

Avaya Solution & Interoperability Test Lab

Application Notes for Tiger Communications Innovation 2020 v2.7.5 with Avaya Communication Manager 4.0.1 -Issue 1.0

Abstract

These Application Notes describe the configuration steps required for Tiger Communications Innovation 2020 v2.7.5 to interoperate with Avaya Communication Manager 4.0.1. The Tiger Innovation 2020 feature set is particularly suited for hospitality applications and includes voice mail and a Property Management System (PMS) interface. During compliance testing only the voice mail was tested.

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

1. Introduction

These Application Notes describe a compliance-tested messaging solution comprised of Avaya Communication Manager 4.0.1 and the Tiger Innovation 2020 v2.7.5. The Tiger Innovation 2020 feature set is particularly suited for hospitality applications and includes voice mail and a Property Management System (PMS) interface. Only voice mail was tested during compliance testing. However, the use of a PMS and Tiger Innovation 2020 in combination provides an integrated voice mail capability by virtue of the PMS integration with Avaya Communication Manager. This allows voice mailboxes to be logically connected to occupants rather than to the physical telephony device.

The Tiger Innovation 2020 system is comprised of both hardware and software running on Microsoft Windows XP. Internally, it utilizes Intel Dialogic voice boards to support 4 - 48 analog voice ports that provide the means of connectivity to Avaya Communication Manager. Each analog port on the Tiger Innovation 2020 is connected to an analog station port administered on Avaya Communication Manager. For the compliance test, all the extensions associated with the ports connected to the Tiger Innovation 2020 were placed in a hunt group. This hunt group number was used as the general access number for Tiger Innovation 2020. All calls to the Tiger Innovation 2020 messaging access number were answered with an internal voice mail greeting that allowed users to retrieve voice mail. All calls that were not answered by the intended destination were covered to the Tiger Innovation 2020. The Tiger Innovation 2020 answered these calls with a personal greeting recorded by the user and allowed the caller to leave a voice mail message. Upon successful recording of the message, the Tiger Innovation 2020 turned on the Message Waiting Indicator (MWI) of the intended destination by interfacing with the CLAN circuit pack on Avaya Communication Manager. When the recipient retrieved the message, the Tiger Innovation 2020 turned off the MWI by interfacing with CLAN.



Figure 1: Avaya Communication Manager with Tiger Innovation 2020

2. Equipment and Software Validated

Below is a list of the equipment and software versions used within the compliance-tested network.

Equipment	Software
Avaya S8500 Server running Avaya Communication	4.0.1 (4.00.1.721.2)
Manager	4.0.1 (4.00.1.731.2)
Avaya G650 Media Gateway	
TN2312BP IPSI	HW 7, FW 39
TN799DP C-LAN	HW 1, FW24
TN2302AP Medpro	HW 20, FW116
Extreme Summit 400-24p Switch	Extremeware 7.5e.2.8
Avaya C363T-PWR Converged Stackable Switch	4.3.12
Tiger Communications Innovation 2020 Server	V2.7.5
Tiger Communications 2020 Database	MySQL v4.1

3. Configure Avaya Communication Manager

This section describes the procedure for configuring Avaya Communication Manager. These steps are performed through the System Access Terminal (SAT).

Step	Description
1.	Enter the change node-names audix command. Enter a descriptive name for Tiger Innovation
	2020 server under the Audix Names field and then enter the IP Address of the Tiger
	Innovation 2020 server.
	change node-names audix Page 1 of 1
	AODIX NODE NAMES
	Audix Names IP Address
	tigervm 10.1.10.57
	· · ·

