resource is the storage quota.

In order to provision and monitor all the services for the service users, each customer will be obtaining a group login for its staff member in BackupAgent.

Also, each Brand can hold a reseller login so this brand can be tied to a reseller in POA and the reseller can monitor all backup services of all customers in the BackupAgent Management Console.

BackupAgent Object Mapping

Table of Object Mappings in BackupAgent for POA

In POA	In BackupAgent	Notes
Brand	Reseller group (private label)	Requires available private label credits in SP license
Profile	Account type	Account type is created if it does not exist
Customer account	Customer group	Group login is matched with staff member login
HSU	User	

Integration Prerequisites

Before you start integrating BackupAgent into PA, learn about necessary preparations to the process.

Prepequisites for BackupAgent Application

In order to be able to integrate BackupAgent to POA as a Service Provider you need to have the following information available:

- BackupAgent's WebService API endpoint (e.g. https://cloud01.backupagent.com/cloudbackupservice/backupservice.asmx)
- Administrator login and password (in case of own datacenter deployment)
- OR service provider tenant login and password on BackupAgent Cloud
- Storage ID of storage location in which backups of service users will be stored

Prerequisites for APS Endpoint

General criteria:

PHP 5.0.3 or higher on the Endpoint

Prerequisites for APS Controller

General criteria:

In case of Parallels Automation the version of POA should be 5.5.5 or higher

CHAPTER 5

Deploying BackupAgent Application

It is assumed that providers deploy BackupAgent by themselves with the needed configuration and then import the BackupAgent APS 2.0 package to POA and configure BackupAgent service offerings for selling. (In this case, the integration of POA and BackupAgent in the frame of APS package does not include BackupAgent deployment and BackupAgent infrastructure management.)

For information about BackupAgent Server deployment in the datacenter of the Service Provider, see https://support.backupagent.com/hc/en-us/articles/200571756-Server-Installation-Manual (login required).

In case the service provider is using the BackupAgent Cloud services, no BackupAgent application deployment is required and the service provider can request details about the BackupAgent Internal Hostname and Admin Login here:

http://www.backupagent.com/support

CHAPTER 6

Deploying BackupAgent APS 2.0 Package

To deploy the BackupAgent APS package on the Endpoint, you need to prepare the host and then import your BackupAgent APS 2.0 package in PA. Find information about how to do it in this section.

In This Chapter

Preparing Endpoint.....24
Importing BackupAgent Application 24

Preparing Endpoint

The host must be registered in POA and the following steps taken:

Register Endpoint in POA

Install Additional Required Software

Mark Endpoint with Provisioning Attribute

Mark Endpoint as Ready to Provide

To install the additionally required software on the endpoint server (Endpoint) execute the following:

- SSH to Endpoint server
- Install libmcrypt rpm
- Install php-mcrypt
- Install backupagent2 rpm

Details can be found in the POA providers guide (http://download.pa.parallels.com/poa/5.5/).

Importing BackupAgent Application

To Import the BackupAgent application to POA:

- In the control panel, go to Top > Service Director > Application Manager > Applications. The list of the applications appears.
- Click the Import Package button.
- Import the application package from the local workstation, select the local file option, and specify the path to the application file using the Browse... button.
    - OR
- Import the application package from catalog
- Select the Enabled (available in subscriptions) checkbox.
- Click the Submit button.

Creating an instance of BackupAgent Application

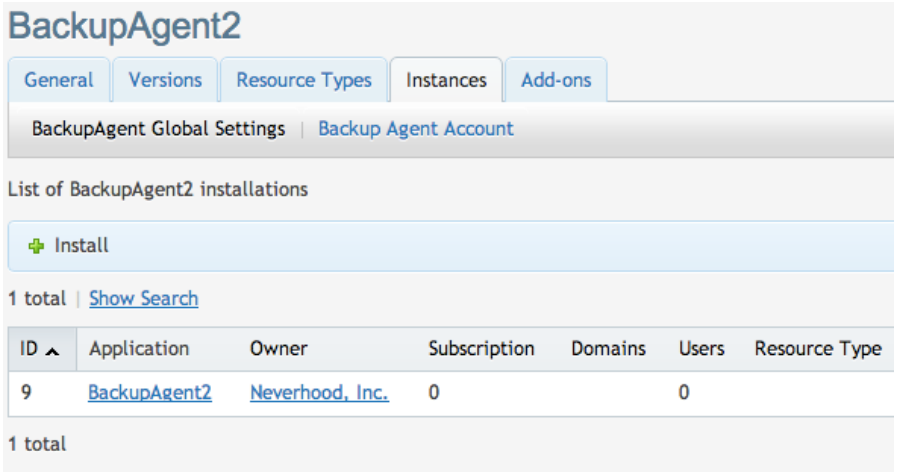
For Customers to be able to use a multi-tenant application, you need to create an instance of the application.

