



Avaya Solution & Interoperability Test Lab

Application Notes for Calero VeraSMART eCAS with Avaya Aura® Communication Manager – Issue 1.0

Abstract

These Application Notes describe the configuration steps required for the Calero VeraSMART eCAS call accounting software to successfully interoperate with Avaya Aura® Communication Manager.

Calero VeraSMART eCAS is a call accounting software that interoperates with Avaya Aura® Communication Manager over the Avaya Reliable Session Protocol (RSP). Call records can be generated for various types of calls. Calero VeraSMART eCAS collects, and processes the call records.

Readers should pay attention to **Section 2**, in particular the scope of testing as outlined in **Section 2.1** as well as any observations noted in **Section 2.2**, to ensure that their own use cases are adequately covered by this scope and results.

Information in these Application Notes has been obtained through DevConnect compliance testing and additional technical discussions. Testing was conducted via the DevConnect Program at the Avaya Solution and Interoperability Test Lab.

1. Introduction

The overall objective of this interoperability compliance testing is to verify that the Calero VeraSMART eCAS call accounting software can interoperate with Avaya Aura® Communication Manager 7.0. Calero VeraSMART eCAS connects to Avaya Aura® Communication Manager over the local or wide area network using a CDR link running on Reliable Session Protocol. Avaya Aura® Communication Manager is configured to send CDR records to Calero VeraSMART eCAS using a specific port.

VeraSMART eCAS Call Accounting provides traditional call collection, rating, and reporting for any size businesses. VeraSMART eCAS Call Accounting can interface with most telephone systems - in particular, with Avaya Aura® Communication Manager - to collect and interpret the detailed records of inbound, outbound, tandem, and internal telephone calls. VeraSMART eCAS Call Accounting then calculates the appropriate charge for local, long distance, international & special calls and allocates them to responsible parties.

During the compliance test, SIP endpoints were included. SIP endpoints registered with Avaya Aura® Session Manager. An assumption is made that Avaya Aura® Session Manager and Avaya Aura® System Manager are already installed and basic configuration have been performed. Only steps relevant to this compliance test will be described in this document.

2. General Test Approach and Test Results

The general test approach was to manually place intra-switch calls, inbound trunk and outbound trunk calls, transfer, conference, and verify that Calero VeraSMART eCAS collects the CDR records, and properly classifies and reports the attributes of the call.

For serviceability testing, physical and logical links were disabled/re-enabled, Avaya Servers were reset and VeraSMART eCAS was restarted.

DevConnect Compliance Testing is conducted jointly by Avaya and DevConnect members. The jointly-defined test plan focuses on exercising APIs and/or standards-based interfaces pertinent to the interoperability of the tested products and their functionalities. DevConnect Compliance Testing is not intended to substitute full product performance or feature testing performed by DevConnect members, nor is it to be construed as an endorsement by Avaya of the suitability or completeness of a DevConnect member's solution.

2.1. Interoperability Compliance Testing

The interoperability compliance testing included features and serviceability tests. The focus of the compliance testing was primarily on verifying the interoperability between Calero VeraSMART eCAS and Communication Manager.

2.2. Test Results

All executed test cases passed, except noted below. Calero VeraSMART eCAS successfully collected the CDR records from Communication Manager via a RSP connection for all types of calls generated including intra-switch calls, inbound/outbound PSTN trunk calls, inbound/outbound private IP trunk calls, transferred calls, and conference calls. The following issues were observed.

- For tandem calls VeraSMART reports the ANI number in the “Special Code” field.
- Timing of call record in VeraSMART’s report is behind 1 minute than the actual timing of call record is issued by Avaya Aura® Communication Manager.
- VeraSMART collects but discard call records with condition code E and F.
- Call records for SIP endpoint usually generates extra record and incorrect call record in some cases because SIP endpoint registers directly to Avaya Aura® Session Manager it seizes a SIP trunk as making or receiving outgoing/incoming call, in order to correct this issue the “off-pbx-telephone configuration-set” is configured for SIP endpoint needs to be administered and shown in **Section 5.5**.

2.3. Support

Technical support for Calero VeraSMART eCAS can be obtained through the following:

- Phone: [\(866\)-769-5992](tel:(866)-769-5992)
- Email: tech.support@calero.com
- Website: <http://www.calero.com/clm/call-accounting-and-reporting/>

3. Reference Configuration

Figure 1 illustrates a sample configuration consisting of an Avaya Aura® System Manager, Avaya Aura® Session Manager, Avaya Aura® Communication Manager, and Avaya Aura® Media Server running on Virtualized Environment, Avaya G450 Media Gateway that has PRI/T1 trunk to PSTN, and Calero VeraSMART eCAS server on the Site 1. Avaya IP Office Server Edition running on Virtualized Environment on the Site 2, Session Manager terminates SIP trunks from both sides.

