

MediaManagement:2 Service

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1 Scope

This service definition is compliant with [1]. It defines a service type referred to herein as the MediaManagement service.

The MediaManagement service enables the feature to set-up a media session on a Telephony Client (TC), under the control of a Telephony Control Point (TelCP). This service provides the following functions:

- Set up a media session to send and/or receive media streams between a TC and a TS. To set up a media session, The MediaManagement service provides an interface for a TelCP to negotiate the media capabilities (e.g., codec types, IP address, port number etc.) between a TC and a TS. This ensures a TelCP to select a common set of the media capabilities to be used to send and/or receive media streams between a TS and a TC. After the media session is established, the TC starts sending and/or receiving media streams based on the media capabilities negotiated between the TC and the TS.
- The mechanism to modify the media capabilities of an existing media session. For instance, if a media session is created for sending and receiving an audio media stream, it is possible to modify the media session for sending and receiving a video media stream.
- The mechanism to terminate a media session.

2 Normative references

The following documents, in whole or in part, are normatively referenced in this document and are indispensable for its application. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

[1] – UPnP Device Architecture, version 1.0, UPnP Forum, October 15, 2008. Available at: <http://www.upnp.org/specs/arch/UPnP-arch-DeviceArchitecture-v1.0-20081015.pdf>. Latest version available at: <http://www.upnp.org/specs/arch/UPnP-arch-DeviceArchitecture-v1.0.pdf>.

[2] – Data elements and interchange formats – Information interchange -- Representation of dates and times, International Standards Organization, December 21, 2000. Available at: [ISO 8601:2000](http://www.iso.org/iso/iso_8601.html).

[3] – IETF RFC 2119, Key words for use in RFCs to Indicate Requirement Levels, S. Bradner, 1997. Available at: <http://www.faqs.org/rfcs/rfc2119.html>.

[4] – IETF RFC 3339, Date and Time on the Internet: Timestamps, G. Klyne, Clearswift Corporation, C. Newman, Sun Microsystems, July 2002. Available at: <http://www.ietf.org/rfc/rfc3339.txt>.

[5] – IETF RFC 4566, SDP: Session Description Protocol, M. Handley, UCL, V. Jacobson, Packet Design, C. Perkins, University of Glasgow, July 2006. Available at: <http://www.ietf.org/rfc/rfc4566.txt>.

[6] – Extensible Markup Language (XML) 1.0 (Third Edition), François Yergeau, Tim Bray, Jean Paoli, C. M. Sperberg-McQueen, Eve Maler, eds., W3C Recommendation, February 4, 2004. Available at: <http://www.w3.org/TR/2004/REC-xml-20040204>.

[7] – XML Schema Part 2: Data Types, Second Edition, Paul V. Biron, Ashok Malhotra, W3C Recommendation, 28 October 2004. Available at: <http://www.w3.org/TR/2004/REC-xmlschema-2-20041028>.

[8] – *CallManagement:2*, UPnP Forum, December 10, 2012. Available at: <http://www.upnp.org/specs/phone/UPnP-phone-CallManagement-v2-Service-20121210.pdf>. Latest version available at: <http://www.upnp.org/specs/phone/UPnP-phone-CallManagement-Service.pdf>.

[9] – *ConnectionManager:1*, UPnP Forum, June 25, 2002. Available at: <http://www.upnp.org/specs/av/UPnP-av-ConnectionManager-v1-Service-20020625.pdf>. Latest version available at: <http://www.upnp.org/specs/av/UPnP-av-ConnectionManager-Service.pdf>.

3 Terms, definitions, symbols and abbreviated terms

For the purposes of this document, the terms and definitions given in [1] and the following apply.

3.1 Provisioning terms

3.1.1

conditionally allowed

CA

The definition or behavior depends on a condition. If the specified condition is met, then the definition or behavior is allowed, otherwise it is not allowed.

3.1.2

conditionally required

CR

The definition or behavior depends on a condition. If the specified condition is met, then the definition or behavior is required, otherwise it is not allowed.

3.1.3

not allowed

The definition or behavior is prohibited by this specification. Opposite of required.

3.2 Symbols

3.2.1

::

signifies a hierarchical parent-child (parent::child) relationship between the two objects separated by the double colon. This delimiter is used in multiple contexts, for example: Service::Action(), Action()::Argument, parentProperty::childProperty.

3.3 Terms

3.3.1

Media Stream

a flow of media (e.g., audio, video, and data etc.) which is sent and/or received between two parties.

3.3.2

Media Session

a series of interactions for flow of media among the parties.

3.3.3

Media Session ID

unique identifier for a Media Session.

Figure 1 shows the relationship among Media Streams, Media Session and Media Session ID. A Media Session can include multiple Media Streams.

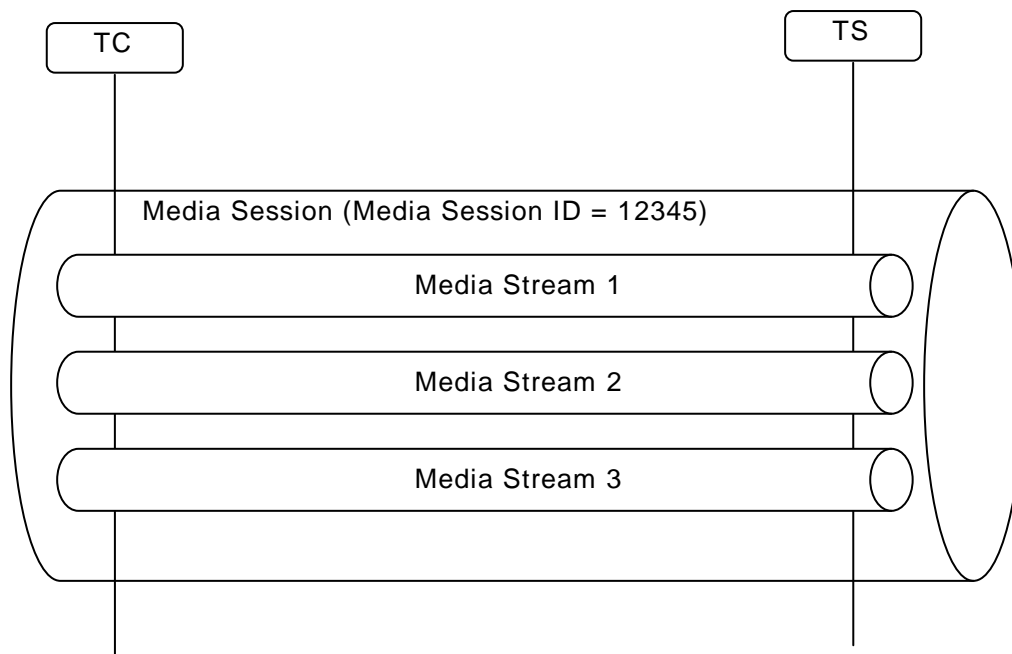


Figure 1 — Relationship among Media Stream, Media Session and Media Session ID

3.3.4

Media Capability

Media Stream's attributes which are negotiated before sending/receiving a Media Stream in a Media Session. Media Stream's attributes include a codec type, a codec parameter, IP address, and a port number etc. [5] defines one of the methods to describe Media Capability. And the Media Capabilities represent attributes for a set of Media Streams.

3.4 Abbreviated terms

3.4.1

ID

Identifier

3.4.2

SDP

Session Description Protocol

3.4.3

TC

Telephony Client

3.4.4

TeICP

Telephony Control Point

3.4.5

TS

Telephony Server

4 Notations and conventions

4.1 Text conventions

- Strings that are to be taken literally are enclosed in “double quotes”.
- Words that are emphasized are printed in *italic*.
- Keywords that are defined by the UPnP Working Committee are printed using the forum character style.
- Keywords that are defined in [1] are printed using the arch character style.

4.2 Data Types

This document uses data type definitions from two different sources. Data types from [1] are used to define state variable and action argument data types. The XML Schema data types [7] are used to define property data types.

For Boolean data types defined in [1], it is strongly recommended to use the value “0” for false, and the value “1” for true. The values “true”, “yes”, “false”, or “no” may also be used but are not recommended. The values “yes” and “no” are deprecated and shall not be sent out by devices but shall be accepted on input.

For XML Schema defined Boolean data types, it is strongly recommended to use the value “0” for false, and the value “1” for true. The values “true”, “yes”, “false”, or “no” may also be used but are not recommended. The values “yes” and “no” are deprecated and shall not be sent out by devices but shall be accepted on input.

4.3 Vendor-defined Extensions

Whenever vendors create additional vendor-defined state variables, actions or properties, their assigned names and XML representation shall follow the naming conventions and XML rules as specified in [1], 2.5.

5 Service Modeling Definitions

5.1 Service Type

The following service type identifies a service that is compliant with this specification:

urn:schemas-upnp-org:service:MediaManagement:2

MediaManagement service is used in this document to refer to this service type.

5.2 MediaManagement Service Architecture

The MediaManagement service provides the feature to set-up Media Session on a Telephony Client (TC), under the control of a Telephony Control Point (TelCP).

The architecture for the MediaManagement service is shown in Figure 2.

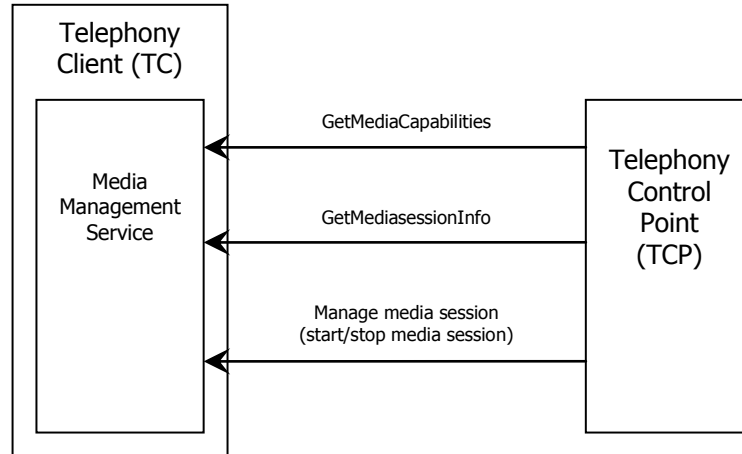


Figure 2 — Architecture of the MediaManagement Service

5.3 State Variables

Note: For first-time reader, it may be more insightful to read the theory of operations first and then the action definitions before reading the state variable definitions.

5.3.1 State Variable Overview

Table 1 — State Variables

Variable Name	R/A ^a	Data Type	Reference
<u>MediaSessionInfo</u>	<u>R</u>	<u>string</u> (XML fragment)	See 5.3.2
<u>A_ARG_TYPE MediaSessionID</u>	<u>R</u>	<u>string</u>	See 5.3.3
<u>A_ARG_TYPE MediaCapabilityInfo</u>	<u>R</u>	<u>string</u> (XML fragment)	See 5.3.4
<u>A_ARG_TYPE MediaSessionInfoList</u>	<u>R</u>	<u>string</u> (XML fragment)	See 5.3.5
^a <u>R</u> = required, <u>A</u> = allowed, <u>CR</u> = conditionally required, <u>CA</u> = conditionally allowed, <u>X</u> = Non-standard, add <u>-D</u> when deprecated (e.g., <u>R-D</u> , <u>A-D</u>).			

5.3.2 MediaSessionInfo

This evented state variable notifies information about an existing Media Session. It contains Media Session ID, Media Session status, Media Capability format, and Media Capabilities etc. This state variable is evented when status of the Media Session changes.

5.3.2.1 XML Schema Definition

This is a string containing an XML fragment. The XML fragment in this argument shall validate against the XML schema for MediaSessionInfo in the XML namespace

"urn:schemas-upnp-org:phone:mms" which is located at "http://www.upnp.org/schemas/phone/mms-v2.xsd".

5.3.2.2 Description of fields in the **MediaSessionInfo** structure

```
<?xml version="1.0" encoding="utf-8"?>
<mms:mediaSessionInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
  http://www.upnp.org/schemas/phone/mms-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:mms="urn:schemas-upnp-org:phone:mms">
  <mediaSessionID>unique Media Session ID</mediaSessionID>
  <mediaSessionStatus reason="reason why status is changed">
    status of Media Session
  </mediaSessionStatus>
  <mediaCapability format="format of Media Capability">
    Media capability
  </mediaCapability>
</mms:mediaSessionInfo>
```

<xml>

Required. Case sensitive.

<mediaSessionInfo>

Required. Shall include a namespace declaration for the **MediaManagement** service Schema ("urn:schemas-upnp-org:phone:mms"). It may have the following elements:

<mediaSessionID>

Required. xsd:string, Indicates the ID of the Media Session which is unique in the **MediaManagement** service.

<mediaSessionStatus>

Required. xsd:string, Indicates the status of the Media Session and can have the following values as described in the Table 2. And this element has an attribute which name is "reason".

Table 2 — Allowed values for mediaSessionStatus

Value	Description
" Started "	Indicates the status of the Media Session when Media Streams are being sent and/or received in the Media Session.
" Stopped "	Indicates the status of the Media Session when the Media Streams stop flowing in the Media Session.

reason

Allowed. xsd:string, Indicates the reason why status of a Media Session is changed. Table 3 shows the allowed values of this attribute and the corresponding status of Media Session:

Table 3 — Allowed values for reason and the corresponding status of Media Session

Value	Media Session Status	Description
" Modified "	" Started "	Indicates the status of the Media Session after the invocation of the ModifyMediaSession() action succeeds and Media Streams are being sent and/or received in the Media Session according to the new Media Capabilities.
" ModifyFailed "	" Started "	Indicates the status of the Media Session after the invocation of the ModifyMediaSession() action succeeds and the MediaManagement service fails to negotiate the Media Capabilities with the WAN side. In this case, Media Streams are being sent and/or received without changing their Media Capabilities.
" Error "	" Stopped "	Indicates the status of the Media Session when the MediaManagement service can not send and/or receive a Media Stream.

Value	Media Session Status	Description
TBD	TBD	(Specified by UPnP vendors.)

<mediaCapability>

Required. Defines the selected Media Capabilities as specified by the "format" attribute.

format

Required. xsd:string, Indicates the format of Media Capabilities. Allowed values of this attribute are as follows:

Table 4 — Allowed values for format

Value	Description
SDP	Media Capability is described by SDP in [5].
TBD	(Specified by UPnP vendors.)

5.3.3 **A ARG TYPE MediaSessionID**

This state variable uniquely indentifies a Media Session. The [MediaManagement](#) service assigns a unique ID for the Media Session when a TelCP invokes the [StartMediaSession\(\)](#) action.

5.3.4 **A ARG TYPE MediaCapabilityInfo**

This state variable defines an XML document that contains the Media Capabilities of a Media Session. This state variable is used as an input argument of the [StartMediaSession\(\)](#) and [ModifyMediaSession\(\)](#) actions.

5.3.4.1 XML Schema Definition

This is a string containing an XML fragment. The XML fragment in this argument shall validate against the XML schema for [MediaCapabilityInfo](#) in the XML namespace "urn:schemas-upnp-org:phone:mms" which is located at "http://www.upnp.org/schemas/phone/mms-v2.xsd".

5.3.4.2 Description of fields in the [MediaCapabilityInfo](#) structure

```
<?xml version="1.0" encoding="utf-8"?>
<mms:mediaCapabilityInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
  http://www.upnp.org/schemas/phone/mms-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:mms">
  <mediaCapability format="format of Media Capability">
    Media capability
  </mediaCapability>
  <contentSharingCapability>
    <protocolInfo>metatdata information of the content</protocolInfo>
    <URI>URI of the content</URI>
    <sharingType>transfer or streaming</sharingType>
  </contentSharingCapability>
</mms:mediaCapabilityInfo>
```

<xml>

Required. Case sensitive.

<mediaCapabilityInfo>

Required. Shall include a namespace declaration for the [MediaManagement](#) service Schema ("urn:schemas-upnp-org:phone:mms"). This namespace defines the following elements and attributes:

<mediaCapability>

Required. Indicates the Media Capability of a Media Session using the format which is specified by the "format" attribute.

format

Required. xsd:string, indicates the format of Media Capability. Values of this attribute are shown in Table 4.

<contentSharingCapability>

Allowed. Used by a TC to indicate whether it supports the TC-Based Content Sharing mechanism defined in [8] by the [SupportedMediaCapabilityInfo](#) output argument of the [GetMediaCapabilities\(\)](#) action. And used by a TelCP to prepare for a Content Sharing session using the [GetMediaCapabilities\(\)](#) action, and trigger the Content Sharing process using the [StartMediaSession\(\)](#) action or the [ModifyMediaSession\(\)](#) action.

<protocolInfo>

Allowed. xsd:string, one or more instances of this element are used by the TC to indicate its Media Capabilities (e.g., transport protocols, codecs etc.) for the TC-Based Content Sharing mechanism. A TelCP uses this element to provide the metadata information of the content to be shared. The format of this string element follows the UPnP AV protocolInfo concept as defined in subclause 2.5.2 of [9].

<URI>

Allowed. xsd:anyURI, used by a TelCP to provide the URI of the content to be shared, used by the TC to locate and retrieve the content.

<sharingType>

Allowed. xsd:string, used by a TelCP to indicate to the TC if the content is sent as a file or streamed to the Remote Party via a TS when invoking the [GetMediaCapabilities\(\)](#), [StartMediaSession\(\)](#) or [ModifyMediaSession\(\)](#) action. Values for this element are "transfer" and "streaming". This element is only a hint to the TC, the TC implementation may anyway choose its supported mechanism.

5.3.5 [A_ARG_TYPE MediaSessionInfoList](#)

This state variable contains a list of ongoing Media Sessions and their information as defined in the MediaSessionInfo structure.

5.3.5.1 XML Schema Definition

This is a string containing an XML fragment. The XML fragment in this argument shall validate against the XML schema for [MediaSessionInfoList](#) in the XML namespace "urn:schemas-upnp-org:phone:mms" which is located at "http://www.upnp.org/schemas/phone/mms-v2.xsd".

5.3.5.2 Description of fields in the [MediaSessionInfoList](#) structure

```
<?xml version="1.0" encoding="utf-8"?>
<mms:mediaSessionInfoList
  xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
  http://www.upnp.org/schemas/phone/mms-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:mms="urn:schemas-upnp-org:phone:mms">
  <mediaSessionInfo>
    <mediaSessionID>unique Media Session ID</mediaSessionID>
    <mediaSessionStatus reason="reason why status is changed">
      status of Media Session
    </mediaSessionStatus>
  </mediaSessionInfo>
</mms:mediaSessionInfoList>
```

```

<mediaCapability format="format of Media Capability">
  Media capability
</mediaCapability>
</mediaSessionInfo>
<!-- Any other mediaSessionInfo (if any) go here.-->
</mms:mediaSessionInfo>

```

<xml>

Required. Case sensitive.

<mediaSessionInfoList>

Required. Shall include a namespace declaration for the [MediaManagement](#) service Schema ("urn:schemas-upnp-org:phone:mms"). Includes information about Media Sessions. This element includes one or more <MediaSessionInfo> elements as described in the [MediaSessionInfo](#) structure.

5.4 Eventing and Moderation

Table 5 — Event Moderation

Variable Name	Evented	Moderated Event	Max Event Rate ^a (seconds)	Logical Combination	Min Delta per Event ^b
MediaSessionInfo	YES	No			
A_ARG_TYPE MediaSessionID	No	No			
A_ARG_TYPE MediaCapabilityInfo	No	No			
A_ARG_TYPE MediaSessionInfoList	No	No			
^a Determined by N, where Rate = (Event)/(N secs). ^b (N) * (allowedValueRange Step).					

5.4.1 Eventing of [MediaSessionInfo](#)

This state variable is evented when the status of the Media Session changes.

5.5 Actions

Table 6 — Actions

Name	Device R/A ^a	Control Point R/A ^b
GetMediaCapabilities()	R	R
StartMediaSession()	R	R
StopMediaSession()	R	R
ModifyMediaSession()	A	A
GetMediaSessionInfo()	R	R
^a For a device this column indicates whether the action shall be implemented or not, where R = required, A = allowed, CR = conditionally required, CA = conditionally allowed, X = Non-standard, add -D when deprecated (e.g., R-D , A-D). ^b For a control point this column indicates whether a control point shall be capable of invoking this action, where R = required, A = allowed, CR = conditionally required, CA = conditionally allowed, X = Non-standard, add -D when deprecated (e.g., R-D , A-D).		

5.5.1 GetMediaCapabilities()

This action returns a set of Media Capabilities supported by the MediaManagement service. If the input argument TSMediaCapabilityInfo contains the empty string(""), this action returns all the Media Capabilities which the MediaManagement service supports. If the input argument TSMediaCapabilityInfo contains a valid value, this action returns the Media Capabilities supported by the MediaManagement service, which will be a subset of TSMediaCapabilityInfo.

5.5.1.1 Arguments

Table 7 — Arguments for GetMediaCapabilities()

Argument	Direction	relatedStateVariable
<u>TSMediaCapabilityInfo</u>	<u>IN</u>	<u>A_ARG_TYPE_MediaCapabilityInfo</u>
<u>SupportedMediaCapabilityInfo</u>	<u>OUT</u>	<u>A_ARG_TYPE_MediaCapabilityInfo</u>

5.5.1.2 Argument Descriptions

The input argument TSMediaCapabilityInfo contains either the empty string("") or the Media Capabilities that a TelCP wants to use for a Media Session. For instance, the input argument TSMediaCapabilityInfo can contain the output argument of the CaMS::GetMediaCapabilities() action.

The output argument SupportedMediaCapabilityInfo contains the Media Capabilities of the MediaManagement service. If the input argument TSMediaCapabilityInfo contains the empty string(""), this action returns all the Media Capabilities which the MediaManagement service supports. If the input argument TSMediaCapabilityInfo contains a valid value, this action returns the Media Capabilities supported by the MediaManagement service, which will be a subset of TSMediaCapabilityInfo.

5.5.1.3 Service Requirements

This service shall return the Media Capabilities of the MediaManagement service regardless of its status.

When receiving this action with the value of the TSMediaCapabilityInfo input argument as the empty string(""), and if this service supports the TC-Based Content Sharing mechanism, the output argument SupportedMediaCapabilityInfo shall contain the <contentSharingCapability> element to indicate the Media Capabilities of this service for the TC-Based Content Sharing mechanism.

When receiving this action with the <contentSharingCapability> element in the TSMediaCapabilityInfo input argument, this service shall check the content metadata information and return the SDP formatted parameters in the <mediaCapability> element of the output argument SupportedMediaCapabilityInfo. The output argument indicates the SDP parameters will be used for sending the content media to the TS.

5.5.1.4 Control Point Requirements When Calling The Action

When setting up a TC-Based Content Sharing session using this action, A TelCP shall include the <contentSharingCapability> element to provide the metadata information of the content, and the <mediaCapability> element to provide the TS Media Capabilities in the TSMediaCapabilityInfo input argument.

5.5.1.5 Dependency on Device State

None.

5.5.1.6 Effect on Device State

None.

5.5.1.7 Errors**Table 8 — Error Codes for [GetMediaCapabilities\(\)](#)**

ErrorCode	errorDescription	Description
400-499	TBD	See Control clause in [1].
500-599	TBD	See Control clause in [1].
600-699	TBD	See Control clause in [1].

5.5.2 [StartMediaSession\(\)](#)

This action allows a TelCP to create and start a Media Session. The Media Session is created using the Media Capabilities specified in the input argument [TSMediaCapabilityInfo](#). If succeeds, the [MediaManagement](#) service assigns a unique ID for the newly created Media Session. The [MediaManagement](#) service returns the ID of the Media Session and the capabilities of the Media Session to be used in the output arguments [MediaSessionID](#) and [TCMediaCapabilityInfo](#) respectively. Once the Media Session is created, the [MediaManagement](#) service starts sending and/or receiving Media Streams.

5.5.2.1 Arguments**Table 9 — Arguments for [StartMediaSession\(\)](#)**

Argument	Direction	relatedStateVariable
TSMediaCapabilityInfo	<i>IN</i>	<i>A_ARG_TYPE_MediaCapabilityInfo</i>
MediaSessionID	<i>OUT</i>	<i>A_ARG_TYPE_MediaSessionID</i>
TCMediaCapabilityInfo	<i>OUT</i>	<i>A_ARG_TYPE_MediaCapabilityInfo</i>

5.5.2.2 Argument Descriptions

The input argument [TSMediaCapabilityInfo](#) contains the Media Capabilities (e.g., codecs, port and IP address etc.) of the TS. The Media Capabilities in this argument shall be a subset of the return value of the [GetMediaCapabilities\(\)](#) action on the TS.

The output argument [MediaSessionID](#) is the return value of this action and uniquely identifies the Media Session. The [MediaManagement](#) service assigns a unique Media Session ID for every Media Session.

The output argument [TCMediaCapabilityInfo](#) contains the Media Capabilities (e.g., codecs, port and IP address etc.) to be used in the [MediaManagement](#) service for this specific Media Session.

5.5.2.3 Service Requirements

This service shall analyze the input argument [TSMediaCapabilityInfo](#) whether this service can support the Media Capabilities. If this service supports the Media Capabilities, this

action succeeds, otherwise fails. If succeeds, this service generates a unique Media Session ID for the Media Session and starts sending and/or receiving Media Streams based on both of [TSMediaCapabilityInfo](#) and [TCMediaCapabilityInfo](#). Then this service events the [MediaSessionInfo](#) state variable which <mediaSessionStatus> element includes “[Started](#)”.

When receiving this action with the <contentSharingCapability> element in the [TSMediaCapabilityInfo](#) input argument, this service shall start retrieving the content based on the provided metadata information, process and send the content media to the TS using the Media Session.

5.5.2.4 Control Point Requirements When Calling The Action

Before calling this action, A TelCP shall decide the Media Capabilities for a Media Session. In case that this service is used with the [CallManagement](#) service, a TelCP gets the Media Capabilities of this service and the [CallManagement](#) service and decide the Media Capabilities which are supported by both of this service and the [CallManagement](#) service. Then the [CallManagement](#) service exchanges the Media Capabilities between a caller and a callee and decide the Media Capabilities of a call. The decided Media Capabilities are contained in the <mediaCapability> element in the [CallInfo](#) state variable which <callStatus> element includes “[Connected](#)” or “[Modified](#)”. Then a TelCP decides the Media Capabilities for setting to the [MediaManagement](#) service and invokes this action.

A TelCP should invoke the [GetMediaCapabilities\(\)](#) action before invoking this action to prepare the TC-Based Content Sharing session. When invoking this action, the TelCP should provide the same content information in the MediaCapabilityInfo input argument as when invoking the [GetMediaCapabilities\(\)](#) action.

5.5.2.5 Dependency on Device State

None.

5.5.2.6 Effect on Device State

None.

5.5.2.7 Errors

Table 10 — Error Codes for [StartMediaSession\(\)](#)

ErrorCode	errorDescription	Description
400-499	TBD	See Control clause in [1].
500-599	TBD	See Control clause in [1].
606	Action not Authorized	The CP does not have privileges to invoke this action.
701	Invalid Media Capabilities	The specified Media Capabilities are invalid (e.g., the MediaManagement service does not support the Media Capabilities).
702	Busy	The MediaManagement service is already in use and no resource left.

5.5.3 [StopMediaSession\(\)](#)

This action allows a TelCP to request to stop a Media Session specified by the input argument [TargetMediaSessionID](#). When a TC receives this action, a TC stops sending and/or receiving Media Streams related to the input argument [TargetMediaSessionID](#) and a TC releases all the resources regarding to the input argument [TargetMediaSessionID](#).

5.5.3.1 Arguments

Table 11 — Arguments for StopMediaSession()

Argument	Direction	relatedStateVariable
<u>TargetMediaSessionID</u>	<u>IN</u>	<u>A_ARG_TYPE_MediaSessionID</u>

5.5.3.2 Argument Descriptions

The argument TargetMediaSessionID uniquely identifies the Media Session to be stopped.

5.5.3.3 Service Requirements

When this action is invoked, this service terminates the Media Session which Media Session ID is the same as the value of the argument TargetMediaSessionID. And this service changes the status of the Media Session to “Stopped” and notifies the MediaSessionInfo state variable.

5.5.3.4 Control Point Requirements When Calling The Action

None.

5.5.3.5 Dependency on Device State

None.

5.5.3.6 Effect on Device State

None.

5.5.3.7 Errors

Table 12 — Error Codes for StopMediaSession()

ErrorCode	errorDescription	Description
400-499	TBD	See Control clause in [1].
500-599	TBD	See Control clause in [1].
606	Action not Authorized	The CP does not have privileges to invoke this action.
703	Invalid Media Session ID	The specified Media Session ID is invalid.

5.5.4 ModifyMediaSession()

This action allows a TelCP to modify the Media Capabilities of an existing Media Session. If this action succeeds, the Media Capabilities of the Media Session which Media Session ID is the same value of the input argument TargetMediaSessionID is change to the new Media Capabilities. To decide the new Media Capabilities, a TelCP offers this service the new Media Capabilities using the input argument NewMediaCapabilityInfo and this service decides the new Media Capabilities by comparing input argument NewMediaCapabilityInfo with the Media Capabilities supported by this service. The decided new Media Capabilities are returned by the output argument TCMediaCapabilityInfo.

5.5.4.1 Arguments

Table 13 — Arguments for [ModifyMediaSession\(\)](#)

Argument	Direction	relatedStateVariable
TargetMediaSessionID	<i>IN</i>	<i>A_ARG_TYPE_MediaSessionID</i>
NewMediaCapabilityInfo	<i>IN</i>	<i>A_ARG_TYPE_MediaCapabilityInfo</i>
TCMediaCapabilityInfo	<i>OUT</i>	<i>A_ARG_TYPE_MediaCapabilityInfo</i>

5.5.4.2 Argument Descriptions

The input argument [TargetMediaSessionID](#) uniquely identifies the Media Session to be modified the Media Capabilities.

The input argument [NewMediaCapabilityInfo](#) contains the new Media Capability information for the Media Session which Media Session ID is the same as the input argument [TargetMediaSessionID](#).

The output argument [TCMediaCapabilityInfo](#) contains this service's Media Capability information based on the input argument [NewMediaCapabilityInfo](#). If SDP as defined in [5] is used to describe the Media Capability information, basic information such as codec types is the same but IP addresses and port numbers are different between [NewMediaCapabilityInfo](#) and [TCMediaCapabilityInfo](#). That is, [NewMediaCapabilityInfo](#) includes IP addresses and port numbers of destinations for sending Media Streams from a TC. [TCMediaCapabilityInfo](#) includes IP addresses and port numbers of a TC to receive Media Streams from the remote party.

5.5.4.3 Service Requirements

When this action succeeds, this service modifies existing Media Session's Media Capabilities. And this service starts sending and/or receiving the Media Streams using the new Media Capabilities. Then this service events the [MediaSessionInfo](#) state variable which <mediaSessionStatus> element includes "[Started](#)" and its reason attribute includes "[Modified](#)".

If this action fails, this service does not modify existing Media Session's Media Capabilities and keep sending and/or receiving Media Streams without changing Media Capabilities. Then this service events the [MediaSessionInfo](#) state variable which <mediaSessionStatus> element includes "[Started](#)" and its reason attribute includes "[ModifyFailed](#)".

When receiving this action with the <contentSharingCapability> element in the [TSMediaCapabilityInfo](#) input argument, this service shall start retrieving the content based on the provided metadata information, process and send the content media to the TS using the Media Session. If the Media Session is not modified, e.g., the content media is mixed into existing stream, this service shall also event the [MediaSessionInfo](#) state variable with the value of the <mediaSessionStatus> element set as "[Started](#)" and its reason attribute set as "[Modified](#)".

5.5.4.4 Control Point Requirements When Calling The Action

Before calling the action, a TelCP shall get the remote party's Media Capabilities.

A TelCP should invoke the [GetMediaCapabilities\(\)](#) action before invoking this action to prepare the TC-Based Content Sharing session. When invoking this action, the TelCP should provide the same content information in the input argument [MediaCapabilityInfo](#) as when invoking the [GetMediaCapabilities\(\)](#) action.

5.5.4.5 Dependency on Device State

None.

5.5.4.6 Effect on Device State

None.

5.5.4.7 Errors**Table 14 — Error Codes for ModifyMediaSession()**

ErrorCode	errorDescription	Description
400-499	TBD	See Control clause in [1].
500-599	TBD	See Control clause in [1].
606	Action not Authorized	The CP does not have privileges to invoke this action.
701	Invalid Media Capability	The specified Media Capabilities are invalid (e.g., the <u>MediaManagement</u> service does not support the Media Capabilities).
703	Invalid Media Session ID	The specified Media Sessin ID is invalid.

5.5.5 GetMediaSessionInfo()

This action allows a TelCP to get information about existing Media Sessions.

This action provides two functions:

- To get the information about all the existing Media Sessions.
- To get the information about the Media Session specified by the input argument TargetMediaSessionID.

5.5.5.1 Arguments**Table 15 — Arguments for GetMediaSessionInfo()**

Argument	Direction	relatedStateVariable
<u>TargetMediaSessionID</u>	<u>IN</u>	<u>A_ARG_TYPE_MediaSessionID</u>
<u>MediaSessionInfoList</u>	<u>OUT</u>	<u>A_ARG_TYPE_MediaSessionInfoList</u>

5.5.5.2 Argument Descriptions

The input argument TargetMediaSessionID uniquely indentifies the Media Session which a TelCP gets Media Session information. When a TelCP gets the information about the all the existing Media Sessions, the value of this argument is set to the empty string("").

The output argument MediaSessionInfo contains information about Media Sessions. When TargetMediaSessionID contains the empty string(""), this argument contains information about all the existing Media Sessions. When TargetMediaSessionID has valid value, this argument contains information about the Media Session specified by TargetMediaSessionID.

5.5.5.3 Service Requirements

None.

5.5.5.4 Control Point Requirements When Calling The Action

None.

5.5.5.5 Dependency on Device State

None.

5.5.5.6 Effect on Device State

None.

5.5.5.7 Errors**Table 16 — Error Codes for [GetMediaSessionInfo\(\)](#)**

ErrorCode	errorDescription	Description
400-499	TBD	See Control clause in [1].
500-599	TBD	See Control clause in [1].
600-699	TBD	See Control clause in [1].
703	Invalid Media Session ID	The specified Media Session ID is invalid.

5.5.6 Error Code Summary

Table 17 lists error codes common to actions for this service type. If an action results in multiple errors, the most specific error should be returned.

Table 17 — Error Code Summary

ErrorCode	errorDescription	Description
400-499	TBD	See Control clause in [1].
500-599	TBD	See Control clause in [1].
606	Action not Authorized	The CP does not have privileges to invoke this action.
700		Reserved for future extensions.
701	Invalid Media Capabilities	The specified Media Capabilities are invalid (e.g., the MediaManagement service does not support the Media Capabilities).
702	Busy	The MediaManagement service is already in use and no resource left.
703	Invalid Media Session ID	The specified Media Session ID is invalid.

Note: 800-899 Error Codes are not permitted for standard actions. See Control clause in [1] for more details.

5.6 Service Behavioral Model**5.6.1 State Diagrams**

The state diagram of a Media Session is shown in Figure 3.

- a) When a TelCP invokes the [StartMediaSession\(\)](#) action, a new Media Session is created and the status of the Media Session is set to as “[Started](#)”. Then, the [MediaManagement](#) service starts sending and/or receiving Media Streams,

- b) When a TelCP invokes the *StopMediaSession()* action, the status of the Media Session is set to as “*Stopped*” and the Media Session is deleted.
- c) The *GetMediaCapabilities()* action and the *GetMediaSessionInfo()* action can be invoked without depending on the status of the Media Session.
- d) The *ModifyMediaSession()* action can be invoked when the status of the Media Session is “*Started*”. This action have no effect on the status of the Media Session.