To create an instance of the application, use the following instructions:

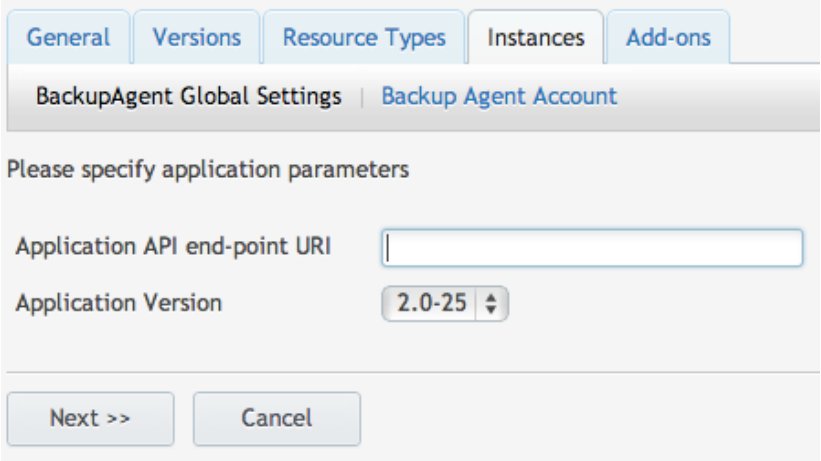
1. In POA Control Panel, go to **Services > Applications > APS Packages Tab**. The list of the Application Packages appears.

2. Click **BackupAgent** and the General tab of the application will appear.

3. Open the **Instances** tab and then click the **Install** button.



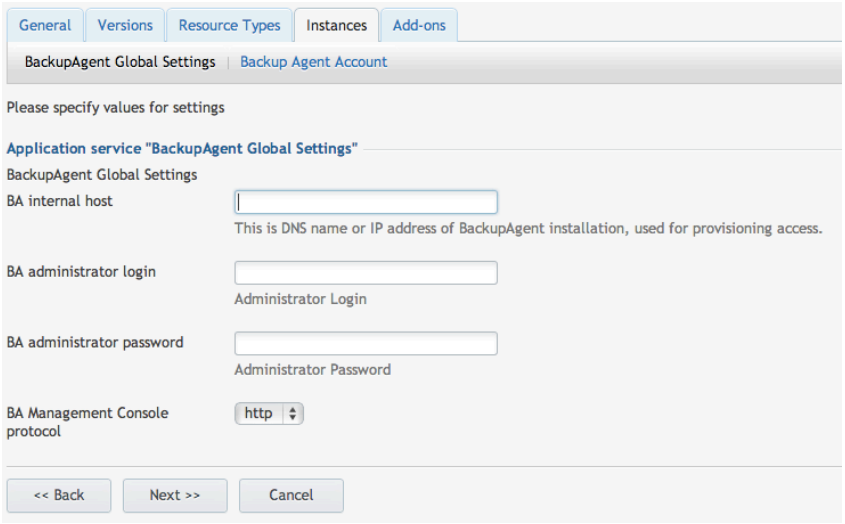
4. Type into the Application API end-point URI field the deployed application's endpoint *(example-* endpoint.xyzcompany.org) and click the **Next** button.