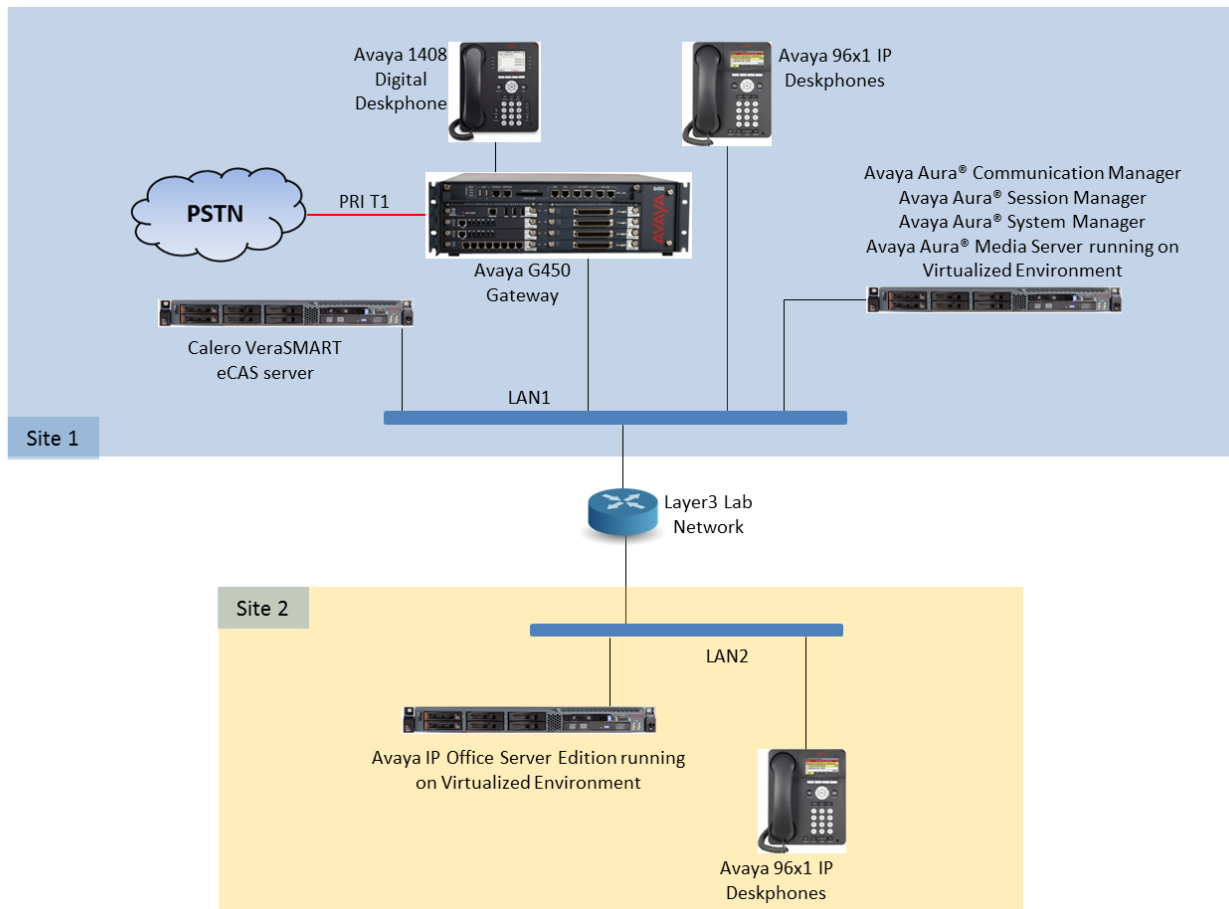


Figure 1: Test Configuration Diagram

4. Equipment and Software Validated

The following equipment and software were used for the sample configuration provided:

Equipment/Software	Release/Version
Avaya Aura® Communication Manager running on Virtualized Environment	7.0.1.1.1-FP1SP1 R017x.00.0.441.0
Avaya Aura® System Manager running on Virtualized Environment	7.0.1.1.065378
Avaya Aura® Session Manager running on Virtualized Environment	7.0.1.1.701114
Avaya Aura® Media Server running on Virtualized Environment	7.7.0.395
Avaya G450 Media Gateway	37.39.0
Avaya 96x1 IP Telephones	H323 6.6.29 SIP 7.0.1.2
Avaya 1408 Digital Telephone	R47
Calero VeraSMART eCAS running on Windows Server 2012	11.1 SP3

5. Configure Avaya Aura® Communication Manager

This section describes the procedure for configuring call detail recording (CDR) in Communication Manager. These steps are performed through the System Access Terminal (SAT). Communication Manager will be configured to generate CDR records using RSP over TCP/IP to the IP address of the server running Calero VeraSMART eCAS.