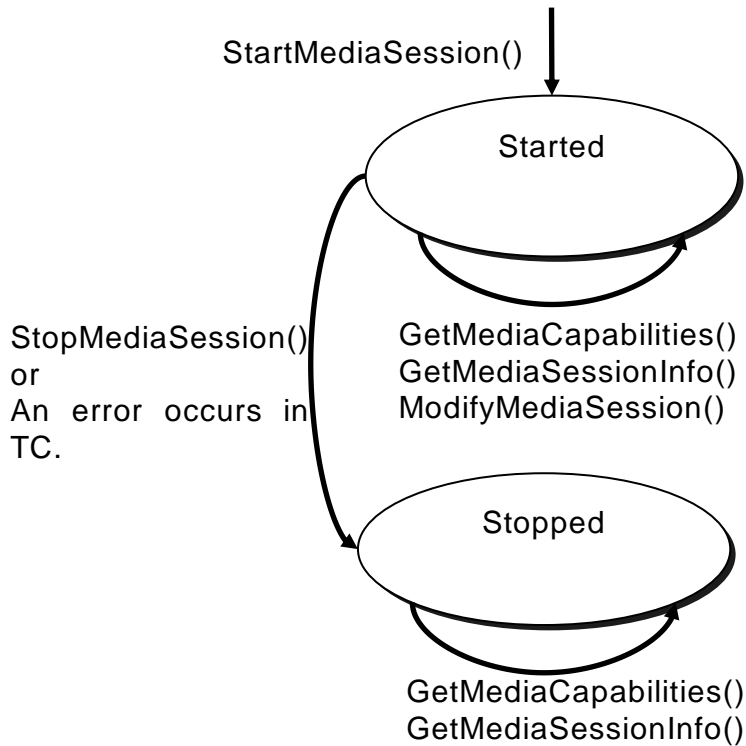


Figure 3 — State diagrams of the *MediaManagement* service

6 XML Service Description

```

<?xml version="1.0"?>
<scpd xmlns="urn:schemas-upnp-org:service-1-0">
  <specVersion>
    <major>1</major>
    <minor>0</minor>
  </specVersion>
  <actionList>
    <action>
      <name>GetMediaCapabilities</name>
      <argumentList>
        <argument>
          <name>TSMediaCapabilityInfo</name>
          <direction>in</direction>
          <relatedStateVariable>
            A ARG TYPE MediaCapabilityInfo
          </relatedStateVariable>
        </argument>
      </argumentList>
    </action>
  </actionList>
  <argumentList>
    <argument>
  
```

```

        <name>SupportedMediaCapabilityInfo</name>
        <direction>out</direction>
        <relatedStateVariable>
            A ARG TYPE MediaCapabilityInfo
        </relatedStateVariable>
    </argument>
</argumentList>
</action>

<action>
    <name>GetMediaSessionInfo</name>
    <argumentList>
        <argument>
            <name>TargetMediaSessionID</name>
            <direction>in</direction>
            <relatedStateVariable>
                A ARG TYPE MediaSessionID
            </relatedStateVariable>
        </argument>
        <argument>
            <name>MediaSessionInfoList</name>
            <direction>out</direction>
            <relatedStateVariable>
                A ARG TYPE MediaSessionInfoList
            </relatedStateVariable>
        </argument>
    </argumentList>
</action>

<action>
    <name>ModifyMediaSession</name>
    <argumentList>
        <argument>
            <name>TargetMediaSessionID</name>
            <direction>in</direction>
            <relatedStateVariable>
                A ARG TYPE MediaSessionID
            </relatedStateVariable>
        </argument>
        <argument>
            <name>NewMediaCapabilityInfo</name>
            <direction>in</direction>
            <relatedStateVariable>
                A ARG TYPE MediaCapabilityInfo
            </relatedStateVariable>
        </argument>
        <argument>
            <name>TCMediaCapabilityInfo</name>
            <direction>out</direction>
            <relatedStateVariable>
                A ARG TYPE MediaCapabilityInfo
            </relatedStateVariable>
        </argument>
    </argumentList>
</action>

<action>
    <name>StartMediaSession</name>
    <argumentList>
        <argument>
            <name>TSMediaCapabilityInfo</name>
            <direction>in</direction>
            <relatedStateVariable>
                A ARG TYPE MediaCapabilityInfo
            </relatedStateVariable>
        </argument>
    </argumentList>
</action>

```

```

    <argument>
      <name>MediaSessionID</name>
      <direction>out</direction>
      <relatedStateVariable>
        A ARG TYPE MediaSessionID
      </relatedStateVariable>
    </argument>
    <argument>
      <name>TCMediaCapabilityInfo</name>
      <direction>out</direction>
      <relatedStateVariable>
        A ARG TYPE MediaCapabilityInfo
      </relatedStateVariable>
    </argument>
  </argumentList>
</action>

<action>
  <name>StopMediaSession</name>
  <argumentList>
    <argument>
      <name>TargetMediaSessionID</name>
      <direction>in</direction>
      <relatedStateVariable>
        A ARG TYPE MediaSessionID
      </relatedStateVariable>
    </argument>
  </argumentList>
</action>

</actionList>

<serviceStateTable>
  <stateVariable sendEvents="yes">
    <name>MediaSessionInfo</name>
    <dataType>string</dataType>
  </stateVariable>

  <stateVariable sendEvents="no">
    <name>A ARG TYPE MediaCapabilityInfo</name>
    <dataType>string</dataType>
  </stateVariable>

  <stateVariable sendEvents="no">
    <name>A ARG TYPE MediaSessionID</name>
    <dataType>string</dataType>
  </stateVariable>

  <stateVariable sendEvents="no">
    <name>A ARG TYPE MediaSessionInfoList</name>
    <dataType>string</dataType>
  </stateVariable>
</serviceStateTable>
</scpd>

```

Annex A (normative)

XML Schema

Annex A provides the global XML Schema for syntactical validation of all the XML fragments used in the MediaManagement service.

```
<?xml version="1.0" encoding="utf-8"?>
<schema targetNamespace="urn:schemas-upnp-org:phone:mms" xmlns:mms="urn:schemas-
upnp-org:phone:mms" xmlns="http://www.w3.org/2001/XMLSchema"
attributeFormDefault="qualified" elementFormDefault="qualified">

  <simpleType name="mediaCapabilityFormatType">
    <restriction base="string">
      <enumeration value="SDP" />
    </restriction>
  </simpleType>

  <simpleType name="mediaSessionStatusValueType">
    <restriction base="string">
      <enumeration value="Started" />
      <enumeration value="Stopped" />
    </restriction>
  </simpleType>

  <simpleType name="mediaSessionStatusReasonType">
    <restriction base="string">
      <enumeration value="Modified" />
      <enumeration value="Error" />
    </restriction>
  </simpleType>

  <complexType name="mediaSessionInfoType">
    <sequence>

      <element name="mediaSessionID" form="unqualified" type="string" />

      <element name="mediaSessionStatus" form="unqualified" nillable="true">
        <complexType>
          <simpleContent>
            <extension base="mms:mediaSessionStatusValueType">
              <attribute name="reason" form="unqualified"
type="mms:mediaSessionStatusReasonType" use="optional" />
            </extension>
          </simpleContent>
        </complexType>
      </element>

      <element name="mediaCapability" form="unqualified" nillable="true">
        <complexType>
          <simpleContent>
            <extension base="string">
              <attribute name="format" form="unqualified"
type="mms:mediaCapabilityFormatType" use="required" />
            </extension>
          </simpleContent>
        </complexType>
      </element>

    </sequence>
  </complexType>

  <complexType name="contentSharingCapabilityType">
    <sequence>
```

```
<element name="protocolInfo" type="string" minOccurs="0" />
<element name="URI" type="anyURI" minOccurs="0" />
<element name="sharingType" minOccurs="0" >
  <simpleType>
    <restriction base="string">
      <enumeration value="transfer" />
      <enumeration value="streaming" />
    </restriction>
  </simpleType>
</element>
</sequence>
</complexType>
<element name="mediaCapabilityInfo">
  <complexType>
    <choice maxOccurs="unbounded">
      <element name="mediaCapability" form="unqualified" nillable="true">
        <complexType>
          <simpleContent>
            <extension base="string">
              <attribute name="format" form="unqualified"
type="mms:mediaCapabilityFormatType" use="required" />
            </extension>
          </simpleContent>
        </complexType>
      </element>
    </choice>
  </complexType>
</element>
<element name="mediaSessionInfo" type="mediaSessionInfoType" />
<element name="mediaSessionInfoList">
  <complexType>
    <choice maxOccurs="unbounded">
      <element name="mediaSessionInfo" form="unqualified"
type="mediaSessionInfoType" />
    </choice>
  </complexType>
</element>
</schema>
```


Annex B (informative)

Theory of Operation

B.1 Create an outgoing Call

The following sequence describes how to create an outgoing Call in the Non-Monopolization Mode.

- a) The TelCP determines the Media Capabilities of the TS by invoking the GetMediaCapabilities() action.
- b) The TelCP determines the Media Capabilities of the TC by invoking the GetMediaCapabilities() action.
- c) The TelCP selects the set of appropriate Media Capabilities for the Call by matching the Media Capabilities of the TS and the TC.
- d) The TelCP invokes the StartCall() action on the TS and the TS initiates the Call on the WAN side.
- e) The TS sends the CallInfo state variable to the TelCP about the state of the Call (“Dialing”, “Calling” and “Connected”). The Call between the TS and the WAN side is established at this point.
- f) The TelCP invokes the StartMediaSession() action on the TC after the TelCP receives the CallInfo state variable with the Call Status as “Connected”. The TC starts sending and/or receiving the Media Streams.
- g) The TC sends the MediaSessionInfo state variable to the TelCP with the status of the Media Session as “Started”.
- h) The TelCP invokes the StartMediaTransfer() action on the TS. The TS starts sending and/or receiving the Media Streams.
- i) The TS sends the CallInfo state variable to the TelCP with the CallStatus as “Talking”.
- j) If the TelCP wants to disconnect the Call, the TelCP invokes the StopCall() action on the TS.
- k) The TelCP then invokes the StopMediaSession() action on the TC.
- l) The TS sends the CallInfo state variable to the TelCP with the CallStatus as “Disconneted” and the TC sends the MediaSessionInfo state variable to the TelCP with the status of the Media Session as “Stopped”.

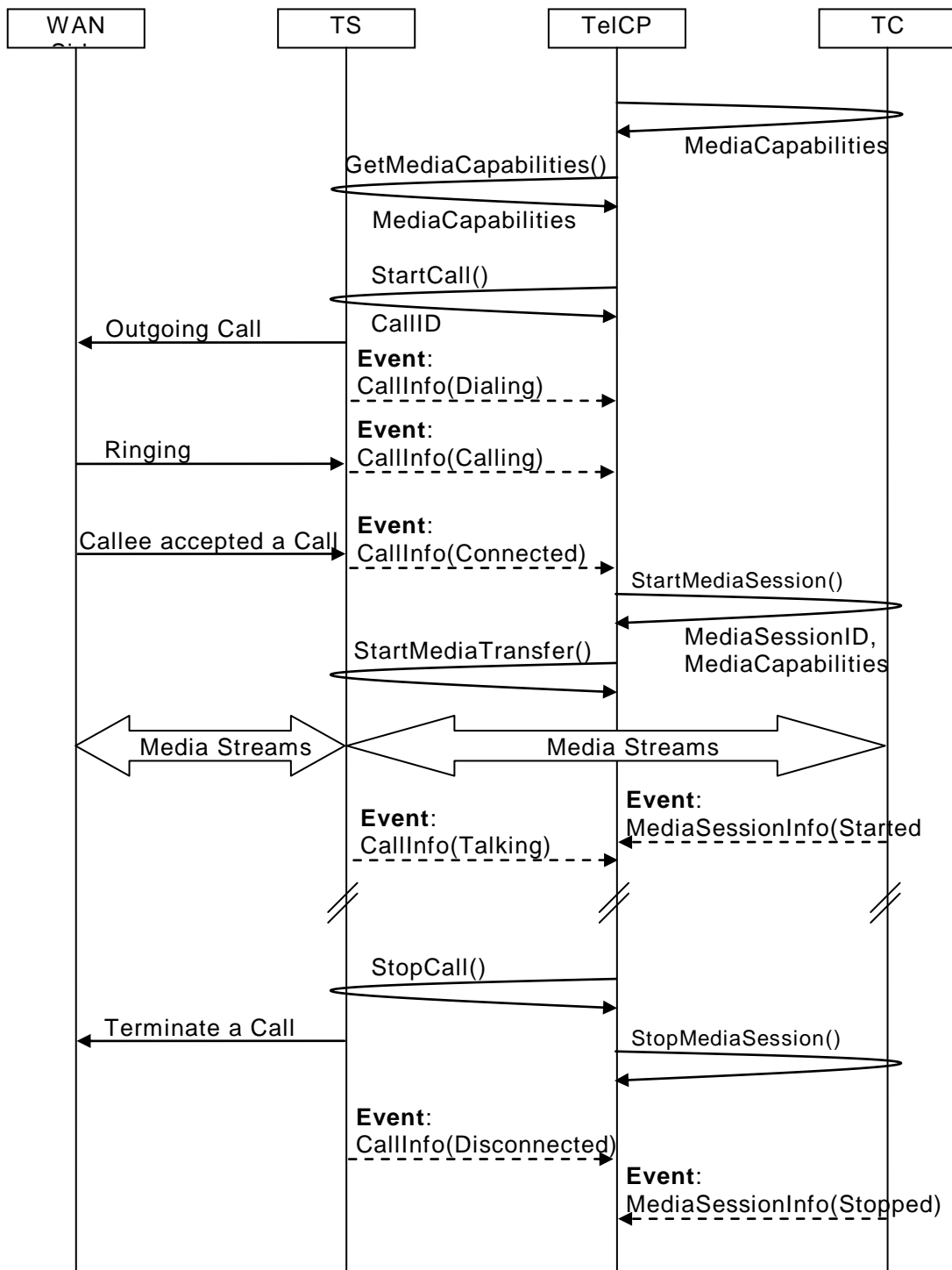


Figure B.1 — Flow basics for creating an outgoing Call

B.2 Accept an incoming Call

The following sequence describes how to accept an incoming Call in the Non-Monopolization Mode.

- a) When the TS receives an incoming Call on the WAN side, the TS sends the CallInfo state variable to the TelCP with the Call Status as “Ringing”. The CallInfo state variable also includes the Media Capabilities of the Caller.
- b) The TelCP determines the Media Capabilities of the TC by invoking the GetMediaCapabilities() action.
- c) The TelCP selects the set of appropriate Media Capabilities for the Call by matching the Media Capabilities of the TS and the TC.
- d) The TelCP invokes the AcceptCall() action on the TS and the TS accepts the Call on the WAN side.
- e) After the Call between the TS and the WAN side is established, the TS sends the CallInfo state variable to the TelCP with the Call Status as “Connected”.
- f) The TelCP invokes the StartMediaSession() action on the TC after the TelCP receives the CallInfo state variable with the Call Status as “Connected”. The TC starts sending and/or receiving the Media Streams.
- g) The TC sends the MediaSessionInfo state variable to the TelCP with the status of the Media Session as “Started”.
- h) The TelCP invokes the StartMediaTransfer() action on the TS. The TS starts sending and/or receiving the Media Streams.
- i) The TS sends the CallInfo state variable to the TelCP with the Call Status as “Talking”.
- j) If the TelCP wants to disconnect the Call, the TelCP invokes the StopCall() action on the TS.
- k) The TelCP then invokes the StopMediaSession() action on the TC.
- l) The TS sends the CallInfo state variable to the TelCP with the Call Status as “Disconnected” and the TC sends the MediaSessionInfo state variable to the TelCP with the status of the Media Session as “Stopped”.

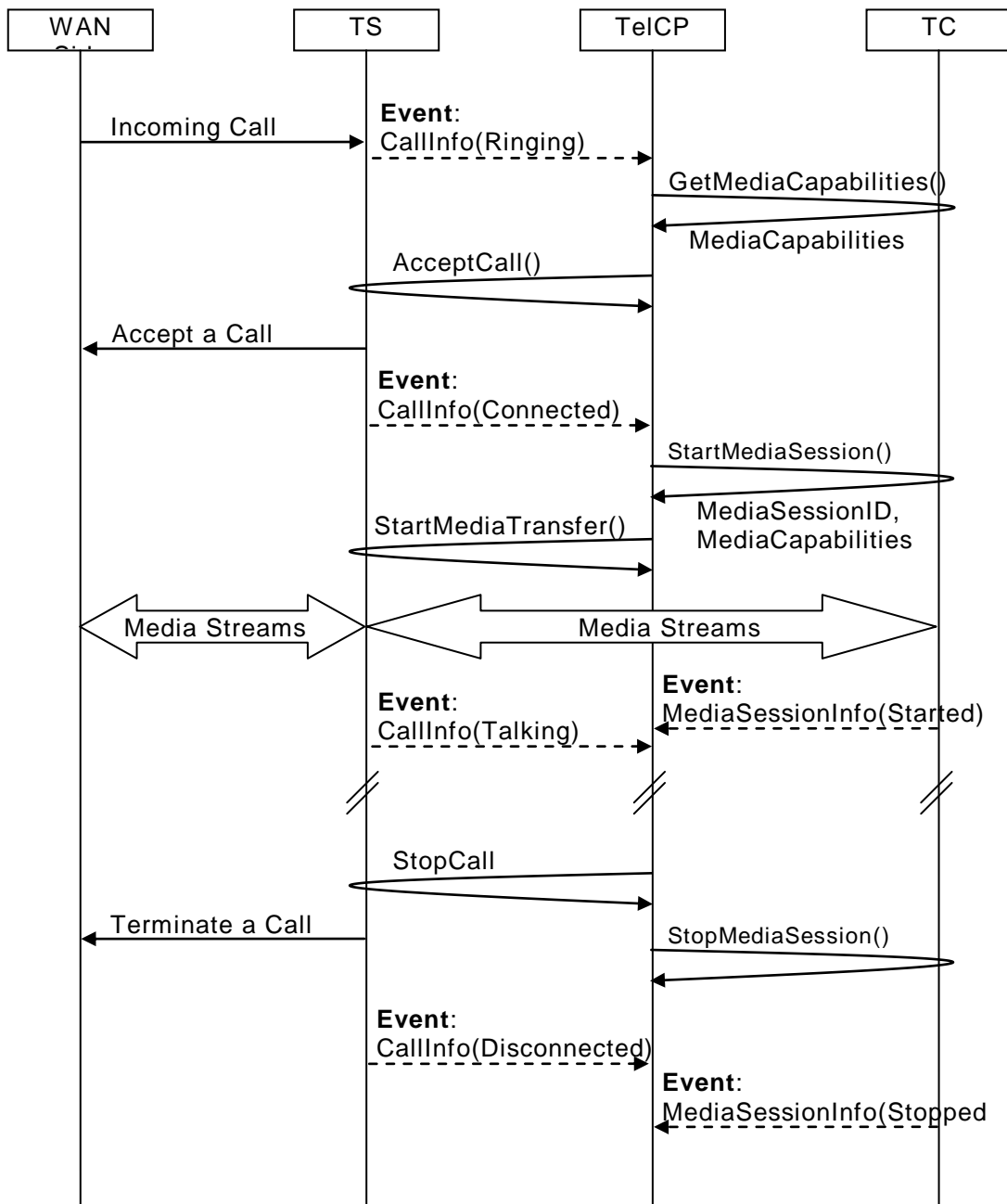


Figure B.2 — Flow basics for accpeting an incoming Call

B.3 Modify an ongoing Call

The following sequence describes how to modify an ongoing Call from an audio to a video Call. In this sequence, the TC1 supports the audio capabilities and the TC2 supports the video capabilities. At first, the TelCP creates an audio Call with TC1. Then the TelCP modifies the Call from audio to a video Call by adding TC2.

- a) The TelCP creates an audio Call with the TC1. The sequence is the same as the sequence shown in B.1.
- b) The TelCP determines the Media Capabilities of the TS by invoking the [GetMediaCapabilities\(\)](#) action.

- c) The TelCP determines the Media Capabilities of the TC2 by invoking the GetMediaCapabilities() action.
- d) The TelCP selects the set of appropriate Media Capabilities for the Call to change the Media Capabilities from an audio to a video Call by matching the Media Capabilities of the TS and the TC1 and TC2.
- e) The TelCP invokes the ModifyCall() action on the TS and the TS modifies the Call on the WAN side.
- f) The TS sends the CallInfo state variable to the TelCP about the state of the Call (“SendingModifyRequest” and “Modified”). The Call between the TS and the WAN side is modified at this point.
- g) The TelCP invokes the StartMediaSession() action on the TC2 after the TelCP receives the CallInfo state variable with the Call Status as “Modified”. The TC2 starts sending and/or receiving the Media Streams.
- h) The TC2 sends the MediaSessionInfo state variable to the TelCP with the status of the Media Session as “Started”.
- i) The TelCP invokes the StartMediaTransfer() action on the TS. The TS starts sending and/or receiving the Media Streams according to the modified Media Capabilities.
- j) The TS sends the CallInfo state variable to the TelCP with the Call Status as “Talking”.
- k) If the TelCP wants to disconnect the Call, the TelCP invokes the StopCall() action on the TS.
- l) The TelCP then invokes the StopMediaSession() action on the TC1 and TC2.
- m) The TS sends the CallInfo state variable to the TelCP with the CallStatus as “Disconnected” and the TC1 and TC2 send the MediaSessionInfo state variable to the TelCP with the status of the Media Session as “Stopped”.

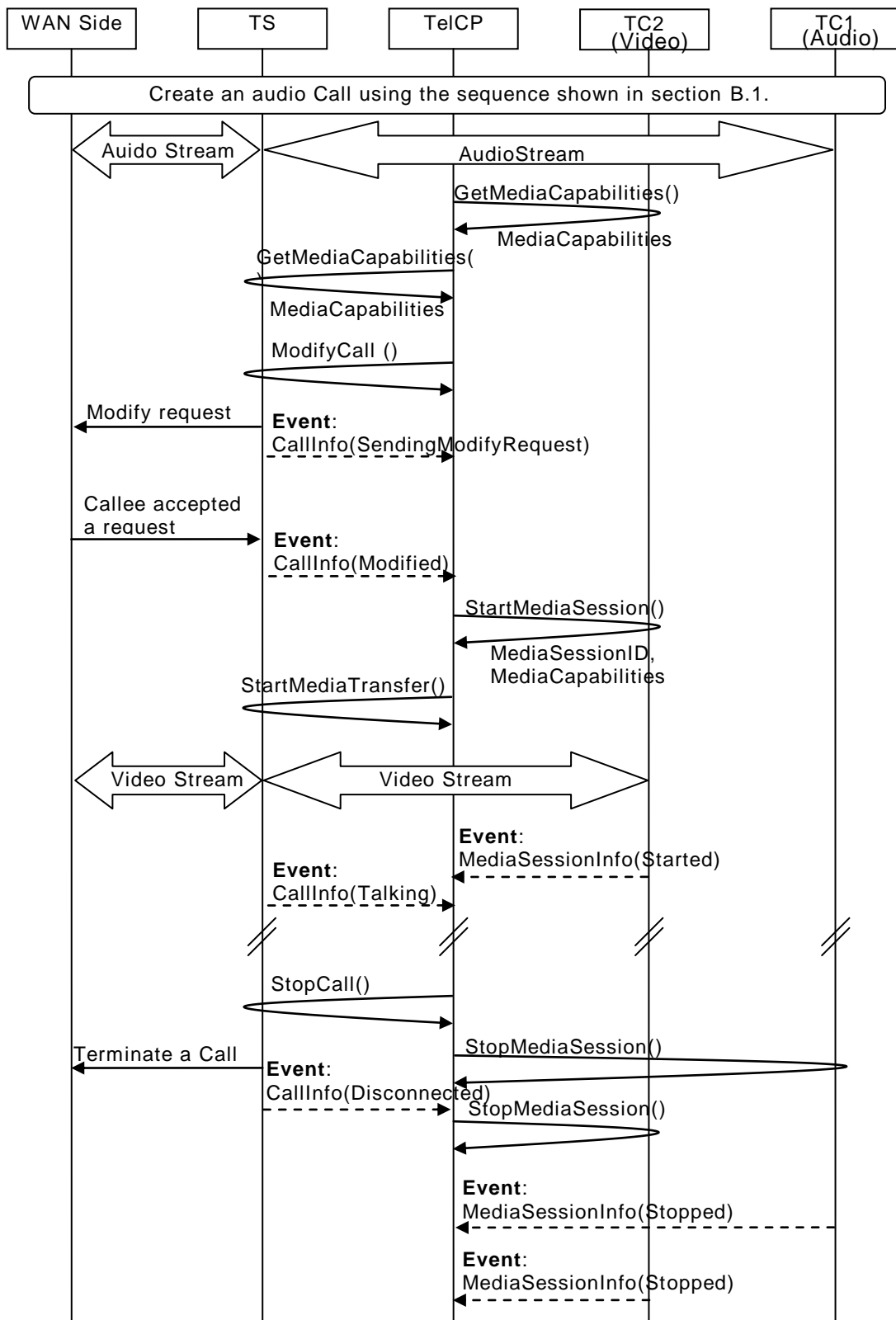


Figure B.3 — Flow basics for modifying an ongoing Call

Annex C
(informative)

Sequence Examples

C.1 Create a Call

C.1.1 Figure

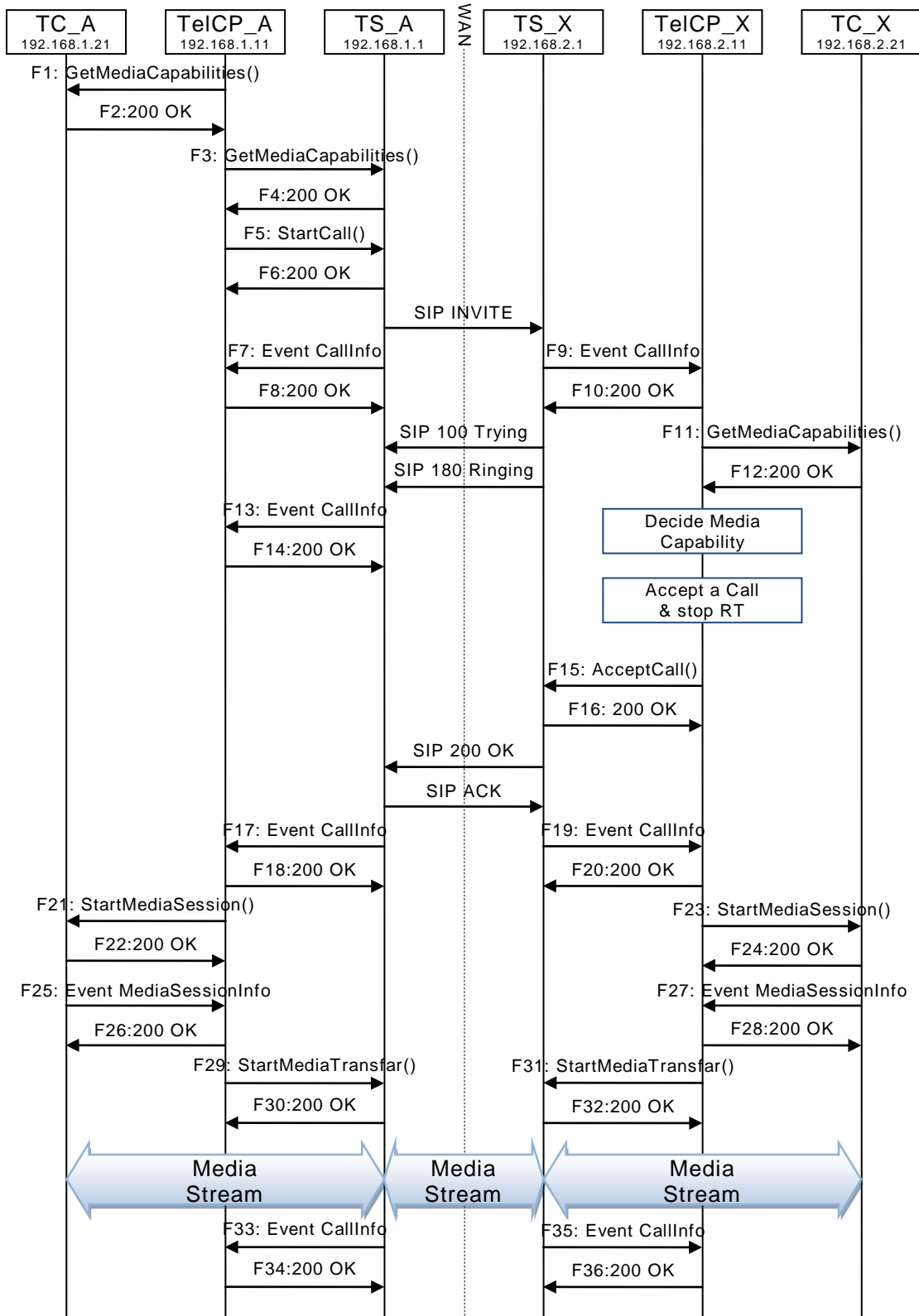


Figure C.4 — Create a Call

C.1.2 F1

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1
 SOAPACTION: "urn:schemas-upnp-org:service:MediaManagement:2#GetMediaCapabilities"
 CONTENT-TYPE: text/xml ; charset="utf-8"
 HOST: 192.168.1.21:10021
 Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetMediaCapabilities xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2" >
      <TSMediaCapabilityInfo></TSMediaCapabilityInfo>
    </u:GetMediaCapabilities>
  </s:Body>
</s:Envelope>
```

C.1.3 F2

HTTP/1.1 200 OK
 EXT:
 CONTENT-TYPE: text/xml ; charset="utf-8"
 SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0
 Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetMediaCapabilitiesResponse xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2">
      <SupportedMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.21
s=-
c=IN IP4 192.168.1.21
t=0 0
m=audio 11021 RTP/AVP 0
c=IN IP4 192.168.1.21
a=rtpmap:0 PCMU/8000
aptime:20
m=video 12021 RTP/AVP 96
c=IN IP4 192.168.1.21
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/mms:mediaCapabilityInfo&gt;
&lt;/SupportedMediaCapabilityInfo>
    </u:GetMediaCapabilitiesResponse>
  </s:Body>
</s:Envelope>
```

C.1.4 F3

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1
 SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#GetMediaCapabilities"
 CONTENT-TYPE: text/xml ; charset="utf-8"
 HOST: 192.168.1.1:10001

Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
<s:Body>
<u:GetMediaCapabilities xmlns:u="urn:schemas-upnp-org:service: CallManagement:2">
  <TCMediaCapabilityInfo></TCMediaCapabilityInfo>
</u:GetMediaCapabilities>
</s:Body>
</s:Envelope>
```

C.1.5 F4

HTTP/1.1 200 OK

EXT:

CONTENT-TYPE: text/xml ; charset="utf-8"

SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0

Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetMediaCapabilitiesResponse xmlns:u="urn:schemas-upnp-
org:service:CallManagement:2">
      <SupportedMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 12001 RTP/AVP 96
c=IN IP4 192.168.1.1
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/cams:mediaCapabilityInfo&gt;</SupportedMediaCapabilityInfo>
    </u:GetMediaCapabilitiesResponse>
  </s:Body>
</s:Envelope>
```

C.1.6 F5

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1

SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#StartCall"

CONTENT-TYPE: text/xml ; charset="utf-8"

HOST: 192.168.1.1:10001

Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StartCall xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
      <TelCPName></TelCPName>
      <SecretKey></SecretKey>
      <CalleeID>tel:0774940201</CalleeID>
```

```

    <CallPriority>Normal</CallPriority>
    <MediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
    &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.11
s=-
c=IN IP4 192.168.1.11
t=0 0
m=audio 11021 RTP/AVP 0
c=IN IP4 192.168.1.21
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability&gt;
&lt;/cams:mediaCapabilityInfo&gt;</MediaCapabilityInfo>
    <CallMode>Non-Monopolize</CallMode>
  </u:StartCall>
</s:Body>
</s:Envelope>

```

C.1.7 F6

HTTP/1.1 200 OK
Content-Length: [bytes in body]
CONTENT-TYPE: text/xml; charset="utf-8"
SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0
EXT:

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
  <s:Body>
    <m:StartCallResponse xmlns:m="urn:schemas-upnp-org:service:CallManagement:2">
      <CallID>call1101</CallID>
    </m:StartCallResponse>
  </s:Body>
</s:Envelope>

```

C.1.8 F7

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1

HOST: 192.168.1.11:10011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-10001
SEQ: [sequence number]
Connection: Keep-Alive

```

<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:callInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:cams"
xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
  &lt;callID&gt;call1101&lt;/callID&gt;
  &lt;targetNames type="TelCPName"&gt;TV@Living&lt;/targetNames&gt;
  &lt;callStatus&gt;Dialing&lt;/callStatus&gt;
  &lt;priority&gt;Normal&lt;/priority&gt;
  &lt;remoteParty&gt;

```

```

    <peer:id>0774940201</peer:id>
  </remoteParty>
  <mediaCapability format="SDP">v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
  </mediaCapability>
  </cams:callInfo></CallInfo>
</e:property>
</e:propertyset>

```

C.1.9 F8

HTTP/1.1 200 OK
Content-Length: 0

C.1.10 F9

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
HOST: 192.168.2.11:20011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-20001
SEQ: [sequence number]
Connection: Keep-Alive

```

<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo><?xml version="1.0" encoding="utf-8"?>
  <cams:callInfo
    xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
      http://www.upnp.org/schemas/phone/cams-v2.xsd"
    xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
    xmlns:cams="urn:schemas-upnp-org:phone:cams"
    xmlns:peer="urn:schemas-upnp-org:phone:peer">
    <callID>call201</callID>
    <targetNames type="TelCPName">*</targetNames>
    <callStatus>Ringing</callStatus>
    <priority>Normal</priority>
    <remoteParty>
      <peer:id>0355550101</peer:id>
    </remoteParty>
    <mediaCapability format="SDP">v=0
o=- 0 0 IN IP4 192.168.2.1
s=-
c=IN IP4 192.168.2.1
t=0 0
m=audio 21001 RTP/AVP 0
c=IN IP4 192.168.2.1
a=rtpmap:0 PCMU/8000
a=ptime:20
  </mediaCapability>
  </cams:callInfo></CallInfo>
</e:property>
</e:propertyset>

```

C.1.11 F10

HTTP/1.1 200 OK
Content-Length: 0

C.1.12 F11

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1
SOAPACTION: "urn:schemas-upnp-org:service:MediaManagement:2#GetMediaCapabilities"
CONTENT-TYPE: text/xml ; charset="utf-8"
HOST: 192.168.2.21:20021
Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>  
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"  
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">  
  <s:Body>  
    <u:GetMediaCapabilities xmlns:u="urn:schemas-upnp-  
org:service:MediaManagement:2" >  
      <TSMediaCapabilityInfo></TSMediaCapabilityInfo>  
    </u:GetMediaCapabilities>  
  </s:Body>  
</s:Envelope>
```

C.1.13 F12

HTTP/1.1 200 OK
EXT:
CONTENT-TYPE: text/xml ; charset="utf-8"
SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0
Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>  
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"  
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">  
  <s:Body>  
    <u:GetMediaCapabilitiesResponse xmlns:u="urn:schemas-upnp-  
org:service:MediaManagement:2">  
<SupportedMediaCapabilityInfo><?xml version="1.0" encoding="utf-8"?>  
&lt;mms:mediaCapabilityInfo  
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms  
http://www.upnp.org/schemas/phone/mms-v2.xsd"  
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"  
xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;  
&lt;mediaCapability format="SDP"&gt;v=0  
o=- 0 0 IN IP4 192.168.2.21  
s=-  
c=IN IP4 192.168.2.21  
t=0 0  
m=audio 21021 RTP/AVP 0  
c=IN IP4 192.168.2.21  
a=rtpmap:0 PCMU/8000  
a=ptime:20  
m=video 22021 RTP/AVP 96  
c=IN IP4 192.168.2.21  
b=AS:2500  
a=rtpmap:96 MP4V-ES/90000  
a=fmtp:96 profile-level-  
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21  
a=framerate:30  
&lt;/mediaCapability&gt;  
&lt;/mms:mediaCapabilityInfo&gt;</SupportedMediaCapabilityInfo>  
  </u:GetMediaCapabilitiesResponse>  
</s:Body>  
</s:Envelope>
```

C.1.14 F13

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1

HOST: 192.168.1.11:10011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange

SID: uuid:c3580410-1dd1-11b2-8000-10001

SEQ: [sequence number]

Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
    http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
  &lt;callID&gt;call101&lt;/callID&gt;
  &lt;targetNames type="TelCPName"&gt;*&lt;/targetNames&gt;
  &lt;callStatus&gt;Calling&lt;/callStatus&gt;
  &lt;priority&gt;Normal&lt;/priority&gt;
  &lt;remoteParty&gt;
    &lt;peer:id&gt;0774940201&lt;/peer:id&gt;
  &lt;/remoteParty&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability&gt;
&lt;/cams:callInfo&gt;</CallInfo>
</e:property>
</e:propertyset>
```

C.1.15 F14

HTTP/1.1 200 OK

Content-Length: 0

C.1.16 F15

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1

SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#AcceptCall"

CONTENT-TYPE: text/xml ; charset="utf-8"

HOST: 192.168.2.1:20001

Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
  xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:AcceptCall xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
      <TelCPName></TelCPName>
      <SecretKey></SecretKey>
      <TargetCallID>call1201</TargetCallID>
      <MediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:mediaCapabilityInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
    http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.11
s=-
c=IN IP4 192.168.2.11
t=0 0
m=audio 21021 RTP/AVP 0
c=IN IP4 192.168.2.21
```

```

a=rtpmap:0 PCMU/8000
a=ptime:20
<lt;/mediaCapability>>
<lt;/cams:mediaCapabilityInfo>></MediaCapabilityInfo>
  <CallMode>"Non-Monopolize"</CallMode>
</u:AcceptCall>
</s:Body>
</s:Envelope>

```

C.1.17 F16

```

HTTP/1.1 200 OK
Content-Length: [bytes in body]
CONTENT-TYPE: text/xml; charset="utf-8"
SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0
EXT:

```

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
<s:Body>
<m:AcceptCallResponse xmlns:m="urn:schemas-upnp-org:service:CallManagement:2" />
</s:Body>
</s:Envelope>

```

C.1.18 F17

```

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
HOST: 192.168.1.11:10011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-10001
SEQ: [sequence number]
Connection: Keep-Alive

```

```

<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo><lt;?xml version="1.0" encoding="utf-8"?>>
<lt;cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer">>
  <lt;callID>>call101<lt;/callID>>
  <lt;targetNames type="TelCPName">>*<lt;/targetNames>>
  <lt;callStatus>>Connected<lt;/callStatus>>
  <lt;priority>>Normal<lt;/priority>>
  <lt;remoteParty>>
    <lt;peer:id>>0774940201<lt;/peer:id>>
  <lt;/remoteParty>>
  <lt;mediaCapability format="SDP">>v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
<lt;/mediaCapability>>
<lt;/cams:callInfo>></CallInfo>
</e:property>
</e:propertyset>

```

C.1.19 F18

HTTP/1.1 200 OK
Content-Length: 0

C.1.20 F19

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
HOST: 192.168.2.11:20011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-20001
SEQ: [sequence number]
Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
  &lt;callID&gt;call1201&lt;/callID&gt;
  &lt;targetNames type="TelCPName"&gt;*&lt;/targetNames&gt;
  &lt;callStatus&gt;Connected&lt;/callStatus&gt;
  &lt;priority&gt;Normal&lt;/priority&gt;
  &lt;remoteParty&gt;
    &lt;peer:id&gt;0355550101&lt;/peer:id&gt;
  &lt;/remoteParty&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.1
s=-
c=IN IP4 192.168.2.1
t=0 0
m=audio 21001 RTP/AVP 0
c=IN IP4 192.168.2.1
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability&gt;
&lt;/cams:callInfo&gt;</CallInfo>
</e:property>
</e:propertyset>
```

C.1.21 F20

HTTP/1.1 200 OK
Content-Length: 0

C.1.22 F21

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1
SOAPACTION: "urn:schemas-upnp-org:service:MediaManagement:2#StartMediaSession"
CONTENT-TYPE: text/xml ; charset="utf-8"
HOST: 192.168.1.21:10021
Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StartMediaSession xmlns:u="urn:schemas-upnp-org:service:MediaManagement:2">
      <TSMediaCapabilityInfo&gt;&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
```



```
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.11
s=-
c=IN IP4 192.168.1.11
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability&gt;
&lt;/mms:mediaCapabilityInfo&gt;
</TSMediaCapabilityInfo>
  </u:StartMediaSession>
</s:Body>
</s:Envelope>
```

C.1.23 F22

HTTP/1.1 200 OK

EXT:

CONTENT-TYPE: text/xml ; charset="utf-8"

SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0

Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StartMediaSessionResponse xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2">
<MediaSessionID>media101</MediaSessionID>
<TCMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.21
s=-
c=IN IP4 192.168.1.21
t=0 0
m=audio 11021 RTP/AVP 0
c=IN IP4 192.168.1.21
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability&gt;
&lt;/mms:mediaCapabilityInfo&gt;
</TCMediaCapabilityInfo>
</u:StartMediaSessionResponse>
</s:Body>
</s:Envelope>
```

C.1.24 F23

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1

SOAPACTION: "urn:schemas-upnp-org:service:MediaManagement:2#StartMediaSession"

CONTENT-TYPE: text/xml ; charset="utf-8"

HOST: 192.168.2:21:20021

Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StartMediaSession xmlns:u="urn:schemas-upnp-org:service:MediaManagement:2">
      <TSMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
```

