

TR-064 Support – WLANConfiguration

Supported by AVM

Author: AVM GmbH

Date: 2013-08-29

History

Date	Version	Changes
2011-09-19	11	- Action X_AVM-DE_GetNightControl added - Parameters X_AVM-DE_Speed and X_AVM-DE_SignalStrength added to action GetSpecificAssociatedDeviceInfo
2012-01-17	12	Support for more than one Access Point List action X_SetHighFrequencyBand
2013-08-26	13	Action X_AVM-DE_GetWLANExtInfo added
2013-08-29	14	Argument NewX_AVM-DE_APEntered for Action X_AVM-DE_GetWLANExtInfo added

urn:WLANConfiguration-com:serviceld:WLANConfiguration1

For details please refer the TR-064 document at <http://www.dslforum.org/techwork/tr/TR-064.pdf>.

For the support of device with more than one Access Point more than one WLANConfiguration services are listed in the TR-064 service description.

If the device supports WLAN one service is listed (service #1).

If the device additionally supports a second physical Access Point e.g. FRITZ!Box 7390 support 2.4 GHz and 5 GHz, one more service is listed (service #2).

If the device supports a logical Access Point for guests, one more service is listed (service #2 or #3).

Action List

This chapter contains the supported actions of the service WLAN configuration which are listed incl. arguments.

SetEnable

Argument name	Direction	Related state variable	Remarks
NewEnable	in	Enable	

Table 1: Argument list of action SetEnable

GetInfo

Argument name	Direction	Related state variable	Remarks
NewEnable	out	Enable	
NewStatus	out	Status	
NewMaxBitRate	out	MaxBitRate	Not supported. Returns default string.
NewChannel	out	Channel	
NewSSID	out	SSID	
NewBeaconType	out	BeaconType	
NewMACAddressControlEnabled	out	MACAddressControlEnabled	
NewStandard	out	Standard	Only the highest of the active modes is returned.
NewBSSID	out	BSSID	
NewBasicEncryptionModes	out	BasicEncryptionModes	
NewBasicAuthenticationMode	out	BasicAuthenticationMode	Returns fixed string "none".
NewMaxCharsSSID	out	MaxCharsSSID	
NewMinCharsSSID	out	MinCharsSSID	
NewAllowedCharsSSID	out	AllowedCharsSSID	
NewMinCharsPSK	out	MinCharsPSK	
NewMaxCharsPSK	out	MaxCharsPSK	
NewAllowedCharsPSK	out	AllowedCharsPSK	

Table 2: Argument list of action GetInfo

SetConfig

Argument name	Direction	Related state variable	Remarks
NewMaxBitRate	in	MaxBitRate	
NewChannel	in	Channel	
NewSSID	in	SSID	
NewBeaconType	in	BeaconType	Determines WLAN-encryption to be used. WEP, WPA, WPA2, WPA mixed.
NewMacAddressControlEnabled	in	MacAddressControlEnabled	
NewBasicEncryptionModes	in	BasicEncryptionModes	
NewBasicAuthenticationMode	in	BasicAuthenticationMode	

Table 3: Argument list of action SetConfig

SetSecurityKeys

Argument name	Direction	Related state variable	Remarks
NewWEPKey0	in	WEPKey0	
NewWEPKey1	in	WEPKey1	
NewWEPKey2	in	WEPKey2	
NewWEPKey3	in	WEPKey3	
NewPreSharedKey	in	PreSharedKey	
NewKeyPassphrase	in	KeyPassphrase	

Table 4: Argument list of action SetSecurityKeys

GetSecurityKeys

Argument name	Direction	Related state variable	Remarks
NewWEPKey0	out	WEPKey0	
NewWEPKey1	out	WEPKey1	
NewWEPKey2	out	WEPKey2	
NewWEPKey3	out	WEPKey3	
NewPreSharedKey	out	PreSharedKey	
NewKeyPassphrase	out	KeyPassphrase	

Table 5: Argument list of action GetSecurityKeys

SetDefaultWEPKeyIndex

Argument name	Direction	Related state variable	Remarks
NewDefaultWEPKeyIndex	in	WEPKeyIndex	

Table 6: Argument list of action SetDefaultWEPKeyIndex

GetDefaultWEPKeyIndex

Argument name	Direction	Related state variable	Remarks
NewDefaultWEPKeyIndex	out	WEPKeyIndex	