5.1. Configure Node-Names IP

Use the **change node-names ip** command to create a new node name, for example, **VeraSMART**. This node name is associated with the IP Address of the server running the VeraSMART eCAS application. Also, take note of the node name – “procr”. It will be used in the next step. The “procr” entry on this form was previously administered

change node-names ip		Page 1 of 2
IP NODE NAMES		
Name	IP Address	
AMS1	10.33.1.30	
CMS18	10.33.1.20	
RDTT	10.10.98.86	
VeraSMART	10.10.97.26	
default	0.0.0.0	
lsp	10.33.1.17	
procr	10.33.1.6	
procr6	::	

5.2. Configure IP Services

Use the **change ip-services** command to define the CDR link to use the RSP over TCP/IP.

To define a primary CDR link, provide the following information:

- **Service Type: CDR1** - If needed, a secondary link can be defined by setting Service Type to CDR2.
- **Local Node: procr**
- **Local Port: 0** - The local Port is fixed to 0 because Avaya Communication Manager initiates the CDR link.
- **Remote Node: VeraSMART** - The Remote Node is set to the node name previously defined.
- **Remote Port: 9000** - The Remote Port may be set to a value between 5000 and 64500 inclusive, and must match the port configured in the VeraSMART eCAS.

change ip-services						Page	1 of	4
IP SERVICES								
Service Type	Enabled	Local Node	Local Port	Remote Node	Remote Port			
AESVCS	y	procr	8765					
CDR1		procr	0	VeraSMART	9000			
CDR2		procr	0	RDTT	9001			

On **Page 3** of the ip-services form, enable the Reliable Session Protocol for the CDR link by setting the **Reliable Protocol** field to “y”

change ip-services							Page	3 of	4
SESSION LAYER TIMERS									
Service Type	Reliable Protocol	Packet Timer	Resp	Session Message	Connect Cntr	SPDU Cntr	Connectivity Timer		
CDR1	y	30			3	3	60		
CDR2	y	30			3	3	60		

5.3. Configure System Parameters CDR

Enter the **change system-parameters cdr** command from the SAT to set the parameters for the type of calls to track and the format of the CDR data. The example below shows the settings used during the compliance test. Provide the following information:

- **CDR Date Format:** “month/day”
- **Primary Output Format:** “unformatted”
- **Primary Output Endpoint:** “CDR1”

The remaining parameters define the type of calls that will be recorded and what data will be included in the record. See to **Reference [2]** for a full explanation of each field. The test configuration used some of the more common fields described below.

- **Use Legacy CDR Formats?:** “y” - Allows CDR formats to use 4.x CDR formats. If the field is set to “y”, then CDR formats utilize the 3.x CDR formats.
- **Intra-switch CDR:** “y” - Allows call records for internal calls involving specific stations. Those stations must be specified in the INTRA-SWITCH CDR form.
- **Record Outgoing Calls Only?:** “n” - Allows incoming trunk calls to appear in the CDR records along with the outgoing trunk calls.
- **Outg Trk Call Splitting?:** “y” - Allows a separate call record for any portion of an outgoing call that is transferred or conferenced.
- **Inc Trk Call Splitting?:** “y” - Allows a separate call record for any portion of an incoming call that is transferred or conferenced.
- **Call Account Code Length:** “5” - The length may be set to a value between 1 and 15. However, during the compliance test, “5” was used.

change system-parameters cdr		Page	1 of	1
CDR SYSTEM PARAMETERS				
Node Number (Local PBX ID):		CDR Date Format: month/day		
Primary Output Format: unformatted		Primary Output Endpoint: CDR1		
Secondary Output Format: unformatted		Secondary Output Endpoint: CDR2		
Use ISDN Layouts? n		Enable CDR Storage on Disk? y		
Use Enhanced Formats? n		Condition Code 'T' For Redirected Calls? n		
Use Legacy CDR Formats? y		Remove # From Called Number? n		
Modified Circuit ID Display? n		Intra-switch CDR? y		
Record Outgoing Calls Only? n		Outg Trk Call Splitting? y		
Suppress CDR for Ineffective Call Attempts? y		Outg Attd Call Record? y		
Disconnect Information in Place of FRL? y		Interworking Feat-flag? n		
Force Entry of Acct Code for Calls Marked on Toll Analysis Form? n		Calls to Hunt Group - Record: member-ext		
Record Called Vector Directory Number Instead of Group or Member? y		Record Agent ID on Incoming? n		
Record Agent ID on Incoming? n		Record Agent ID on Outgoing? y		
Inc Trk Call Splitting? y		Inc Attd Call Record? n		
Record Non-Call-Assoc TSC? n		Call Record Handling Option: warning		
Record Call-Assoc TSC? n		Digits to Record for Outgoing Calls: dialed		
Privacy - Digits to Hide: 0		CDR Account Code Length: 5		
Remove '+' from SIP Numbers? y				