2.	Enter the change communication-interfa	ace processor-channels command	l, and configure the
	following parameters for a Processor Cha	nnel.	
	• Enable – set to "y"		
	• Apple set to "oudix"		
	• Appi – set to audix .		
	• Mode – set to "s" for server mode	2.	
	• Interface Link/Chan – enter the	pre-configured CLAN data-modul	e link number. For
	the channel enter a value between	5000 and 64500 inclusive, this mu	ust match the port
	configured on the Tiger Innovation	n 2020 in Section 4, Step 5.	
	• Node – select the Tiger Innovation	n 2020 node name configured in th	ne previous step.
	Session Local/Remote set both	local and remote sessions to "1"	
	• Session Local Remote – set both	iocal and remote sessions to 1.	
	• Mach ID – set the ID to 1° .		
	change communication interface proce	agor abannola Dago	1 of 24
	PROCESSOR CH	ANNEL ASSIGNMENT	1 01 24
	Proc Gtwy Inter	face Destination	Session Mach
	Chan Enable Appl. To Mode Link/	Chan Node Port Lo	cal/Remote ID
	1: y audix s 12	5003 tigervm 0 1	1 1
	2: n 3: n	U	-
	5. 11	5	
5.	add station x command where x is the ex 10701 being added. The Type field is set the physical port on the analog board (TN The example shows the Port field is set to A, slot 2, port 1 is associated with the new arbitrary name but is useful if it indicates	tension to be added. The example to "2500". The Port field is set to 746B) that will be associated to the o "01A0201", which indicates that w extension. The Name field can be that this extension connects to the	e shows extension o the identifier for ne new extension. t cabinet 01, carrier be set to any voice mail system.
	change station 10701	Pa	ge 1 of 4
		STATION	
	Fotoncion: 10701		
	Extension: 10/01	LOCK Messages? n Security Code:	BCC: 0 TN: 1
	Port: 01A0201	Coverage Path 1:	COR: 1
	Name: tiger1	Coverage Path 2:	COS: 1
		Hunt-to Station:	Tests? y
	STATION OPTIONS		
		Time of Day Lock Table:	
	Loss Group: 1 Off Dremises Station2 n	Message Waiting Indicator:	none
	OIL FIEMISES SLACION? II		
	Survivable COR: internal		
	Survivable Trunk Dest? y		

4.	On Page 2 of the same commu	and, set Adjunct Supervision to "y" and AUDIX Name to
	ligervin .	
	change station 10701	Page 2 of 4
		STATION
	FEATURE OPTIONS	
	LWC Activation?	v Coverage Msg Retrieval? v
	LWC Log External Calls?	n Auto Answer: none
	CDR Privacy?	n Data Restriction? n
	Redirect Notification?	У
	Per Button Ring Control?	n Distinction Audible Alexton
	Bridged Call Alerting?	n Distinctive Audible Alert? y
	Ignore Rotary Digits?	n Aujunce Supervision: y
	H.320 Conversion?	n Per Station CPN - Send Calling Number?
	Service Link Mode:	as-needed
	Multimedia Mode:	basic
	MWI Served User Type:	
	AUDIX Name:	tigervm
		Coverage After Forwarding? s
~		
5.	Repeat the previous two steps	for each extension to be connected to the Tiger Innovation 2020.
6	Enter the add hunt-group x (command where \mathbf{x} is the bunt group number to be added for the
0.	Tiger Innovation 2020 extens	ions. The Group Name can be set to any arbitrary name. The
	Charme Entendion 2020 extens	walld extension consistent with the dial plan. This will be the milet
	Group Extension can be any	vand extension consistent with the dial plan. This will be the phot
	number to the voice mail. The	e Group Type is set to "ucd-mia". The Queue field is set to "y".
	change hunt-group 97	HUNT GROUP
	Croup Number	97 ACD2 n
	Group Name:	tiger Queue? v
	Group Extension:	16097 Vector? n
	Group Type:	ucd-mia Coverage Path:
	TN:	1 Night Service Destination:
	COR:	1 MM Early Answer? n
	Security Code:	Local Agent Preference? n
	ISDN/SIP Caller Display:	
	Oueue Limit:	unlimited
	Calls Warning Threshold:	Port:
	Time Warning Threshold:	Port:

change	hunt-group 97			Page 3 of 60
change	name group st	HUN	T GROUP	rage 5 of 60
	Group Number	: 97 Group Ext	ension: 16097	Group Type: ucd-mia
Memb	er Range Allowe	d: 1 - 1500	Administered M	embers (min/max): 1 /2
CD OUD			Total Admi	nistered Members: 2
GROUP	MEMBER ASSIGNME	NTS Iomo (10 ghornagtor		Nome (10, shows stows)
1:	10701 t	iger1	14:	Name(19 Characters)
2:	10702 t	iger2	15:	
3:	10703 t	iger3	16:	
4:	10704 t	iger4	17:	
created	in Step 6 for Poi	nt1 : for this examp	ple it would be "h9	97".
change	in Step 6 for Poi	nt1: for this examp	ple it would be "h	97". Page 1 of 1
created :	in Step 6 for Poi	nt1: for this examp	ple it would be "he rage path	97". Page 1 of 1
change	in Step 6 for Poi	nt1: for this examp 97 COVE verage Path Numb	PRAGE PATH	Page 1 of 1
change	in Step 6 for Poi	nt1: for this examp 97 COVE verage Path Numb Next Path Numb	Ple it would be "he RAGE PATH Per: 97 Hun Per: Lin	Page 1 of 1 Page 1 of 1 t after Coverage? n kage
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Created : change COVERA St	in Step 6 for Point coverage path Co GE CRITERIA ation/Group Sta Active? Busy? Don't Answer?	nt1: for this examp 97 COVE verage Path Numb Next Path Numb tus Inside Ca n Y Y	ple it would be "h RAGE PATH er: 97 Hun er: Lin .ll Outside C n y y	Page 1 of 1 t after Coverage? n kage all Number of Rings: 2
Created in the change of the coverage of the c	in Step 6 for Point coverage path Co GE CRITERIA ation/Group Sta Active? Busy? Don't Answer? All?	nt1: for this examp 97 COVE verage Path Numb Next Path Numb tus Inside Ca n y y n	ple it would be "h RAGE PATH per: 97 Hun per: Lin .11 Outside C n y y n	Page 1 of 1 t after Coverage? n kage all Number of Rings: 2
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Created : change COVERA St DND/S Hol	in Step 6 for Poin coverage path Co GE CRITERIA ation/Group Sta Active? Busy? Don't Answer? All? AC/Goto Cover? iday Coverage?	97 COVE verage Path Numb Next Path Numb tus Inside Ca y y n y n	ple it would be "h RAGE PATH per: 97 Hun per: Lin .ll Outside C n y y y n n	Page 1 of 1 t after Coverage? n kage all Number of Rings: 2
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Created in the change of the change of the covera of the c	in Step 6 for Poin coverage path Coverage path Co GE CRITERIA ation/Group Sta Active? Busy? Don't Answer? All? AC/Goto Cover? iday Coverage? GE POINTS rminate to Cove t1: h97	nt1: for this examp 97 COVE verage Path Numb Next Path Numb tus Inside Ca n y y n y n Y n erage Pts. with B Rng: Poin	Ple it would be "he RAGE PATH Per: 97 Hun Per: Lin Ull Outside C n y y n y n sridged Appearanc t2:	Page 1 of 1 t after Coverage? n kage all Number of Rings: 2 es? n

9.	The coverage path for each user station that will be using the Tiger Innovation 2020 for voice
	mail must be set to the coverage path defined in the previous step. Enter the change station x
	command, where \mathbf{x} is the extension number, to set the coverage path value created in the
	previous step. The example below shows the Coverage Path 1 field being set to "97" for user
	extension 10001.

change station 10001	Page 1 d	f 5
	STATION	
Extension: 10001	Lock Messages? n BO	C: 0
Type: 4620	Security Code: 12345	'N: 1
Port: S00018	Coverage Path 1: 97 CC	R: 1
Name: 10001 avaya 1	Coverage Path 2: CC Hunt-to Station:	s: 1
STATION OPTIONS		
	Time of Day Lock Table:	
Loss Group: 19	Personalized Ringing Pattern: 1	
	Message Lamp Ext: 10001	
Speakerphone: 2-w	Mute Button Enabled? y	
Display Language: eng Survivable GK Node Name:	sh Expansion Module? n	
Survivable COR: int	nal Media Complex Ext:	
Survivable Trunk Dest? y	IP SoftPhone? y	
	IP Video Softphone? n	

4. Configure the Tiger Innovation 2020 Server

The configuration information provided in this section describes the steps required to set up Tiger Innovation 2020 to interoperate with Avaya Communication Manager.