```

<lt;mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms">
<lt;mediaCapability format="SDP">v=0
o=- 0 0 IN IP4 192.168.2.11
s=-
c=IN IP4 192.168.2.11
t=0 0
m=audio 21001 RTP/AVP 0
c=IN IP4 192.168.2.1
a=rtpmap:0 PCMU/8000
a=ptime:20
<lt;/mediaCapability>
<lt;/mms:mediaCapabilityInfo>
</TSMediaCapabilityInfo>
</u:StartMediaSession>
</s:Body>
</s:Envelope>

```

C.1.25 F24

HTTP/1.1 200 OK

EXT:

CONTENT-TYPE: text/xml ; charset="utf-8"

SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0

Content-Length: [bytes in body]

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
<s:Body>
<u:StartMediaSessionResponse xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2">
<MediaSessionID>media201</MediaSessionID>
<TCMediaCapabilityInfo><?xml version="1.0" encoding="utf-8"?>
<lt;mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms">
<lt;mediaCapability format="SDP">v=0
o=- 0 0 IN IP4 192.168.2.21
s=-
c=IN IP4 192.168.2.21
t=0 0
m=audio 21021 RTP/AVP 0
c=IN IP4 192.168.2.21
a=rtpmap:0 PCMU/8000
a=ptime:20
<lt;/mediaCapability>
<lt;/mms:mediaCapabilityInfo></TCMediaCapabilityInfo>
</u:StartMediaSessionResponse>
</s:Body>
</s:Envelope>

```

C.1.26 F25

NOTIFY /_urn:upnp-org:serviceId:MediaManagement HTTP/1.1

HOST: 192.168.1.11:10011

CONTENT-TYPE: text/xml

Content-Length: [bytes in body]

NT: upnp:event

NTS: upnp:propchange

SID: uuid:c3580410-1dd1-11b2-8000-10021

SEQ: [sequence number]

Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<MediaSessionInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaSessionInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
  http://www.upnp.org/schemas/phone/mms-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:mms="urn:schemas-upnp-org:phone:mms"&gt;
  &lt;mediaSessionID&gt;media101&lt;/mediaSessionID&gt;
  &lt;mediaSessionStatus&gt;Started&lt;/mediaSessionStatus&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.21
s=-
c=IN IP4 192.168.1.21
t=0 0
m=audio 11021 RTP/AVP 0
c=IN IP4 192.168.1.21
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability&gt;
&lt;/mms:mediaSessionInfo&gt;</MediaSessionInfo>
</e:property>
</e:propertyset>
```

C.1.27 F26

HTTP/1.1 200 OK
Content-Length: 0

C.1.28 F27

NOTIFY /_urn:upnp-org:serviceId:MediaManagement HTTP/1.1
HOST: 192.168.2.11:20011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-20021
SEQ: [sequence number]
Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<MediaSessionInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaSessionInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
  http://www.upnp.org/schemas/phone/mms-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:mms="urn:schemas-upnp-org:phone:mms"&gt;
  &lt;mediaSessionID&gt;media201&lt;/mediaSessionID&gt;
  &lt;mediaSessionStatus&gt;Started&lt;/mediaSessionStatus&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.21
s=-
c=IN IP4 192.168.2.21
t=0 0
m=audio 21021 RTP/AVP 0
c=IN IP4 192.168.2.21
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability&gt;
&lt;/mms:mediaSessionInfo&gt;</MediaSessionInfo>
</e:property>
</e:propertyset>
```

C.1.29 F28

HTTP/1.1 200 OK
Content-Length: 0

C.1.30 F29

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1
SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#StartMediaTransfer"
CONTENT-TYPE: text/xml ; charset="utf-8"
HOST: 192.168.1.1:10001
Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StartMediaTransfer xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
      <TelCPName></TelCPName>
      <SecretKey></SecretKey>
      <TargetCallID>call1101</TargetCallID>
      <TCList>&lt;?xml version="1.0" encoding="utf-8"?&gt;
        &lt;cams:TCList
          xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
            http://www.upnp.org/schemas/phone/cams-v2.xsd"
          xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
          xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
            &lt;TC&gt;
              &lt;UDN&gt;uid:97ef6efa-ac89-4ea2-0001-udn101&lt;/UDN&gt;
              &lt;mediaSessionID&gt;media101&lt;/mediaSessionID&gt;
            &lt;/TC&gt;
          &lt;/cams:TCList&gt;</TCList>
      <MediaCapabilityInfo&lt;?xml version="1.0" encoding="utf-8"?&gt;
        &lt;cams:mediaCapabilityInfo
          xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
            http://www.upnp.org/schemas/phone/cams-v2.xsd"
          xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
          xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
            &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.11
s=-
c=IN IP4 192.168.1.11
t=0 0
m=audio 11021 RTP/AVP 0
c=IN IP4 192.168.1.21
a=rtpmap:0 PCMU/8000
a=ptime:20
            &lt;/mediaCapability&gt;
          &lt;/cams:mediaCapabilityInfo&gt;</MediaCapabilityInfo>
    </u:StartMediaTransfer>
  </s:Body>
</s:Envelope>
```

C.1.31 F30

HTTP/1.1 200 OK
Content-Length: [bytes in body]
CONTENT-TYPE: text/xml; charset="utf-8"
SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0
EXT:

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
  <s:Body>
    <m:StartMediaTransferResponse xmlns:m="urn:schemas-upnp-
org:service:CallManagement:2" />
  </s:Body>
</s:Envelope>
```

C.1.32 F31

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1
 SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#StartMediaTransfer"
 CONTENT-TYPE: text/xml ; charset="utf-8"
 HOST: 192.168.2.1:20001
 Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
<s:Body>
<u:StartMediaTransfer xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
<TelCPName></TelCPName>
<SecretKey></SecretKey>
<TargetCallID>call1201</TargetCallID>
<TCList>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:TCList
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
&lt;TC&gt;
  &lt;UDN&gt;uuid:97ef6efa-ac89-4ea2-0001-udn201&lt;/UDN&gt;
  &lt;mediaSessionID&gt;media201&lt;/mediaSessionID&gt;
  &lt;/TC&gt;
&lt;/cams:TCList&gt;</TCList>
<MediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:mediaCapabilityInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.11
s=-
c=IN IP4 192.168.2.11
t=0 0
m=audio 21021 RTP/AVP 0
c=IN IP4 192.168.2.21
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability&gt;
&lt;/cams:mediaCapabilityInfo&gt;</MediaCapabilityInfo>
</u:StartMediaTransfer>
</s:Body>
</s:Envelope>
```

C.1.33 F32

HTTP/1.1 200 OK
 Content-Length: [bytes in body]
 CONTENT-TYPE: text/xml; charset="utf-8"
 SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0
 EXT:

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
  <s:Body>
    <m:StartMediaTransferResponse xmlns:m="urn:schemas-upnp-
org:service:CallManagement:2" />
  </s:Body>
</s:Envelope>
```

C.1.34 F33

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
 HOST: 192.168.1.11:10011
 CONTENT-TYPE: text/xml

Content-Length: [bytes in body]
 NT: upnp:event
 NTS: upnp:propchange
 SID: uuid:c3580410-1dd1-11b2-8000-10001
 SEQ: [sequence number]
 Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
  &lt;callID&gt;call1101&lt;/callID&gt;
  &lt;targetNames type="TelCPName"&gt;*&lt;/targetNames&gt;
  &lt;callStatus&gt;Talking&lt;/callStatus&gt;
  &lt;priority&gt;Normal&lt;/priority&gt;
  &lt;remoteParty&gt;
    &lt;peer:id&gt;0774940201&lt;/peer:id&gt;
  &lt;/remoteParty&gt;
  &lt;TCList&gt;
    &lt;TC&gt;
      &lt;UDN&gt;uuid:97ef6efa-ac89-4ea2-0001-udn101&lt;/UDN&gt;
      &lt;mediaSessionID&gt;media101&lt;/mediaSessionID&gt;
    &lt;/TC&gt;
  &lt;/TCList&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability&gt;
&lt;/cams:callInfo&gt;</CallInfo>
</e:property>
</e:propertyset>
```

C.1.35 F34

HTTP/1.1 200 OK
 Content-Length: 0

C.1.36 F35

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
 HOST: 192.168.2.11:20011
 CONTENT-TYPE: text/xml
 Content-Length: [bytes in body]
 NT: upnp:event
 NTS: upnp:propchange
 SID: uuid:c3580410-1dd1-11b2-8000-20001
 SEQ: [sequence number]
 Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
```

```

xmlns:cams="urn:schemas-upnp-org:phone:cams"
xmlns:peer="urn:schemas-upnp-org:phone:peer">
  <callID>call1201</callID>
  <targetNames type="TelCPName">*</targetNames>
  <callStatus>Talking</callStatus>
  <priority>Normal</priority>
  <remoteParty>
    <peer:id>0355550101</peer:id>
  </remoteParty>
  <TCList>
    <TC>
      <UDN>uuid:97ef6efa-ac89-4ea2-0001-udn201</UDN>
      <mediaSessionID>media201</mediaSessionID>
    </TC>
  </TCList>
  <mediaCapability format="SDP">v=0
o=- 0 0 IN IP4 192.168.2.1
s=-
c=IN IP4 192.168.2.1
t=0 0
m=audio 21001 RTP/AVP 0
c=IN IP4 192.168.2.1
a=rtpmap:0 PCMU/8000
a=ptime:20
</mediaCapability>
</cams:callInfo></CallInfo>
</e:property>
</e:propertyset>

```

C.1.37 F36

HTTP/1.1 200 OK
Content-Length: 0

C.2 Terminate a Call

C.2.1 Figure

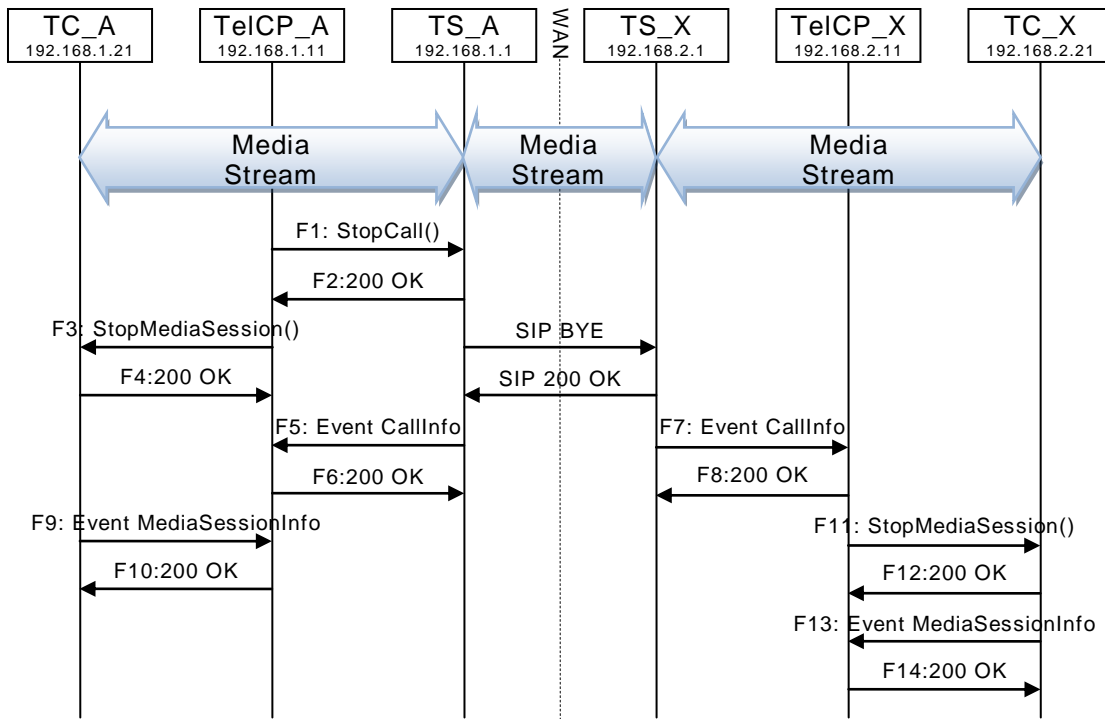


Figure C.5 — Terminate a Call

C.2.2 F1

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1
 SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#StopCall"
 CONTENT-TYPE: text/xml ; charset="utf-8"
 HOST: 192.168.1.1:10001
 Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StopCall xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
      <TelCPName></TelCPName>
      <SecretKey></SecretKey>
      <CallID>call101</CallID>
    </u:StopCall>
  </s:Body>
</s:Envelope>
```

C.2.3 F2

HTTP/1.1 200 OK
 EXT:
 CONTENT-TYPE: text/xml ; charset="utf-8"
 SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0
 Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StopCallResponse xmlns:u="urn:schemas-upnp-org:service:CallManagement:2" />
  </s:Body>
</s:Envelope>
```

C.2.4 F3

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1
 SOAPACTION: "urn:schemas-upnp-org:service:MediaManagement:2#StopMediaSession"
 CONTENT-TYPE: text/xml ; charset="utf-8"
 HOST: 192.168.1.21:10021
 Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StopMediaSession xmlns:u="urn:schemas-upnp-org:service:MediaManagement:2">
      <TargetMediaSessionID>media101</TargetMediaSessionID>
    </u:StopMediaSession>
  </s:Body>
</s:Envelope>
```

C.2.5 F4

HTTP/1.1 200 OK
 EXT:
 CONTENT-TYPE: text/xml ; charset="utf-8"
 SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0
 Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
```



```
<u:StopMediaSessionResponse xmlns:u="urn:schemas-upnp-org:service:MediaManagement:2" />
</s:Body>
</s:Envelope>
```

C.2.6 F5

```
NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
HOST: 192.168.1.11:10011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-10001
SEQ: [sequence number]
Connection: Keep-Alive
```

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
  &lt;callID&gt;call101&lt;/callID&gt;
  &lt;targetNames type="TelCPName"&gt;*&lt;/targetNames&gt;
  &lt;callStatus&gt;Disconnected&lt;/callStatus&gt;
  &lt;priority&gt;Normal&lt;/priority&gt;
  &lt;remoteParty&gt;
    &lt;peer:id&gt;ID of the Peer&lt;/peer:id&gt;
  &lt;/remoteParty&gt;
  &lt;TCList&gt;
    &lt;TC&gt;
      &lt;UDN&gt;uuid:97ef6efa-ac89-4ea2-0001-udn101&lt;/UDN&gt;
      &lt;mediaSessionID&gt;media101&lt;/mediaSessionID&gt;
    &lt;/TC&gt;
  &lt;/TCList&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtptime:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability&gt;
&lt;/cams:callInfo&gt;</CallInfo>
</e:property>
</e:propertyset>
```

C.2.7 F6

```
HTTP/1.1 200 OK
Content-Length: 0
```

C.2.8 F7

```
NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
HOST: 192.168.2.11:20011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-20001
```

SEQ: [sequence number]

Connection: Keep-Alive

```

<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
  &lt;callID&gt;call201&lt;/callID&gt;
  &lt;targetNames type="TelCPName"&gt;*&lt;/targetNames&gt;
  &lt;callStatus&gt;Disconnected&lt;/callStatus&gt;
  &lt;priority&gt;Normal&lt;/priority&gt;
  &lt;remoteParty&gt;
    &lt;peer:id&gt;0355550101&lt;/peer:id&gt;
  &lt;/remoteParty&gt;
  &lt;TCList&gt;
    &lt;TC&gt;
      &lt;UDN&gt;uuid:97ef6efa-ac89-4ea2-0001-udn201&lt;/UDN&gt;
      &lt;mediaSessionID&gt;media201&lt;/mediaSessionID&gt;
    &lt;/TC&gt;
  &lt;/TCList&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.1
s=-
c=IN IP4 192.168.2.1
t=0 0
m=audio 21001 RTP/AVP 0
c=IN IP4 192.168.2.1
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability&gt;
&lt;/cams:callInfo&gt;</CallInfo>
</e:property>
</e:propertyset>

```

C.2.9 F8

HTTP/1.1 200 OK

Content-Length: 0

C.2.10 F9

NOTIFY /_urn:upnp-org:serviceId:MediaManagement HTTP/1.1

HOST: 192.168.1.11:10011

CONTENT-TYPE: text/xml

Content-Length: [bytes in body]

NT: upnp:event

NTS: upnp:propchange

SID: uuid:c3580410-1dd1-11b2-8000-10021

SEQ: [sequence number]

Connection: Keep-Alive

```

<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<MediaSessionInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaSessionInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:mms="urn:schemas-upnp-org:phone:mms"&gt;
  &lt;mediaSessionID&gt;media101&lt;/mediaSessionID&gt;
  &lt;mediaSessionStatus&gt;Stopped&lt;/mediaSessionStatus&gt;
  &lt;mediaCapability format="SDP"&gt;v=0

```

```
o=- 0 0 IN IP4 192.168.1.21
s=-
c=IN IP4 192.168.1.21
t=0 0
m=audio 11021 RTP/AVP 0
c=IN IP4 192.168.1.21
a=rtpmap:0 PCMU/8000
a=ptime:20
<!--/mediaCapability-->
<!--/mms:mediaSessionInfo--></MediaSessionInfo>
</e:property>
</e:propertyset>
```

C.2.11 F10

HTTP/1.1 200 OK
Content-Length: 0

C.2.12 F11

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1
SOAPACTION: "urn:schemas-upnp-org:service:MediaManagement:2#StopMediaSession"
CONTENT-TYPE: text/xml ; charset="utf-8"
HOST: 192.168.2.21:20021
Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StopMediaSession xmlns:u="urn:schemas-upnp-org:service:MediaManagement:2">
      <TargetMediaSessionID>media201</TargetMediaSessionID>
    </u:StopMediaSession>
  </s:Body>
</s:Envelope>
```

C.2.13 F12

HTTP/1.1 200 OK
EXT:
CONTENT-TYPE: text/xml ; charset="utf-8"
SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0
Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StopMediaSessionResponse xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2" />
  </s:Body>
</s:Envelope>
```

C.2.14 F13

NOTIFY /_urn:upnp-org:serviceId:MediaManagement HTTP/1.1
HOST: 192.168.2.11:20011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-20021
SEQ: [sequence number]
Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
```

```
<MediaSessionInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaSessionInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
    http://www.upnp.org/schemas/phone/mms-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:mms="urn:schemas-upnp-org:phone:mms"&gt;
  &lt;mediaSessionID&gt;media201&lt;/mediaSessionID&gt;
  &lt;mediaSessionStatus&gt;Stopped&lt;/mediaSessionStatus&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.21
s=-
c=IN IP4 192.168.2.21
t=0 0
m=audio 21021 RTP/AVP 0
c=IN IP4 192.168.2.21
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability&gt;
&lt;/mms:mediaSessionInfo&gt;</MediaSessionInfo>
</e:property>
</e:propertyset>
```

C.2.15 F14

HTTP/1.1 200 OK
Content-Length: 0

C.3 Reject an incoming Call

C.3.1 Figure

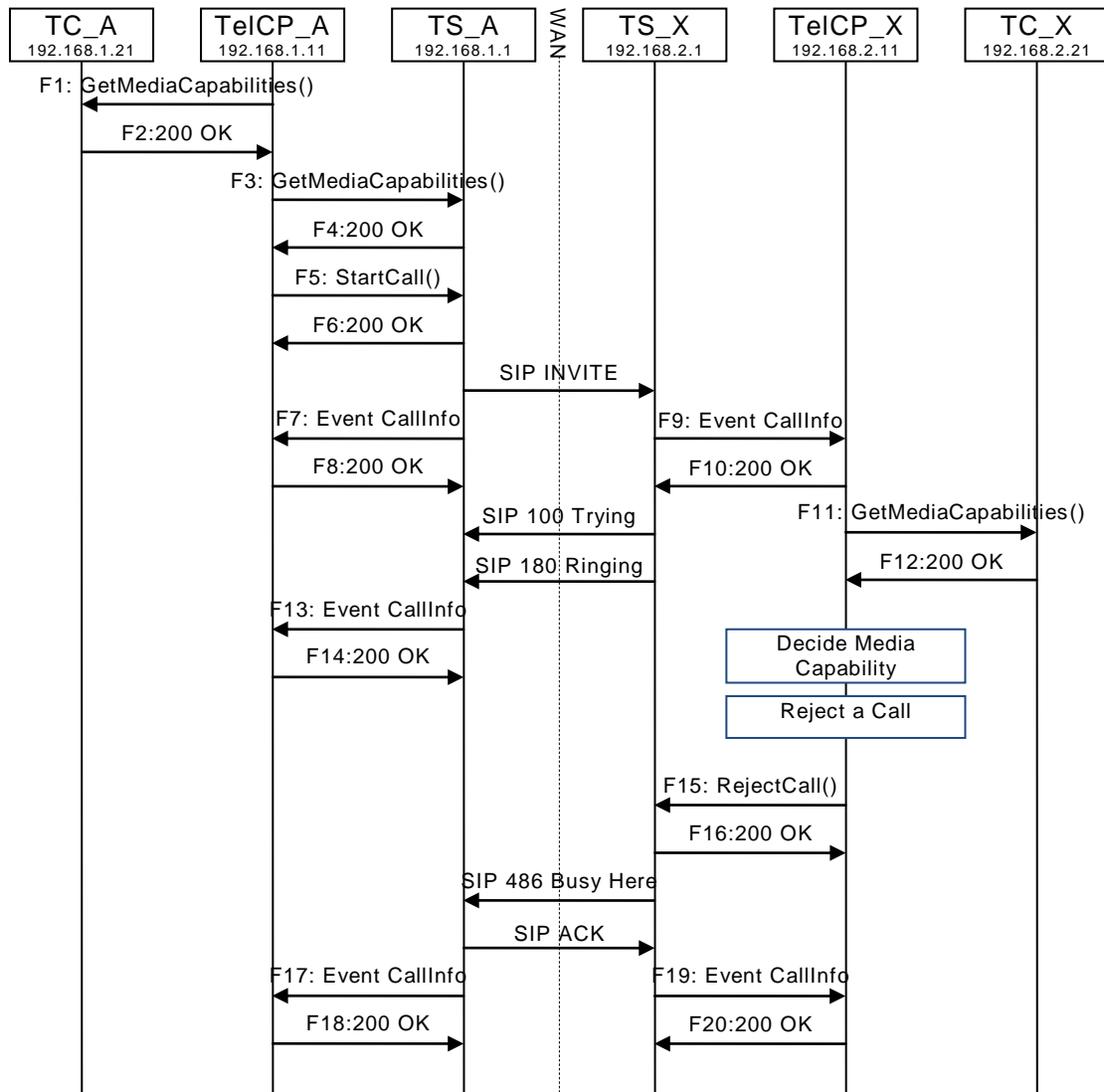


Figure C.6 — Reject an incoming Call

C.3.2 F1 to F14 are the same as “C.1 Create a Call”

C.3.3 F15

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1
 SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#RejectCall"
 CONTENT-TYPE: text/xml ; charset="utf-8"
 HOST: 192.168.2.1:20001
 Content-Length: [bytes in body]

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
  xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:RejectCall xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
      <TelCPName></TelCPName>
      <SecretKey></SecretKey>
    </u:RejectCall>
  </s:Body>
</s:Envelope>
  
```

```

    <TargetCallID>call201</TargetCallID>
    <RejectReason>Busy</RejectReason>
  </u:RejectCall>
</s:Body>
</s:Envelope>

```

C.3.4 F16

HTTP/1.1 200 OK
 Content-Length: [bytes in body]
 CONTENT-TYPE: text/xml; charset="utf-8"
 SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0
 EXT:

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
  <s:Body>
    <m:RejectCallResponse xmlns:m="urn:schemas-upnp-org:service:CallManagement:2" />
  </s:Body>
</s:Envelope>

```

C.3.5 F17

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
 HOST: 192.168.1.11:10011
 CONTENT-TYPE: text/xml
 Content-Length: [bytes in body]
 NT: upnp:event
 NTS: upnp:propchange
 SID: uuid:c3580410-1dd1-11b2-8000-10001
 SEQ: [sequence number]
 Connection: Keep-Alive

```

<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
  <e:property>
    <CallInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
    &lt;cams:callInfo
      xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
      http://www.upnp.org/schemas/phone/cams-v2.xsd"
      xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
      xmlns:cams="urn:schemas-upnp-org:phone:cams"
      xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
      &lt;callID&gt;call101&lt;/callID&gt;
      &lt;targetNames type="TelCPName"&gt;*&lt;/targetNames&gt;
      &lt;callStatus reason="Busy"&gt;Disconnected&lt;/callStatus&gt;
      &lt;priority&gt;Normal&lt;/priority&gt;
      &lt;remoteParty&gt;
        &lt;peer:id&gt;0774940201&lt;/peer:id&gt;
      &lt;/remoteParty&gt;
      &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability&gt;
&lt;/cams:callInfo&gt;</CallInfo>
  </e:property>
</e:propertyset>

```

C.3.6 F18

HTTP/1.1 200 OK

Content-Length: 0

C.3.7 F19

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1

HOST: 192.168.2.11:20011

CONTENT-TYPE: text/xml

Content-Length: [bytes in body]

NT: upnp:event

NTS: upnp:propchange

SID: uuid:c3580410-1dd1-11b2-8000-20001

SEQ: [sequence number]

Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
  &lt;callID&gt;call101&lt;/callID&gt;
  &lt;targetNames type="TelCPName"&gt;*&lt;/targetNames&gt;
  &lt;callStatus reason="Busy"&gt;Disconnected&lt;/callStatus&gt;
  &lt;priority&gt;Normal&lt;/priority&gt;
  &lt;remoteParty&gt;
    &lt;peer:id&gt;0355550101&lt;/peer:id&gt;
  &lt;/remoteParty&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.1
s=-
c=IN IP4 192.168.2.1
t=0 0
m=audio 21001 RTP/AVP 0
c=IN IP4 192.168.2.1
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability&gt;
&lt;/cams:callInfo&gt;</CallInfo>
</e:property>
</e:propertyset>
```

C.3.8 F20

HTTP/1.1 200 OK

Content-Length: 0

C.4 Cancel an outgoing Call

C.4.1 Figure

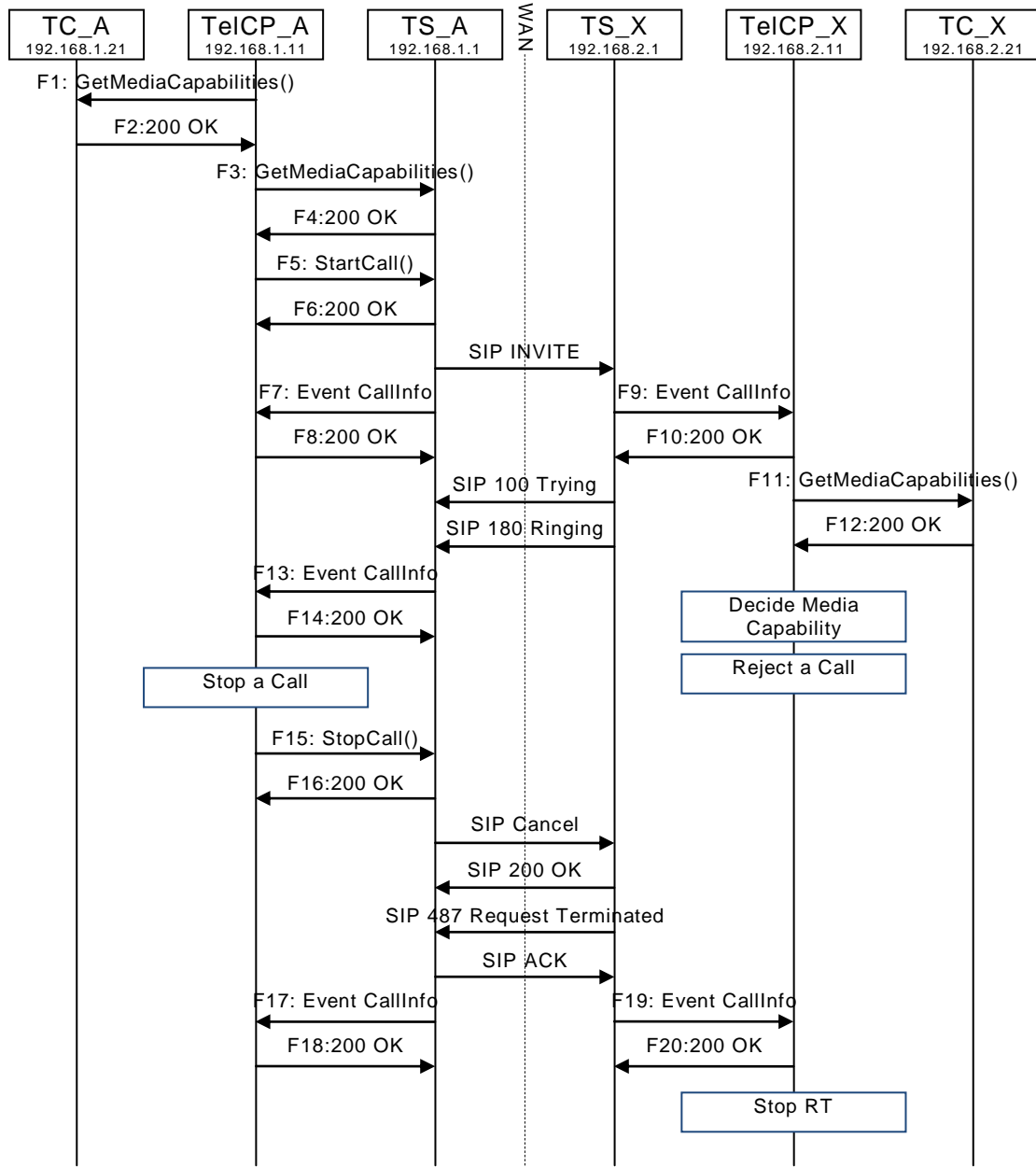


Figure C.7 — Cancel an outgoing Call

C.4.2 F1 to F14 are the same as “C.1 Create a Call”

C.4.3 F15

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1
 SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#StopCall"
 CONTENT-TYPE: text/xml ; charset="utf-8"
 HOST: 192.168.1.1:10001
 Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
```



```
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StopCall xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
      <TelCPName></TelCPName>
      <SecretKey></SecretKey>
      <CallID>call1101</CallID>
    </u:StopCall>
  </s:Body>
</s:Envelope>
```

C.4.4 F16

HTTP/1.1 200 OK
Content-Length: [bytes in body]
CONTENT-TYPE: text/xml; charset="utf-8"
SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0
EXT:

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
  <s:Body>
    <m:StopCallResponse xmlns:m="urn:schemas-upnp-org:service:CallManagement:2" />
  </s:Body>
</s:Envelope>
```

C.4.5 F17

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
HOST: 192.168.1.11:10011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-10001
SEQ: [sequence number]
Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
  <e:property>
    <CallInfo><?xml version="1.0" encoding="utf-8"?&gt;
    &lt;cams:callInfo
      xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
      http://www.upnp.org/schemas/phone/cams-v2.xsd"
      xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
      xmlns:cams="urn:schemas-upnp-org:phone:cams"
      xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
      &lt;callID&gt;call1101&lt;/callID&gt;
      &lt;targetNames type="TelCPName"&gt;*&lt;/targetNames&gt;
      &lt;callStatus reason="Cancelled"&gt;Disconnected&lt;/callStatus&gt;
      &lt;priority&gt;Normal&lt;/priority&gt;
      &lt;remoteParty&gt;
        &lt;peer:id&gt;0774940201&lt;/peer:id&gt;
      &lt;/remoteParty&gt;
      &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability&gt;
&lt;/cams:callInfo&gt;</CallInfo>
  </e:property>
</e:propertyset>
```

C.4.6 F18

HTTP/1.1 200 OK
Content-Length: 0

C.4.7 F19

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
HOST: 192.168.2.11:20011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-20001
SEQ: [sequence number]
Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
  &lt;callID&gt;call1101&lt;/callID&gt;
  &lt;targetNames type="TelCPName"&gt;*&lt;/targetNames&gt;
  &lt;callStatus reason="Cancelled"&gt;Disconnected&lt;/callStatus&gt;
  &lt;priority&gt;Normal&lt;/priority&gt;
  &lt;remoteParty&gt;
    &lt;peer:id&gt;0355550101;/peer:id&gt;
  &lt;/remoteParty&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.1
s=-
c=IN IP4 192.168.2.1
t=0 0
m=audio 21001 RTP/AVP 0
c=IN IP4 192.168.2.1
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability&gt;
&lt;/cams:callInfo&gt;</CallInfo>
</e:property>
</e:propertyset>
```

C.4.8 F20

HTTP/1.1 200 OK
Content-Length: 0

C.5 Cancel an outgoing Call (But the specified CallID does not exist.)

C.5.1 Figure

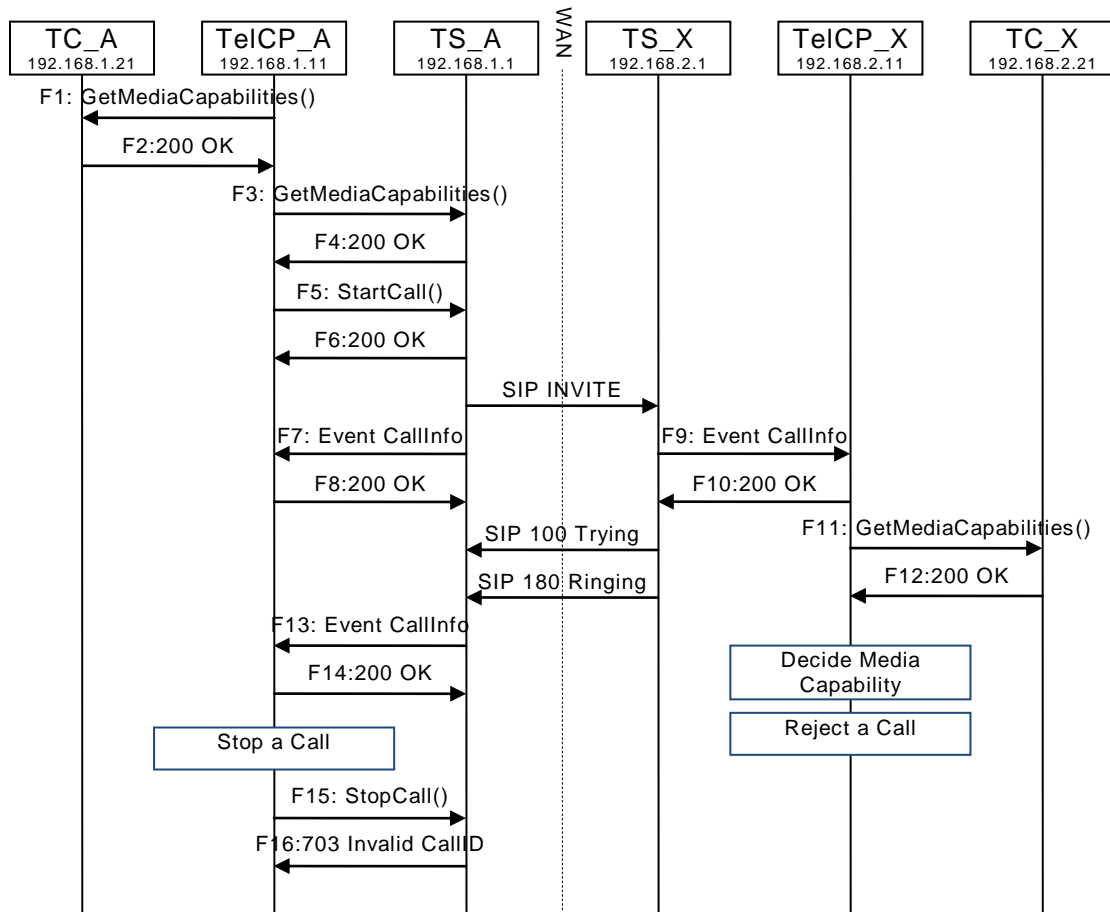


Figure C.8 — Cancel an outgoing Call (But the specified CallID does not exist.)

C.5.2 F1 to F14 are the same as “C.1 Create a Call”

C.5.3 F15

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1
 SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#StopCall"
 CONTENT-TYPE: text/xml ; charset="utf-8"
 HOST: 192.168.1.1:10001
 Content-Length: [bytes in body]

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StopCall xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
      <TelCPName>TV@Living</TelCPName>
      <SecretKey>secret101</SecretKey>
      <CallID>wrongcallid</CallID>
    </u:StopCall>
  </s:Body>
</s:Envelope>
  
```

C.5.4 F16

HTTP/1.1 500 Internal Server Error
Content-Length: [bytes in body]

```
<s:Envelope
  xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
  s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
  <s:Body>
  <s:Fault>
    <faultcode>s:Client</faultcode>
    <faultstring>UPnPError</faultstring>
    <detail>
      <UPnPError xmlns="urn:schemas-upnp-org:control-1-0">
        <errorCode>703</errorCode>
        <errorDescription>Invalid CallID</errorDescription>
      </UPnPError>
    </detail>
  </s:Fault>
</s:Body>
</s:Envelope>
```

C.6 Cancel an outgoing Call (But the StopCall() action is invoked at invalid timing.)

C.6.1 Figure

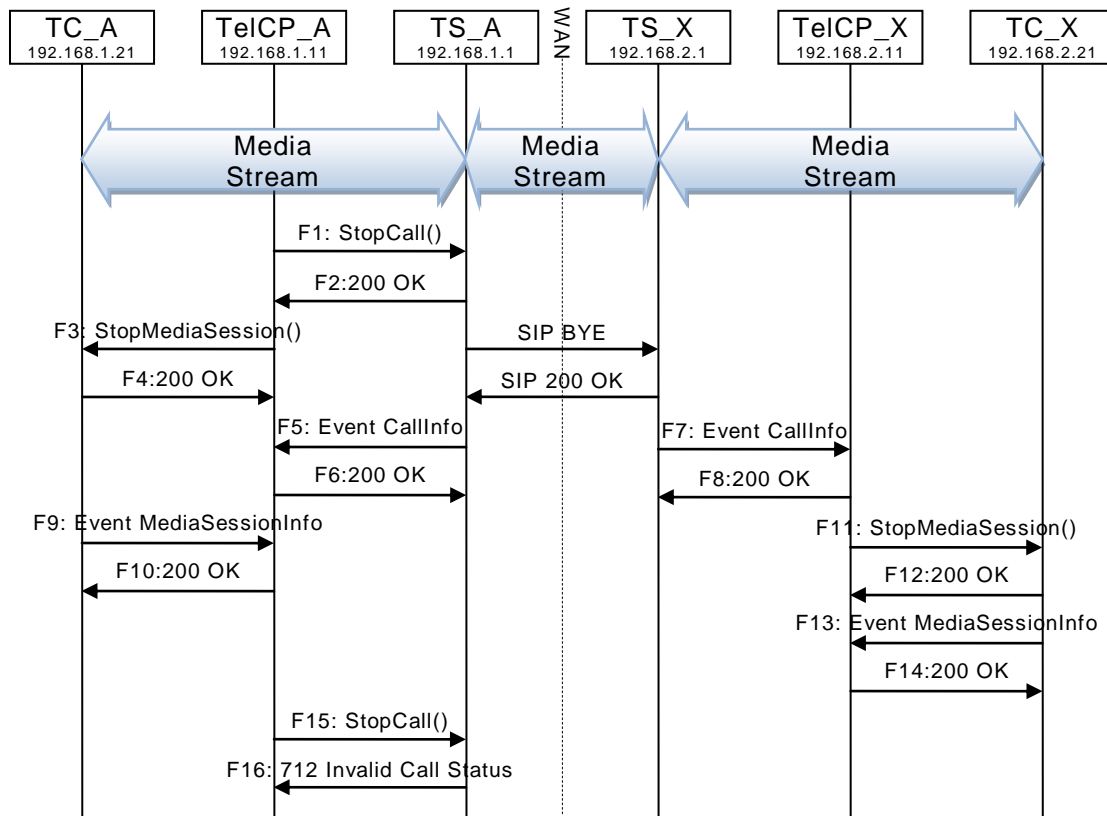


Figure C.9 — Cancel an outgoing Call (But the StopCall() action is invoked at invalid timing.)