5.4. Configure Intra-Switch CDR

If the **Intra-switch CDR** field is set to “y” on Page 1 of the **system-parameters cdr** form, then use the **change intra-switch-cdr** command to define the extensions that will be subject to call detail records. In the Assigned Members field, enter the specific extensions whose usage will be tracked.

change intra-switch-cdr				Page	1 of	3
INTRA-SWITCH CDR						
Assigned Members:				15	of 5000	administered
Extension	Extension	Extension	Extension			
3301						
3302						
3303						
3402						
3403						
Use 'list intra-switch-cdr' to see all members, 'add intra-switch-cdr' to add new members and 'change intra-switch-cdr <ext>' to change/remove other members						

5.5. Configure Off-PBX-Telephone Configuration Set

SIP endpoints and off-pbx-telephone stations will be automatically created in Communication manager when SIP endpoints were created in Session Manager. However, the off-pbx-telephone configuration-set form needs to be modified in order to call records of SIP endpoint are generated correctly. Enter **change off-pbx-telephone configuration-set** and set **CDR or Origination** to “none” and disable the **CDR for Calls to EC500 Destination?** to “n”.

change off-pbx-telephone configuration-set 1		Page	1 of	1
CONFIGURATION SET: 1				
Configuration Set Description:				
Calling Number Style: network				
CDR for Origination: none				
CDR for Calls to EC500 Destination? n				
Fast Connect on Origination? n				
Post Connect Dialing Options: dtmf				
Cellular Voice Mail Detection: timed (seconds): 4				
Barge-in Tone? n				
Calling Number Verification? y				
Call Appearance Selection for Origination: primary-first				
Confirmed Answer? n				
Use Shared Voice Connections for Second Call Answered? n				
Use Shared Voice Connections for Second Call Initiated? n				
Provide Forced Local Ringback for EC500? n				
Apply Ringback upon Receipt of: Call-Proceeding				
Location to Route Incoming Overlap Calls: station-location-if-set				