Step	Description
1.	On the Tiger Innovation 2020 server, navigate to d:\Innline\bin\ and click on innline.exe to
	launch the Tiger Innovation 2020 voice mail configuration. Click on Do \rightarrow Configure System .
	View Port Activity TIGER INNOVATION 2020 View Port Activity Interface: Avaya C-LAN Protocol Configure System Interface: All Activity Set Time/Date Interface: All Activity Minimize Window Interface: All Activity Subdown System Interface: All Activity Of wait for call
2.	Expand the tree configuration menu on the left by clicking on System \rightarrow Voice Ports. In the
	main screen on the right double-click Port 01 . Enter the Port Extension to match the configured
	analog extension configured in Section 3, Step 3. Select "Avaya CLAN" from the Port Type drop down list. The remaining parameters can be left with their default settings. Click OK
	drop down list. The follaming parameters can be fold with their default settings. Check OK.
	System Voice Ports Voice Ports Image: Port Types Voice Ports Port Types Voice Ports Port Types Port Types Port Misard Port
3.	Repeat the previous step for the number of Ports configured on Avaya Communication Manager.
	I I I I O O O O O O O O O O O O O O O O

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Step	Description
4.	Expand the tree configuration menu on the left by clicking on System \rightarrow Device Interfaces. In
	the main screen on the right double-click New Interface. In the Select New Interface Type
	dialog box select Avaya C-LAN Protocol and click OK.
	System - Device Interfaces
	Voice Ports Port Types Device Interfaces Administrators Tenants Solect New Interface Type:
	Tenant 1 Automated Attendants Guest Services Menus Avaya C-LAN Protocol Okst Services Menus Active Voice PMS Distribution Lists Active Voice PMS Notifications Avaya P-Sasive PMS Service Classes Genest Holding Guest Holding Did Rotop PMS Staff Encore PMS Fidelic PMS (NOT CENTIGRAM) Htabi VMS
	Select an item and click OK
5.	In the Avaya C-LAN Protocol(1) screen, click on the Other Settings tab. Modify the Parameters field so that the IP address matches the IP address of the CLAN and the port matches the number configured in Section 3, Step 2.
	Avaya C-LAN Protocol (1)
	Information Other Settings Notes
	Associated Tenant 1
	Parameters: IPADDRESS=10.1.10.12 PORT=5003 MSGTOINN
	Echo Messages?
	Device Number Translation: Strip Leading Digit Append Leading Digit Only in Ranger through 55
	OK Cancel

Step	Description
6.	To create a user mailbox, expand the tree configuration menu on the left by clicking on System
	\rightarrow Tenants \rightarrow Tenant 1 \rightarrow Mailboxes \rightarrow Guest. In the main screen on the right, double-click
	on New Mailbox. In the Enter dialog box enter the ID of the new guest mailbox in this example
	the extension number configured in Section 3, Step 9 was used. Click OK.
	TIGER INNOVATION 2020
	System - Tenants - Tenant 1 - Mailboxes - Guest
	System Voice Ports Port Types
	Device Interfaces Administrators
	Tenants Tenant 1 Utenant 1 Utenant 4 (thendent: Utenant emplate
	- Guest Services Menus - Guest Tutorials Guest Template
	Distribution Lists Notifications Secold Macroso Notifications
	- Special Message Houridadurs Mailboxes - Guest
	Service Classes Enter X
	- Front Desk - Administration I 10001 I I I I I I I I I I I I I I I I I
	Other OK Cancel
	12:30:08
7	In the Cuest Meilber 10001 dieles have alighten the Company taken denter the extension number
7.	of the quest mailbox in the Extension #1 field as shown below. The remaining values can be left
	with their default values. Click OK
	with then default values. Chek Oix.
	Guest Mailbox 10001
	General Greeting Transfers
	Extension #1: 10001 Checked In: 07/03/07 12:30 pm
	Extension #2: Check Out:
	Extension #3: Guest ID: MANUAL
	Passcode: Group ID:
	Guest Name: Service ID:
	Name Recording: 1 Print Fax to:
	Language: Default
	New Saved DMS
	Messages: Core Core Core Core Core Core Core Core
I	Service Class: Default OK Cancel
l	