C.6.2 F1 to F14 are the same as “C.2 Terminate a Call”

C.6.3 F15

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1
SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#StopCall"
CONTENT-TYPE: text/xml ; charset="utf-8"
HOST: 192.168.1.1:10001
Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StopCall xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
      <TelCPName></TelCPName>
      <SecretKey></SecretKey>
      <CallID>call1101</CallID>
    </u:StopCall>
  </s:Body>
</s:Envelope>
```

C.6.4 F16

HTTP/1.1 500 Internal Server Error
Content-Length: [bytes in body]

```
<s:Envelope
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
  <s:Body>
    <s:Fault>
      <faultcode>s:Client</faultcode>
      <faultstring>UPnPError</faultstring>
      <detail>
        <UPnPError xmlns="urn:schemas-upnp-org:control-1-0">
          <errorCode>712</errorCode>
          <errorDescription>Invalid Call Status</errorDescription>
        </UPnPError>
      </detail>
    </s:Fault>
  </s:Body>
</s:Envelope>
```

C.7 Get MediaSessionInfo and CallInfo during the Call

C.7.1 Figure

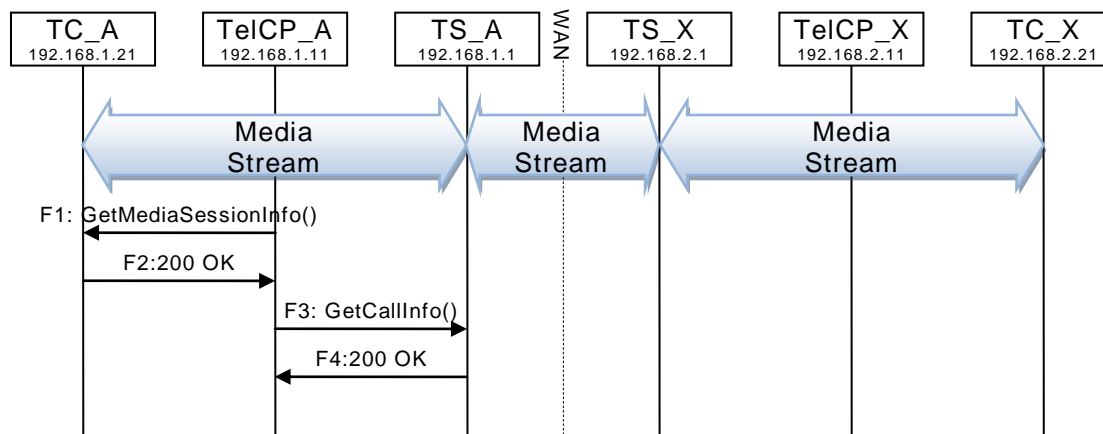


Figure C.10 — Get MediaSessionInfo and CallInfo during the Call

C.7.2 F1

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1
 SOAPACTION: "urn:schemas-upnp-org:service:MediaManagement:2#GetMediaSessionInfo"
 CONTENT-TYPE: text/xml ; charset="utf-8"
 HOST: 192.168.1.21:10021
 Content-Length: [bytes in body]

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetMediaSessionInfo xmlns:u="urn:schemas-upnp-org:service:MediaManagement:2"
/>
      <TargetMediaSessionID>media101</TargetMediaSessionID>
    </u:GetMediaSessionInfo>
  </s:Body>
</s:Envelope>
  
```

C.7.3 F2

HTTP/1.1 200 OK
 EXT:
 CONTENT-TYPE: text/xml ; charset="utf-8"
 SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0
 Content-Length: [bytes in body]

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetMediaSessionInfoResponse xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2">
      <MediaSessionInfoList>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mss:mediaSessionInfoList xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/cams-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaSessionInfo&gt;
  &lt;mediaSessionID&gt;media101&lt;/mediaSessionID&gt;
  &lt;mediaSessionStatus&gt;Started&lt;/mediaSessionStatus&gt;
  
```

```

    <it;mediaCapability format="SDP">>v=0
o=- 0 0 IN IP4 192.168.1.21
s=-
c=IN IP4 192.168.1.21
t=0 0
m=audio 11021 RTP/AVP 0
c=IN IP4 192.168.1.21
a=rtpmap:0 PCMU/8000
a=ptime:20
</mediaCapability>>
</mediaSessionInfo>>
</mms:mediaSessionInfo>></MediaSessionInfoList>
</u:GetMediaSessionInfoResponse>
</s:Body>
</s:Envelope>

```

C.7.4 F3

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1
 SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#GetCallInfo"
 CONTENT-TYPE: text/xml ; charset="utf-8"
 HOST: 192.168.1.1:10001
 Content-Length: [bytes in body]

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetCallInfo xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
      <TelCPName></TelCPName>
      <SecretKey></SecretKey>
      <TargetCallID>call101</TargetCallID>
    </u:GetCallInfo>
  </s:Body>
</s:Envelope>

```

C.7.5 F4

HTTP/1.1 200 OK
 Content-Length: [bytes in body]
 CONTENT-TYPE: text/xml; charset="utf-8"
 SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0
 EXT:

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetCallInfoResponse xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
      <callInfoList><?xml version="1.0" encoding="utf-8"?>
      <cams:callInfoList
xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:cams"
xmlns:peer="urn:schemas-upnp-org:phone:peer">
        <callInfo>
          <callID>call101</callID>
          <TelCPNames></TelCPNames>
          <callStatus>Talking </callStatus>
          <priority>Normal</priority>
          <peer>
            <peer:id>0774940201</peer:id>
          </peer>
          <TCList>
            <TC>
              <UDN>97ef6efa-ac89-4ea2-0001-udn101</UDN>
              <mediaSessionID>media101</mediaSessionID>
            </TC>
          </callInfo>
        </callInfoList>
      </cams:callInfoList>
    </u:GetCallInfoResponse>
  </s:Body>
</s:Envelope>

```

```
    </TCList>
    <mediaCapability format="SDP">v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
    </mediaCapability>
    </callInfo>
</cans:callInfoList></callInfoList>
</m:GetCallInfoResponse>
</s:Body>
</s:Envelope>
```


C.8 Create an outgoing Call using multiple TCs (Case 1)

C.8.1 Figure

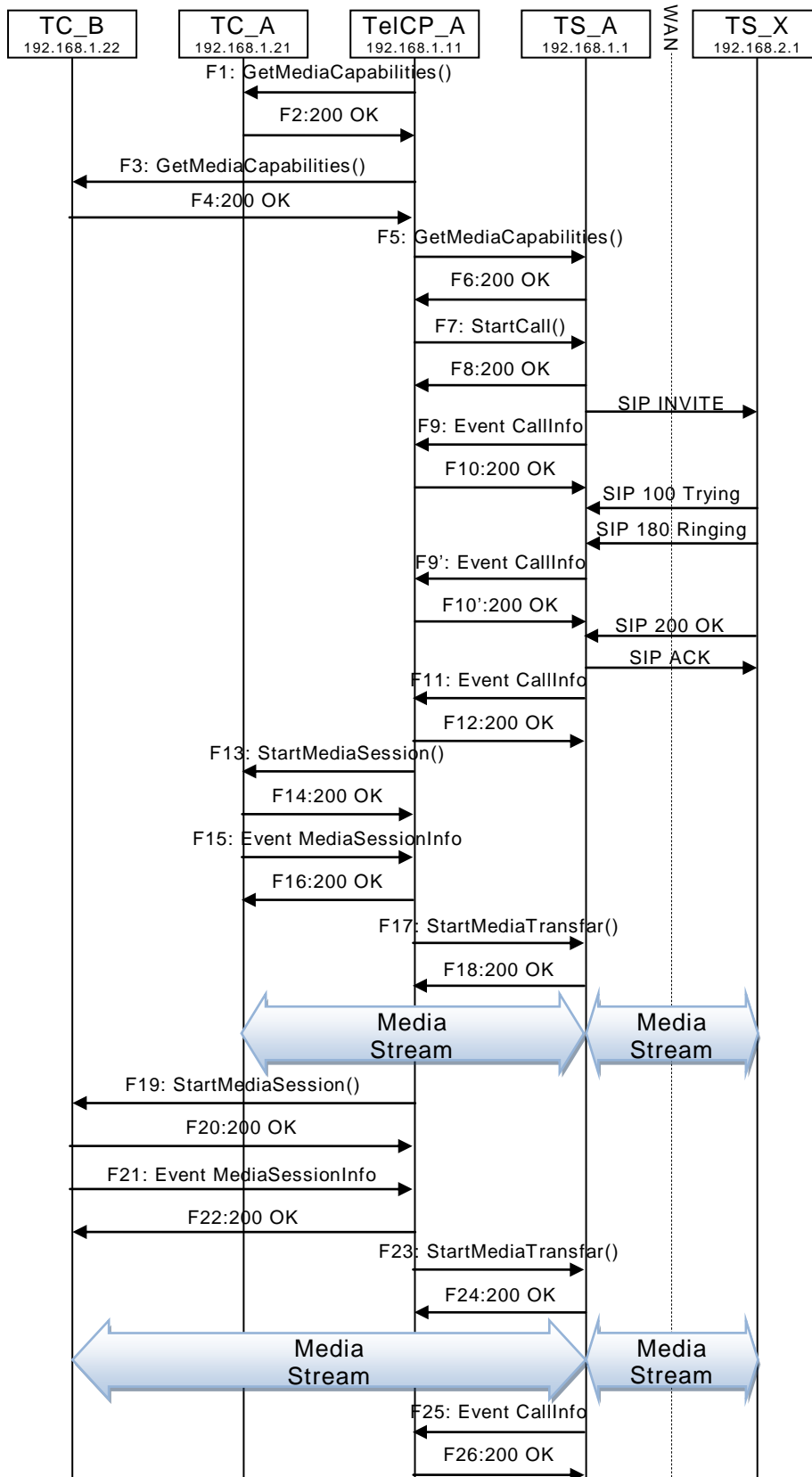


Figure C.11 — Create an outgoing Call using multiple TCs (Case 1)

C.8.2 F1

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1
 SOAPACTION: "urn:schemas-upnp-org:service:MediaManagement:2#GetMediaCapabilities"
 CONTENT-TYPE: text/xml ; charset="utf-8"
 HOST: 192.168.1.21:10021
 Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetMediaCapabilities xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2" >
      <TSMediaCapabilityInfo></TSMediaCapabilityInfo>
    </u:GetMediaCapabilities>
  </s:Body>
</s:Envelope>
```

C.8.3 F2

HTTP/1.1 200 OK
 EXT:
 CONTENT-TYPE: text/xml ; charset="utf-8"
 SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0
 Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetMediaCapabilitiesResponse xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2">
      <SupportedMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt; mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/cams-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
&lt; mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.21
s=-
c=IN IP4 192.168.1.21
t=0 0
m=audio 11021 RTP/AVP 0
c=IN IP4 192.168.1.21
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 12021 RTP/AVP 96
c=IN IP4 192.168.1.21
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/mms:mediaCapabilityInfo&gt;
&lt;/SupportedMediaCapabilityInfo>
    </u:GetMediaCapabilitiesResponse>
  </s:Body>
</s:Envelope>
```

C.8.4 F3

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1
 SOAPACTION: "urn:schemas-upnp-org:service:MediaManagement:2#GetMediaCapabilities"
 CONTENT-TYPE: text/xml ; charset="utf-8"

HOST: 192.168.1.22:10022
Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetMediaCapabilities xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2" >
      <TSMediaCapabilityInfo></TSMediaCapabilityInfo>
    </u:GetMediaCapabilities>
  </s:Body>
</s:Envelope>
```

C.8.5 F4

HTTP/1.1 200 OK
EXT:
CONTENT-TYPE: text/xml ; charset="utf-8"
SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0
Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetMediaCapabilitiesResponse xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2">
<SupportedMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/cams-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.22
s=-
c=IN IP4 192.168.1.22
t=0 0
m=audio 11022 RTP/AVP 0
c=IN IP4 192.168.1.22
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 12022 RTP/AVP 96
c=IN IP4 192.168.1.22
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/mms:mediaCapabilityInfo&gt;
</SupportedMediaCapabilityInfo>
    </u:GetMediaCapabilitiesResponse>
  </s:Body>
</s:Envelope>
```

C.8.6 F5

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1
SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#GetMediaCapabilities"
CONTENT-TYPE: text/xml ; charset="utf-8"
HOST: 192.168.1.1:10001
Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetMediaCapabilities xmlns:u="urn:schemas-upnp-org:service: CallManagement:2">
```

```

    <TCMediaCapabilityInfo></TCMediaCapabilityInfo>
  </u:GetMediaCapabilities>
</s:Body>
</s:Envelope>

```

C.8.7 F6

HTTP/1.1 200 OK

EXT:

CONTENT-TYPE: text/xml ; charset="utf-8"

SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0

Content-Length: [bytes in body]

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetMediaCapabilitiesResponse xmlns:u="urn:schemas-upnp-
org:service:CallManagement:2">
      <SupportedMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 12001 RTP/AVP 96
c=IN IP4 192.168.1.1
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/cams:mediaCapabilityInfo&gt;</SupportedMediaCapabilityInfo>
    </u:GetMediaCapabilitiesResponse>
  </s:Body>
</s:Envelope>

```

C.8.8 F7

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1

SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#StartCall"

CONTENT-TYPE: text/xml ; charset="utf-8"

HOST: 192.168.1.1:10001

Content-Length: [bytes in body]

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StartCall xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
      <TelCPName>TV@Living</TelCPName>
      <SecretKey>secret101</SecretKey>
      <CalleeID>tel:0774940201</CalleeID>
      <CallPriority>Normal</CallPriority>
      <MediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;

```

```

    <mediaCapability format="SDP">v=0
o=- 0 0 IN IP4 192.168.1.11
s=-
c=IN IP4 192.168.1.11
t=0 0
m=audio 11021 RTP/AVP 0
c=IN IP4 192.168.1.21
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 12022 RTP/AVP 96
c=IN IP4 192.168.1.22
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
</mediaCapability>
</cams:mediaCapabilityInfo></MediaCapabilityInfo>
  <CallMode>Non-Monopolize</CallMode>
</u:StartCall>
</s:Body>
</s:Envelope>

```

C.8.9 F8

```

HTTP/1.1 200 OK
Content-Length: [bytes in body]
CONTENT-TYPE: text/xml; charset="utf-8"
SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0
EXT:

```

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
  <s:Body>
    <m:StartCallResponse xmlns:m="urn:schemas-upnp-org:service:CallManagement:2">
      <CallID>call1101</CallID>
    </m:StartCallResponse>
  </s:Body>
</s:Envelope>

```

C.8.10 F9

```

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
HOST: 192.168.1.11:10011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-10001
SEQ: [sequence number]
Connection: Keep-Alive

```

```

<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo><?xml version="1.0" encoding="utf-8"?>
<mediaCapability format="SDP">v=0
o=- 0 0 IN IP4 192.168.1.11
s=-
c=IN IP4 192.168.1.11
t=0 0
m=audio 11021 RTP/AVP 0
c=IN IP4 192.168.1.21
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 12022 RTP/AVP 96
c=IN IP4 192.168.1.22
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
</mediaCapability>
</cams:mediaCapabilityInfo></MediaCapabilityInfo>
  <CallMode>Non-Monopolize</CallMode>
</u:StartCall>
</s:Body>
</s:Envelope>

```

```

    </remoteParty>
    <mediaCapability format="SDP">v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 12001 RTP/AVP 96
c=IN IP4 192.168.1.1
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30</mediaCapability>
</cams:callInfo></CallInfo>
</e:property>
</e:propertyset>

```

C.8.11 F10

HTTP/1.1 200 OK
Content-Length: 0

C.8.12 F9'

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
HOST: 192.168.1.11:10011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-10001
SEQ: [sequence number]
Connection: Keep-Alive

```

<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo><?xml version="1.0" encoding="utf-8"?>
<callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer">
  <callID>call101</callID>
  <targetNames type="TelCPName">*</targetNames>
  <callStatus>Calling</callStatus>
  <priority>Normal</priority>
  <remoteParty>
    <peer:id>0774940201</peer:id>
  </remoteParty>
  <mediaCapability format="SDP">v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 12001 RTP/AVP 96
c=IN IP4 192.168.1.1
b=AS:2500
a=rtpmap:96 MP4V-ES/90000

```

```

a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30</mediaCapability>
</cams:callInfo></CallInfo>
</e:property>
</e:propertyset>

```

C.8.13 F10'

HTTP/1.1 200 OK
Content-Length: 0

C.8.14 F11

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
HOST: 192.168.1.11:10011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-10001
SEQ: [sequence number]
Connection: Keep-Alive

```

<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo><?xml version="1.0" encoding="utf-8"?>
<callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer">
  <callID>call1101</callID>
  <targetNames type="TelCPName" *</targetNames>
  <callStatus>Connected</callStatus>
  <priority>Normal</priority>
  <remoteParty>
    <peer:id>0774940201</peer:id>
  </remoteParty>
  <mediaCapability format="SDP">v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 12001 RTP/AVP 96
c=IN IP4 192.168.1.1
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30</mediaCapability>
</cams:callInfo></CallInfo>
</e:property>
</e:propertyset>

```

C.8.15 F12

HTTP/1.1 200 OK
Content-Length: 0

C.8.16 F13

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1
 SOAPACTION: "urn:schemas-upnp-org:service:MediaManagement:2#StartMediaSession"
 CONTENT-TYPE: text/xml ; charset="utf-8"
 HOST: 192.168.1.21:10021
 Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StartMediaSession xmlns:u="urn:schemas-upnp-org:service:MediaManagement:2">
      <TSMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.11
s=-
c=IN IP4 192.168.1.11
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability&gt;
&lt;/mms:mediaCapabilityInfo&gt;
</TSMediaCapabilityInfo>
    </u:StartMediaSession>
  </s:Body>
</s:Envelope>
```

C.8.17 F14

HTTP/1.1 200 OK
 EXT:
 CONTENT-TYPE: text/xml ; charset="utf-8"
 SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0
 Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
<s:Body>
<u:StartMediaSessionResponse xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2">
<MediaSessionID>media101</MediaSessionID>
<TCMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.21
s=-
c=IN IP4 192.168.1.21
t=0 0
m=audio 11021 RTP/AVP 0
c=IN IP4 192.168.1.21
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability&gt;
&lt;/mms:mediaCapabilityInfo&gt;
</TCMediaCapabilityInfo>
</u:StartMediaSessionResponse>
</s:Body>
```



```
</s:Envelope>
```

C.8.18 F15

NOTIFY /_urn:upnp-org:serviceId:MediaManagement HTTP/1.1

HOST: 192.168.1.11:10011

CONTENT-TYPE: text/xml

Content-Length: [bytes in body]

NT: upnp:event

NTS: upnp:propchange

SID: uuid:c3580410-1dd1-11b2-8000-10021

SEQ: [sequence number]

Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<MediaSessionInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaSessionInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
  http://www.upnp.org/schemas/phone/mms-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:mms="urn:schemas-upnp-org:phone:mms"&gt;
  &lt;mediaSessionID&gt;media101&lt;/mediaSessionID&gt;
  &lt;mediaSessionStatus&gt;Started&lt;/mediaSessionStatus&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o-- 0 0 IN IP4 192.168.1.21
s=-
c=IN IP4 192.168.1.21
t=0 0
m=audio 11021 RTP/AVP 0
c=IN IP4 192.168.1.21
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability&gt;
&lt;/mms:mediaSessionInfo&gt;</MediaSessionInfo>
</e:property>
</e:propertyset>
```

C.8.19 F16

HTTP/1.1 200 OK

Content-Length: 0

C.8.20 F17

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1

SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#StartMediaTransfer"

CONTENT-TYPE: text/xml ; charset="utf-8"

HOST: 192.168.1.1:10001

Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
<s:Body>
<u:StartMediaTransfer xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
<TelCPName>TV@Living</TelCPName>
<SecretKey>secret101</SecretKey>
<TargetCallID>call101</TargetCallID>
<TCList>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:TCList
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
  &lt;TC&gt;
  &lt;UDN&gt;uuid:97ef6efa-ac89-4ea2-0001-udn101&lt;/UDN&gt;
```

```

    <mediaSessionID>media101</mediaSessionID>
  </TC>
</cams:TCList>
<MediaCapabilityInfo?xml version="1.0" encoding="utf-8"?>
  <cams:mediaCapabilityInfo
    xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
      http://www.upnp.org/schemas/phone/cams-v2.xsd"
    xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
    xmlns:cams="urn:schemas-upnp-org:phone:cams">
    <mediaCapability format="SDP">v=0
o=- 0 0 IN IP4 192.168.1.11
s=-
c=IN IP4 192.168.1.11
t=0 0
m=audio 11021 RTP/AVP 0
c=IN IP4 192.168.1.21
a=rtpmap:0 PCMU/8000
a=ptime:20
  </mediaCapability >
</cams:mediaCapabilityInfo>
</u:StartMediaTransfer>
</s:Body>
</s:Envelope>

```

C.8.21 F18

HTTP/1.1 200 OK

Content-Length: [bytes in body]

CONTENT-TYPE: text/xml; charset="utf-8"

SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0

EXT:

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
  s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
  <s:Body>
    <m:StartMediaTransferResponse xmlns:m="urn:schemas-upnp-
      org:service:CallManagement:2" />
  </s:Body>
</s:Envelope>

```

C.8.22 F19

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1

SOAPACTION: "urn:schemas-upnp-org:service:MediaManagement:2#StartMediaSession"

CONTENT-TYPE: text/xml ; charset="utf-8"

HOST: 192.168.1.22:10022

Content-Length: [bytes in body]

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
  xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StartMediaSession xmlns:u="urn:schemas-upnp-org:service:MediaManagement:2">
      <TSMediaCapabilityInfo?xml version="1.0" encoding="utf-8"?>
      <mms:mediaCapabilityInfo
        xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
          http://www.upnp.org/schemas/phone/mms-v2.xsd"
        xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
        xmlns:cams="urn:schemas-upnp-org:phone:mms">
        <mediaCapability format="SDP">v=0
o=- 0 0 IN IP4 192.168.1.11
s=-
c=IN IP4 192.168.1.11
t=0 0
m=video 12001 RTP/AVP 96
c=IN IP4 192.168.1.1
b=AS:2500
a=rtpmap:96 MP4V-ES/90000

```

```
a=fmtp:96 profile-level-  
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21  
a=framerate:30  
&lt;/mediaCapability&gt;  
&lt;/mms:mediaCapabilityInfo&gt;  
</TSMediaCapabilityInfo>  
</u:StartMediaSession>  
</s:Body>  
</s:Envelope>
```

C.8.23 F20

HTTP/1.1 200 OK

EXT:

CONTENT-TYPE: text/xml ; charset="utf-8"

SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0

Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>  
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"  
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">  
<s:Body>  
<u:StartMediaSessionResponse xmlns:u="urn:schemas-upnp-  
org:service:MediaManagement:2">  
<MediaSessionID>media102</MediaSessionID>  
<TCMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;  
&lt;mms:mediaCapabilityInfo  
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms  
http://www.upnp.org/schemas/phone/mms-v2.xsd"  
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"  
xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;  
&lt;mediaCapability format="SDP"&gt;v=0  
o=- 0 0 IN IP4 192.168.1.22  
s=-  
c=IN IP4 192.168.1.22  
t=0 0  
m=video 12022 RTP/AVP 96  
c=IN IP4 192.168.1.22  
b=AS:2500  
a=rtpmap:96 MP4V-ES/90000  
a=fmtp:96 profile-level-  
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21  
a=framerate:30  
&lt;/mediaCapability&gt;  
&lt;/mms:mediaCapabilityInfo&gt;</TCMediaCapabilityInfo>  
</u:StartMediaSessionResponse>  
</s:Body>  
</s:Envelope>
```

C.8.24 F21

NOTIFY /_urn:upnp-org:serviceId:MediaManagement HTTP/1.1

HOST: 192.168.1.11:10011

CONTENT-TYPE: text/xml

Content-Length: [bytes in body]

NT: upnp:event

NTS: upnp:propchange

SID: uuid:c3580410-1dd1-11b2-8000-10022

SEQ: [sequence number]

Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>  
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">  
<e:property>  
<MediaSessionInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;  
&lt;mms:mediaSessionInfo  
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms  
http://www.upnp.org/schemas/phone/mms-v2.xsd"  
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
```

```

xmlns:mms="urn:schemas-upnp-org:phone:mms"&gt;
  &lt;mediaSessionID&gt;media102&lt;/mediaSessionID&gt;
  &lt;mediaSessionStatus&gt;Started&lt;/mediaSessionStatus&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.22
s=-
c=IN IP4 192.168.1.22
t=0 0
m=video 12022 RTP/AVP 96
c=IN IP4 192.168.1.22
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/mms:mediaSessionInfo&gt;</MediaSessionInfo>
</e:property>
</e:propertyset>

```

C.8.25 F22

HTTP/1.1 200 OK
Content-Length: 0

C.8.26 F23

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1
SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#StartMediaTransfer"
CONTENT-TYPE: text/xml ; charset="utf-8"
HOST: 192.168.1.1:10001
Content-Length: [bytes in body]

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
<s:Body>
<u:StartMediaTransfer xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
<TelCPName>TV@Living</TelCPName>
<SecretKey>secret101</SecretKey>
<TargetCallID>call101</TargetCallID>
<TCList>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:TCList
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
  &lt;TC&gt;
    &lt;UDN&gt;uid:97ef6efa-ac89-4ea2-0001-udn102&lt;/UDN&gt;
    &lt;mediaSessionID&gt;media102&lt;/mediaSessionID&gt;
  &lt;/TC&gt;
  &lt;/cams:TCList&gt;</TCList>
<MediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:mediaCapabilityInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.11
s=-
c=IN IP4 192.168.1.11
t=0 0
m=video 12022 RTP/AVP 96
c=IN IP4 192.168.1.22
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30

```

```
</mediaCapability>
</cams:mediaCapabilityInfo></MediaCapabilityInfo>
</u:StartMediaTransfer>
</s:Body>
</s:Envelope>
```

C.8.27 F24

```
HTTP/1.1 200 OK
Content-Length: [bytes in body]
CONTENT-TYPE: text/xml; charset="utf-8"
SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0
EXT:
```

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
  <s:Body>
    <m:StartMediaTransferResponse xmlns:m="urn:schemas-upnp-
org:service:CallManagement:2" />
  </s:Body>
</s:Envelope>
```

C.8.28 F25

```
NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
HOST: 192.168.1.11:10011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-10001
SEQ: [sequence number]
Connection: Keep-Alive
```

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo><?xml version="1.0" encoding="utf-8"?>
<callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer">
  <callID><callID101</callID>
  <targetNames type="TelCPName">*</targetNames>
  <callStatus><Talking></callStatus>
  <priority><Normal></priority>
  <remoteParty>
    <peer:id><0774940201</peer:id>
  </remoteParty>
  <TCList>
    <TC>
      <UDN><uuid:97ef6efa-ac89-4ea2-0001-udn101</UDN>
      <mediaSessionID><media101</mediaSessionID>
    </TC>
    <TC>
      <UDN><uuid:97ef6efa-ac89-4ea2-0001-udn102</UDN>
      <mediaSessionID><media102</mediaSessionID>
    </TC>
  </TCList>
  <mediaCapability format="SDP"><v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
```

```
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 12001 RTP/AVP 96
c=IN IP4 192.168.1.1
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
</mediaCapability>
</cams:callInfo></CallInfo>
</e:property>
</e:propertyset>
```

C.8.29 F26

```
HTTP/1.1 200 OK
Content-Length: 0
```

C.9 Create an outgoing Call using multiple TCs (Case 2)

C.9.1 Figure

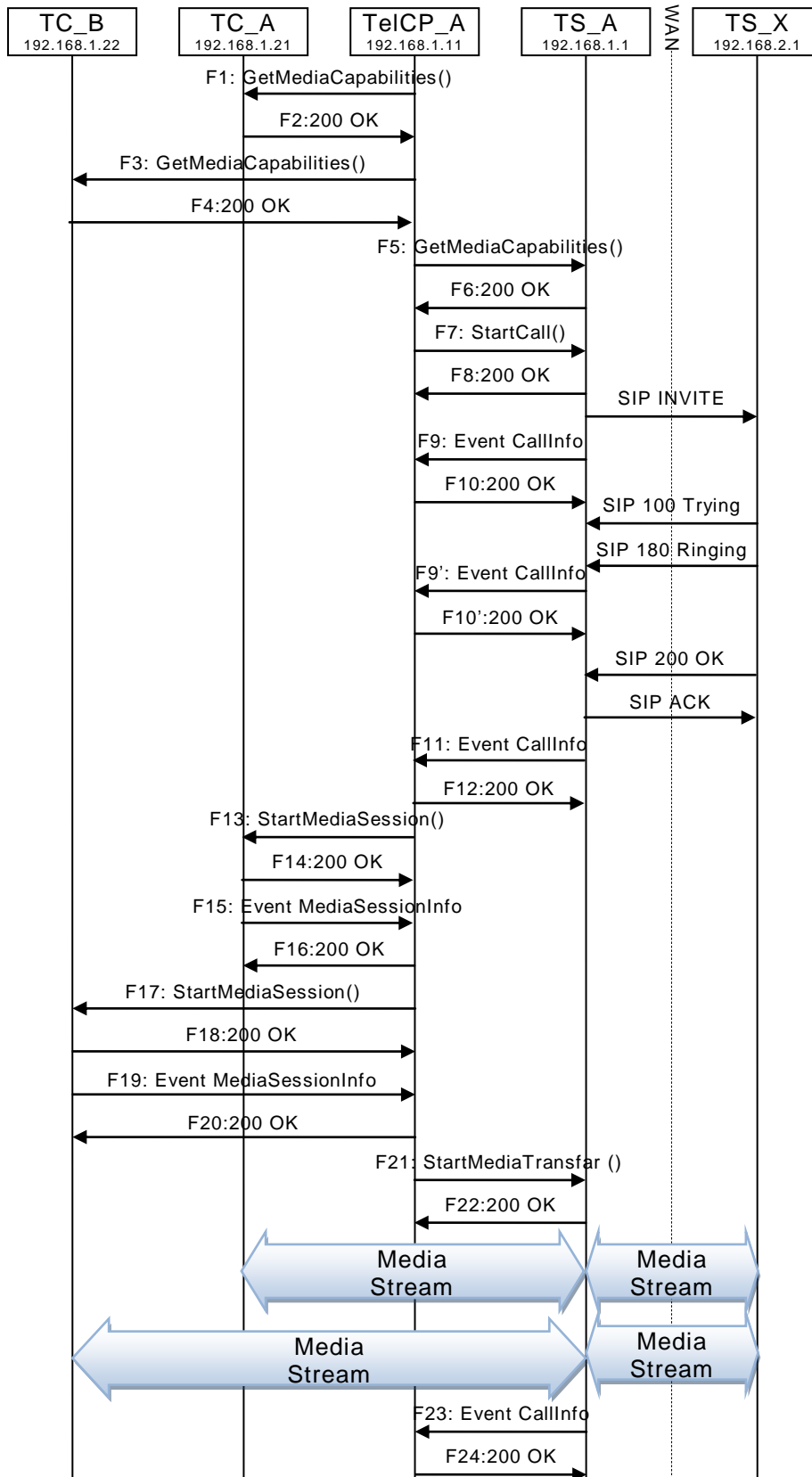


Figure C.12 — Create an outgoing Call using multiple TCs (Case 2)

C.9.2 F1 to F16 are the same as “C.8 Create an outgoing Call using multiple TCs (Case 1)”

C.9.3 F17

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1
 SOAPACTION: "urn:schemas-upnp-org:service:MediaManagement:2#StartMediaSession"
 CONTENT-TYPE: text/xml ; charset="utf-8"
 HOST: 192.168.1.22:10022
 Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
  xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StartMediaSession xmlns:u="urn:schemas-upnp-org:service:MediaManagement:2">
      <TSMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaCapabilityInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.11
s=-
c=IN IP4 192.168.1.11
t=0 0
m=video 12001 RTP/AVP 96
c=IN IP4 192.168.1.1
b=AS:2500
a=rtptime:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/mms:mediaCapabilityInfo&gt;
</TSMediaCapabilityInfo>
    </u:StartMediaSession>
  </s:Body>
</s:Envelope>
```

C.9.4 F18

HTTP/1.1 200 OK
 EXT:
 CONTENT-TYPE: text/xml ; charset="utf-8"
 SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0
 Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
  xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StartMediaSessionResponse xmlns:u="urn:schemas-upnp-
  org:service:MediaManagement:2">
      <MediaSessionID>media102</MediaSessionID>
      <TCMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaCapabilityInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.22
s=-
c=IN IP4 192.168.1.22
t=0 0
```



```
m=video 12022 RTP/AVP 96
c=IN IP4 192.168.1.22
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
</mediaCapability>
</mms:mediaCapabilityInfo></TCMediaCapabilityInfo>
</u:StartMediaSessionResponse>
</s:Body>
</s:Envelope>
```

C.9.5 F19

NOTIFY/_urn:upnp-org:serviceId:MediaManagement HTTP/1.1
HOST: 192.168.1.11:10011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-10022
SEQ: [sequence number]
Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<MediaSessionInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaSessionInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
  http://www.upnp.org/schemas/phone/mms-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:mms="urn:schemas-upnp-org:phone:mms"&gt;
  &lt;mediaSessionID&gt;media102&lt;/mediaSessionID&gt;
  &lt;mediaSessionStatus&gt;Started&lt;/mediaSessionStatus&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.22
s=-
c=IN IP4 192.168.1.22
t=0 0
m=video 12022 RTP/AVP 96
c=IN IP4 192.168.1.22
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/mms:mediaSessionInfo&gt;</MediaSessionInfo>
</e:property>
</e:propertyset>
```

C.9.6 F20

HTTP/1.1 200 OK
Content-Length: 0

C.9.7 F21

POST/_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1
SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#StartMediaTransfer"
CONTENT-TYPE: text/xml ; charset="utf-8"
HOST: 192.168.1.1:10001
Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
```

```

<s:Body>
<u:StartMediaTransfer xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
<TelCPName>TV@Living</TelCPName>
<SecretKey>secret101</SecretKey>
<TargetCallID>call101</TargetCallID>
<TCList>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:TCList
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
  &lt;TC&gt;
    &lt;UDN&gt;uid:97ef6efa-ac89-4ea2-0001-udn101&lt;/UDN&gt;
    &lt;mediaSessionID&gt;media101&lt;/mediaSessionID&gt;
    &lt;/TC&gt;
  &lt;/TC&gt;
  &lt;UDN&gt;uid:97ef6efa-ac89-4ea2-0001-udn102&lt;/UDN&gt;
  &lt;mediaSessionID&gt;media102&lt;/mediaSessionID&gt;
  &lt;/TC&gt;
  &lt;/cams:TCList&gt;</TCList>
<MediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:mediaCapabilityInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.11
s=-
c=IN IP4 192.168.1.11
t=0 0
m=audio 11021 RTP/AVP 0
c=IN IP4 192.168.1.21
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 12022 RTP/AVP 96
c=IN IP4 192.168.1.22
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/cams:mediaCapabilityInfo&gt;</MediaCapabilityInfo>
</u:StartMediaTransfer>
</s:Body>
</s:Envelope>

```

C.9.8 F22

```

HTTP/1.1 200 OK
Content-Length: [bytes in body]
CONTENT-TYPE: text/xml; charset="utf-8"
SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0
EXT:

```

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
  <s:Body>
    <m:StartMediaTransferResponse xmlns:m="urn:schemas-upnp-
org:service:CallManagement:2" />
  </s:Body>
</s:Envelope>

```

C.9.9 F23

```

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
HOST: 192.168.1.11:10011

```

CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-10001
SEQ: [sequence number]
Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
  &lt;callID&gt;call101&lt;/callID&gt;
  &lt;targetNames type="TelCPName"&gt;*&lt;/targetNames&gt;
  &lt;callStatus&gt;Talking&lt;/callStatus&gt;
  &lt;priority&gt;Normal&lt;/priority&gt;
  &lt;remoteParty&gt;
    &lt;peer:id&gt;0774940201&lt;/peer:id&gt;
  &lt;/remoteParty&gt;
  &lt;TCList&gt;
    &lt;TC&gt;
      &lt;UDN&gt;uuid:97ef6efa-ac89-4ea2-0001-udn101&lt;/UDN&gt;
      &lt;mediaSessionID&gt;media101&lt;/mediaSessionID&gt;
    &lt;/TC&gt;
    &lt;TC&gt;
      &lt;UDN&gt;uuid:97ef6efa-ac89-4ea2-0001-udn102&lt;/UDN&gt;
      &lt;mediaSessionID&gt;media102&lt;/mediaSessionID&gt;
    &lt;/TC&gt;
  &lt;/TCList&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 12001 RTP/AVP 96
c=IN IP4 192.168.1.1
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/cams:callInfo&gt;</CallInfo>
</e:property>
</e:propertyset>
```

C.9.10 F24

HTTP/1.1 200 OK
Content-Length: 0

C.10 Accept an incoming Call using multiple TCs (Case 1)