Table 7: Argument list of action GetDefaultWEPKeyIndex

GetBasBeaconSecurityProperties

Argument name	Direction	Related state variable	Remarks
NewBasicEncryptionModes	out	BasicEncryptionModes	
NewBasicAuthenticationMode	out	BasicAuthenticationMode	

Table 8: Argument list of action GetBasBeaconSecurityProperties

GetBSSID

Argument name	Direction	Related state variable	Remarks
NewBSSID	out	BSSID	

Table 9: Argument list of action GetBSSID

GetSSID

Argument name	Direction	Related state variable	Remarks
NewSSID	out	SSID	

Table 10: Argument list of action GetSSID

SetSSID

Argument name	Direction	Related state variable	Remarks
NewSSID	in	SSID	

Table 11: Argument list of action SetSSID

GetBeaconType

Argument name	Direction	Related state variable	Remarks
NewBeaconType	out	BeaconType	

Table 12: Argument list of action GetBeaconType

SetBeaconType

Argument name	Direction	Related state variable	Remarks
NewBeaconType	in	BeaconType	

Table 13: Argument list of action SetBeaconType

GetChannelInfo

Argument name	Direction	Related state variable	Remarks
NewChannel	out	Channel	
NewPossibleChannels	out	PossibleChannels	

Table 14: Argument list of action GetChannelInfo

SetChannel

Argument name	Direction	Related state variable	Remarks
NewChannel	in	Channel	

Table 15: Argument list of action SetChannel

GetBeaconAdvertisement

Argument name	Direction	Related state variable	Remarks
NewBeaconAdvertisementEnabled	out	BeaconAdvertisementEnabled	

Table 16: Argument list of action GetBeaconAdvertisement

SetBeaconAdvertisement

Argument name	Direction	Related state variable	Remarks
NewBeaconAdvertisementEnabled	in	BeaconAdvertisementEnabled	

Table 17: Argument list of action SetBeaconAdvertisement

GetTotalAssociations

Argument name	Direction	Related state variable	Remarks
NewTotalAssociations	out	TotalAssociations	

Table 18: Argument list of action GetTotalAssociations

GetGenericAssociatedDeviceInfo

Argument name	Direction	Related state variable	Remarks
NewAssociatedDeviceIndex	in	TotalAssociations	
NewAssociatedDeviceMACAddress	out	AssociatedDeviceMACAddress	
NewAssociatedDeviceIPAddress	out	AssociatedDeviceIPAddress	
NewAssociatedDeviceAuthState	out	AssociatedDeviceAuthState	
NewX_AVM-DE_Speed	out	X_AVM-DE_Speed	22.01.10
NewX_AVM-DE_SignalStrength	out	X_AVM-DE_SignalStrength	22.01.10

Table 19: Argument list of action GetGenericAssociatedDeviceInfo

GetSpecificAssociatedDeviceInfo

Argument name	Direction	Related state variable	Remarks
NewAssociatedDeviceMACAddress	in	AssociatedDeviceMACAddress	
NewAssociatedDeviceIPAddress	out	AssociatedDeviceIPAddress	
NewAssociatedDeviceAuthState	out	AssociatedDeviceAuthState	
NewX_AVM-DE_Speed	out	X_AVM-DE_Speed	19.09.11
NewX_AVM-DE_SignalStrength	out	X_AVM-DE_SignalStrength	19.09.11

Table 20: Argument list of action GetSpecificAssociatedDeviceInfo

X_AVM-DE_SetStickSurfEnable

Argument name	Direction	Related state variable	Remarks
NewStickSurfEnable	in	StickSurfEnable	

Table 21: Argument list of action X_AVM-DE_SetStickSurfEnable

X_AVM-DE_GetIPTVOptimized

Argument name	Direction	Related state variable	Remarks
NewX_AVM-DE_IPTVOptimize	out	X_AVM-DE_IPTVOptimize	

Table 22: Argument list of action X_AVM-DE_GetIPTVOptimized

X_AVM-DE_SetIPTVOptimized

Argument name	Direction	Related state variable	Remarks
NewX_AVM-DE_IPTVOptimize	in	X_AVM-DE_IPTVOptimize	

Table 23: Argument list of action X_AVM-DE_SetIPTVOptimized

GetStatistics

Argument name	Direction	Related state variable	Remarks
NewTotalPacketsSent	out	TotalPacketsSent	
NewTotalPacketsReceived	out	TotalPacketsReceived	