(Make sure the latest Application Version is selected from the dropdown)

Application API MUST be http://<ENDPOINT>/BackupAgent2 otherwise task will fail

5. Specify the global settings as listed in the Prerequisites for the BackupAgent Application:



6. Press Next and Finish to install the instance

CHAPTER 7

Configuring Services for Selling - POA

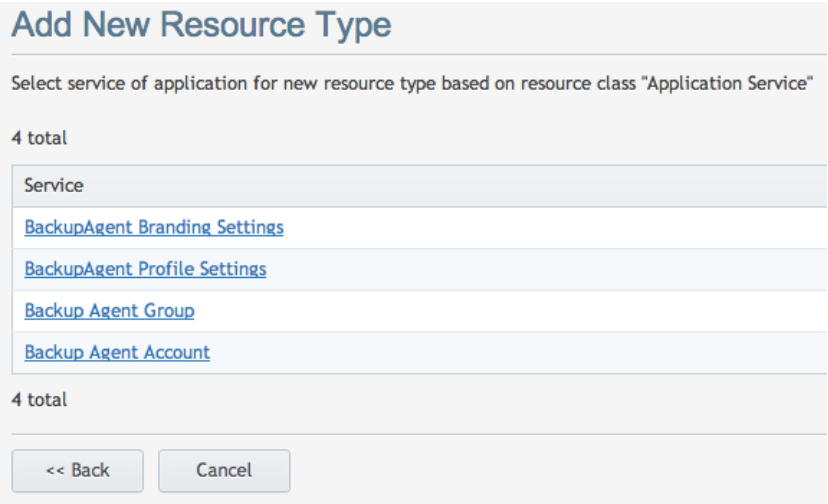
Learn about how to configure the service templates that are necessary to form BackupAgent APS subscriptions for sale.

In This Chapter

Resource Creation 29
Service Template Creation 32
Branding Options.....30
Localization 32

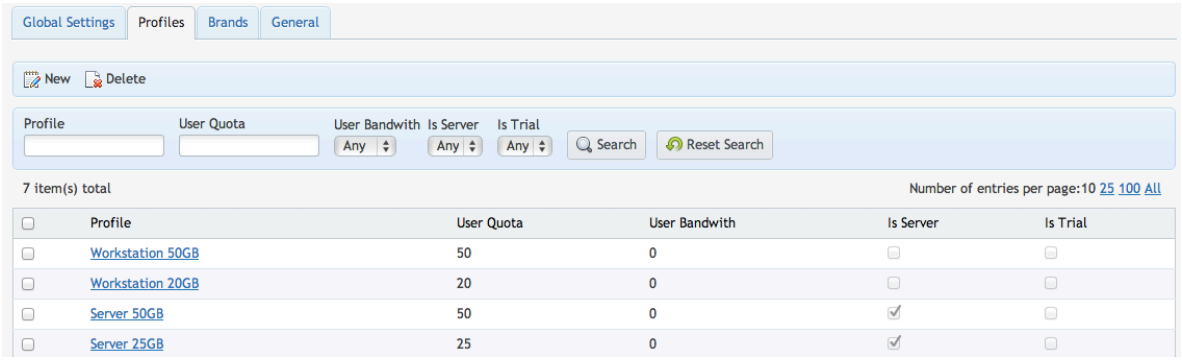
Resource Creation

- Create at least one of each of the following resource types
  - Global Settings
  - Branding Settings
  - Profile Settings
  - Group
  - Account



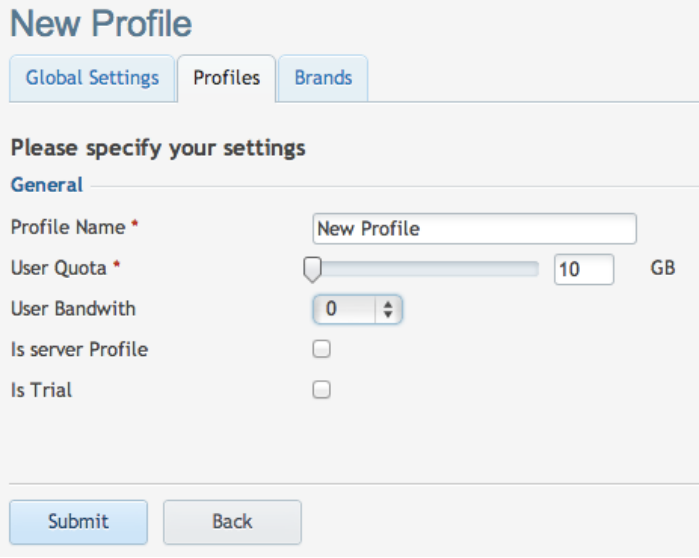
The **Branding Settings** and **Profile Settings** resource types are managed strictly through the BackupAgent APS Instance provider interface.