C.10.1 Figure

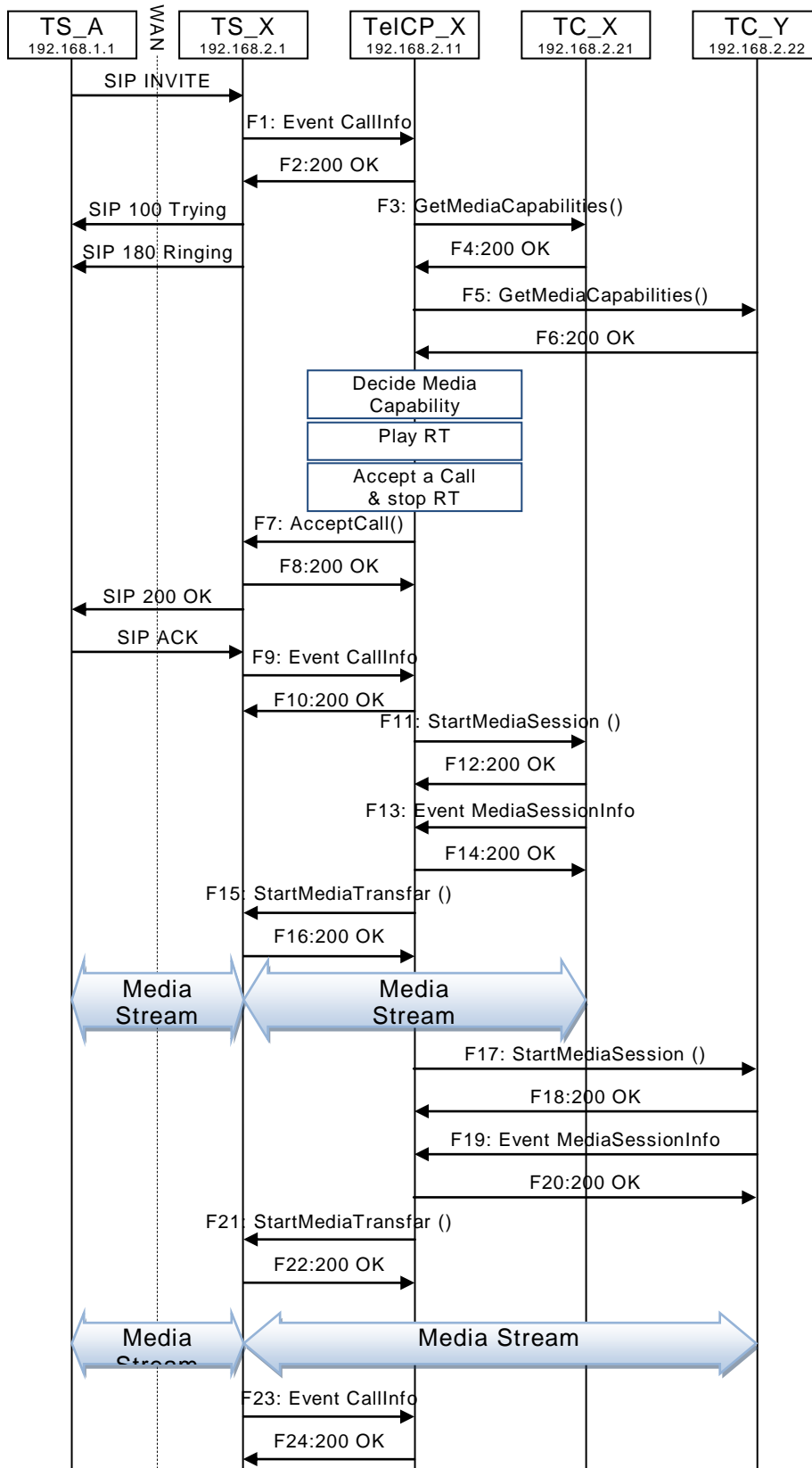


Figure C.13 — Accept an incoming Call using multiple TCs (Case 1)

C.10.2 F1

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
 HOST: 192.168.2.11:20011
 CONTENT-TYPE: text/xml
 Content-Length: [bytes in body]
 NT: upnp:event
 NTS: upnp:propchange
 SID: uuid:c3580410-1dd1-11b2-8000-20001
 SEQ: [sequence number]
 Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
  &lt;callID&gt;call201&lt;/callID&gt;
  &lt;targetNames type="TelCPName"&gt;*&lt;/targetNames&gt;
  &lt;callStatus&gt;Ringing&lt;/callStatus&gt;
  &lt;priority&gt;Normal&lt;/priority&gt;
  &lt;remoteParty&gt;
    &lt;peer:id&gt;0355550101&lt;/peer:id&gt;
  &lt;/remoteParty&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.1
s=-
c=IN IP4 192.168.2.1
t=0 0
m=audio 21001 RTP/AVP 0
c=IN IP4 192.168.2.1
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 22001 RTP/AVP 96
c=IN IP4 192.168.2.1
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/cams:callInfo&gt;</CallInfo>
</e:property>
</e:propertyset>
```

C.10.3 F2

HTTP/1.1 200 OK
 Content-Length: 0

C.10.4 F3

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1
 SOAPACTION: "urn:schemas-upnp-org:service:MediaManagement:2#GetMediaCapabilities"
 CONTENT-TYPE: text/xml ; charset="utf-8"
 HOST: 192.168.2.21:20021
 Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
```

```
<s:Body>
  <u:GetMediaCapabilities xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2" >
    <TSMediaCapabilityInfo></TSMediaCapabilityInfo>
  </u:GetMediaCapabilities>
</s:Body>
</s:Envelope>
```

C.10.5 F4

HTTP/1.1 200 OK

EXT:

CONTENT-TYPE: text/xml ; charset="utf-8"

SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0

Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetMediaCapabilitiesResponse xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2">
<SupportedMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.21
s=-
c=IN IP4 192.168.2.21
t=0 0
m=audio 21021 RTP/AVP 0
c=IN IP4 192.168.2.21
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 22021 RTP/AVP 96
c=IN IP4 192.168.2.21
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/mms:mediaCapabilityInfo&gt;</SupportedMediaCapabilityInfo>
    </u:GetMediaCapabilitiesResponse>
  </s:Body>
</s:Envelope>
```

C.10.6 F5

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1

SOAPACTION: "urn:schemas-upnp-org:service:MediaManagement:2#GetMediaCapabilities"

CONTENT-TYPE: text/xml ; charset="utf-8"

HOST: 192.168.2.22:20022

Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <u:GetMediaCapabilities xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2" >
    <TSMediaCapabilityInfo></TSMediaCapabilityInfo>
  </u:GetMediaCapabilities>
</s:Envelope>
```

C.10.7 F6

HTTP/1.1 200 OK

EXT:

CONTENT-TYPE: text/xml ; charset="utf-8"

SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0

Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetMediaCapabilitiesResponse xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2">
<SupportedMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.22
s=-
c=IN IP4 192.168.2.22
t=0 0
m=audio 21022 RTP/AVP 0
c=IN IP4 192.168.2.22
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 22022 RTP/AVP 96
c=IN IP4 192.168.2.22
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability &gt;
&lt;/mms:mediaCapabilityInfo&gt;</SupportedMediaCapabilityInfo>
  </u:GetMediaCapabilitiesResponse>
</s:Body>
</s:Envelope>
```

C.10.8 F7

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1

SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#AcceptCall"

CONTENT-TYPE: text/xml ; charset="utf-8"

HOST: 192.168.2.1:20001

Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:AcceptCall xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
      <TelCPName>phone@Bedroom</TelCPName>
      <SecretKey>secret201</SecretKey>
      <TargetCallID>call201</TargetCallID>
      <MediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.11
s=-
c=IN IP4 192.168.2.11
t=0 0
m=audio 21021 RTP/AVP 0
```

```
c=IN IP4 192.168.2.21
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 22022 RTP/AVP 96
c=IN IP4 192.168.2.22
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
</mediaCapability>
</cams:mediaCapabilityInfo>
</MediaCapabilityInfo>
  <CallMode>Non-Monopolize</CallMode>
</u:AcceptCall>
</s:Body>
</s:Envelope>
```

C.10.9 F8

HTTP/1.1 200 OK
Content-Length: [bytes in body]
CONTENT-TYPE: text/xml; charset="utf-8"
SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0
EXT:

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
<s:Body>
<m:AcceptCallResponse xmlns:m="urn:schemas-upnp-org:service:CallManagement:2" />
</s:Body>
</s:Envelope>
```

C.10.10 F9

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
HOST: 192.168.2.11:20011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-20001
SEQ: [sequence number]
Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
  &lt;callID&gt;call1201&lt;/callID&gt;
  &lt;targetNames type="TelCPName"&gt;*&lt;/targetNames&gt;
  &lt;callStatus&gt;Connected&lt;/callStatus&gt;
  &lt;priority&gt;Normal&lt;/priority&gt;
  &lt;remoteParty&gt;
    &lt;peer:id&gt;0355550101&lt;/peer:id&gt;
  &lt;/remoteParty&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.1
s=-
c=IN IP4 192.168.2.1
t=0 0
m=audio 21001 RTP/AVP 0
```



```
c=IN IP4 192.168.2.1
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 22001 RTP/AVP 96
c=IN IP4 192.168.2.1
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
</mediaCapability>
</cams:callInfo>
</CallInfo>
</e:property>
</e:propertyset>
```

C.10.11 F10

HTTP/1.1 200 OK
Content-Length: 0

C.10.12 F11

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1
SOAPACTION: "urn:schemas-upnp-org:service:MediaManagement:2#StartMediaSession"
CONTENT-TYPE: text/xml ; charset="utf-8"
HOST: 192.168.2.21:20021
Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StartMediaSession xmlns:u="urn:schemas-upnp-org:service:MediaManagement:2">
      <TSMediaCapabilityInfo><?xml version="1.0" encoding="utf-8"?>
        <TSMediaCapabilityInfo
          xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
            http://www.upnp.org/schemas/phone/mms-v2.xsd"
          xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
          xmlns:cams="urn:schemas-upnp-org:phone:mms">
          <mediaCapability format="SDP">v=0
            o=- 0 0 IN IP4 192.168.2.11
            s=-
            c=IN IP4 192.168.2.11
            t=0 0
            m=audio 21001 RTP/AVP 0
            c=IN IP4 192.168.2.1
            a=rtpmap:0 PCMU/8000
            a=ptime:20
          </mediaCapability>
        </TSMediaCapabilityInfo>
      </u:StartMediaSession>
    </s:Body>
  </s:Envelope>
```

C.10.13 F12

HTTP/1.1 200 OK
EXT:
CONTENT-TYPE: text/xml ; charset="utf-8"
SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0
Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StartMediaSessionResponse xmlns:u="urn:schemas-upnp-
      org:service:MediaManagement:2">
```

```

<MediaSessionID>media201</MediaSessionID>
<TCMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaCapabilityInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
  http://www.upnp.org/schemas/phone/mms-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
  o=- 0 0 IN IP4 192.168.2.21
  s=-
  c=IN IP4 192.168.2.21
  t=0 0
  m=audio 21021 RTP/AVP 0
  c=IN IP4 192.168.2.21
  a=rtpmap:0 PCMU/8000
  a=ptime:20
  &lt;/mediaCapability&gt;
  &lt;/mms:mediaCapabilityInfo&gt;</TCMediaCapabilityInfo>
</u:StartMediaSessionResponse>
</s:Body>
</s:Envelope>

```

C.10.14 F13

```

NOTIFY /_urn:upnp-org:serviceId:MediaManagement HTTP/1.1
HOST: 192.168.2.11:20011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-20021
SEQ: [sequence number]
Connection: Keep-Alive

```

```

<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<MediaSessionInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaSessionInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
  http://www.upnp.org/schemas/phone/mms-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:mms="urn:schemas-upnp-org:phone:mms"&gt;
  &lt;mediaSessionID&gt;media201&lt;/mediaSessionID&gt;
  &lt;mediaSessionStatus&gt;Started&lt;/mediaSessionStatus&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
  o=- 0 0 IN IP4 192.168.2.21
  s=-
  c=IN IP4 192.168.2.21
  t=0 0
  m=audio 21021 RTP/AVP 0
  c=IN IP4 192.168.2.21
  a=rtpmap:0 PCMU/8000
  a=ptime:20
  &lt;/mediaCapability&gt;
  &lt;/mms:mediaSessionInfo&gt;</MediaSessionInfo>
</e:property>
</e:propertyset>

```

C.10.15 F14

```

HTTP/1.1 200 OK
Content-Length: 0

```

C.10.16 F15

```

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1
SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#StartMediaTransfer"
CONTENT-TYPE: text/xml ; charset="utf-8"

```

HOST: 192.168.2.1:20001
Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
<s:Body>
<u:StartMediaTransfer xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
<TelCPName>phone@Bedroom</TelCPName>
<SecretKey>secret201</SecretKey>
<TargetCallID>call201</TargetCallID>
<TCList>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:TCList
xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
&lt;TC&gt;
&lt;UDN&gt;uid:97ef6efa-ac89-4ea2-0001-udn201&lt;/UDN&gt;
&lt;mediaSessionID&gt;media201&lt;/mediaSessionID&gt;
&lt;/TC&gt;
&lt;/cams:TCList&gt;</TCList>
<MediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.11
s=-
c=IN IP4 192.168.2.11
t=0 0
m=audio 21021 RTP/AVP 0
c=IN IP4 192.168.2.21
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability&gt;
&lt;/cams:mediaCapabilityInfo&gt;</MediaCapabilityInfo>
</u:StartMediaTransfer>
</s:Body>
</s:Envelope>
```

C.10.17 F16

HTTP/1.1 200 OK
Content-Length: [bytes in body]
CONTENT-TYPE: text/xml; charset="utf-8"
SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0
EXT:

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
<s:Body>
<m:StartMediaTransferResponse xmlns:m="urn:schemas-upnp-
org:service:CallManagement:2" />
</s:Body>
</s:Envelope>
```

C.10.18 F17

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1
SOAPACTION: "urn:schemas-upnp-org:service:MediaManagement:2#StartMediaSession"
CONTENT-TYPE: text/xml ; charset="utf-8"
HOST: 192.168.2.22:20022
Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
```

```

<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StartMediaSession xmlns:u="urn:schemas-upnp-org:service:MediaManagement:2">
      <TSMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.11
s=-
c=IN IP4 192.168.2.11
t=0 0
m=video 22001 RTP/AVP 96
c=IN IP4 192.168.2.1
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/mms:mediaCapabilityInfo&gt;
</TSMediaCapabilityInfo>
  </u:StartMediaSession>
</s:Body>
</s:Envelope>

```

C.10.19 F18

HTTP/1.1 200 OK

EXT:

CONTENT-TYPE: text/xml ; charset="utf-8"

SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0

Content-Length: [bytes in body]

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StartMediaSessionResponse xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2">
      <MediaSessionID>media202</MediaSessionID>
      <TCMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.22
s=-
c=IN IP4 192.168.2.22
t=0 0
m=video 22022 RTP/AVP 96
c=IN IP4 192.168.2.22
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/mms:mediaCapabilityInfo&gt;</TCMediaCapabilityInfo>
    </u:StartMediaSessionResponse>
  </s:Body>
</s:Envelope>

```

C.10.20 F19

NOTIFY /_urn:upnp-org:serviceId:MediaManagement HTTP/1.1
 HOST: 192.168.2.11:20011
 CONTENT-TYPE: text/xml
 Content-Length: [bytes in body]
 NT: upnp:event
 NTS: upnp:propchange
 SID: uuid:c3580410-1dd1-11b2-8000-20022
 SEQ: [sequence number]
 Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<MediaSessionInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaSessionInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
  http://www.upnp.org/schemas/phone/mms-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:mms="urn:schemas-upnp-org:phone:mms"&gt;
  &lt;mediaSessionID&gt;media202&lt;/mediaSessionID&gt;
  &lt;mediaSessionStatus&gt;Started&lt;/mediaSessionStatus&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.22
s=-
c=IN IP4 192.168.2.22
t=0 0
m=video 22022 RTP/AVP 96
c=IN IP4 192.168.2.22
b=AS:2500
a=rtptime:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/mms:mediaSessionInfo&gt;</MediaSessionInfo>
</e:property>
</e:propertyset>
```

C.10.21 F20

HTTP/1.1 200 OK
 Content-Length: 0

C.10.22 F21

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1
 SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#StartMediaTransfer"
 CONTENT-TYPE: text/xml ; charset="utf-8"
 HOST: 192.168.2.1:20001
 Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
<s:Body>
<u:StartMediaTransfer xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
<TelCPName>phone@Bedroom</TelCPName>
<SecretKey>secret201</SecretKey>
<TargetCallID>call1201</TargetCallID>
<TCList>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:TCList
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
  &lt;TC&gt;
  &lt;UDN&gt;uid:97ef6efa-ac89-4ea2-0001-udn202&lt;/UDN&gt;
```

```

    <mediaSessionID>media202</mediaSessionID>;
  </TC>;
</cams:TCList>;</TCList>
<MediaCapabilityInfo><?xml version="1.0" encoding="utf-8"?>
<cams:mediaCapabilityInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams">
  <mediaCapability format="SDP">v=0
o=- 0 0 IN IP4 192.168.2.11
s=-
c=IN IP4 192.168.2.11
t=0 0
m=video 22022 RTP/AVP 96
c=IN IP4 192.168.2.22
b=AS:2500
a=rtmpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
  </mediaCapability>;
</cams:mediaCapabilityInfo>;</MediaCapabilityInfo>
</u:StartMediaTransfer>
</s:Body>
</s:Envelope>

```

C.10.23 F22

HTTP/1.1 200 OK
 Content-Length: [bytes in body]
 CONTENT-TYPE: text/xml; charset="utf-8"
 SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0
 EXT:

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
<s:Body>
<m:StartMediaTransferResponse xmlns:m="urn:schemas-upnp-
org:service:CallManagement:2" />
</s:Body>
</s:Envelope>

```

C.10.24 F23

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
 HOST: 192.168.2.11:20011
 CONTENT-TYPE: text/xml
 Content-Length: [bytes in body]
 NT: upnp:event
 NTS: upnp:propchange
 SID: uuid:c3580410-1dd1-11b2-8000-20001
 SEQ: [sequence number]
 Connection: Keep-Alive

```

<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo><?xml version="1.0" encoding="utf-8"?>
<cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer">
  <callID>call201</callID>;
  <targetNames type="TelCPName">*</targetNames>;
  <callStatus>Talking</callStatus>;

```

```
<priority>Normal</priority>
<remoteParty>
  <peer:id>0355550101</peer:id>
</remoteParty>
<TCList>
  <TC>
    <UDN>uid:97ef6efa-ac89-4ea2-0001-udn201</UDN>
    <mediaSessionID>media201</mediaSessionID>
  </TC>
  <TC>
    <UDN>uid:97ef6efa-ac89-4ea2-0001-udn202</UDN>
    <mediaSessionID>media202</mediaSessionID>
  </TC>
</TCList>
<mediaCapability format="SDP">v=0
o=- 0 0 IN IP4 192.168.2.1
s=-
c=IN IP4 192.168.2.1
t=0 0
m=audio 21001 RTP/AVP 0
c=IN IP4 192.168.2.1
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 22001 RTP/AVP 96
c=IN IP4 192.168.2.1
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
</mediaCapability>
</cams:callInfo></CallInfo>
</e:property>
</e:propertyset>
```

C.10.25 F24

HTTP/1.1 200 OK
Content-Length: 0

C.11 Accept an incoming Call using multiple TCs (Case 2)

C.11.1 Figure

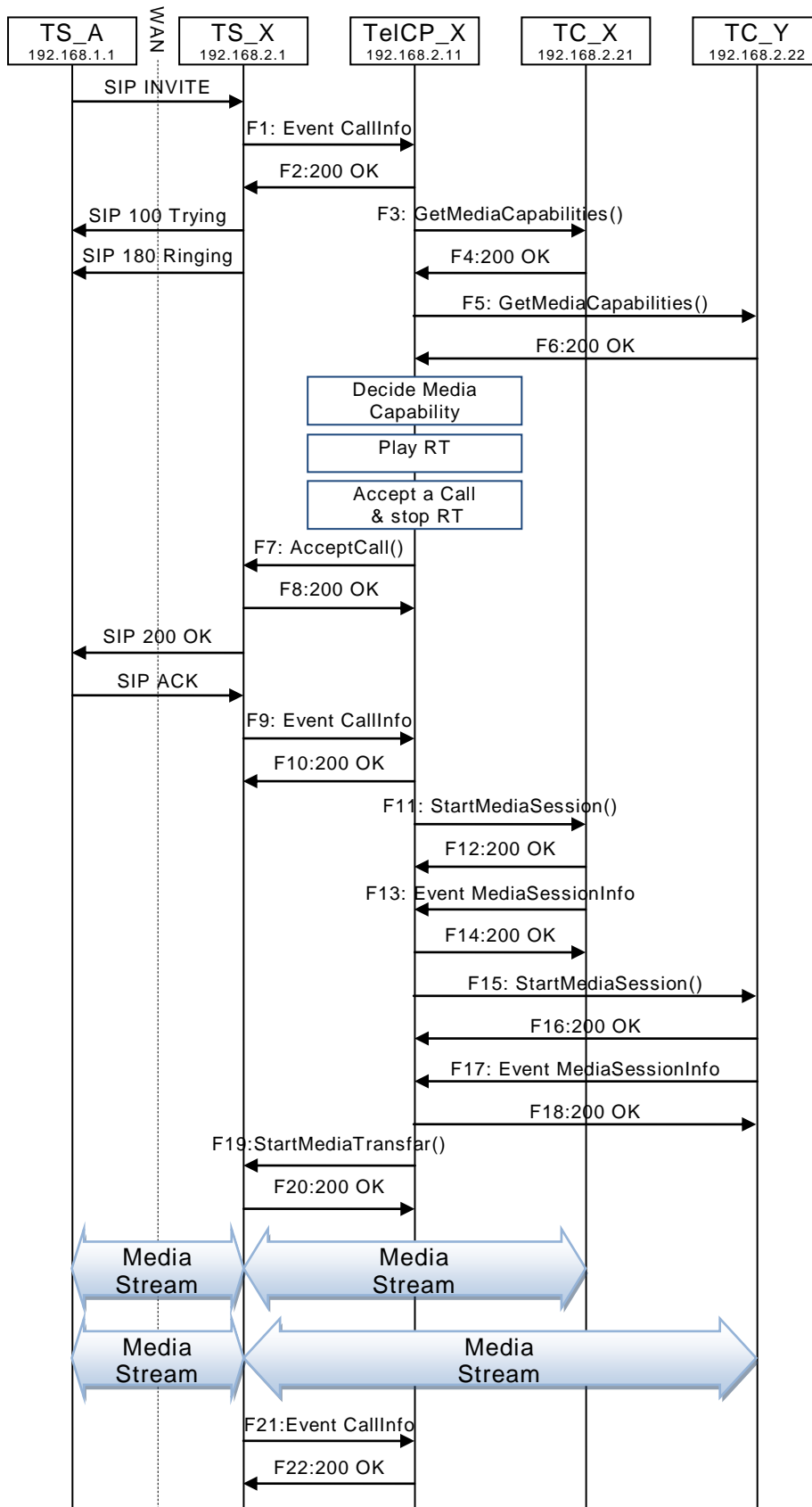


Figure C.14 — Accept an incoming Call using multiple TCs (Case 2)

C.11.2 F1 to F14 are the same as “C.10 Accept an incoming Call using multiple TCs (Case 1)”

C.11.3 F15

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1
 SOAPACTION: "urn:schemas-upnp-org:service:MediaManagement:2#StartMediaSession"
 CONTENT-TYPE: text/xml ; charset="utf-8"
 HOST: 192.168.2.22:20022
 Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StartMediaSession xmlns:u="urn:schemas-upnp-org:service:MediaManagement:2">
      <TSMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.11
s=-
c=IN IP4 192.168.2.11
t=0 0
m=video 22001 RTP/AVP 96
c=IN IP4 192.168.2.1
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/mms:mediaCapabilityInfo&gt;
</TSMediaCapabilityInfo>
    </u:StartMediaSession>
  </s:Body>
</s:Envelope>
```

C.11.4 F16

HTTP/1.1 200 OK
 EXT:
 CONTENT-TYPE: text/xml ; charset="utf-8"
 SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0
 Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StartMediaSessionResponse xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2">
      <MediaSessionID>media202</MediaSessionID>
      <TCMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.22
s=-
c=IN IP4 192.168.2.22
t=0 0
m=video 22022 RTP/AVP 96
c=IN IP4 192.168.2.22
b=AS:2500
```

```

a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
</mediaCapability>&gt;
</mms:mediaCapabilityInfo>&gt;</TCMediaCapabilityInfo>
</u:StartMediaSessionResponse>
</s:Body>
</s:Envelope>

```

C.11.5 F17

NOTIFY /_urn:upnp-org:serviceId:MediaManagement HTTP/1.1

HOST: 192.168.2.11:20011

CONTENT-TYPE: text/xml

Content-Length: [bytes in body]

NT: upnp:event

NTS: upnp:propchange

SID: uuid:c3580410-1dd1-11b2-8000-20022

SEQ: [sequence number]

Connection: Keep-Alive

```

<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<MediaSessionInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaSessionInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
  http://www.upnp.org/schemas/phone/mms-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:mms="urn:schemas-upnp-org:phone:mms"&gt;
  &lt;mediaSessionID&gt;media202&lt;/mediaSessionID&gt;
  &lt;mediaSessionStatus&gt;Started&lt;/mediaSessionStatus&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.22
s=-
c=IN IP4 192.168.2.22
t=0 0
m=video 22022 RTP/AVP 96
c=IN IP4 192.168.2.22
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/mms:mediaSessionInfo&gt;</MediaSessionInfo>
</e:property>
</e:propertyset>

```

C.11.6 F18

HTTP/1.1 200 OK

Content-Length: 0

C.11.7 F19

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1

SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#StartMediaTransfer"

CONTENT-TYPE: text/xml ; charset="utf-8"

HOST: 192.168.2.1:20001

Content-Length: [bytes in body]

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
<s:Body>
<u:StartMediaTransfer xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
<TelCPName>phone@Bedroom</TelCPName>

```

```

<SecretKey>secret201</SecretKey>
<TargetCallID>call1201</TargetCallID>
<TCList>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:TCList
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
  &lt;TC&gt;
    &lt;UDN&gt;uid:97ef6efa-ac89-4ea2-0001-udn201&lt;/UDN&gt;
    &lt;mediaSessionID&gt;media201&lt;/mediaSessionID&gt;
  &lt;/TC&gt;
  &lt;TC&gt;
    &lt;UDN&gt;uid:97ef6efa-ac89-4ea2-0001-udn202&lt;/UDN&gt;
    &lt;mediaSessionID&gt;media202&lt;/mediaSessionID&gt;
  &lt;/TC&gt;
  &lt;/cams:TCList&gt;</TCList>
<MediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:mediaCapabilityInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.11
s=-
c=IN IP4 192.168.2.11
t=0 0
m=audio 21021 RTP/AVP 0
c=IN IP4 192.168.2.21
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 22022 RTP/AVP 96
c=IN IP4 192.168.2.22
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/cams:mediaCapabilityInfo&gt;</MediaCapabilityInfo>
</u:StartMediaTransfer>
</s:Body>
</s:Envelope>

```

C.11.8 F20

```

HTTP/1.1 200 OK
Content-Length: [bytes in body]
CONTENT-TYPE: text/xml; charset="utf-8"
SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0
EXT:

```

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
  <s:Body>
    <m:StartMediaTransferResponse xmlns:m="urn:schemas-upnp-
org:service:CallManagement:2" />
  </s:Body>
</s:Envelope>

```

C.11.9 F21

```

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
HOST: 192.168.2.11:20011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event

```

NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-20001
SEQ: [sequence number]
Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
  &lt;callID&gt;call201&lt;/callID&gt;
  &lt;targetNames type="TelCPName"&gt;*&lt;/targetNames&gt;
  &lt;callStatus&gt;Talking&lt;/callStatus&gt;
  &lt;priority&gt;Normal&lt;/priority&gt;
  &lt;remoteParty&gt;
    &lt;peer:id&gt;0355550101&lt;/peer:id&gt;
  &lt;/remoteParty&gt;
  &lt;TCList&gt;
    &lt;TC&gt;
      &lt;UDN&gt;uuid:97ef6efa-ac89-4ea2-0001-udn201&lt;/UDN&gt;
      &lt;mediaSessionID&gt;media201&lt;/mediaSessionID&gt;
      &lt;/TC&gt;
    &lt;TC&gt;
      &lt;UDN&gt;uuid:97ef6efa-ac89-4ea2-0001-udn202&lt;/UDN&gt;
      &lt;mediaSessionID&gt;media202&lt;/mediaSessionID&gt;
      &lt;/TC&gt;
    &lt;/TCList&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.1
s=-
c=IN IP4 192.168.2.1
t=0 0
m=audio 21001 RTP/AVP 0
c=IN IP4 192.168.2.1
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 22001 RTP/AVP 96
c=IN IP4 192.168.2.1
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/cams:callInfo&gt;</CallInfo>
</e:property>
</e:propertyset>
```

C.11.10 F22

HTTP/1.1 200 OK
Content-Length: 0

C.12 Add TC during a Call (Create a modification request)

C.12.1 Figure

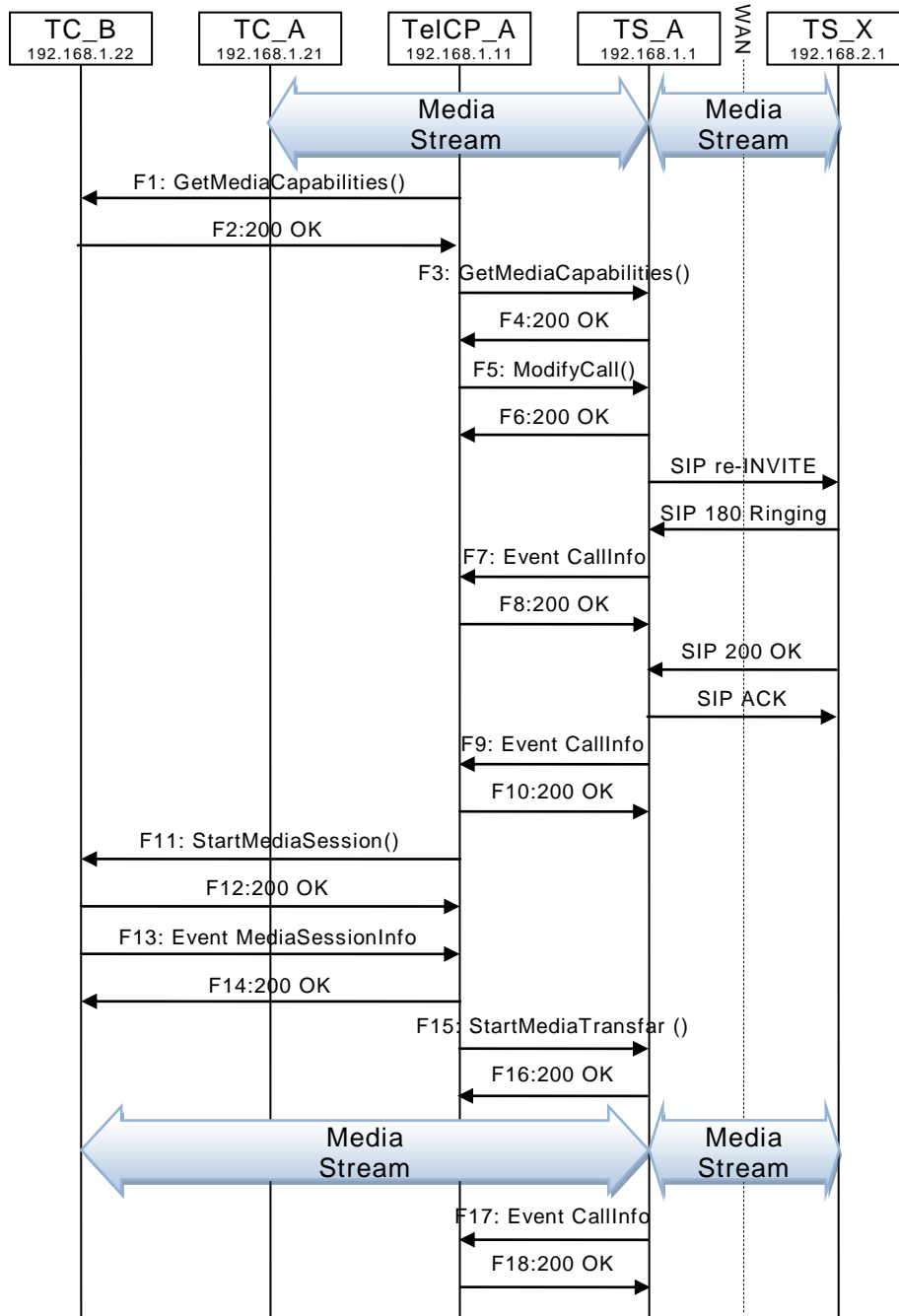


Figure C.15 — Add TC during a Call (Create a modification request)

C.12.2 F1

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1
 SOAPACTION: "urn:schemas-upnp-org:service:MediaManagement:2#GetMediaCapabilities"
 CONTENT-TYPE: text/xml ; charset="utf-8"
 HOST: 192.168.1.22:10022
 Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetMediaCapabilities xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2" >
      <TSMediaCapabilityInfo></TSMediaCapabilityInfo>
    </u:GetMediaCapabilities>
  </s:Body>
</s:Envelope>
```

C.12.3 F2

HTTP/1.1 200 OK

EXT:

CONTENT-TYPE: text/xml ; charset="utf-8"

SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0

Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetMediaCapabilitiesResponse xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2">
      <SupportedMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.22
s=-
c=IN IP4 192.168.1.22
t=0 0
m=audio 11022 RTP/AVP 0
c=IN IP4 192.168.1.22
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 12022 RTP/AVP 96
c=IN IP4 192.168.1.22
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/mms:mediaCapabilityInfo&gt;
&lt;/SupportedMediaCapabilityInfo>
    </u:GetMediaCapabilitiesResponse>
  </s:Body>
</s:Envelope>
```

C.12.4 F3

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1

SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#GetMediaCapabilities"

CONTENT-TYPE: text/xml ; charset="utf-8"

HOST: 192.168.1.1:10001

Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetMediaCapabilities xmlns:u="urn:schemas-upnp-org:service: CallManagement:2">
      <TCMediaCapabilityInfo></TCMediaCapabilityInfo>
    </u:GetMediaCapabilities>
  </s:Body>
```

```
</s:Envelope>
```

C.12.5 F4

HTTP/1.1 200 OK

EXT:

CONTENT-TYPE: text/xml ; charset="utf-8"

SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0

Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetMediaCapabilitiesResponse xmlns:u="urn:schemas-upnp-
org:service:CallManagement:2">
      <SupportedMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 12001 RTP/AVP 96
c=IN IP4 192.168.1.1
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/cams:mediaCapabilityInfo&gt;</SupportedMediaCapabilityInfo>
    </u:GetMediaCapabilitiesResponse>
  </s:Body>
</s:Envelope>
```

C.12.6 F5

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1

SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#ModifyCall"

CONTENT-TYPE: text/xml ; charset="utf-8"

HOST: 192.168.1.1:10001

Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:ModifyCall xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
      <TelCPName>TV@Living</TelCPName>
      <SecretKey>secret101</SecretKey>
      <TargetCallID>call101</TargetCallID>
    <MediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.11
s=-
c=IN IP4 192.168.1.11
```



```

t=0 0
m=audio 11021 RTP/AVP 0
c=IN IP4 192.168.1.21
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 12022 RTP/AVP 96
c=IN IP4 192.168.1.22
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
<!--/mediaCapability-->
<!--/cams:mediaCapabilityInfo-->
</MediaCapabilityInfo>
  </u:ModifyCall>
</s:Body>
</s:Envelope>

```

C.12.7 F6

```

HTTP/1.1 200 OK
Content-Length: [bytes in body]
CONTENT-TYPE: text/xml; charset="utf-8"
SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0
EXT:

```

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
  <s:Body>
    <m:ModifyCallResponse xmlns:m="urn:schemas-upnp-org:service:CallManagement:2" />
  </s:Body>
</s:Envelope>

```

C.12.8 F7

```

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
HOST: 192.168.1.11:10011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-10001
SEQ: [sequence number]
Connection: Keep-Alive

```

```

<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
  &lt;callID&gt;call101&lt;/callID&gt;
  &lt;targetNames type="TelCPName"&gt;*&lt;/targetNames&gt;
  &lt;callStatus&gt;SendingModifyRequest&lt;/callStatus&gt;
  &lt;priority&gt;Normal&lt;/priority&gt;
  &lt;remoteParty&gt;
    &lt;peer:id&gt;0774940201&lt;/peer:id&gt;
  &lt;/remoteParty&gt;
  &lt;TCList&gt;
    &lt;TC&gt;
      &lt;UDN&gt;uuid:97ef6efa-ac89-4ea2-0001-udn101&lt;/UDN&gt;
      &lt;mediaSessionID&gt;media101&lt;/mediaSessionID&gt;
    &lt;/TC&gt;

```

```

    </TCList>
    <mediaCapability format="SDP">v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 12001 RTP/AVP 96
c=IN IP4 192.168.1.1
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
    </mediaCapability>
    </cams:callInfo>
</CallInfo>
</e:property>
</e:propertyset>

```

C.12.9 F8

HTTP/1.1 200 OK
Content-Length: 0

C.12.10 F9

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
HOST: 192.168.1.11:10011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-10001
SEQ: [sequence number]
Connection: Keep-Alive

```

<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo><?xml version="1.0" encoding="utf-8"?>
<callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer">
    <callID><call101</callID>
    <targetNames type="TelCPName">*</targetNames>
    <callStatus>Modified</callStatus>
    <priority>Normal</priority>
    <remoteParty>
      <peer:id>0774940201</peer:id>
    </remoteParty>
    <TCList>
      <TC>
        <UDN>uuid:97ef6efa-ac89-4ea2-0001-udn101</UDN>
        <mediaSessionID>media101</mediaSessionID>
      </TC>
    </TCList>
    <mediaCapability format="SDP">v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0

```

```
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 12001 RTP/AVP 96
c=IN IP4 192.168.1.1
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
</mediaCapability>
</cams:callInfo>
</CallInfo>
</e:property>
</e:propertyset>
```

C.12.11 F10

HTTP/1.1 200 OK
Content-Length: 0

C.12.12 F11

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1
SOAPACTION: "urn:schemas-upnp-org:service:MediaManagement:2#StartMediaSession"
CONTENT-TYPE: text/xml ; charset="utf-8"
HOST: 192.168.1.22:10022
Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StartMediaSession xmlns:u="urn:schemas-upnp-org:service:MediaManagement:2">
      <TSMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.11
s=-
c=IN IP4 192.168.1.11
t=0 0
m=video 12001 RTP/AVP 96
c=IN IP4 192.168.1.1
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/mms:mediaCapabilityInfo&gt;
</TSMediaCapabilityInfo>
    </u:StartMediaSession>
  </s:Body>
</s:Envelope>
```

C.12.13 F12

HTTP/1.1 200 OK
EXT:
CONTENT-TYPE: text/xml ; charset="utf-8"
SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0
Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
```

```

<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
<s:Body>
<u:StartMediaSessionResponse xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2">
<MediaSessionID>media102</MediaSessionID>
<TCMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.22
s=-
c=IN IP4 192.168.1.22
t=0 0
m=video 12022 RTP/AVP 96
c=IN IP4 192.168.1.22
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/mms:mediaCapabilityInfo&gt;
</TCMediaCapabilityInfo>
</u:StartMediaSessionResponse>
</s:Body>
</s:Envelope>