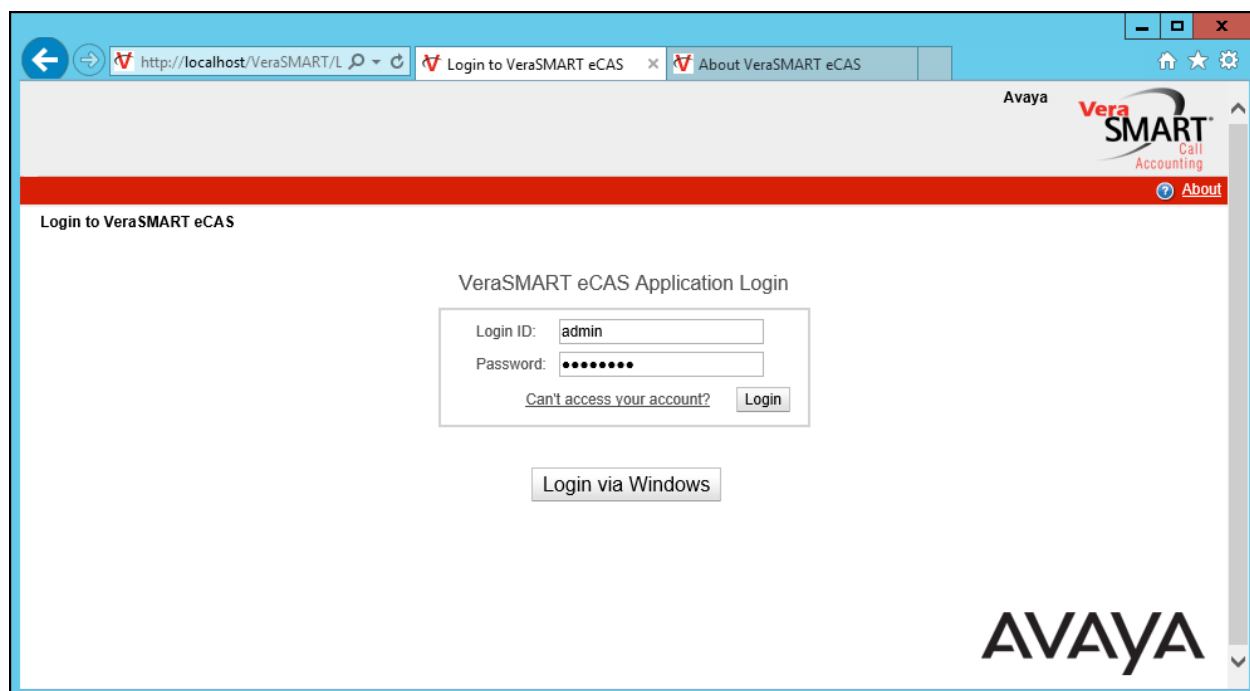
5.6. Enable CDR in Trunk Group

Enter the command **change trunk-group <id>** which the <id> is the trunk number that needs to be modified. Set **CDR Reports** field to “y” to enable call record for calls going in and out from this trunk group. Note that this field is set to “y” by default.

change trunk-group 1			Page 1 of 21	
TRUNK GROUP				
Group Number: 1		Group Type: sip		CDR Reports: y
Group Name: For-Private		COR: 1	TN: 1	TAC: #01
Direction: two-way		Outgoing Display? n		
Dial Access? n		Night Service:		
Queue Length: 0				
Service Type: tie		Auth Code? n		
		Member Assignment Method: auto		
		Signaling Group: 1		
		Number of Members: 14		

6. Configure Calero VeraSMART eCAS

This section describes the configuration of Calero VeraSMART eCAS to receive CDR data from Communication Manager. To configure VeraSMART eCAS, launch a web browser, enter <http://<ipaddress of VeraSMART>/VeraSMART/Login.aspx> as URL, and log in with the appropriate credentials.



From the Main menu, navigate to **Call Accounting → Call Collection → CDR Source** link. Click **Add**.

Welcome, admin ([Change Password](#) | [Preferences](#) | [Logout](#))

Avaya **VeraSMART** Call Accounting

Call Accounting Organization Administration

Extensions Call Detail Call Collection Call Rating Tools Reports Help

CDR Source Wizard

Back Next Finish Cancel

Welcome

To use this Call Accounting System, you will need to create a CDR Source for each call record source. If you are collecting calls from two phone systems, then you will need to create two CDR Source records. Each CDR Source will be given a name, and it will be configured so that you can collect, rate, and report on call records.

This wizard will help you configure a new or partially setup CDR Source. If you are resuming a setup, the wizard will remember all items previously defined.

You will need to provide specific instructions in a series of steps. Then, depending on the call collection method to be used, you may need to identify the Server PC modem or COM port used, the CDR Source baud rate, remote modem phone number, collection file name, etc.

Not all of these items need to be addressed at once, since the wizard can resume the setup where you left off. Consult your CDR Source technician or vendor, if needed.

Please click Next to continue.

Back Next Finish Cancel

In the CDR Source Wizard window, provide the Time Zone of the CDR source and click on the **Next** tab.

Welcome, admin ([Change Password](#) | [Preferences](#) | [Logout](#))

Avaya **VeraSMART** Call Accounting

Call Accounting Organization Administration

Extensions Call Detail Call Collection Call Rating Tools Reports Help

CDR Source Wizard

Back Next Finish Cancel

Welcome

To use this Call Accounting System, you will need to create a CDR Source for each call record source. If you are collecting calls from two phone systems, then you will need to create two CDR Source records. Each CDR Source will be given a name, and it will be configured so that you can collect, rate, and report on call records.

This wizard will help you configure a new or partially setup CDR Source. If you are resuming a setup, the wizard will remember all items previously defined.

You will need to provide specific instructions in a series of steps. This will include information related to the local exchange and rate services. Then, depending on the call collection method to be used, you may need to identify the Server PC modem or COM port used, the CDR Source baud rate, remote modem phone number, collection file name, etc.

Not all of these items need to be addressed at once, since the wizard can resume the setup where you left off. Consult your CDR Source technician or vendor, if needed.

Please click Next to continue.

Time zone*: (UTC-05:00) Eastern Time (US & Canada) ▼

Back Next Finish Cancel

In the CDR Source Wizard window, provide needed information for **CDR Source name**, **Area Code**, **Local exchange** and keep other values at default and click **Next** button.

Welcome, admin ([Change Password](#) | [Preferences](#) | [Logout](#))

Avaya **VeraSMART** Call Accounting

Call Accounting Organization Administration

Extensions Call Detail Call Collection Call Rating Tools Reports Help

CDR Source Wizard

[Back](#) [Next](#) [Finish](#) [Cancel](#)

Identify the source of call records.