Table 24: Argument list of action GetStatistics

GetPacketStatistics

Argument name	Direction	Related state variable	Remarks
NewTotalPacketsSent	out	TotalPacketsSent	
NewTotalPacketsReceived	out	TotalPacketsReceived	

Table 25: Argument list of action GetPacketStatistics

X_AVM-DE_GetNightControl

Argument name	Direction	Related state variable	Remarks
NewNightControl	out	NightControl	
NewNightTimeControlNoForcedOff	out	NightTimeControlNoForcedOff	

Table 26: Argument list of action X_AVM-DE_GetNightControl

X_SetHighFrequencyBand

The action is listed in the WLA configuration service but only supported on certain OEM devices. Please see WLAN configuration service 2 on FRITZ!Box 7390 for reading and writing 5 GHz WLAN settings.

Argument name	Direction	Related state variable	Remarks
NewEnableHighFrequency	in	EnableHighFrequency	

Table 27: Argument list of action X_SetHighFrequencyBand

X_AVM-DE_GetWLANExtInfo

This action delivers informations about the WLAN-Guest access.

Argument name	Direction	Related state variable	Remarks
NewX_AVM-DE_APEnabled	out	X_AVM-DE_APEnabled	
NewX_AVM-DE_APTYPE	out	X_AVM-DE_APTYPE	
NewX_AVM-DE_TimeoutActive	out	X_AVM-DE_TimeoutActive	
NewX_AVM-DE_Timeout	out	X_AVM-DE_Timeout	
NewX_AVM-DE_TimeRemain	out	X_AVM-DE_TimeRemain	
NewX_AVM-DE_NoForcedOff	out	X_AVM-DE_NoForcedOff	
NewX_AVM-DE_UserIsolation	out	X_AVM-DE_UserIsolation	
NewX_AVM-DE_EncryptionMode	out	X_AVM-DE_EncryptionMode	
NewX_AVM-DE_LastChangedStamp	out	X_AVM-DE_LastChangedStamp	

Table 28: Argument list of action X_AVM-DE_GetWLANExtInfo

Service States Table

Variable name	Allowed values (* == default)	Data type
Enable		Boolean
Status		String
MaxBitRate	Auto	String
Channel	0 means auto channel	ui1
PossibleChannels	depends on currently used standard	String
SSID		String
BeaconType	None, Basic, WPA, 11i, WPAand11i	String
MACAddressControlEnabled		Boolean
Standard	a, b, g, n	String
BSSID		String
BasicEncryptionModes	WEPEncryption, None	String
BasicAuthenticationMode	None	String
WEPKey0		String
WEPKey1		String
WEPKey2		String
WEPKey3		String
WEPKeyIndex		ui1
KeyPassphrase		String
PreSharedKey		String
MaxCharsSSID	32 (*)	ui1
MinCharsSSID	3 (*)	ui1
NightControl	XML-String	String
NightTimeControlNoForcedOff		Boolean
EnableHighFrequency		Boolean

Variable name	Allowed values (* == default)	Data type
AllowedCharsSSID	01234567890ABCDEFGHIJKLMNPOQRSTUVWXYZa bcdefghijklmnopqrstuvwxyz_!"#\$%&'()*+,-./:;<=>? @[^_`{}~(*)	String
MinCharsPSK	64 (*)	ui1
MaxCharsPSK	64 (*)	ui1
AllowedCharsPSK	01234567890ABCDEFabcdef (*)	String
MinCharsKeyPassphrase	8 (*)	ui1
MaxCharsKeyPassphrase	63 (*)	ui1
AllowedChars KeyPassphrase	01234567890ABCDEFGHIJKLMNPOQRSTUVWXYZa bcdefghijklmnopqrstuvwxyz_!"#\$%&'()*+,-./:;<=>? @[^_`{}~(*)	String
BeaconAdvertisementEnabled		Boolean
TotalAssociations	0 (*)	ui2
AssociatedDeviceMACAddress		String
AssociatedDeviceIPAddress		String
AssociatedDeviceAuthState	0 (*)	Boolean
StickSurfEnable	0 (*)	Boolean
TotalPacketsSent		ui4
TotalPacketsReceived		ui4
X_AVM-DE_IPTVoptimize	0 (*)	Boolean
X_AVM-DE_Speed	0 (*), 0 ... 300	ui2
X_AVM-DE_SignalStrength	0 (*), 0 ... 70	ui1

Table 29: Variable list