```

C.12.14 F13

```

NOTIFY /_urn:upnp-org:serviceId:MediaManagement HTTP/1.1
HOST: 192.168.1.11:10011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-10022
SEQ: [sequence number]
Connection: Keep-Alive

```

```

<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<MediaSessionInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaSessionInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:mms="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaSessionID&gt;media102&lt;/mediaSessionID&gt;
&lt;mediaSessionStatus&gt;Started&lt;/mediaSessionStatus&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.22
s=-
c=IN IP4 192.168.1.22
t=0 0
m=video 12022 RTP/AVP 96
c=IN IP4 192.168.1.22
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/mms:mediaSessionInfo&gt;</MediaSessionInfo>
</e:property>
</e:propertyset>

```

C.12.15 F14

HTTP/1.1 200 OK
Content-Length: 0

C.12.16 F15

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1
SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#StartMediaTransfer"
CONTENT-TYPE: text/xml ; charset="utf-8"
HOST: 192.168.1.1:10001
Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
<s:Body>
<u:StartMediaTransfer xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
<TelCPName>TV@Living</TelCPName>
<SecretKey>secret101</SecretKey>
<TargetCallID>call101</TargetCallID>
<TCList>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:TCList
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
&lt;TC&gt;
  &lt;UDN&gt;uid:97ef6efa-ac89-4ea2-0001-udn101&lt;/UDN&gt;
  &lt;mediaSessionID&gt;media101&lt;/mediaSessionID&gt;
  &lt;/TC&gt;
&lt;TC&gt;
  &lt;UDN&gt;uid:97ef6efa-ac89-4ea2-0001-udn102&lt;/UDN&gt;
  &lt;mediaSessionID&gt;media102&lt;/mediaSessionID&gt;
  &lt;/TC&gt;
  &lt;/cams:TCList&gt;</TCList>
<MediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:mediaCapabilityInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.11
s=-
c=IN IP4 192.168.1.11
t=0 0
m=audio 11021 RTP/AVP 0
c=IN IP4 192.168.1.21
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 12022 RTP/AVP 96
c=IN IP4 192.168.1.22
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/cams:mediaCapabilityInfo&gt;</MediaCapabilityInfo>
  </u:StartMediaTransfer>
</s:Body>
</s:Envelope>
```

C.12.17 F16

HTTP/1.1 200 OK
Content-Length: [bytes in body]
CONTENT-TYPE: text/xml; charset="utf-8"

SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0
EXT:

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
  <s:Body>
    <m:StartMediaTransferResponse xmlns:m="urn:schemas-upnp-
org:service:CallManagement:2" />
  </s:Body>
</s:Envelope>
```

C.12.18 F17

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
HOST: 192.168.1.11:10011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-10001
SEQ: [sequence number]
Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:cams"
xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
  &lt;callID&gt;call101&lt;/callID&gt;
  &lt;targetNames type="TelCPName"&gt;*&lt;/targetNames&gt;
  &lt;callStatus&gt;Talking&lt;/callStatus&gt;
  &lt;priority&gt;Normal&lt;/priority&gt;
  &lt;remoteParty&gt;
    &lt;peer:id&gt;0774940201&lt;/peer:id&gt;
  &lt;/remoteParty&gt;
  &lt;TCList&gt;
    &lt;TC&gt;
      &lt;UDN&gt;uuid:97ef6efa-ac89-4ea2-0001-udn101&lt;/UDN&gt;
      &lt;mediaSessionID&gt;media101&lt;/mediaSessionID&gt;
    &lt;/TC&gt;
    &lt;TC&gt;
      &lt;UDN&gt;uuid:97ef6efa-ac89-4ea2-0001-udn102&lt;/UDN&gt;
      &lt;mediaSessionID&gt;media102&lt;/mediaSessionID&gt;
    &lt;/TC&gt;
  &lt;/TCList&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 12001 RTP/AVP 96
c=IN IP4 192.168.1.1
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/cams:callInfo&gt;</CallInfo>
```

```
</e:property>
</e:propertyset>
```

C.12.19 F18

HTTP/1.1 200 OK
Content-Length: 0

C.13 Add TC during a Call (Accept a modification request)

C.13.1 Figure

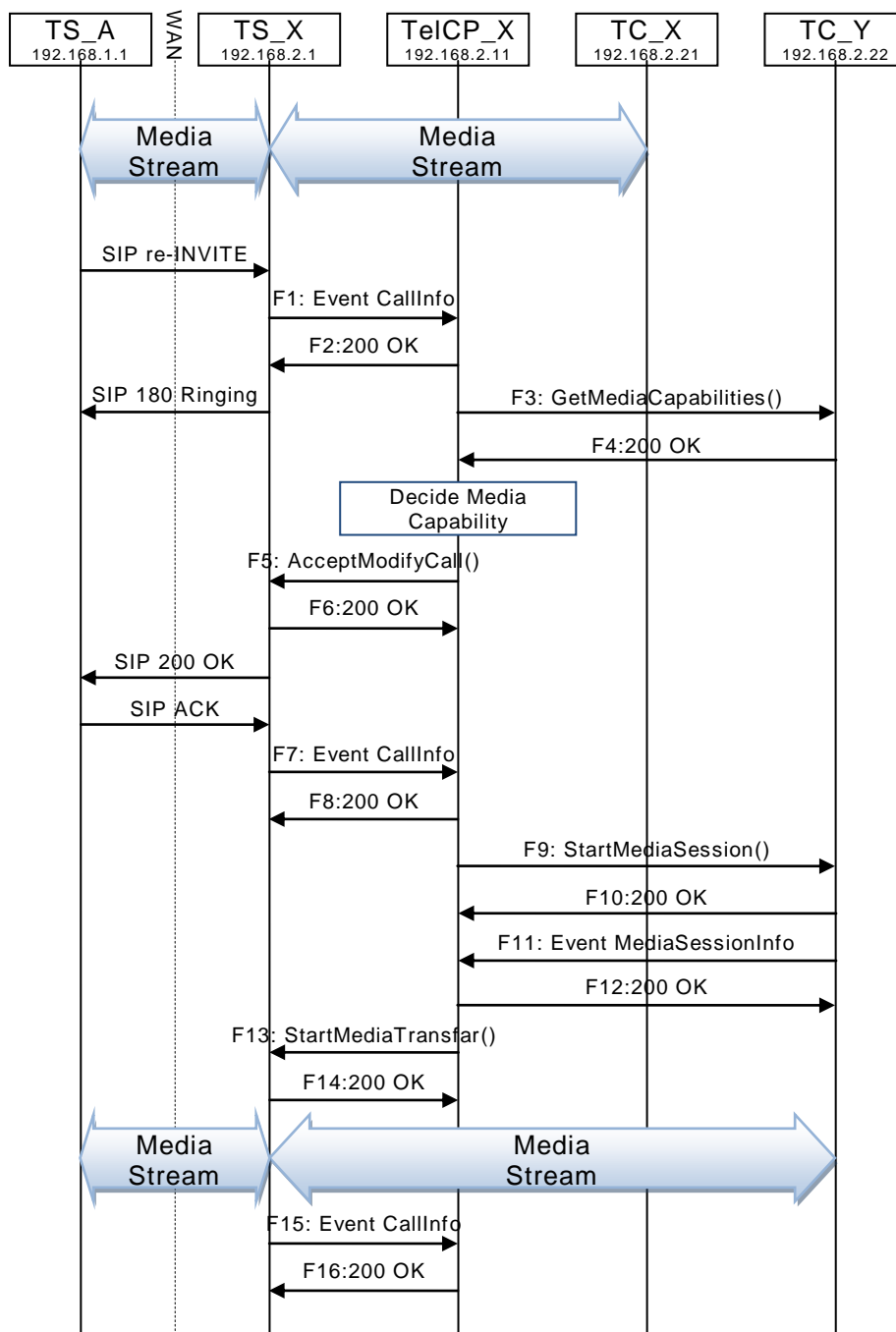


Figure C.16 — Add TC during a Call (Accept a modification request)

C.13.2 F1

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
HOST: 192.168.2.11:20011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-20001
SEQ: [sequence number]
Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
  &lt;callID&gt;call201&lt;/callID&gt;
  &lt;targetNames type="TelCPName"&gt;*&lt;/targetNames&gt;
  &lt;callStatus&gt;ReceivingModifyRequest&lt;/callStatus&gt;
  &lt;priority&gt;Normal&lt;/priority&gt;
  &lt;remoteParty&gt;
    &lt;peer:id&gt;0355550101&lt;/peer:id&gt;
  &lt;/remoteParty&gt;
  &lt;TCList&gt;
    &lt;TC&gt;
      &lt;UDN&gt;uuid:97ef6efa-ac89-4ea2-0001-udn201&lt;/UDN&gt;
      &lt;mediaSessionID&gt;media201&lt;/mediaSessionID&gt;
    &lt;/TC&gt;
  &lt;/TCList&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.1
s=-
c=IN IP4 192.168.2.1
t=0 0
m=audio 21001 RTP/AVP 0
c=IN IP4 192.168.2.1
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 22001 RTP/AVP 96
c=IN IP4 192.168.2.1
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/cams:callInfo&gt;</CallInfo>
</e:property>
</e:propertyset>
```

C.13.3 F2

HTTP/1.1 200 OK
Content-Length: 0

C.13.4 F3

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1
SOAPACTION: "urn:schemas-upnp-org:service:MediaManagement:2#GetMediaCapabilities"
CONTENT-TYPE: text/xml ; charset="utf-8"
HOST: 192.168.2.22:20022
Content-Length: [bytes in body]


```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <u:GetMediaCapabilities xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2" >
    <TSMediaCapabilityInfo></TSMediaCapabilityInfo>
  </u:GetMediaCapabilities>
</s:Envelope>
```

C.13.5 F4

HTTP/1.1 200 OK

EXT:

CONTENT-TYPE: text/xml ; charset="utf-8"

SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0

Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetMediaCapabilitiesResponse xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2">
      <SupportedMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.22
s=-
c=IN IP4 192.168.2.22
t=0 0
m=audio 21022 RTP/AVP 0
c=IN IP4 192.168.2.22
a=rtpmap:0 PCMU/8000
aptime:20
m=video 22022 RTP/AVP 96
c=IN IP4 192.168.2.22
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/mms:mediaCapabilityInfo&gt;</SupportedMediaCapabilityInfo>
    </u:GetMediaCapabilitiesResponse>
  </s:Body>
</s:Envelope>
```

C.13.6 F5

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1

SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#AcceptModifyCall"

CONTENT-TYPE: text/xml ; charset="utf-8"

HOST: 192.168.2.1:20001

Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:AcceptModifyCall xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
      <TelCPName>phone@Bedroom</TelCPName>
      <SecretKey>secret201</SecretKey>
      <TargetCallID>call201</TargetCallID>
    <MediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
```

```

http://www.upnp.org/schemas/phone/cams-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.11
s=-
c=IN IP4 192.168.2.11
t=0 0
m=audio 21021 RTP/AVP 0
c=IN IP4 192.168.2.21
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 22022 RTP/AVP 96
c=IN IP4 192.168.2.22
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/cams:mediaCapabilityInfo&gt;
</MediaCapabilityInfo>
  </u:AcceptModifyCall>
</s:Body>
</s:Envelope>

```

C.13.7 F6

```

HTTP/1.1 200 OK
Content-Length: [bytes in body]
CONTENT-TYPE: text/xml; charset="utf-8"
SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0
EXT:

```

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
  <s:Body>
    <m:AcceptModifyCallResponse xmlns:m="urn:schemas-upnp-
org:service:CallManagement:2" />
  </s:Body>
</s:Envelope>

```

C.13.8 F7

```

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
HOST: 192.168.2.11:20011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-20001
SEQ: [sequence number]
Connection: Keep-Alive

```

```

<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;&lt;cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:cams"
xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
  &lt;callID&gt;call201&lt;/callID&gt;
  &lt;targetNames type="TelCPName"&gt;*&lt;/targetNames&gt;
  &lt;callStatus&gt;Modified&lt;/callStatus&gt;
  &lt;priority&gt;Normal&lt;/priority&gt;

```

```

<remoteParty>
  <peer:id>0355550101</peer:id>
</remoteParty>
<TCList>
  <TC>
    <UDN>uid:97ef6efa-ac89-4ea2-0001-udn201</UDN>
    <mediaSessionID>media201</mediaSessionID>
  </TC>
</TCList>
  <mediaCapability format="SDP">v=0
o=- 0 0 IN IP4 192.168.2.1
s=-
c=IN IP4 192.168.2.1
t=0 0
m=audio 21001 RTP/AVP 0
c=IN IP4 192.168.2.1
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 22001 RTP/AVP 96
c=IN IP4 192.168.2.1
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
</mediaCapability>
</cams:callInfo></CallInfo>
</e:property>
</e:propertyset>

```

C.13.9 F8

HTTP/1.1 200 OK
Content-Length: 0

C.13.10 F9

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1
SOAPACTION: "urn:schemas-upnp-org:service:MediaManagement:2#StartMediaSession"
CONTENT-TYPE: text/xml ; charset="utf-8"
HOST: 192.168.2.22:20022
Content-Length: [bytes in body]

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StartMediaSession xmlns:u="urn:schemas-upnp-org:service:MediaManagement:2">
      <TSMediaCapabilityInfo><?xml version="1.0" encoding="utf-8"?>
<TSMediaCapabilityInfo
  <TSMediaCapabilityInfo
    xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms">
    <mediaCapability format="SDP">v=0
o=- 0 0 IN IP4 192.168.2.11
s=-
c=IN IP4 192.168.2.11
t=0 0
m=video 22001 RTP/AVP 96
c=IN IP4 192.168.2.1
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
</mediaCapability>
    </TSMediaCapabilityInfo>
  </u:StartMediaSession>

```

```
</s:Body>
</s:Envelope>
```

C.13.11 F10

HTTP/1.1 200 OK

EXT:

CONTENT-TYPE: text/xml ; charset="utf-8"

SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0

Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
<s:Body>
<u:StartMediaSessionResponse xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2">
<MediaSessionID>media202</MediaSessionID>
<TCMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.22
s=-
c=IN IP4 192.168.2.22
t=0 0
m=video 22022 RTP/AVP 96
c=IN IP4 192.168.2.22
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/mms:mediaCapabilityInfo&gt;</TCMediaCapabilityInfo>
</u:StartMediaSessionResponse>
</s:Body>
</s:Envelope>
```

C.13.12 F11

NOTIFY /_urn:upnp-org:serviceId:MediaManagement HTTP/1.1

HOST: 192.168.2.11:20011

CONTENT-TYPE: text/xml

Content-Length: [bytes in body]

NT: upnp:event

NTS: upnp:propchange

SID: uuid:c3580410-1dd1-11b2-8000-20022

SEQ: [sequence number]

Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<MediaSessionInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaSessionInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:mms="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaSessionID&gt;media202&lt;/mediaSessionID&gt;
&lt;mediaSessionStatus&gt;Started&lt;/mediaSessionStatus&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.22
s=-
c=IN IP4 192.168.2.22
```

```

t=0 0
m=video 22022 RTP/AVP 96
c=IN IP4 192.168.2.22
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
<lt;/mediaCapability>&gt;
<lt;/mms:mediaSessionInfo>&gt;</MediaSessionInfo>
</e:property>
</e:propertyset>

```

C.13.13 F12

HTTP/1.1 200 OK

Content-Length: 0

C.13.14 F13

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1

SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#StartMediaTransfer"

CONTENT-TYPE: text/xml ; charset="utf-8"

HOST: 192.168.2.1:20001

Content-Length: [bytes in body]

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
<s:Body>
<u:StartMediaTransfer xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
<TelCPName>phone@Bedroom</TelCPName>
<SecretKey>secret201</SecretKey>
<TargetCallID>call1201</TargetCallID>
<TCList>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:TCList
xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
&lt;TC&gt;
&lt;UDN&gt;uid:97ef6efa-ac89-4ea2-0001-udn201&lt;/UDN&gt;
&lt;mediaSessionID&gt;media201&lt;/mediaSessionID&gt;
&lt;/TC&gt;
&lt;TC&gt;
&lt;UDN&gt;uid:97ef6efa-ac89-4ea2-0001-udn202&lt;/UDN&gt;
&lt;mediaSessionID&gt;media202&lt;/mediaSessionID&gt;
&lt;/TC&gt;
&lt;/cams:TCList&gt;</TCList>
<MediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.11
s=-
c=IN IP4 192.168.2.11
t=0 0
m=audio 21021 RTP/AVP 0
c=IN IP4 192.168.2.21
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 22022RTP/AVP 96
c=IN IP4 192.168.2.22
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21

```

```

a=framerate:30
<lt;/mediaCapability>>
<lt;/cams:mediaCapabilityInfo>></MediaCapabilityInfo>
</u:StartMediaTransfer>
</s:Body>
</s:Envelope>

```

C.13.15 F14

HTTP/1.1 200 OK

Content-Length: [bytes in body]

CONTENT-TYPE: text/xml; charset="utf-8"

SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0

EXT:

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
<s:Body>
<m:StartMediaTransferResponse xmlns:m="urn:schemas-upnp-
org:service:CallManagement:2" />
</s:Body>
</s:Envelope>

```

C.13.16 F15

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1

HOST: 192.168.2.11:20011

CONTENT-TYPE: text/xml

Content-Length: [bytes in body]

NT: upnp:event

NTS: upnp:propchange

SID: uuid:c3580410-1dd1-11b2-8000-20001

SEQ: [sequence number]

Connection: Keep-Alive

```

<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo><lt;?xml version="1.0" encoding="utf-8"?>>
<lt;/cams:callInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:cams"
xmlns:peer="urn:schemas-upnp-org:phone:peer">>
<lt;/callID>>call1201<lt;/callID>>
<lt;/targetNames type="TelCPName">>*<lt;/targetNames>>
<lt;/callStatus>>Talking<lt;/callStatus>>
<lt;/priority>>Normal<lt;/priority>>
<lt;/remoteParty>>
<lt;/peer:id>>0355550101<lt;/peer:id>>
<lt;/remoteParty>>
<lt;/TCList>>
<lt;/TC>>
<lt;/UDN>>uuid:97ef6efa-ac89-4ea2-0001-udn201<lt;/UDN>>
<lt;/mediaSessionID>>media201<lt;/mediaSessionID>>
<lt;/TC>>
<lt;/TC>>
<lt;/UDN>>uuid:97ef6efa-ac89-4ea2-0001-udn202<lt;/UDN>>
<lt;/mediaSessionID>>media202<lt;/mediaSessionID>>
<lt;/TC>>
<lt;/TCList>>
<lt;/mediaCapability format="SDP">>v=0
o=- 0 0 IN IP4 192.168.2.1
s=-
c=IN IP4 192.168.2.1
t=0 0
m=audio 21001 RTP/AVP 0

```

```
c=IN IP4 192.168.2.1
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 22001 RTP/AVP 96
c=IN IP4 192.168.2.1
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
</mediaCapability>
</cans:callInfo></CallInfo>
</e:property>
</e:propertyset>
```

C.13.17 F16

```
HTTP/1.1 200 OK
Content-Length: 0
```

C.14 Remove TC during a Call (Create a modification request)

C.14.1 Figure

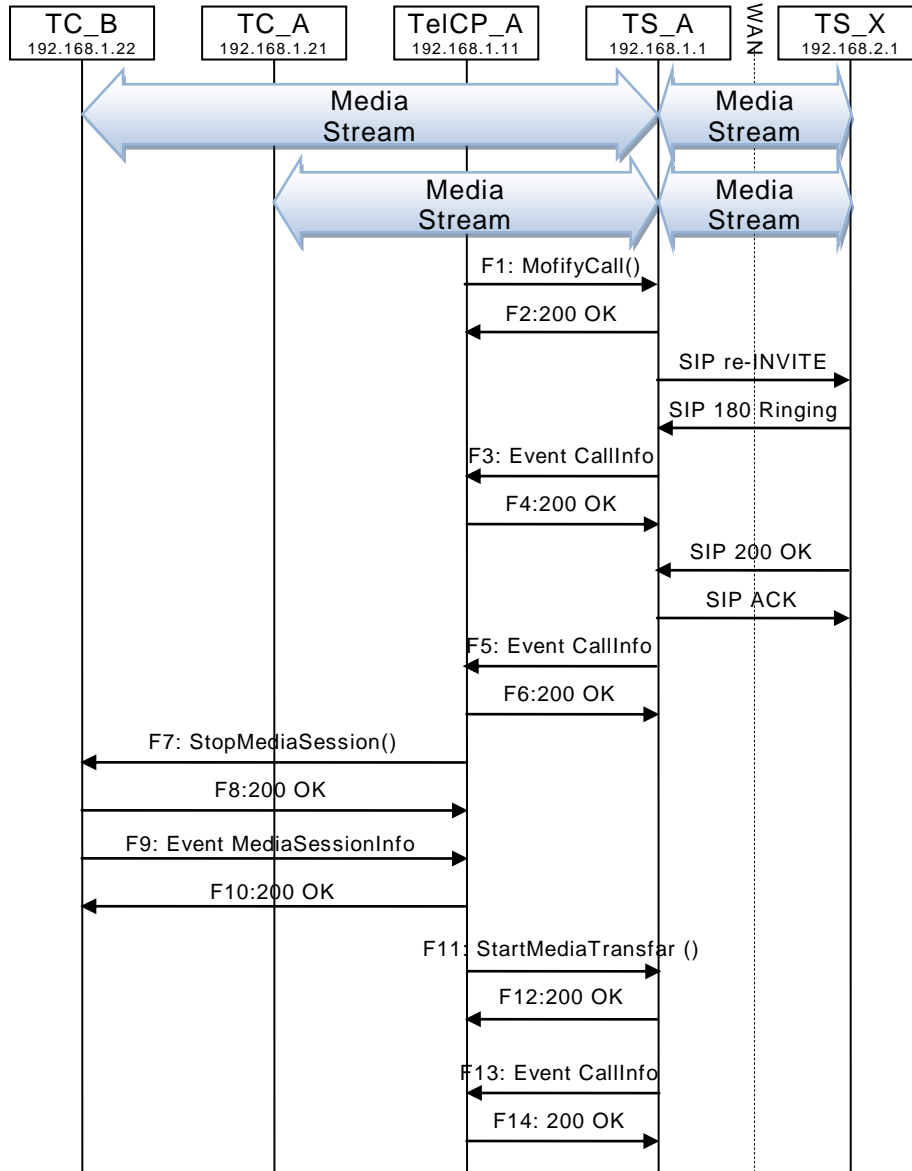


Figure C.17 — Remove TC during a Call (Create a modification request)

C.14.2 F1

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1
 SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#ModifyCall"
 CONTENT-TYPE: text/xml ; charset="utf-8"
 HOST: 192.168.1.1:10001
 Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:ModifyCall xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
      <TelCPName>TV@Living</TelCPName>
```



```

    <SecretKey>secret101</SecretKey>
    <TargetCallID>call101</TargetCallID>
<MediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:mediaCapabilityInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.11
s=-
c=IN IP4 192.168.1.11
t=0 0
m=audio 11021 RTP/AVP 0
c=IN IP4 192.168.1.21
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability &gt;
&lt;/cams:mediaCapabilityInfo&gt;</MediaCapabilityInfo>
  </u:ModifyCall>
</s:Body>
</s:Envelope>

```

C.14.3 F2

HTTP/1.1 200 OK

Content-Length: [bytes in body]

CONTENT-TYPE: text/xml; charset="utf-8"

SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0

EXT:

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
  <s:Body>
    <m:ModifyCallResponse xmlns:m="urn:schemas-upnp-org:service:CallManagement:2" />
  </s:Body>
</s:Envelope>

```

C.14.4 F3

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1

HOST: 192.168.1.11:10011

CONTENT-TYPE: text/xml

Content-Length: [bytes in body]

NT: upnp:event

NTS: upnp:propchange

SID: uuid:c3580410-1dd1-11b2-8000-10001

SEQ: [sequence number]

Connection: Keep-Alive

```

<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
  &lt;callID&gt;call101&lt;/callID&gt;
  &lt;targetNames type="TelCPName"&gt;*&lt;/targetNames&gt;
  &lt;callStatus&gt;SendingModifyRequest&lt;/callStatus&gt;
  &lt;priority&gt;Normal&lt;/priority&gt;
  &lt;remoteParty&gt;
    &lt;peer:id&gt;0774940201&lt;/peer:id&gt;
  &lt;/remoteParty&gt;
  &lt;TCList&gt;

```

```

    <TC>
    <UDN>uuid:97ef6efa-ac89-4ea2-0001-udn101</UDN>
    <mediaSessionID>media101</mediaSessionID>
    </TC>
    <TC>
    <UDN>uuid:97ef6efa-ac89-4ea2-0001-udn102</UDN>
    <mediaSessionID>media102</mediaSessionID>
    </TC>
  </TCList>
  <mediaCapability format="SDP">v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
aptime:20
m=video 12001 RTP/AVP 96
c=IN IP4 192.168.1.1
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30</mediaCapability>
</Cams:callInfo></CallInfo>
</e:property>
</e:propertyset>

```

C.14.5 F4

HTTP/1.1 200 OK
Content-Length: 0

C.14.6 F5

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
HOST: 192.168.1.11:10011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-10001
SEQ: [sequence number]
Connection: Keep-Alive

```

<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo><?xml version="1.0" encoding="utf-8"?>
<Cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer">
  <callID>call101</callID>
  <targetNames type="TelCPName">*</targetNames>
  <callStatus>Modified</callStatus>
  <priority>Normal</priority>
  <remoteParty>
    <peer:id>0774940201</peer:id>
  </remoteParty>
  </TCList>
  <TC>
  <UDN>uuid:97ef6efa-ac89-4ea2-0001-udn101</UDN>
  <mediaSessionID>media101</mediaSessionID>
  </TC>
</TCList>

```

```

    <mediaCapability format="SDP">v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20</mediaCapability>
</cams:callInfo></CallInfo>
</e:property>
</e:propertyset>

```

C.14.7 F6

HTTP/1.1 200 OK
Content-Length: 0

C.14.8 F7

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1
SOAPACTION: "urn:schemas-upnp-org:service:MediaManagement:2#StopMediaSession"
CONTENT-TYPE: text/xml ; charset="utf-8"
HOST: 192.168.1.22:10022
Content-Length: [bytes in body]

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StopMediaSession xmlns:u="urn:schemas-upnp-org:service:MediaManagement:2">
      <TargetMediaSessionID>media102</TargetMediaSessionID>
    </u:StopMediaSession>
  </s:Body>
</s:Envelope>

```

C.14.9 F8

HTTP/1.1 200 OK
EXT:
CONTENT-TYPE: text/xml ; charset="utf-8"
SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0
Content-Length: [bytes in body]

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StopMediaSessionResponse xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2" />
  </s:Body>
</s:Envelope>

```

C.14.10 F9

NOTIFY /_urn:upnp-org:serviceId:MediaManagement HTTP/1.1
HOST: 192.168.1.11:10011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-10022
SEQ: [sequence number]
Connection: Keep-Alive

```

<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>

```

```

<MediaSessionInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaSessionInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
    http://www.upnp.org/schemas/phone/mms-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:mms="urn:schemas-upnp-org:phone:mms"&gt;
  &lt;mediaSessionID&gt;media102&lt;/mediaSessionID&gt;
  &lt;mediaSessionStatus&gt;Stopped&lt;/mediaSessionStatus&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.22
s=-
c=IN IP4 192.168.1.22
t=0 0
m=video 12022 RTP/AVP 96
c=IN IP4 192.168.1.22
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:3
&lt;/mediaCapability&gt;
&lt;/mms:mediaSessionInfo&gt;</MediaSessionInfo>
</e:property>
</e:propertyset>

```

C.14.11 F10

HTTP/1.1 200 OK
Content-Length: 0

C.14.12 F11

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1
SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#StartMediaTransfer"
CONTENT-TYPE: text/xml ; charset="utf-8"
HOST: 192.168.1.1:10001
Content-Length: [bytes in body]

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
  xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StartMediaTransfer xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
      <TelCPName>TV@Living</TelCPName>
      <SecretKey>secret101</SecretKey>
      <TargetCallID>call101</TargetCallID>
      <TCList>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:TCList
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
    http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
  &lt;TC&gt;
    &lt;UDN&gt;uid:97ef6efa-ac89-4ea2-0001-udn101&lt;/UDN&gt;
    &lt;mediaSessionID&gt;media101&lt;/mediaSessionID&gt;
    &lt;/TC&gt;
  &lt;/cams:TCList&gt;</TCList>
    <MediaCapabilityInfo&gt;&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:mediaCapabilityInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
    http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.11
s=-
c=IN IP4 192.168.1.11
t=0 0
m=audio 11021 RTP/AVP 0
c=IN IP4 192.168.1.21

```

```

a=rtpmap:0 PCMU/8000
a=ptime:20
<!--mediaCapability-->
<!--cams:mediaCapabilityInfo--></MediaCapabilityInfo>
  </u:StartMediaTransfer>
</s:Body>
</s:Envelope>

```

C.14.13 F12

```

HTTP/1.1 200 OK
Content-Length: [bytes in body]
CONTENT-TYPE: text/xml; charset="utf-8"
SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0
EXT:

```

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
  <s:Body>
    <m:StartMediaTransferResponse xmlns:m="urn:schemas-upnp-
org:service:CallManagement:2" />
  </s:Body>
</s:Envelope>

```

C.14.14 F13

```

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
HOST: 192.168.1.11:10011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-10001
SEQ: [sequence number]
Connection: Keep-Alive

```

```

<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo><!--?xml version="1.0" encoding="utf-8"?>
<!--cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer">
    <!--callID-->call101<!--/callID-->
    <!--targetNames type="TelCPName" -->*-->/targetNames-->
    <!--callStatus-->Talking<!--/callStatus-->
    <!--priority-->Normal<!--/priority-->
    <!--remoteParty-->
      <!--peer:id-->0774940201<!--/peer:id-->
    <!--/remoteParty-->
    <!--TCList-->
      <!--TC-->
        <!--UDN-->uuid:97ef6efa-ac89-4ea2-0001-udn101<!--/UDN-->
        <!--mediaSessionID-->media101<!--/mediaSessionID-->
      <!--/TC-->
    <!--/TCList-->
    <!--mediaCapability format="SDP" -->v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20

```

```
</mediaCapability>  
</cams:callInfo></CallInfo>  
</e:property>  
</e:propertyset>
```

C.14.15 F14

HTTP/1.1 200 OK
Content-Length: 0

C.15 Remove TC during a Call (Accept a modification request)

C.15.1 Figure

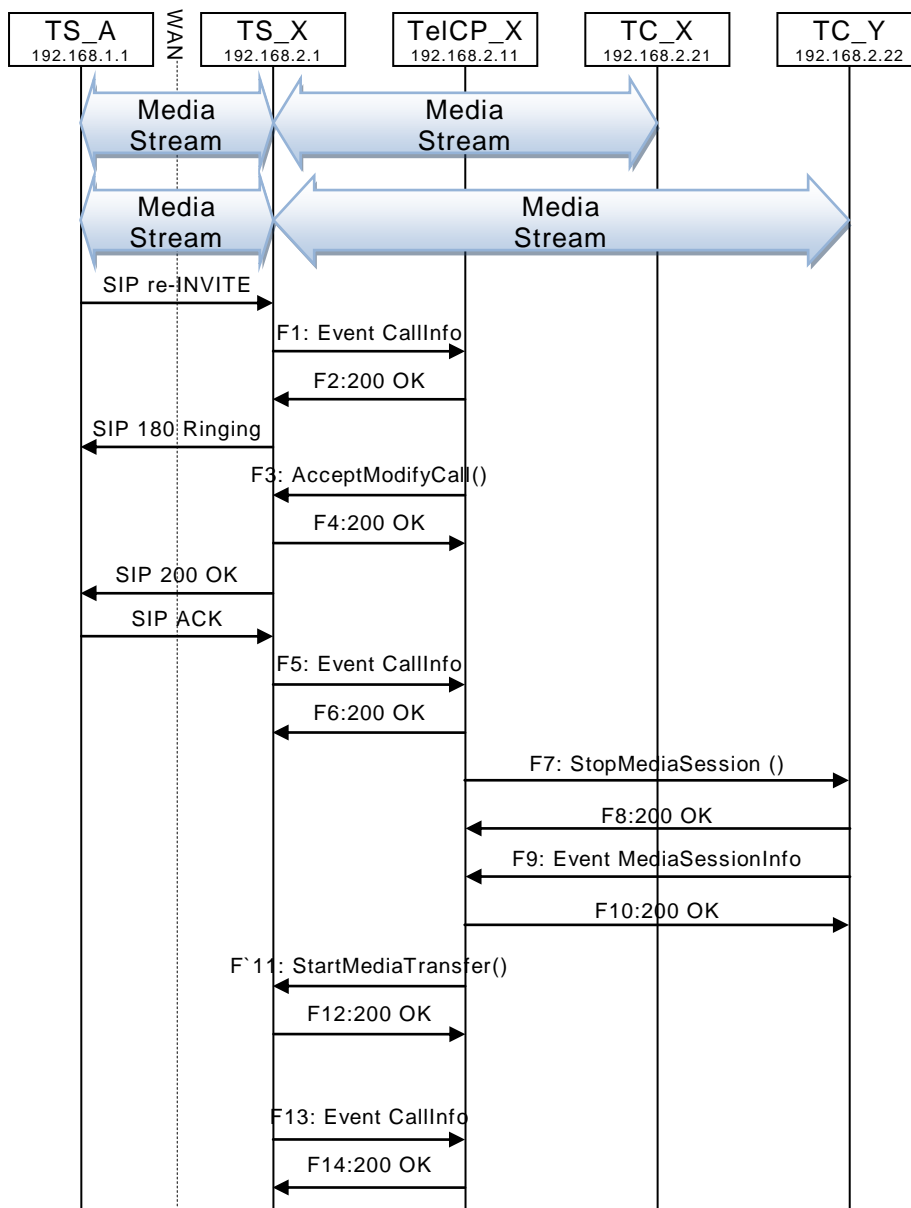


Figure C.18 — Remove TC during a Call (Accept a modification request)

C.15.2 F1

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
 HOST: 192.168.2.11:20011
 CONTENT-TYPE: text/xml
 Content-Length: [bytes in body]
 NT: upnp:event
 NTS: upnp:propchange
 SID: uuid:c3580410-1dd1-11b2-8000-20001
 SEQ: [sequence number]
 Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
  &lt;callID&gt;call201&lt;/callID&gt;
  &lt;targetNames type="TelCPName"&gt;*&lt;/targetNames&gt;
  &lt;callStatus&gt;ReceivingModifyRequest&lt;/callStatus&gt;
  &lt;priority&gt;Normal&lt;/priority&gt;
  &lt;remoteParty&gt;
    &lt;peer:id&gt;0355550101&lt;/peer:id&gt;
  &lt;/remoteParty&gt;
  &lt;TCList&gt;
    &lt;TC&gt;
      &lt;UDN&gt;uuid:97ef6efa-ac89-4ea2-0001-udn201&lt;/UDN&gt;
      &lt;mediaSessionID&gt;media201&lt;/mediaSessionID&gt;
    &lt;/TC&gt;
    &lt;TC&gt;
      &lt;UDN&gt;uuid:97ef6efa-ac89-4ea2-0001-udn202&lt;/UDN&gt;
      &lt;mediaSessionID&gt;media202&lt;/mediaSessionID&gt;
    &lt;/TC&gt;
  &lt;/TCList&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.1
s=-
c=IN IP4 192.168.2.1
t=0 0
m=audio 21001 RTP/AVP 0
c=IN IP4 192.168.2.1
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability&gt;
&lt;/cams:callInfo&gt;</CallInfo>
</e:property>
</e:propertyset>
```

C.15.3 F2

HTTP/1.1 200 OK
 Content-Length: 0

C.15.4 F3

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1
 SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#AcceptModifyCall"
 CONTENT-TYPE: text/xml ; charset="utf-8"
 HOST: 192.168.2.1:20001
 Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
```

```

<s:Body>
  <u:AcceptModifyCall xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
    <TelCPName>phone@Bedroom</TelCPName>
    <SecretKey>secret201</SecretKey>
    <TargetCallID>call201</TargetCallID>
  </u:AcceptModifyCall>
</s:Body>
</s:Envelope>

```

```

<MediaCapabilityInfo><?xml version="1.0" encoding="utf-8"?>
<mediaCapabilityInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams">
  <mediaCapability format="SDP">v=0
o=- 0 0 IN IP4 192.168.2.11
s=-
c=IN IP4 192.168.2.11
t=0 0
m=audio 21021 RTP/AVP 0
c=IN IP4 192.168.2.21
a=rtpmap:0 PCMU/8000
a=ptime:20
</mediaCapability>
</cams:mediaCapabilityInfo>
</MediaCapabilityInfo>
</u:AcceptModifyCall>
</s:Body>
</s:Envelope>

```

C.15.5 F4

```

HTTP/1.1 200 OK
Content-Length: [bytes in body]
CONTENT-TYPE: text/xml; charset="utf-8"
SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0
EXT:

```

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
  <s:Body>
    <m:AcceptModifyCallResponse xmlns:m="urn:schemas-upnp-
org:service:CallManagement:2" />
  </s:Body>
</s:Envelope>

```

C.15.6 F5

```

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
HOST: 192.168.2.11:20011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-20001
SEQ: [sequence number]
Connection: Keep-Alive

```

```

<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo><?xml version="1.0" encoding="utf-8"?>
<callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer">
  <callID>call201</callID>
  <targetNames type="TelCPName">phone@Bedroom</targetNames>
  <callStatus>Modified</callStatus>

```



```

<lt;priority>Normal</priority>
<lt;remoteParty>
  <lt;peer:id>0355550101</peer:id>
</remoteParty>
<lt;TCList>
  <lt;TC>
    <lt;UDN>uid:97ef6efa-ac89-4ea2-0001-udn201</UDN>
    <lt;mediaSessionID>media201</mediaSessionID>
  </TC>
  <lt;TC>
    <lt;UDN>uid:97ef6efa-ac89-4ea2-0001-udn202</UDN>
    <lt;mediaSessionID>media202</mediaSessionID>
  </TC>
</TCList>
<lt;mediaCapability format="SDP">v=0
o=- 0 0 IN IP4 192.168.2.1
s=-
c=IN IP4 192.168.2.1
t=0 0
m=audio 21001 RTP/AVP 0
c=IN IP4 192.168.2.1
a=rtpmap:0 PCMU/8000
a=ptime:20
</mediaCapability>
<lt;/cans:callInfo></CallInfo>
</e:property>
</e:propertyset>

```

C.15.7 F6

HTTP/1.1 200 OK
Content-Length: 0

C.15.8 F7

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1
SOAPACTION: "urn:schemas-upnp-org:service:MediaManagement:2#StopMediaSession"
CONTENT-TYPE: text/xml ; charset="utf-8"
HOST: 192.168.2.22:20022
Content-Length: [bytes in body]

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StopMediaSession xmlns:u="urn:schemas-upnp-org:service:MediaManagement:2">
      <TargetMediaSessionID>media202</TargetMediaSessionID>
    </u:StopMediaSession>
  </s:Body>
</s:Envelope>