Create a CDR Source name. Use up to 25 alphanumeric characters for a unique name (this can be anything that makes sense to you to reference this CDR Source - for example: East Coast, New York Office, Main CDR Source).

Enter the CDR Source area code, local exchange, and local rating method (this depends on the rate service used locally - for example: measured, message, flat, etc.).

CDR Source name*:

Area code*:

Local exchange*:

Local rate method:

Do you want to discard the following types of calls for this CDR Source? These choices can be changed later through the 'edit' CDR Source function.

Internal: ☒ Store ☐ Discard Incoming: ☒ Store ☐ Discard

[Back](#) [Next](#) [Finish](#) [Cancel](#)

Select **Avaya** in the **Manufacturer** dropdown menu and click **Next**.

Welcome, admin ([Change Password](#) | [Preferences](#) | [Logout](#))

Avaya **VeraSMART** Call Accounting

Call Accounting Organization Administration

Extensions Call Detail Call Collection Call Rating Tools Reports Help

CDR Source Wizard

[Back](#) [Next](#) [Finish](#) [Cancel](#)

Select the CDR Source manufacturer.

Every telephone system produces call records in a specific format. The system uses "format" software to interpret call record data.

From the list, select the manufacturer of the CDR Source, or if collecting call records from another call accounting system select "Call Accounting System", then click Next to continue.

Currently assigned Format:

Manufacturer:

[Back](#) [Next](#) [Finish](#) [Cancel](#)

In the **Select the call record format** page, select the format number **175** and click **Next**.

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Call Accounting Organization Administration

Extensions Call Detail Call Collection Call Rating Tools Reports Help

CDR Source Wizard

[Back](#) [Next](#) [Finish](#) [Cancel](#)

Select the call record format.

This page contains a list of CDR Source formats for this manufacturer. Select the call record format used by your CDR Source (if you need help to decide on a specific choice, click its help link). Then click Next to continue.

Displaying 11 to 20 of 24 Page 2 of 3 [Previous](#) [Next](#) [First](#) [Last](#) Items per page: 10

	Format name	Format description	CDR Source software release	Format number	Format revision number
<input type="radio"/>	Avaya Aura Session Manager 6.1, 6.2 FP1	SIP data collection from Avaya Aura Session Manager 6.1, 6.2 FP1 and legacy SM systems.	1.0	200	2.190.14
<input type="radio"/>	CM Aura/DEFINITY systems	For Survivable CDR for media gateway (via SFTP) only	1.0	176	6.186.34
<input checked="" type="radio"/>	CM Aura/DEFINITY systems	For standard RSP and legacy CDR output to local file	1.1	175	7.186.34
<input type="radio"/>	CM Aura/DEFINITY systems	For customized CDR format; supports standard RSP and legacy CDR output to serial port	G3FD1I2	158	10.191.2
<input type="radio"/>	CM Aura/DEFINITY systems	For Expanded Meet-me Conferencing; supports standard RSP protocol and legacy CDR output to serial port or local file	G3FD1I2	154	5.186.34
<input type="radio"/>	Legacy DEFINITY systems	For serial CDR output only	G3FD1I2	146	8.187.40
<input type="radio"/>	(120)System 75	Teleser Format	R1V2,V3,V4	120	1.184.0

In the **Select the call collection method** page, select the **Realtime RSP** method. Click on the **next** link.

Welcome, admin ([Change Password](#) | [Preferences](#) | [Logout](#)) Avaya **VeraSMART** Call Accounting

Call Accounting Organization Administration

Extensions Call Detail Call Collection Call Rating Tools Reports Help

CDR Source Wizard

[Back](#) [Next](#) [Finish](#) [Cancel](#)

Select the call collection method.

This page contains a list of call collection methods. Select the method that best describes the way your calls will be collected. Then click Next to continue.

Displaying 1 to 4 of 4 Items per page: 50

	Call collection method name	Call collection method description
<input type="radio"/>	Collect From File (Local)	Calls are processed from file on the local hard drive.
<input type="radio"/>	Collect From File (Remote)	Calls are processed from file on a remote hard drive.
<input type="radio"/>	Direct Connect over IP	Calls are processed over an IP network connection.
<input checked="" type="radio"/>	Realtime RSP	Processes calls coming from an RSP switch in realtime.

Displaying 1 to 4 of 4 Items per page: 50

[Back](#) [Next](#) [Finish](#) [Cancel](#)

In the **Switch IP address** – Enter the IP address of Communication Manager's **Procr** IP address.