Go to Services > Applications > BackupAgent and click *Instances*



Profiles

- BackupAgent Profiles contain the following service resources for a service user:
  - Friendly Profile Name *(tip: do add the size of the storage in the name)*
  - User quota is the total amount of storage the service user can take for storing backup data *(tip: there's no limit on computers per account)*
  - User bandwidth *(0 is unlimited)*
  - Is server Profile *(enables Server features in installed client software)*
  - Is trial *(account is in trial state and expires in several weeks)*



Branding Options

BackupAgent has the following branding options:

BA download URLs:	Configurable links to download URLs of various online backup clients.
BA Storage ID:	This is the storage location ID as defined in the BackupAgent management console. Example is '1002'. You can find this by logging in the management console and navigate to Server Settings > Storage locations tab.
Reseller login:	Login for a reseller (this will be created on-the-fly if it does not already exist)
Reseller password:	Password for reseller login
BA public URL:	The URL which is used to login to the BackupAgent server and is also used for single sign-on. By default it is the DNS of the internal host. This can be rebranded.
Service URLs:	Four service URLs must be defined and can also be rebranded.
Reseller email address:	Communication email address of reseller
Max usage warning:	Warns the user if his/her personal backup account uses x% of quota.
Days before… mail:	Sets the amount of days that have to pass before the user is warned that the system received no backup.
Custom CSS	Customizable items (like colors) can be added here to change the style of APS elements

Service Template Creation

Create at least one service template. It should contain only one resource type of:

- Global Settings
- Branding Settings
- Group
- Account

Global settings have been created when the instance of BackupAgent was created. All you need to do is to include it in the Service Template.

Add at least one, but preferably multiple Profile Settings.

Example schedule of a Service Template:

Resource Name	Resource Class	Limit	Auto-Provide
BA Globals	Application Service Reference	1	N/A
BA Brand	Application Service Reference	1	N/A
BA Group	Application Service	1	Yes
BA User	Application Service	Unlimited	No
BA Workstation 10 GB	Application Service Reference	1	N/A
BA Workstation 20 GB	Application Service Reference	1	N/A
BA Server 50 GB	Application Service Reference	1	N/A

Configuring Services for Selling - PBA

Learn about how to configure the service templates that are necessary to form BackupAgent APS subscriptions for sale.

In This Chapter

Service Plans 17
Bundling or Composite Resource Creation 17
Adding to Order Forms 17
Reseller Options 17

Service Plans

- Go to PBA environment in Parallels Automation
- Go to Service Plans and add a new Service Plan – Generic Service Plan
- Give the plan a friendly name and select a Service Template in POA
- Choose ‘Other Services’ Plan Category
- Choose a Billing Period – *monthly and 1 period are recommended*

Remaining options such as Notifications are optional and depend on the implementation preference of the ISP.

The next step is to create a pricing sheet for the appropriate periods of subscription. Once pricing has been programmed, click Finish to store the plan.

Index

BackupAgent Services Provided - 9, 17

BackupAgent Subscriptions Configuration Overview - 27, 31

A

About This Guide - 8

Audience - 8

C

Configuring Services for Selling - 26, 31

Creating BackupAgent Application Resource Type - 30, 31

Creating BackupAgent Diskspace Resource Type - 28, 29, 31

Creating BackupAgent Service Resource Types - 31

Customer’s Workflow - 11

D

Deploying BackupAgent Application - 13, 21

Deploying BackupAgent APS Package - 22

Documentation Conventions - 5

F

Feedback - 7

G

General Architecture - 11, 15

General Conventions - 6

I

Importing BackupAgent Application - 23, 24

Installing Additional Required Software - 22

Integration Overview - 9, 15

Integration Prerequisites - 18

Introduction - 8

M

Marking Endpoint as Ready to Provide - 22

Marking Endpoint with Provisioning Attribute - 22

P

Preface - 5

Preparing Endpoint - 22

Prepequisites for BackupAgent Application - 18

Prerequisites for Endpoint - 19

R

Registering Endpoint in POA - 22

T

Terms and Abbreviations - 8

Typographical Conventions - 5