```

C.15.9 F8

HTTP/1.1 200 OK
EXT:
CONTENT-TYPE: text/xml ; charset="utf-8"
SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0
Content-Length: [bytes in body]

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StopMediaSessionResponse xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2" />
  </s:Body>
</s:Envelope>

```

C.15.10 F9

NOTIFY /_urn:upnp-org:serviceId:MediaManagement HTTP/1.1
 HOST: 192.168.2.11:20011
 CONTENT-TYPE: text/xml
 Content-Length: [bytes in body]
 NT: upnp:event
 NTS: upnp:propchange
 SID: uuid:c3580410-1dd1-11b2-8000-20022
 SEQ: [sequence number]
 Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<MediaSessionInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaSessionInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
  http://www.upnp.org/schemas/phone/mms-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:mms="urn:schemas-upnp-org:phone:mms"&gt;
  &lt;mediaSessionID&gt;media202&lt;/mediaSessionID&gt;
  &lt;mediaSessionStatus&gt;Stopped&lt;/mediaSessionStatus&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.22
s=-
c=IN IP4 192.168.2.22
t=0 0
m=video 22022 RTP/AVP 96
c=IN IP4 192.168.2.22
b=AS:2500
a=rtptime:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:3
&lt;/mediaCapability&gt;
&lt;/mms:mediaSessionInfo&gt;</MediaSessionInfo>
</e:property>
</e:propertyset>
```

C.15.11 F10

HTTP/1.1 200 OK
 Content-Length: 0

C.15.12 F11

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1
 SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#StartMediaTransfer"
 CONTENT-TYPE: text/xml ; charset="utf-8"
 HOST: 192.168.2.1:20001
 Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
<s:Body>
<u:StartMediaTransfer xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
<TelCPName>phone@Bedroom</TelCPName>
<SecretKey>secret201</SecretKey>
<TargetCallID>call1201</TargetCallID>
<TCList>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:TCList
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
  &lt;TC&gt;
  &lt;/UDN&gt;uid:97ef6efa-ac89-4ea2-0001-udn201&lt;/UDN&gt;
```

```

    <mediaSessionID>media201</mediaSessionID>
  </TC>
</cams:TCList></TCList>
<MediaCapabilityInfo><?xml version="1.0" encoding="utf-8"?>
<cams:mediaCapabilityInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams">
  <mediaCapability format="SDP">v=0
o=- 0 0 IN IP4 192.168.2.11
s=-
c=IN IP4 192.168.2.11
t=0 0
m=audio 21021 RTP/AVP 0
c=IN IP4 192.168.2.21
a=rtpmap:0 PCMU/8000
a=ptime:20
  </mediaCapability>
</cams:mediaCapabilityInfo></MediaCapabilityInfo>
</u:StartMediaTransfer>
</s:Body>
</s:Envelope>

```

C.15.13 F12

HTTP/1.1 200 OK

Content-Length: [bytes in body]

CONTENT-TYPE: text/xml; charset="utf-8"

SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0

EXT:

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
<s:Body>
<m:StartMediaTransferResponse xmlns:m="urn:schemas-upnp-
org:service:CallManagement:2" />
</s:Body>
</s:Envelope>

```

C.15.14 F13

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1

HOST: 192.168.2.11:20011

CONTENT-TYPE: text/xml

Content-Length: [bytes in body]

NT: upnp:event

NTS: upnp:propchange

SID: uuid:c3580410-1dd1-11b2-8000-20001

SEQ: [sequence number]

Connection: Keep-Alive

```

<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo><?xml version="1.0" encoding="utf-8"?>
<cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer">
  <callID>call201</callID>
  <targetNames type="TelCPName">phone@Bedroom</targetNames>
  <callStatus>Talking</callStatus>
  <priority>Normal</priority>
  <remoteParty>
    <peer:id>0355550101</peer:id>

```

```
</remoteParty>
<TCList>
  <TC>
    <UDN>uuid:97ef6efa-ac89-4ea2-0001-udn201</UDN>
    <mediaSessionID>media201</mediaSessionID>
  </TC>
</TCList>
<mediaCapability format="SDP" v=0
o=- 0 0 IN IP4 192.168.2.1
s=-
c=IN IP4 192.168.2.1
t=0 0
m=audio 21001 RTP/AVP 0
c=IN IP4 192.168.2.1
a=rtpmap:0 PCMU/8000
a=ptime:20
</mediaCapability>
</cans:callInfo></CallInfo>
</e:property>
</e:propertyset>
```

C.15.15 F14

HTTP/1.1 200 OK
Content-Length: 0

C.16 Change TC during a Call

C.16.1 Figure

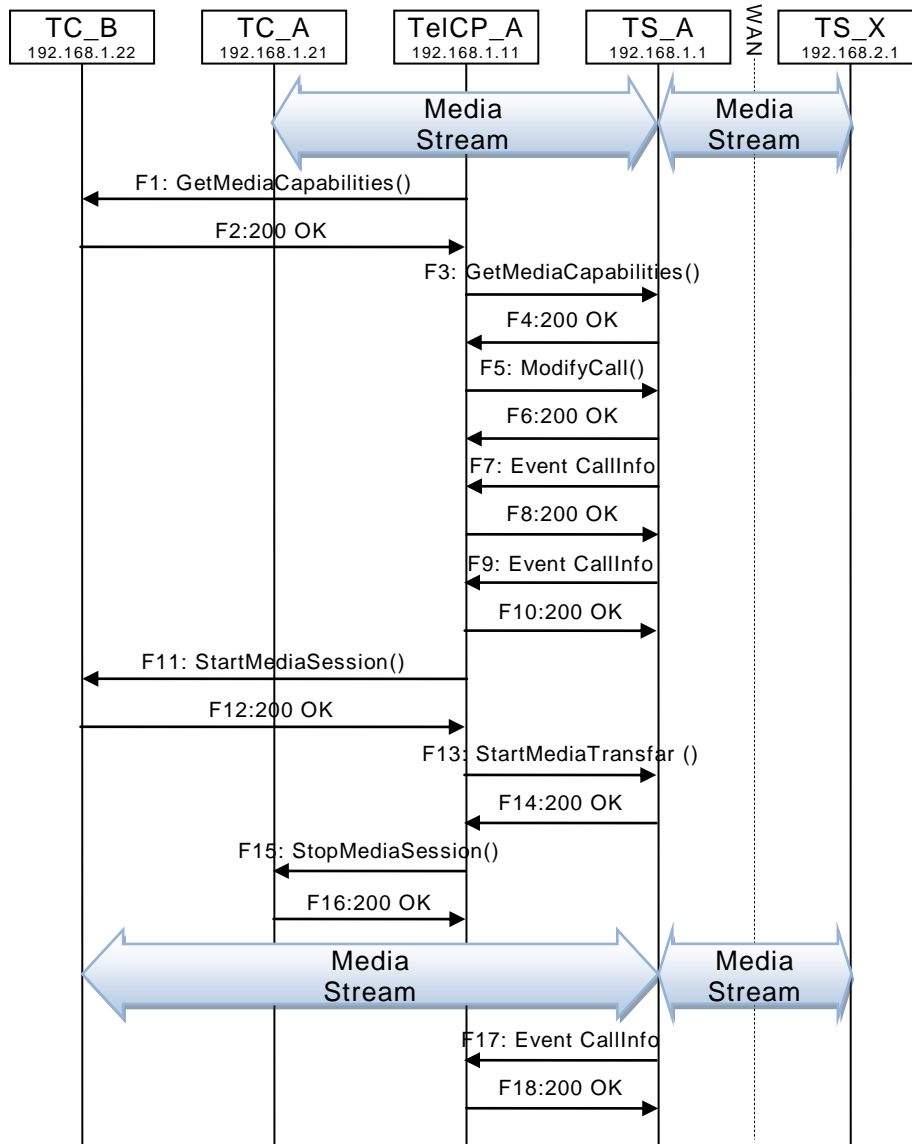


Figure C.19 — Change TC during a Call

C.16.2 F1

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1
 SOAPACTION: "urn:schemas-upnp-org:service:MediaManagement:2#GetMediaCapabilities"
 CONTENT-TYPE: text/xml ; charset="utf-8"
 HOST: 192.168.1.22:10022
 Content-Length: [bytes in body]

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetMediaCapabilities xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2" >
      <TSMediaCapabilityInfo></TSMediaCapabilityInfo>
    
```

```

    </u:GetMediaCapabilities>
  </s:Body>
</s:Envelope>

```

C.16.3 F2

HTTP/1.1 200 OK

EXT:

CONTENT-TYPE: text/xml ; charset="utf-8"

SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0

Content-Length: [bytes in body]

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetMediaCapabilitiesResponse xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2">
      <SupportedMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.22
s=-
c=IN IP4 192.168.1.22
t=0 0
m=audio 11022 RTP/AVP 0
c=IN IP4 192.168.1.22
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 12022 RTP/AVP 96
c=IN IP4 192.168.1.22
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmt:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/mms:mediaCapabilityInfo&gt;
    </SupportedMediaCapabilityInfo>
  </u:GetMediaCapabilitiesResponse>
</s:Body>
</s:Envelope>

```

C.16.4 F3

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1

SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#GetMediaCapabilities"

CONTENT-TYPE: text/xml ; charset="utf-8"

HOST: 192.168.1.1:10001

Content-Length: [bytes in body]

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetMediaCapabilities xmlns:u="urn:schemas-upnp-org:service: CallManagement:2">
      <TCMediaCapabilityInfo></TCMediaCapabilityInfo>
    </u:GetMediaCapabilities>
  </s:Body>
</s:Envelope>

```

C.16.5 F4

HTTP/1.1 200 OK

EXT:

CONTENT-TYPE: text/xml ; charset="utf-8"
 SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0
 Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetMediaCapabilitiesResponse xmlns:u="urn:schemas-upnp-
org:service:CallManagement:2">
<SupportedMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:mediaCapabilityInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
    &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
aptime:20
m=video 12001 RTP/AVP 96
c=IN IP4 192.168.1.1
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/cams:mediaCapabilityInfo&gt;</SupportedMediaCapabilityInfo>
    </u:GetMediaCapabilitiesResponse>
  </s:Body>
</s:Envelope>
```

C.16.6 F5

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1
 SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#ModifyCall"
 CONTENT-TYPE: text/xml ; charset="utf-8"
 HOST: 192.168.1.1:10001
 Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:ModifyCall xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
      <TelCPName>TV@Living</TelCPName>
      <SecretKey>secret101</SecretKey>
      <TargetCallID>call101</TargetCallID>
    <MediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:mediaCapabilityInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
    &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.11
s=-
c=IN IP4 192.168.1.11
t=0 0
m=audio 11022 RTP/AVP 0
c=IN IP4 192.168.1.22
a=rtpmap:0 PCMU/8000
aptime:20
&lt;/mediaCapability&gt;
```

```
</cams:mediaCapabilityInfo></MediaCapabilityInfo>
</u:ModifyCall>
</s:Body>
</s:Envelope>
```

C.16.7 F6

HTTP/1.1 200 OK

Content-Length: [bytes in body]

CONTENT-TYPE: text/xml; charset="utf-8"

SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0

EXT:

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
  <s:Body>
    <m:ModifyCallResponse xmlns:m="urn:schemas-upnp-org:service:CallManagement:2" />
  </s:Body>
</s:Envelope>
```

C.16.8 F7

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1

HOST: 192.168.1.11:10011

CONTENT-TYPE: text/xml

Content-Length: [bytes in body]

NT: upnp:event

NTS: upnp:propchange

SID: uuid:c3580410-1dd1-11b2-8000-10001

SEQ: [sequence number]

Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
  &lt;callID&gt;call101&lt;/callID&gt;
  &lt;targetNames type="TelCPName"&gt;*&lt;/targetNames&gt;
  &lt;callStatus&gt;SendingModifyRequest&lt;/callStatus&gt;
  &lt;priority&gt;Normal&lt;/priority&gt;
  &lt;remoteParty&gt;
    &lt;peer:id&gt;0774940201&lt;/peer:id&gt;
  &lt;/remoteParty&gt;
  &lt;TCList&gt;
    &lt;TC&gt;
      &lt;UDN&gt;uuid:97ef6efa-ac89-4ea2-0001-udn101&lt;/UDN&gt;
      &lt;mediaSessionID&gt;media101&lt;/mediaSessionID&gt;
    &lt;/TC&gt;
  &lt;/TCList&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability&gt;
&lt;/cams:callInfo&gt;</CallInfo>
</e:property>
</e:propertyset>
```


C.16.9 F8

HTTP/1.1 200 OK
Content-Length: 0

C.16.10 F9

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
HOST: 192.168.1.11:10011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-10001
SEQ: [sequence number]
Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
  &lt;callID&gt;call101&lt;/callID&gt;
  &lt;targetNames type="TelCPName"&gt;*&lt;/targetNames&gt;
  &lt;callStatus&gt;Modified&lt;/callStatus&gt;
  &lt;priority&gt;Normal&lt;/priority&gt;
  &lt;remoteParty&gt;
    &lt;peer:id&gt;0774940201&lt;/peer:id&gt;
  &lt;/remoteParty&gt;
  &lt;TCList&gt;
    &lt;TC&gt;
      &lt;UDN&gt;uuid:97ef6efa-ac89-4ea2-0001-udn101&lt;/UDN&gt;
      &lt;mediaSessionID&gt;media101&lt;/mediaSessionID&gt;
    &lt;/TC&gt;
  &lt;/TCList&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability&gt;
&lt;/cams:callInfo&gt;</CallInfo>
</e:property>
</e:propertyset>
```

C.16.11 F10

HTTP/1.1 200 OK
Content-Length: 0

C.16.12 F11

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1
SOAPACTION: "urn:schemas-upnp-org:service:MediaManagement:2#StartMediaSession"
CONTENT-TYPE: text/xml ; charset="utf-8"
HOST: 192.168.1.22:10022
Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
```

```

<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StartMediaSession xmlns:u="urn:schemas-upnp-org:service:MediaManagement:2">
      <TSMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.11
s=-
c=IN IP4 192.168.1.11
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability&gt;
&lt;/mms:mediaCapabilityInfo&gt;
</TSMediaCapabilityInfo>
    </u:StartMediaSession>
  </s:Body>
</s:Envelope>

```

C.16.13 F12

HTTP/1.1 200 OK

EXT:

CONTENT-TYPE: text/xml ; charset="utf-8"

SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0

Content-Length: [bytes in body]

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StartMediaSessionResponse xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2">
      <MediaSessionID>media102</MediaSessionID>
      <TCMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.22
s=-
c=IN IP4 192.168.1.22
t=0 0
m=audio 11022 RTP/AVP 0
c=IN IP4 192.168.1.22
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability&gt;
&lt;/mms:mediaCapabilityInfo&gt;
</TCMediaCapabilityInfo>
    </u:StartMediaSessionResponse>
  </s:Body>
</s:Envelope>

```

C.16.14 F13

NOTIFY /_urn:upnp-org:serviceId:MediaManagement HTTP/1.1

HOST: 192.168.1.11:10011

CONTENT-TYPE: text/xml

Content-Length: [bytes in body]

NT: upnp:event

NTS: upnp:propchange
 SID: uuid:c3580410-1dd1-11b2-8000-10022
 SEQ: [sequence number]
 Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<MediaSessionInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaSessionInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
  http://www.upnp.org/schemas/phone/mms-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:mms="urn:schemas-upnp-org:phone:mms"&gt;
  &lt;mediaSessionID&gt;media102&lt;/mediaSessionID&gt;
  &lt;mediaSessionStatus&gt;Started&lt;/mediaSessionStatus&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o-- 0 0 IN IP4 192.168.1.22
s=-
c=IN IP4 192.168.1.22
t=0 0
m=audio 11022 RTP/AVP 0
c=IN IP4 192.168.1.22
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability&gt;
&lt;/mms:mediaSessionInfo&gt;</MediaSessionInfo>
</e:property>
</e:propertyset>
```

C.16.15 F14

HTTP/1.1 200 OK
 Content-Length: 0

C.16.16 F15

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1
 SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#StartMediaTransfer"
 CONTENT-TYPE: text/xml ; charset="utf-8"
 HOST: 192.168.1.1:10001
 Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
<s:Body>
<u:StartMediaTransfer xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
<TelCPName>TV@Living</TelCPName>
<SecretKey>secret101</SecretKey>
<TargetCallID>call101</TargetCallID>
<TCList>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:TCList
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
  &lt;TC&gt;
    &lt;UDN&gt;uuid:97ef6efa-ac89-4ea2-0001-udn102&lt;/UDN&gt;
    &lt;mediaSessionID&gt;media102&lt;/mediaSessionID&gt;
  &lt;/TC&gt;
  &lt;/cams:TCList&gt;</TCList>
<MediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:mediaCapabilityInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
```

```

o=- 0 0 IN IP4 192.168.1.11
s=-
c=IN IP4 192.168.1.11
t=0 0
m=audio 11022 RTP/AVP 0
c=IN IP4 192.168.1.22
a=rtpmap:0 PCMU/8000
a=ptime:20
<!-- /mediaCapability -->
<!-- /cams:mediaCapabilityInfo --> </MediaCapabilityInfo>
  </u:StartMediaTransfer>
</s:Body>
</s:Envelope>

```

C.16.17 F16

```

HTTP/1.1 200 OK
Content-Length: [bytes in body]
CONTENT-TYPE: text/xml; charset="utf-8"
SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0
EXT:

```

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
  <s:Body>
    <m:StartMediaTransferResponse xmlns:m="urn:schemas-upnp-
org:service:CallManagement:2" />
  </s:Body>
</s:Envelope>

```

C.16.18 F17

```

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
HOST: 192.168.1.11:10011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-10001
SEQ: [sequence number]
Connection: Keep-Alive

```

```

<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
  &lt;callID&gt;call1101&lt;/callID&gt;
  &lt;targetNames type="TelCPName"&gt;*&lt;/targetNames&gt;
  &lt;callStatus&gt;Talking&lt;/callStatus&gt;
  &lt;priority&gt;Normal&lt;/priority&gt;
  &lt;remoteParty&gt;
    &lt;peer:id&gt;0774940201&lt;/peer:id&gt;
  &lt;/remoteParty&gt;
  &lt;TCList&gt;
    &lt;TC&gt;
    &lt;UDN&gt;97ef6efa-ac89-4ea2-0001-udn102&lt;/UDN&gt;
    &lt;mediaSessionID&gt;media102&lt;/mediaSessionID&gt;
    &lt;/TC&gt;
  &lt;/TCList&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.1
s=-

```

```
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
<!--mediaCapability-->
<!--cans:callInfo--></CallInfo>
</e:property>
</e:propertyset>
```

C.16.19 F18

HTTP/1.1 200 OK
Content-Length: 0

C.16.20 F19

NOTIFY /_urn:upnp-org:serviceId:MediaManagement HTTP/1.1
HOST: 192.168.1.11:10011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-10021
SEQ: [sequence number]
Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<MediaSessionInfo-->?xml version="1.0" encoding="utf-8"?&
<!--mms:mediaSessionInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
  http://www.upnp.org/schemas/phone/mms-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:mms="urn:schemas-upnp-org:phone:mms"&
  <!--mediaSessionID-->media101<!--/mediaSessionID-->
  <!--mediaSessionStatus-->Stopped<!--/mediaSessionStatus-->
  <!--mediaCapability format="SDP"&v=0
o=- 0 0 IN IP4 192.168.1.21
s=-
c=IN IP4 192.168.1.21
t=0 0
m=audio 11021 RTP/AVP 0
c=IN IP4 192.168.1.21
a=rtpmap:0 PCMU/8000
a=ptime:20
<!--mediaCapability-->
<!--mms:mediaSessionInfo--></MediaSessionInfo>
</e:property>
</e:propertyset>
```

C.16.21 F20

HTTP/1.1 200 OK
Content-Length: 0

C.17 Modify Media Session during a Call

C.17.1 Figure

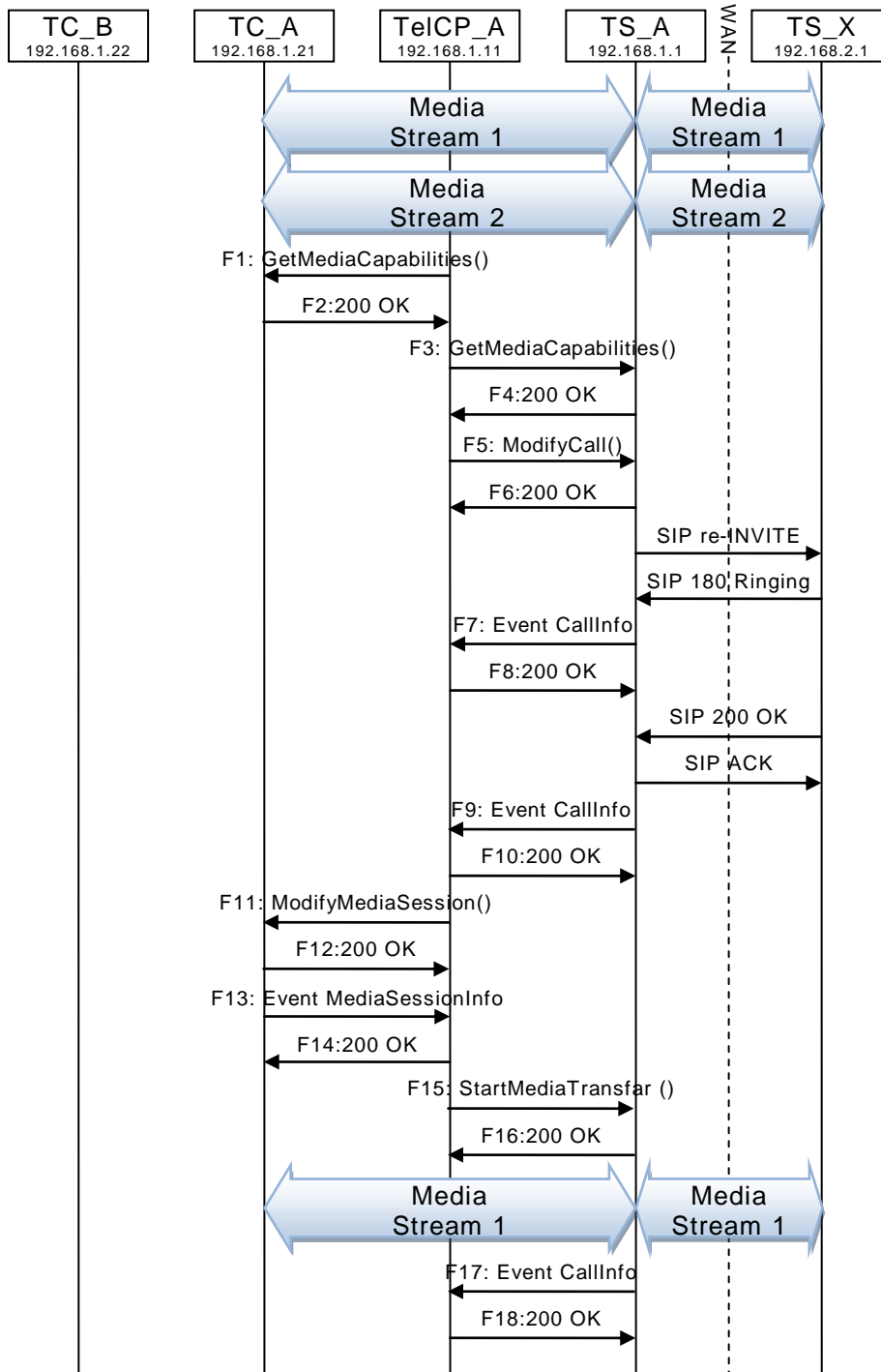


Figure C.20 — Modify Media Session during a Call

C.17.2 F1

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1
 SOAPACTION: "urn:schemas-upnp-org:service:MediaManagement:2#GetMediaCapabilities"
 CONTENT-TYPE: text/xml ; charset="utf-8"

HOST: 192.168.1.22:10022
Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetMediaCapabilities xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2" >
      <TSMediaCapabilityInfo></TSMediaCapabilityInfo>
    </u:GetMediaCapabilities>
  </s:Body>
</s:Envelope>
```

C.17.3 F2

HTTP/1.1 200 OK
EXT:
CONTENT-TYPE: text/xml ; charset="utf-8"
SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0
Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetMediaCapabilitiesResponse xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2">
<SupportedMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.22
s=-
c=IN IP4 192.168.1.22
t=0 0
m=audio 11022 RTP/AVP 0
c=IN IP4 192.168.1.22
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 12022 RTP/AVP 96
c=IN IP4 192.168.1.22
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/mms:mediaCapabilityInfo&gt;
</SupportedMediaCapabilityInfo>
    </u:GetMediaCapabilitiesResponse>
  </s:Body>
</s:Envelope>
```

C.17.4 F3

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1
SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#GetMediaCapabilities"
CONTENT-TYPE: text/xml ; charset="utf-8"
HOST: 192.168.1.1:10001
Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetMediaCapabilities xmlns:u="urn:schemas-upnp-org:service: CallManagement:2">
```

```

    <TCMediaCapabilityInfo></TCMediaCapabilityInfo>
  </u:GetMediaCapabilities>
</s:Body>
</s:Envelope>

```

C.17.5 F4

HTTP/1.1 200 OK

EXT:

CONTENT-TYPE: text/xml ; charset="utf-8"

SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0

Content-Length: [bytes in body]

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetMediaCapabilitiesResponse xmlns:u="urn:schemas-upnp-
org:service:CallManagement:2">
<SupportedMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:mediaCapabilityInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
    &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 12001 RTP/AVP 96
c=IN IP4 192.168.1.1
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/cams:mediaCapabilityInfo&gt;</SupportedMediaCapabilityInfo>
    </u:GetMediaCapabilitiesResponse>
  </s:Body>
</s:Envelope>

```

C.17.6 F5

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1

SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#ModifyCall"

CONTENT-TYPE: text/xml ; charset="utf-8"

HOST: 192.168.1.1:10001

Content-Length: [bytes in body]

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:ModifyCall xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
      <TelCPName>TV@Living</TelCPName>
      <SecretKey>secret101</SecretKey>
      <TargetCallID>call101</TargetCallID>
    <MediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:mediaCapabilityInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
    &lt;mediaCapability format="SDP"&gt;v=0

```



```
o=- 0 0 IN IP4 192.168.1.11
s=-
c=IN IP4 192.168.1.11
t=0 0
m=audio 11022 RTP/AVP 0
c=IN IP4 192.168.1.22
a=rtpmap:0 PCMU/8000
a=ptime:20
<u:ModifyCall>
  <u:ModifyCallResponse xmlns:m="urn:schemas-upnp-org:service:CallManagement:2" />
</u:ModifyCall>
</s:Body>
</s:Envelope>
```

C.17.7 F6

HTTP/1.1 200 OK
Content-Length: [bytes in body]
CONTENT-TYPE: text/xml; charset="utf-8"
SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0
EXT:

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
  <s:Body>
    <m:ModifyCallResponse xmlns:m="urn:schemas-upnp-org:service:CallManagement:2" />
  </s:Body>
</s:Envelope>
```

C.17.8 F7

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
HOST: 192.168.1.11:10011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-10001
SEQ: [sequence number]
Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo><?xml version="1.0" encoding="utf-8"?>
<u:ModifyCallResponse xmlns:m="urn:schemas-upnp-org:service:CallManagement:2" />
</u:ModifyCallResponse>
</e:property>
</e:propertyset>
```

```
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtptime:0 PCMU/8000
a=ptime:20
</mediaCapability>
</cams:callInfo>
</e:property>
</e:propertyset>
```

C.17.9 F8

```
HTTP/1.1 200 OK
Content-Length: 0
```

C.17.10 F9

```
NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
HOST: 192.168.1.11:10011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-10001
SEQ: [sequence number]
Connection: Keep-Alive
```

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo><?xml version="1.0" encoding="utf-8"?>
<callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer">
  <callID>call101</callID>
  <targetNames type="TelCPName" *</targetNames>
  <callStatus>Modified</callStatus>
  <priority>Normal</priority>
  <remoteParty>
    <peer:id>0774940201</peer:id>
  </remoteParty>
  <TCList>
    <TC>
      <UDN>97ef6efa-ac89-4ea2-0001-udn101</UDN>
      <mediaSessionID>media101</mediaSessionID>
    </TC>
  </TCList>
  <mediaCapability format="SDP">v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtptime:0 PCMU/8000
a=ptime:20
</mediaCapability>
</cams:callInfo>
</e:property>
</e:propertyset>
```

C.17.11 F10

```
HTTP/1.1 200 OK
Content-Length: 0
```

C.17.12 F11

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1
 SOAPACTION: "urn:schemas-upnp-org:service:MediaManagement:2#StartMediaSession"
 CONTENT-TYPE: text/xml ; charset="utf-8"
 HOST: 192.168.1.22:10022
 Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StartMediaSession xmlns:u="urn:schemas-upnp-org:service:MediaManagement:2">
      <TSMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.11
s=-
c=IN IP4 192.168.1.11
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability&gt;
&lt;/mms:mediaCapabilityInfo&gt;
</TSMediaCapabilityInfo>
    </u:StartMediaSession>
  </s:Body>
</s:Envelope>
```

C.17.13 F12

HTTP/1.1 200 OK
 EXT:
 CONTENT-TYPE: text/xml ; charset="utf-8"
 SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0
 Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
<s:Body>
<u:StartMediaSessionResponse xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2">
<MediaSessionID>media102</MediaSessionID>
<TCMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.22
s=-
c=IN IP4 192.168.1.22
t=0 0
m=audio 11022 RTP/AVP 0
c=IN IP4 192.168.1.22
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability &gt;
&lt;/mms:mediaCapabilityInfo&gt;
</TCMediaCapabilityInfo>
</u:StartMediaSessionResponse>
</s:Body>
```

```
</s:Envelope>
```

C.17.14 F13

NOTIFY /_urn:upnp-org:serviceId:MediaManagement HTTP/1.1

HOST: 192.168.1.11:10011

CONTENT-TYPE: text/xml

Content-Length: [bytes in body]

NT: upnp:event

NTS: upnp:propchange

SID: uuid:c3580410-1dd1-11b2-8000-10022

SEQ: [sequence number]

Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<MediaSessionInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaSessionInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
  http://www.upnp.org/schemas/phone/mms-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:mms="urn:schemas-upnp-org:phone:mms"&gt;
  &lt;mediaSessionID&gt;media102&lt;/mediaSessionID&gt;
  &lt;mediaSessionStatus&gt;Started&lt;/mediaSessionStatus&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.22
s=-
c=IN IP4 192.168.1.22
t=0 0
m=video 12022 RTP/AVP 96
c=IN IP4 192.168.1.22
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/mms:mediaSessionInfo&gt;</MediaSessionInfo>
</e:property>
</e:propertyset>
```

C.17.15 F14

HTTP/1.1 200 OK

Content-Length: 0

C.17.16 F15

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1

SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#StartMediaTransfer"

CONTENT-TYPE: text/xml ; charset="utf-8"

HOST: 192.168.1.1:10001

Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
<s:Body>
<u:StartMediaTransfer xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
<TelCPName>TV@Living</TelCPName>
<SecretKey>secret101</SecretKey>
<TargetCallID>call101</TargetCallID>
<TCList>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:TCList
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
```

```

xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
&lt;TC&gt;
  &lt;UDN&gt;uuid:97ef6efa-ac89-4ea2-0001-udn102&lt;/UDN&gt;
  &lt;mediaSessionID&gt;media102&lt;/mediaSessionID&gt;
&lt;/TC&gt;
&lt;/cams:TCList&gt;</TCList>
<MediaCapabilityInfo&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:mediaCapabilityInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.11
s=-
c=IN IP4 192.168.1.11
t=0 0
m=audio 11022 RTP/AVP 0
c=IN IP4 192.168.1.22
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability&gt;
&lt;/cams:mediaCapabilityInfo&gt;</MediaCapabilityInfo>
  </u:StartMediaTransfer>
  </s:Body>
</s:Envelope>

```

C.17.17 F16

```

HTTP/1.1 200 OK
Content-Length: [bytes in body]
CONTENT-TYPE: text/xml; charset="utf-8"
SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0
EXT:

```

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
  <s:Body>
    <m:StartMediaTransferResponse xmlns:m="urn:schemas-upnp-
org:service:CallManagement:2" />
  </s:Body>
</s:Envelope>

```

C.17.18 F17

```

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
HOST: 192.168.1.11:10011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-10001
SEQ: [sequence number]
Connection: Keep-Alive

```

```

<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
  &lt;callID&gt;call101&lt;/callID&gt;
  &lt;targetNames type="TelCPName"&gt;*&lt;/targetNames&gt;
  &lt;callStatus&gt;Talking&lt;/callStatus&gt;

```

```

<lt;priority>Normal</priority>
<lt;remoteParty>
  <lt;peer:id>0774940201</peer:id>
</remoteParty>
<lt;TCList>
  <lt;TC>
    <lt;UDN>uid:97ef6efa-ac89-4ea2-0001-udn102</UDN>
    <lt;mediaSessionID>media102</mediaSessionID>
  </TC>
</TCList>
<lt;mediaCapability format="SDP">v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
</mediaCapability>
<lt;/cans:callInfo></CallInfo>
</e:property>
</e:propertyset>

```

C.17.19 F18

HTTP/1.1 200 OK
Content-Length: 0

C.18 Initiate a Call

C.18.1 Figure

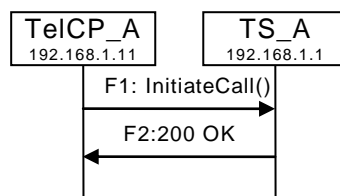


Figure C.21 — Initiate a Call

C.18.2 F1

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1
SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#InitiateCall"
CONTENT-TYPE: text/xml ; charset="utf-8"
HOST: 192.168.1.1:10001
Content-Length: [bytes in body]

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
<s:Body>
<u:InitiateCall xmlns:u="urn:schemas-upnp-org:service: CallManagement:2">
  <CalleeID> tel:0774940201</CalleeID>
</u:InitiateCall>
</s:Body>
</s:Envelope>

```

C.18.3 F2

HTTP/1.1 200 OK

EXT:

CONTENT-TYPE: text/xml ; charset="utf-8"

SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0

Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:InitiateCallResponse xmlns:u="urn:schemas-upnp-org:service:CallManagement:2"
/>
    <CallID>call1101</CallID>
  </u:InitiateCallResponse>
</s:Body>
</s:Envelope>
```

C.19 Create an outgoing Call (Monopolization Mode Call(PHONE-TelCP))

C.19.1 Figure

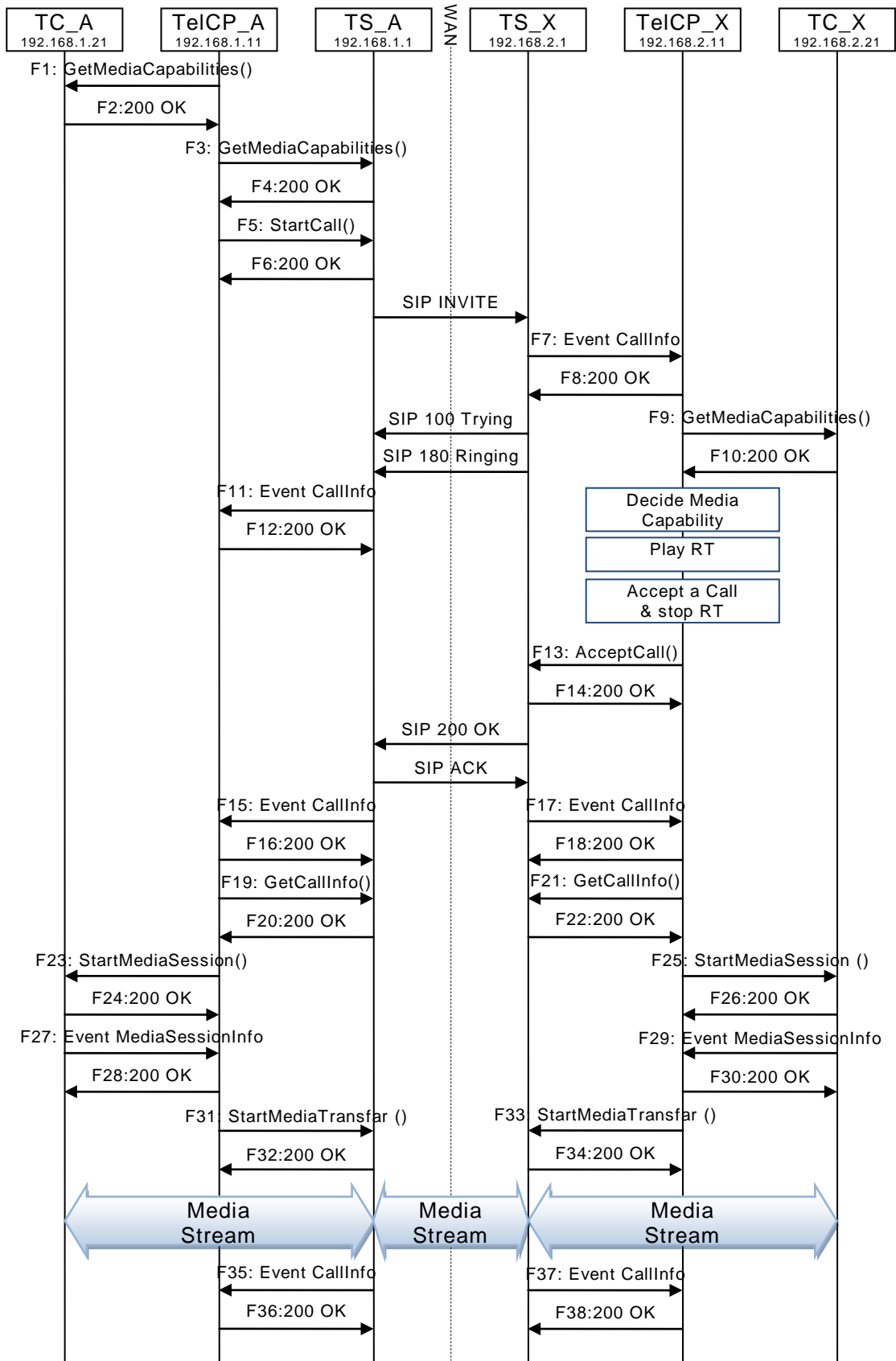


Figure C.22 — Create an outgoing Call (Monopolization Mode Call(PHONE-TelCP))

C.19.2 F1

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1
 SOAPACTION: "urn:schemas-upnp-org:service:MediaManagement:2#GetMediaCapabilities"
 CONTENT-TYPE: text/xml ; charset="utf-8"
 HOST: 192.168.1.21:10021
 Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetMediaCapabilities xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2" >
      <TSMediaCapabilityInfo></TSMediaCapabilityInfo>
    </u:GetMediaCapabilities>
  </s:Body>
</s:Envelope>
```