The screenshot shows the VeraSMART Call Accounting web interface. At the top, there's a header with "Welcome, admin" and links for "Change Password", "Preferences", and "Logout". The "Call Accounting" tab is selected in the main navigation bar. Below this, a red navigation bar contains links for "Extensions", "Call Detail", "Call Collection", "Call Rating", "Tools", "Reports", and "Help". The main content area is titled "CDR Source Wizard" and features a "Back", "Next", "Finish", and "Cancel" button set. The configuration section shows "Call collection method: Realtime RSP" and "Switch IP address*: 10.33.1.6". A "Realtime RSP Help" link is provided. A second set of "Back", "Next", "Finish", and "Cancel" buttons is at the bottom of the configuration area.

VeraSMART is trying to establish connection to Communication Manager and retrieving call records.

This screenshot shows the same "CDR Source Wizard" interface, but now it's in a waiting state. The main content area displays the message "Please wait while call records are retrieved...". Below this, there's explanatory text: "If polling a remote unit, this process may take a few minutes. If the CDR Source is not yet connected, click Cancel to exit (when ready, return here to validate CDR Source configuration). If no call records are displayed, there may be issues with settings or connectivity. Click the following link for a help page of possible reasons why no calls are displayed." A "No Calls Help" link is provided. The "Back", "Next", "Finish", and "Cancel" buttons remain at the bottom.

Welcome, admin (
[Change Password](#) |
[Preferences](#) |
[Logout](#))

Avaya

Call Accounting

Organization

Administration

[Extensions](#)
[Call Detail](#)
[Call Collection](#)
[Call Rating](#)
[Tools](#)
[Reports](#)
[Help](#)

CDR Source Wizard

Back

Next

Finish

Cancel

Raw Call Record Viewer

This page contains a list of 'raw' (unformatted) call records coming from the CDR Source. Check the lines of data under the header row and determine if they look valid, without 'garbage' characters.

If valid, click Next to continue. Otherwise, click Back to return to the call collection method page, change the settings, and return to the test viewers again.

[Raw Call Record Viewer Help](#)

Raw call data

	1	2	3	4	5	6	7	8	9	10
1234567890123456789012345678901234567890123456789012345678901234567890										
21450076C			3400	340188888			0001 0	#01 0	000	
214500760	E01		3400	340088888		0 0024	0	0	000	
215100380	E01		3401	340188888		0 0034	0	0	000	
21510038C			3401	340088888		0001 0	#01 0	0	000	
22000054C			3400	340188888		0001 0	#01 0	0	000	
220000540	E01		3400	340088888		0 0044	0	0	000	
220200140	E01		3401	340188888		0 0054	0	0	000	
22020014C			3401	340088888		0001 0	#01 0	0	000	
22130066C			3401	340088888		0001 0	#01 0	0	000	
221300660	E01		3401	340188888		0 0094	0	0	000	
222100040	E01		3401	340188888		0 0104	0	0	000	
22210004C			3401	340088888		0001 0	#01 0	0	000	
22210005C			3400	340188888		0001 0	#01 0	0	000	
222100050	E01		3400	340088888		0 0114	0	0	000	
00:00 10/28										
122500120	E01		3402	340288888		0 0024	0	0	000	
12250012C			3402	340088888		0001 0	#01 0	0	000	
122500020	E01		3400	340088888		0 0034	0	0	000	
12250002C			3400	340288888		0001 0	#01 0	0	000	
122600030	E01		3400	340088888		0 0044	0	0	000	

Back

Next

Finish

Cancel

Click **Finish** button to complete the configuration for Communication Manager.

The screenshot shows the 'CDR Source Wizard' completion screen in the VeraSMART Call Accounting application. The top navigation bar includes 'Call Accounting', 'Organization', and 'Administration'. The main content area displays a congratulatory message and instructions for further configuration. The 'Finish' button is highlighted in the navigation tabs and at the bottom of the wizard.

Welcome, admin ([Change Password](#) | [Preferences](#) | [Logout](#))

Avaya **VeraSMART** Call Accounting

Call Accounting Organization Administration

Extensions Call Detail Call Collection Call Rating Tools Reports Help

CDR Source Wizard

Back Next **Finish** Cancel

Congratulations! You have successfully performed a basic setup for this CDR Source.

We suggest that you go to these areas of the system for additional configuration.

- [Rate Plans](#) - define rating
- [Organization Menu](#) - configure your organization

When rating and organization setup is complete, go to [Call Processing Status](#) and enable rating for this CDR Source. Until you enable rating, calls are being collected, but not rated.

To exit the wizard, click Finish.