5. Interoperability Compliance Testing

The interoperability compliance testing included feature and serviceability testing. The feature testing focused on exercising voice mail features of the Tiger Innovation 2020 to validate the interface to Avaya Communication Manager via the CLAN and the analog ports. The serviceability testing introduced failure scenarios to verify operation of the Tiger Innovation 2020 after failure recovery.

5.1. General Test Approach

The general test approach was to manually place intra-switch calls and inbound trunk calls to extension covered to voice mail as well as directly to the voice mail pilot number. All unanswered inbound calls were routed by Avaya Communication Manager to the Tiger Innovation 2020 hunt group, which were answered by the Tiger Innovation 2020 with the automated attendant greeting. Internal calls placed to the voice mail pilot number directly were answered by the Tiger Innovation 2020 with the voice mail pilot number directly were answered by the Tiger Innovation 2020 with the voice mail pilot number directly were answered by the Tiger Innovation 2020 with the voice mail pilot number directly were answered by the Tiger Innovation 2020 with the voice mail menu of the originating extension with an option to retrieve messages. For serviceability testing, the Tiger Innovation 2020 and Avaya Communication Manager were each restarted separately.

5.2. Test Results

All test cases passed. The Tiger Innovation 2020 correctly interfaced with Avaya Communication Manager and responded as expected in each of the call scenarios. Voice mail messages could be recorded and retrieved. It was verified that the Message Waiting Indicator was activated when a new message was left and was deactivated when the message was retrieved. The Tiger Innovation 2020 was able to resume processing of calls after being restarted and after Avaya Communication Manager was restarted.

6. Verification Steps

The following steps may be used to verify the configuration:

- Verify that calls are routed properly to the Tiger Innovation 2020 hunt group. Connect an analog phone to one of the extensions assigned to the Tiger Innovation 2020 hunt group. Dial this extension from another phone on Avaya Communication Manager. Verify the phone rings and then answer the call.
- Verify that users can leave voice messages.
 - Place an internal call to an extension with a mailbox on the Tiger Innovation 2020 and let the call go to coverage. Verify that the caller is connected to the voice mailbox of the destination extension and record a message. Verify that the Message Waiting Indicator is activated on the recipient extension.
- Verify that users can access their voice mailboxes.

From an extension with a mailbox on the Tiger Innovation 2020 that has an active Message Waiting Indicator, call the Tiger Innovation 2020 hunt group extension. Verify that the user is connected to the voice mailbox for that extension and can retrieve the message. Verify the Message Waiting Indicator is deactivated.

7. Support

If technical support is required for the Tiger Communications Innovation 2020, contact the Technical Support Department using the following:

Email: support@tigercomms.com

Phone: +44 1425 891 000 (When prompted select Option 2)

8. Conclusion

These Application Notes describe the procedures for configuring the Tiger Innovation 2020 V2.7.5 to integrate with Avaya Communication Manager 4.0.1. The Tiger Innovation 2020 V2.7.5 successfully passed all compliance testing.

9. Additional References

Avaya product documentation can be found at <u>http://support.avaya.com</u>.

• Administrator Guide for Avaya Communication Manager (4.0), Document ID 03-300509, Issue 3.1, February 2007.

Tiger Communications Innovation 2020 Product information available from www.tigercomms.com

• Sales Brochure for Tiger Innovation 2020 (Innovation.pdf)

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