Back Next **Finish** Cancel

7. Verification Steps

The following steps may be used to verify the configuration:

- Check the CDR status, by running the **status cdr-link** command in Communication Manager. The status should be **up** for the primary CDR.

status cdr-link	
CDR LINK STATUS	
Primary	Secondary
Link State: up	up
Date & Time: 2016/11/11 10:38:03	2016/11/11 10:38:03
Forward Seq. No: 11	11
Backward Seq. No: 0	0
CDR Buffer % Full: 0.00	0.00
Reason Code: OK	OK

- Make several different types of calls such as between local stations, outgoing call via SIP trunk, and incoming call via PSTN and verify that call records were collected from Calero VeraSMART eCAS and shown up in the report and shown up in the report.

Welcome, admin ([Change Password](#) | [Preferences](#) | [Logout](#))

Avaya VeraSMART Call Accounting

Call Accounting Organization Administration

Extensions Call Detail Call Collection Call Rating Tools Reports Help

View Call Records

Search

Personnel: Extension Used: Dialed/CLI number:

Inventory ID: Call direction:

Start date: Yesterday From 11/10/2016 12:00:00 AM To 11/10/2016 11:59:59 PM

Search

Displaying 1 to 25 of 32 Page 1 of 2 Items per page: 25

	Start date	Duration	Extension Used	Dialed/CLI number	Call destination	Call direction	Call type	Trunk	Tandem Trunk	Cost	Special Code	Account Code	Authorization Code
✓	11/10/2016 10:57:00 AM	00:00:00	3302	3402		INTERNAL	Internal			\$0.00			
✓	11/10/2016 1:53:54 PM	00:00:06	3403	4321		INCOMING	Incoming	#01001		\$0.00			
✓	11/10/2016 1:53:54 PM	00:00:06	3402	4321		INCOMING	Incoming	#01001		\$0.00			
✓	11/10/2016 2:10:48 PM	00:00:12	3302	4321		INCOMING	Incoming	#01001		\$0.00			
✓	11/10/2016 2:10:54 PM	00:00:06	3301	4300		INCOMING	Incoming	#01001		\$0.00			
✓	11/10/2016 2:11:48 PM	00:00:12	3302	614-967-4300	OH	INCOMING	Incoming	#04001		\$0.00			
✓	11/10/2016 2:11:54 PM	00:00:06	3303	4602		OUTGOING	Unknown	#01002		\$0.00			
✓	11/10/2016 2:12:30 PM	00:07:30	3301	614-967-4321	OH	OUTGOING	National	#04002		\$0.38			1111
✓	11/10/2016 2:12:48 PM	00:00:12	3302	4689		INCOMING	Incoming	#01001		\$0.00			
✓	11/10/2016 2:19:48 PM	00:00:12	3301	423-468-4602	CHATTNOOGA, TN	OUTGOING	National	#03002		\$0.01		12345	
✓	11/10/2016 2:20:30 PM	00:00:30	3301	4602		INCOMING	Incoming	#01001		\$0.00			
✓	11/10/2016 2:20:42 PM	00:00:18	3302	4602		INCOMING	Incoming	#01001		\$0.00			
✓	11/10/2016 2:26:54 PM	00:00:06	3301	4321		OUTGOING	Unknown	#01003		\$0.00			
✓	11/10/2016 2:31:48 PM	00:00:12	3301	4602		OUTGOING	Unknown	#01004		\$0.00			
✓	11/10/2016 2:32:54 PM	00:00:06	3301	3303		INTERNAL	Internal			\$0.00			
✓	11/10/2016 2:33:30 PM	00:00:30	3301	4300		INCOMING	Incoming	#01001		\$0.00			
✓	11/10/2016 2:34:54 PM	00:00:06	3301	4300		INCOMING	Incoming	#01001		\$0.00			
✓	11/10/2016 2:40:54 PM	00:00:06	3301	4300		INCOMING	Incoming	#01001		\$0.00			

8. Conclusion

These Application Notes describe the procedures for configuring Calero VeraSMART eCAS call accounting with Avaya Aura® Communication Manager. Testing was successful with some observations noted in Test Result section; refer to **Section 2.2** for details.

9. Additional References

This section references the Avaya and Veramark documentation that are relevant to these Application Notes.

[1] *Administering Avaya Aura® Communication Manager*, Document 03-300509, Issue 7.0, Release 7.0, July 2016, available at <http://support.avaya.com>.

[2] *Avaya Aura® Communication Manager Feature Description and Implementation*, Document 555-245-205, Issue 9.0, Release 7.0, July 2016

The VeraSMART Solution and Product information is available from Veramark. Visit <http://www.veramark.com/Call-Accounting/eCAS/>

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