C.19.3 F2

HTTP/1.1 200 OK
 EXT:
 CONTENT-TYPE: text/xml ; charset="utf-8"
 SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0
 Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetMediaCapabilitiesResponse xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2">
<SupportedMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.21
s=-
c=IN IP4 192.168.1.21
t=0 0
m=audio 11021 RTP/AVP 0
c=IN IP4 192.168.1.21
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 12021 RTP/AVP 96
c=IN IP4 192.168.1.21
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/mms:mediaCapabilityInfo&gt;
</SupportedMediaCapabilityInfo>
  </u:GetMediaCapabilitiesResponse>
</s:Body>
</s:Envelope>
```

C.19.4 F3

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1
 SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#GetMediaCapabilities"
 CONTENT-TYPE: text/xml ; charset="utf-8"
 HOST: 192.168.1.1:10001
 Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetMediaCapabilities xmlns:u="urn:schemas-upnp-org:service: CallManagement:2">
      <TCMediaCapabilityInfo></TCMediaCapabilityInfo>
    </u:GetMediaCapabilities>
  </s:Body>
</s:Envelope>
```

C.19.5 F4

HTTP/1.1 200 OK

EXT:

CONTENT-TYPE: text/xml ; charset="utf-8"

SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0

Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetMediaCapabilitiesResponse xmlns:u="urn:schemas-upnp-
org:service:CallManagement:2">
      <SupportedMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:mediaCapabilityInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
    &lt;mediaCapability format="SDP"&gt;v=0
o-- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 12001 RTP/AVP 96
c=IN IP4 192.168.1.1
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/cams:mediaCapabilityInfo&gt;</SupportedMediaCapabilityInfo>
    </u:GetMediaCapabilitiesResponse>
  </s:Body>
</s:Envelope>
```

C.19.6 F5

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1

SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#StartCall"

CONTENT-TYPE: text/xml ; charset="utf-8"

HOST: 192.168.1.1:10001

Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StartCall xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
      <TelCPName>TV@Living</TelCPName>
      <SecretKey>secret101</SecretKey>
      <CalleeID> tel:0774940201</CalleeID>
      <CallPriority>Normal</CallPriority>
      <MediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
```

```

<lt;cams:mediaCapabilityInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams">
  <lt;mediaCapability format="SDP">v=0
o=- 0 0 IN IP4 192.168.1.11
s=-
c=IN IP4 192.168.1.11
t=0 0
m=audio 11021 RTP/AVP 0
c=IN IP4 192.168.1.21
a=rtpmap:0 PCMU/8000
a=ptime:20
<lt;/mediaCapability>
<lt;/cams:mediaCapabilityInfo></MediaCapabilityInfo>
  <CallMode>PHONE-TeLCP</CallMode>
</u:StartCall>
</s:Body>
</s:Envelope>

```

C.19.7 F6

```

HTTP/1.1 200 OK
Content-Length: [bytes in body]
CONTENT-TYPE: text/xml; charset="utf-8"
SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0
EXT:

```

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
  <s:Body>
    <m:StartCallResponse xmlns:m="urn:schemas-upnp-org:service:CallManagement:2">
      <CallID>call1101</CallID>
    </m:StartCallResponse>
  </s:Body>
</s:Envelope>

```

C.19.8 F7

```

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
HOST: 192.168.2.11:20011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-20001
SEQ: [sequence number]
Connection: Keep-Alive

```

```

<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo><lt;?xml version="1.0" encoding="utf-8"?>
<lt;cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer">
  <lt;callID>call1201</callID>
  <lt;targetNames type="TelCPName">*</targetNames>
  <lt;callStatus>Ringing</callStatus>
  <lt;priority>Normal</priority>
  <lt;remoteParty>
    <lt;peer:id>0355550101</peer:id>
  <lt;/remoteParty>
  <lt;mediaCapability format="SDP">v=0

```

```
o=- 0 0 IN IP4 192.168.2.1
s=-
c=IN IP4 192.168.2.1
t=0 0
m=audio 21001 RTP/AVP 0
c=IN IP4 192.168.2.1
a=rtpmap:0 PCMU/8000
a=ptime:20
<!--/mediaCapability-->
<!--/cams:callInfo--></CallInfo>
</e:property>
</e:propertyset>
```

C.19.9 F8

HTTP/1.1 200 OK

Content-Length: 0

C.19.10 F9

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1
SOAPACTION: "urn:schemas-upnp-org:service:MediaManagement:2#GetMediaCapabilities"
CONTENT-TYPE: text/xml ; charset="utf-8"
HOST: 192.168.2.21:20021
Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetMediaCapabilities xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2" >
      <TSMediaCapabilityInfo--></TSMediaCapabilityInfo>
    </u:GetMediaCapabilities>
  </s:Body>
</s:Envelope>
```

C.19.11 F10

HTTP/1.1 200 OK

EXT:

CONTENT-TYPE: text/xml ; charset="utf-8"

SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0

Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    xmlns:u="urn:schemas-upnp-org:service:MediaManagement:2">
    <SupportedMediaCapabilityInfo--><!--?xml version="1.0" encoding="utf-8"?-->
    <!--mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms"-->
    <!--mediaCapability format="SDP"-->v=0
o=- 0 0 IN IP4 192.168.2.21
s=-
c=IN IP4 192.168.2.21
t=0 0
m=audio 21021 RTP/AVP 0
c=IN IP4 192.168.2.21
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 22021 RTP/AVP 96
c=IN IP4 192.168.2.21
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
```

```

a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
<lt;/mediaCapability>
<lt;/mms:mediaCapabilityInfo></SupportedMediaCapabilityInfo>
  </u:GetMediaCapabilitiesResponse>
</s:Body>
</s:Envelope>

```

C.19.12 F11

```

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
HOST: 192.168.1.11:10011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-10001
SEQ: [sequence number]
Connection: Keep-Alive

```

```

<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo><lt;?xml version="1.0" encoding="utf-8"?>&
<lt;cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer"&
  &lt;callID&gt;call101&lt;/callID&gt;
  &lt;targetNames type="TelCPName"&gt;TV@Living&lt;/targetNames&gt;
  &lt;callStatus&gt;Calling&lt;/callStatus&gt;
&lt;/cams:callInfo&gt;</CallInfo>
</e:property>
</e:propertyset>

```

C.19.13 F12

```

HTTP/1.1 200 OK
Content-Length: 0

```

C.19.14 F13

```

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1
SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#AcceptCall"
CONTENT-TYPE: text/xml ; charset="utf-8"
HOST: 192.168.2.1:20001
Content-Length: [bytes in body]

```

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:AcceptCall xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
      <TelCPName>phone@Bedroom</TelCPName>
      <SecretKey>secret201</SecretKey>
      <TargetCallID>call201</TargetCallID>
      <MediaCapabilityInfo><lt;?xml version="1.0" encoding="utf-8"?>&
&lt;cams:mediaCapabilityInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"&
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.11
s=-

```

```

c=IN IP4 192.168.2.11
t=0 0
m=audio 21021 RTP/AVP 0
c=IN IP4 192.168.2.21
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability&gt;
&lt;/cams:mediaCapabilityInfo&gt;</MediaCapabilityInfo>
  <CallMode>PHONE-Te1CP</CallMode>
  </u:AcceptCall>
</s:Body>
</s:Envelope>

```

C.19.15 F14

HTTP/1.1 200 OK
Content-Length: [bytes in body]
CONTENT-TYPE: text/xml; charset="utf-8"
SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0
EXT:

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
<s:Body>
<m:AcceptCallResponse xmlns:m="urn:schemas-upnp-org:service:CallManagement:2" />
</s:Body>
</s:Envelope>

```

C.19.16 F15

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
HOST: 192.168.1.11:10011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-10001
SEQ: [sequence number]
Connection: Keep-Alive

```

<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;/cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
  &lt;/callID&gt;<callID101&lt;/callID&gt;
  &lt;/targetNames type="TelCPName"&gt;<TV@Living&lt;/targetNames&gt;
  &lt;/callStatus&gt;<Connected&lt;/callStatus&gt;
&lt;/cams:callInfo&gt;</CallInfo>
</e:property>
</e:propertyset>

```

C.19.17 F16

HTTP/1.1 200 OK
Content-Length: 0

C.19.18 F17

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
HOST: 192.168.2.11:20011
CONTENT-TYPE: text/xml

Content-Length: [bytes in body]
 NT: upnp:event
 NTS: upnp:propchange
 SID: uuid:c3580410-1dd1-11b2-8000-20001
 SEQ: [sequence number]
 Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
  &lt;callID&gt;call1201&lt;/callID&gt;
  &lt;targetNames type="TelCPName"&gt;phone@Bedroom&lt;/targetNames&gt;
  &lt;callStatus&gt;Connected&lt;/callStatus&gt;
&lt;/cams:callInfo&gt;</CallInfo>
</e:property>
</e:propertyset>
```

C.19.19 F18

HTTP/1.1 200 OK
 Content-Length: 0

C.19.20 F19

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1
 SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#GetCallInfo"
 CONTENT-TYPE: text/xml ; charset="utf-8"
 HOST: 192.168.1.1:10001
 Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetCallInfo xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
      <TelCPName>TV@Living</TelCPName>
      <SecretKey>secret101</SecretKey>
      <TargetCallID>call101</TargetCallID>
    </u:GetCallInfo>
  </s:Body>
</s:Envelope>
```

C.19.21 F20

HTTP/1.1 200 OK
 Content-Length: [bytes in body]
 CONTENT-TYPE: text/xml; charset="utf-8"
 SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0
 EXT:

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetCallInfoResponse xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
      <callInfoList&gt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:callInfoList
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
```



```

xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
  &lt;callInfo&gt;
    &lt;callID&gt;call101&lt;/callID&gt;
    &lt;TelCPNames&gt;TV@Living&lt;/TelCPNames&gt;
    &lt;callStatus&gt;Connected &lt;/callStatus&gt;
    &lt;priority&gt;"Normal"&lt;/priority&gt;
    &lt;peer&gt;
      &lt;peer:id&gt;0774940201&lt;/peer:id&gt;
    &lt;/peer&gt;
    &lt;TCList&gt;
      &lt;TC&gt;
        &lt;UDN&gt;uid:97ef6efa-ac89-4ea2-0001-udn101&lt;/UDN&gt;
      &lt;/TC&gt;
    &lt;/TCList&gt;
    &lt;mediaSessionID&gt;media101&lt;/mediaSessionID&gt;
    &lt;/TC&gt;
    &lt;/TCList&gt;
    &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
    &lt;/mediaCapability&gt;
  &lt;/callInfo&gt;
&lt;/cams:callInfoList&gt;</callInfoList>
</m:GetCallInfoResponse>
</s:Body>
</s:Envelope>

```

C.19.22 F21

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1
 SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#GetCallInfo"
 CONTENT-TYPE: text/xml ; charset="utf-8"
 HOST: 192.168.1.1:10001
 Content-Length: [bytes in body]

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetCallInfo xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
      <TelCPName>phone@Bedroom</TelCPName>
      <SecretKey>secret201</SecretKey>
      <TargetCallID>call201</TargetCallID>
    </u:GetCallInfo>
  </s:Body>
</s:Envelope>

```

C.19.23 F22

HTTP/1.1 200 OK
 Content-Length: [bytes in body]
 CONTENT-TYPE: text/xml; charset="utf-8"
 SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0
 EXT:

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetCallInfoResponse xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
      <callInfoList>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:callInfoList
xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"

```

```

xmlns:cams="urn:schemas-upnp-org:phone:cams"
xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
  &lt;callInfo&gt;
    &lt;callID&gt;call201&lt;/callID&gt;
    &lt;TelCPNames&gt;phone@Bedroom&lt;/TelCPNames&gt;
    &lt;callStatus&gt;Connected &lt;/callStatus&gt;
    &lt;priority&gt;"Normal"&lt;/priority&gt;
    &lt;peer&gt;
      &lt;peer:id&gt;0355550101&lt;/peer:id&gt;
    &lt;/peer&gt;
    &lt;TCList&gt;
      &lt;TC&gt;
        &lt;UDN&gt;uuid:97ef6efa-ac89-4ea2-0001-udn201&lt;/UDN&gt;
      &lt;/TC&gt;
    &lt;/TCList&gt;
    &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.1
s=-
c=IN IP4 192.168.2.1
t=0 0
m=audio 21001 RTP/AVP 0
c=IN IP4 192.168.2.1
a=rtpmap:0 PCMU/8000
a=ptime:20
  &lt;/mediaCapability&gt;
  &lt;/callInfo&gt;
&lt;/cams:callInfoList&gt;</callInfoList>
</m:GetCallInfoResponse>
</s:Body>
</s:Envelope>

```

C.19.24 F23

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1
 SOAPACTION: "urn:schemas-upnp-org:service:MediaManagement:2#StartMediaSession"
 CONTENT-TYPE: text/xml ; charset="utf-8"
 HOST: 192.168.1.21:10021
 Content-Length: [bytes in body]

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StartMediaSession xmlns:u="urn:schemas-upnp-org:service:MediaManagement:2">
      <TSMediaCapabilityInfo&gt;?xml version="1.0" encoding="utf-8"?&gt;
      &lt;mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.11
s=-
c=IN IP4 192.168.1.11
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability&gt;
&lt;/mms:mediaCapabilityInfo&gt;
</TSMediaCapabilityInfo>
    </u:StartMediaSession>
  </s:Body>
</s:Envelope>

```

C.19.25 F24

HTTP/1.1 200 OK

EXT:

CONTENT-TYPE: text/xml ; charset="utf-8"

SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0

Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
<s:Body>
<u:StartMediaSessionResponse xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2">
<MediaSessionID>media101</MediaSessionID>
<TCMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.21
s=-
c=IN IP4 192.168.1.21
t=0 0
m=audio 11021 RTP/AVP 0
c=IN IP4 192.168.1.21
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability &gt;
&lt;/mms:mediaCapabilityInfo&gt;
</TCMediaCapabilityInfo>
</u:StartMediaSessionResponse>
</s:Body>
</s:Envelope>
```

C.19.26 F25

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1

SOAPACTION: "urn:schemas-upnp-org:service:MediaManagement:2#StartMediaSession"

CONTENT-TYPE: text/xml ; charset="utf-8"

HOST: 192.168.2:21:20021

Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
<s:Body>
<u:StartMediaSession xmlns:u="urn:schemas-upnp-org:service:MediaManagement:2">
<TSMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.11
s=-
c=IN IP4 192.168.2.11
t=0 0
m=audio 21001 RTP/AVP 0
c=IN IP4 192.168.2.1
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability&gt;
&lt;/mms:mediaCapabilityInfo&gt;
</TSMediaCapabilityInfo>
</u:StartMediaSession>
</s:Body>
</s:Envelope>
```

C.19.27 F26

HTTP/1.1 200 OK

EXT:

CONTENT-TYPE: text/xml ; charset="utf-8"

SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0

Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
<s:Body>
<u:StartMediaSessionResponse xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2">
<MediaSessionID>media201</MediaSessionID>
<TCMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.21
s=-
c=IN IP4 192.168.2.21
t=0 0
m=audio 21021 RTP/AVP 0
c=IN IP4 192.168.2.21
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability&gt;
&lt;/mms:mediaCapabilityInfo&gt;</TCMediaCapabilityInfo>
</u:StartMediaSessionResponse>
</s:Body>
</s:Envelope>
```

C.19.28 F27

NOTIFY /_urn:upnp-org:serviceId:MediaManagement HTTP/1.1

HOST: 192.168.1.11:10011

CONTENT-TYPE: text/xml

Content-Length: [bytes in body]

NT: upnp:event

NTS: upnp:propchange

SID: uuid:c3580410-1dd1-11b2-8000-10021

SEQ: [sequence number]

Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<MediaSessionInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaSessionInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:mms="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaSessionID&gt;media101&lt;/mediaSessionID&gt;
&lt;mediaSessionStatus&gt;Started&lt;/mediaSessionStatus&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.21
s=-
c=IN IP4 192.168.1.21
t=0 0
m=audio 11021 RTP/AVP 0
c=IN IP4 192.168.1.21
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability&gt;
&lt;/mms:mediaSessionInfo&gt;</MediaSessionInfo>
```

```
</e:property>  
</e:propertyset>
```

C.19.29 F28

HTTP/1.1 200 OK
Content-Length: 0

C.19.30 F29

NOTIFY /_urn:upnp-org:serviceId:MediaManagement HTTP/1.1
HOST: 192.168.2.11:20011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-20021
SEQ: [sequence number]
Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>  
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">  
<e:property>  
<MediaSessionInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;  
&lt;mms:mediaSessionInfo  
  xsi:schemaLocation="urn:schemas-upnp-org:phone:mms  
  http://www.upnp.org/schemas/phone/mms-v2.xsd"  
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"  
  xmlns:mms="urn:schemas-upnp-org:phone:mms"&gt;  
  &lt;mediaSessionID&gt;media201&lt;/mediaSessionID&gt;  
  &lt;mediaSessionStatus&gt;Started&lt;/mediaSessionStatus&gt;  
  &lt;mediaCapability format="SDP"&gt;v=0  
o=- 0 0 IN IP4 192.168.2.21  
s=-  
c=IN IP4 192.168.2.21  
t=0 0  
m=audio 21021 RTP/AVP 0  
c=IN IP4 192.168.2.21  
a=rtpmap:0 PCMU/8000  
a=ptime:20  
&lt;/mediaCapability&gt;  
&lt;/mms:mediaSessionInfo&gt;</MediaSessionInfo>  
</e:property>  
</e:propertyset>
```

C.19.31 F30

HTTP/1.1 200 OK
Content-Length: 0

C.19.32 F31

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1
SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#StartMediaTransfer"
CONTENT-TYPE: text/xml ; charset="utf-8"
HOST: 192.168.1.1:10001
Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>  
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"  
  xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">  
<s:Body>  
<u:StartMediaTransfer xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">  
<TelCPName>TV@Living</TelCPName>  
<SecretKey>secret101</SecretKey>  
<TargetCallID>call101</TargetCallID>  
<TCList>&lt;?xml version="1.0" encoding="utf-8"?&gt;  
&lt;cams:TCList
```

```

xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:cams">
  <TC>
    <UDN>uid:97ef6efa-ac89-4ea2-0001-udn101</UDN>
    <mediaSessionID>media101</mediaSessionID>
  </TC>
</cams:TCList></TCList>
<MediaCapabilityInfo><?xml version="1.0" encoding="utf-8"?>
  <cams:mediaCapabilityInfo
    xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
    xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
    xmlns:cams="urn:schemas-upnp-org:phone:cams">
    <mediaCapability format="SDP">v=0
o-- 0 0 IN IP4 192.168.1.11
s=-
c=IN IP4 192.168.1.11
t=0 0
m=audio 11021 RTP/AVP 0
c=IN IP4 192.168.1.21
a=rtpmap:0 PCMU/8000
a=ptime:20
  </mediaCapability>
</cams:mediaCapabilityInfo></MediaCapabilityInfo>
</u:StartMediaTransfer>
</s:Body>
</s:Envelope>

```

C.19.33 F32

HTTP/1.1 200 OK

Content-Length: [bytes in body]

CONTENT-TYPE: text/xml; charset="utf-8"

SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0

EXT:

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
  <s:Body>
    <m:StartMediaTransferResponse xmlns:m="urn:schemas-upnp-
org:service:CallManagement:2" />
  </s:Body>
</s:Envelope>

```

C.19.34 F33

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1

SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#StartMediaTransfer"

CONTENT-TYPE: text/xml ; charset="utf-8"

HOST: 192.168.2.1:20001

Content-Length: [bytes in body]

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StartMediaTransfer xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
      <TelCPName>phone@Bedroom</TelCPName>
      <SecretKey>secret201</SecretKey>
      <TargetCallID>call1201</TargetCallID>
      <TCList><?xml version="1.0" encoding="utf-8"?>
        <cams:TCList
          xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
          xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"

```

```

xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
&lt;TC&gt;
  &lt;UDN&gt;uuid:97ef6efa-ac89-4ea2-0001-udn201&lt;/UDN&gt;
  &lt;mediaSessionID&gt;media201&lt;/mediaSessionID&gt;
&lt;/TC&gt;
&lt;/cams:TCList&gt;</TCList>
<MediaCapabilityInfo&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:mediaCapabilityInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.11
s=-
c=IN IP4 192.168.2.11
t=0 0
m=audio 21021 RTP/AVP 0
c=IN IP4 192.168.2.21
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability&gt;
&lt;/cams:mediaCapabilityInfo&gt;</MediaCapabilityInfo>
</u:StartMediaTransfer>
</s:Body>
</s:Envelope>

```

C.19.35 F34

HTTP/1.1 200 OK

Content-Length: [bytes in body]

CONTENT-TYPE: text/xml; charset="utf-8"

SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0

EXT:

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
  <s:Body>
    <m:StartMediaTransferResponse xmlns:m="urn:schemas-upnp-
org:service:CallManagement:2" />
  </s:Body>
</s:Envelope>

```

C.19.36 F35

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1

HOST: 192.168.1.11:10011

CONTENT-TYPE: text/xml

Content-Length: [bytes in body]

NT: upnp:event

NTS: upnp:propchange

SID: uuid:c3580410-1dd1-11b2-8000-10001

SEQ: [sequence number]

Connection: Keep-Alive

```

<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
  &lt;callID&gt;call101&lt;/callID&gt;
  &lt;targetNames type="TelCPName"&gt;TV@Living&lt;/targetNames&gt;
  &lt;callStatus&gt;Talking&lt;/callStatus&gt;

```

```
</cams:callInfo></CallInfo>
</e:property>
</e:propertyset>
```

C.19.37 F36

HTTP/1.1 200 OK
Content-Length: 0

C.19.38 F37

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
HOST: 192.168.2.11:20011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-20001
SEQ: [sequence number]
Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
  &lt;callID&gt;call1201&lt;/callID&gt;
  &lt;targetNames type="TelCPName"&gt;phone@Bedroom&lt;/targetNames&gt;
  &lt;callStatus&gt;Talking&lt;/callStatus&gt;
&lt;/cams:callInfo&gt;</CallInfo>
</e:property>
</e:propertyset>
```

C.19.39 F38

HTTP/1.1 200 OK
Content-Length: 0

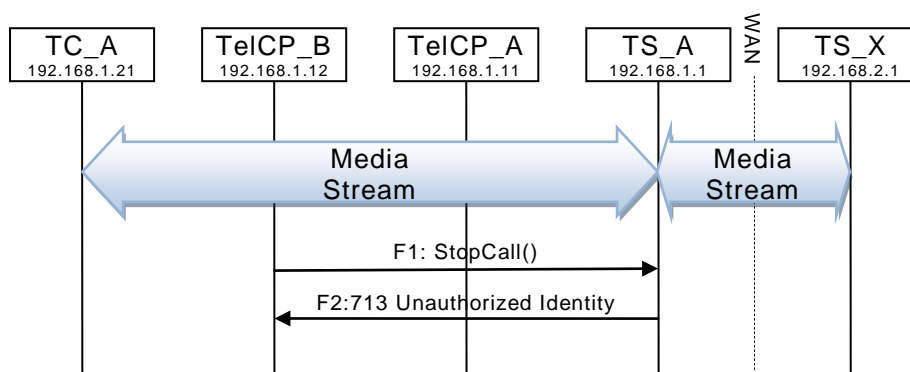
C.20 Terminate a Call (But the specified TelCP is not authorized.)**C.20.1 Figure**

Figure C.23 — Terminate a Call (But the specified TelCP is not authorized.)

C.20.2 F1

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1
SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#StopCall"
CONTENT-TYPE: text/xml ; charset="utf-8"
HOST: 192.168.1.1:10001
Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StopCall xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
      <TelCPName>TV@Living</TelCPName>
      <SecretKey>wrongkey</SecretKey>
      <CallID>call101</CallID>
    </u:StopCall>
  </s:Body>
</s:Envelope>
```

C.20.3 F2

HTTP/1.1 500 Internal Server Error
Content-Length: [bytes in body]

```
<s:Envelope
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
  <s:Body>
<s:Fault>
  <faultcode>s:Client</faultcode>
  <faultstring>UPnPError</faultstring>
  <detail>
    <UPnPError xmlns="urn:schemas-upnp-org:control-1-0">
      <errorCode>713</errorCode>
      <errorDescription>Unauthorized Identity</errorDescription>
    </UPnPError>
  </detail>
</s:Fault>
  </s:Body>
</s:Envelope>
```

C.21 Cancel an outgoing Call (But the specified TelCP is not authorized.)

C.21.1 Figure

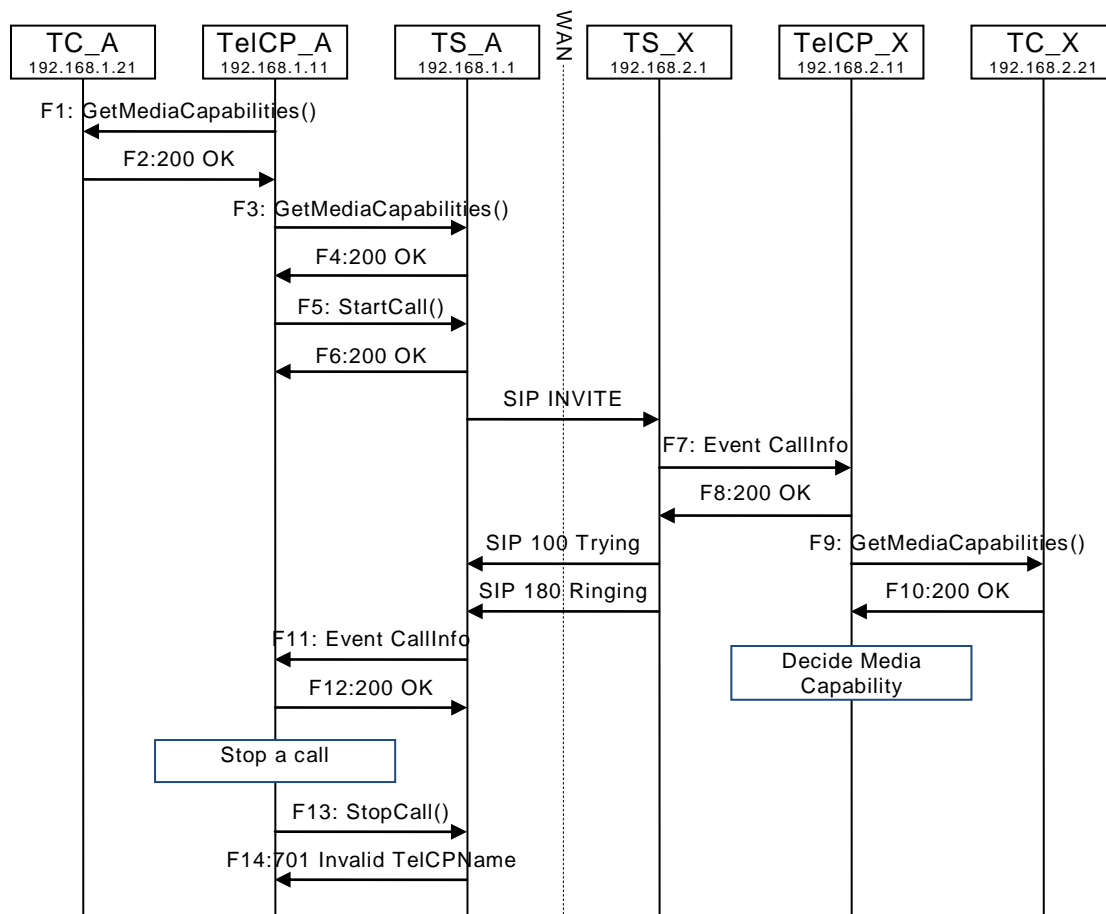


Figure C.24 — Cancel an outgoing Call (But the specified TelCP is not authorized.)

C.21.2 F1 to F12 are the same as “C.1 Create a Call”

C.21.3 F13

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1
 SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#StopCall"
 CONTENT-TYPE: text/xml ; charset="utf-8"
 HOST: 192.168.1.1:10001
 Content-Length: [bytes in body]

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StopCall xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
      <TelCPName>Alice's TV</TelCPName>
      <SecretKey>secret101</SecretKey>
      <CallID>call1101</CallID>
    </u:StopCall>
  </s:Body>
</s:Envelope>
  
```

C.21.4 F14

HTTP/1.1 500 Internal Server Error
Content-Length: [bytes in body]

```
<s:Envelope
  xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
  s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
  <s:Body>
  <s:Fault>
    <faultcode>s:Client</faultcode>
    <faultstring>UPnPError</faultstring>
    <detail>
      <UPnPError xmlns="urn:schemas-upnp-org:control-1-0">
        <errorCode>713</errorCode>
        <errorDescription>Unauthorized Identity</errorDescription>
      </UPnPError>
    </detail>
  </s:Fault>
  </s:Body>
</s:Envelope>
```

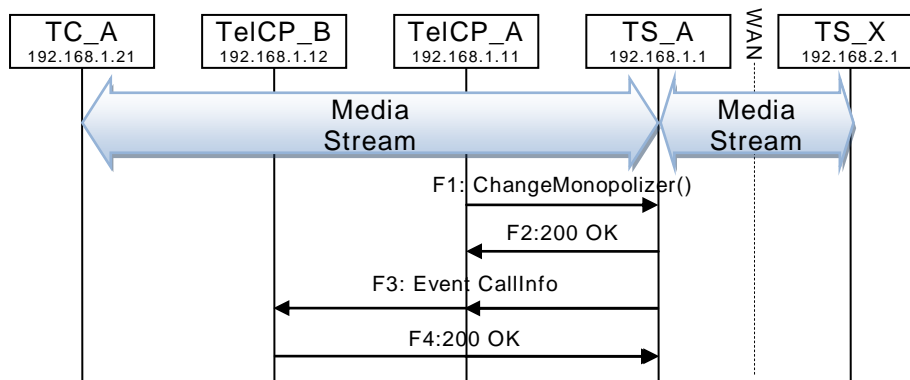
C.22 Change TelCP which Monopolize the Call**C.22.1 Figure**

Figure C.25 — Change TelCP which Monopolize the Call

C.22.2 F1

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1
SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#ChangeMonopolizer"
CONTENT-TYPE: text/xml ; charset="utf-8"
HOST: 192.168.1.1:10001
Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
  xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
  <u:ChangeMonopolizer xmlns:u="urn:schemas-upnp-org:service: CallManagement:2">
    <CurrentMonopolizer>TV@Living</CurrentMonopolizer>
    <SecretKey>secret101</SecretKey>
    <CallID>call1101</CallID>
    <NewMonopolizer>HD-TV@Living</NewMonopolizer>
  </u:ChangeMonopolizer>
  </s:Body>
</s:Envelope>
```

C.22.3 F2

HTTP/1.1 200 OK

EXT:

CONTENT-TYPE: text/xml ; charset="utf-8"

SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0

Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:ChangeMonopolizerResponse xmlns:u="urn:schemas-upnp-
org:service:CallManagement:2" />
  </s:Body>
</s:Envelope>
```

C.22.4 F3

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1

HOST: 192.168.1.12:10012

CONTENT-TYPE: text/xml

Content-Length: [bytes in body]

NT: upnp:event

NTS: upnp:propchange

SID: uuid:c3580410-1dd1-11b2-8000-10001

SEQ: [sequence number]

Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
    &lt;callID&gt;call101&lt;/callID&gt;
    &lt;targetNames type="TelCPName"&gt;HD-TV@Living&lt;/targetNames&gt;
    &lt;callStatus&gt;Talking&lt;/callStatus&gt;
    &lt;priority&gt;Normal&lt;/priority&gt;
    &lt;remoteParty&gt;
      &lt;peer:id&gt;0774940201&lt;/peer:id&gt;
    &lt;/remoteParty&gt;
    &lt;TCList&gt;
      &lt;TC&gt;
        &lt;UDN&gt;uuid:97ef6efa-ac89-4ea2-0001-udn101&lt;/UDN&gt;
        &lt;mediaSessionID&gt;media101&lt;/mediaSessionID&gt;
      &lt;/TC&gt;
    &lt;/TCList&gt;
    &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/mediaCapability&gt;
&lt;/cams:callInfo&gt;</CallInfo>
</e:property>
</e:propertyset>
```

C.22.5 F4

HTTP/1.1 200 OK

Content-Length: 0

C.23 Create a Call with TC-Based and TS-Based Media Handlings

C.23.1 Figure

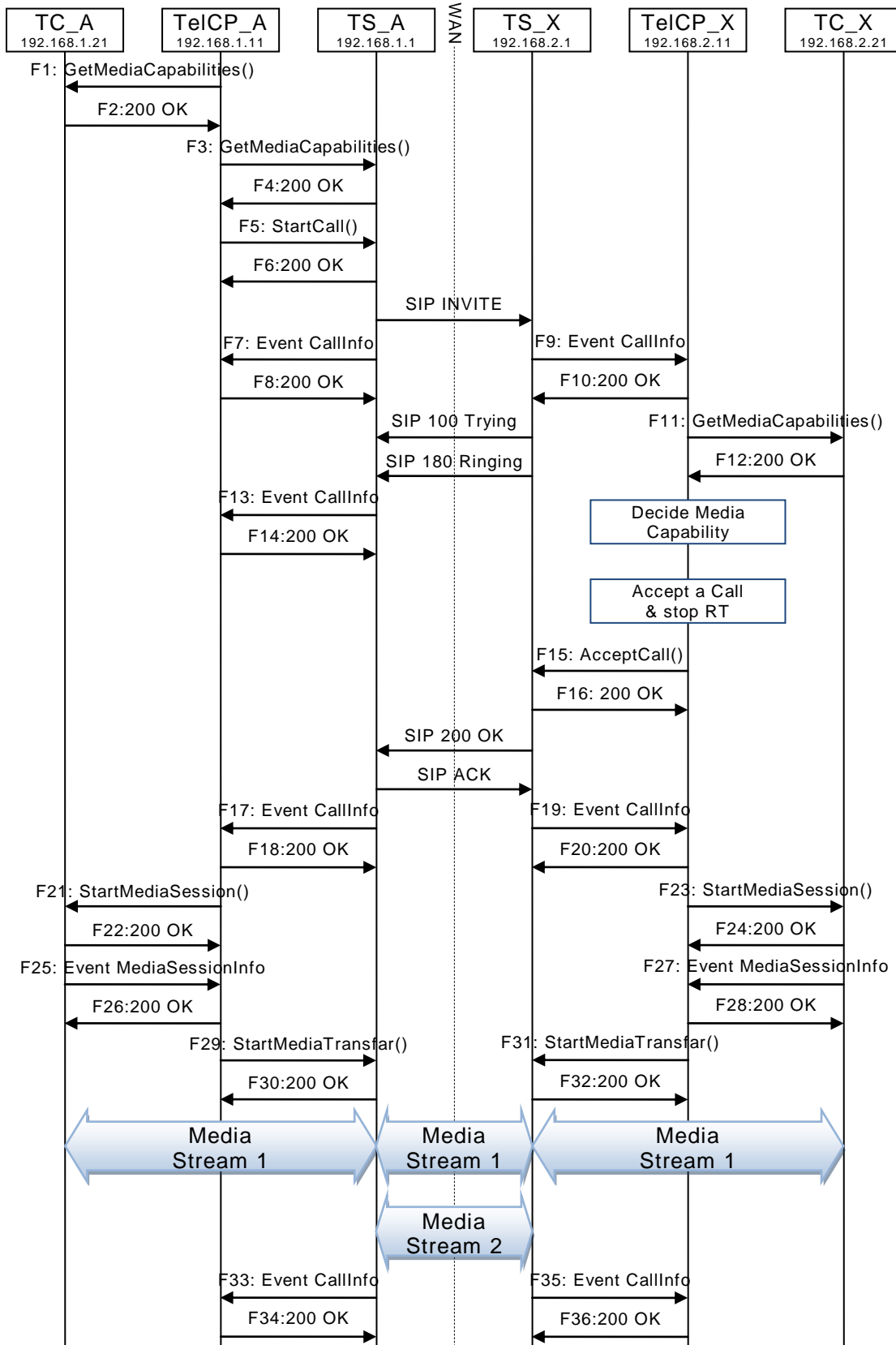


Figure C.26 — Create a Call with TC-Based and TS-Based Media Handlings

C.23.2 F1

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1
 SOAPACTION: "urn:schemas-upnp-org:service:MediaManagement:2#GetMediaCapabilities"
 CONTENT-TYPE: text/xml ; charset="utf-8"
 HOST: 192.168.1.21:10021
 Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetMediaCapabilities xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2" >
      <TSMediaCapabilityInfo></TSMediaCapabilityInfo>
    </u:GetMediaCapabilities>
  </s:Body>
</s:Envelope>
```

C.23.3 F2

HTTP/1.1 200 OK
 EXT:
 CONTENT-TYPE: text/xml ; charset="utf-8"
 SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0
 Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetMediaCapabilitiesResponse xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2">
      <SupportedMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.21
s=-
c=IN IP4 192.168.1.21
t=0 0
m=video 12021 RTP/AVP 96
c=IN IP4 192.168.1.21
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/mms:mediaCapabilityInfo&gt;
&lt;/SupportedMediaCapabilityInfo>
    </u:GetMediaCapabilitiesResponse>
  </s:Body>
</s:Envelope>
```

C.23.4 F3

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1
 SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#GetMediaCapabilities"
 CONTENT-TYPE: text/xml ; charset="utf-8"
 HOST: 192.168.1.1:10001
 Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
```

```
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
<s:Body>
<u:GetMediaCapabilities xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
  <TCMediaCapabilityInfo></TCMediaCapabilityInfo>
</u:GetMediaCapabilities>
</s:Body>
</s:Envelope>
```

C.23.5 F4

HTTP/1.1 200 OK

EXT:

CONTENT-TYPE: text/xml ; charset="utf-8"

SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0

Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetMediaCapabilitiesResponse xmlns:u="urn:schemas-upnp-
org:service:CallManagement:2">
      <SupportedMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 12001 RTP/AVP 96
c=IN IP4 192.168.1.1
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;nativeMediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/nativeMediaCapability&gt;
&lt;/cams:mediaCapabilityInfo&gt;</SupportedMediaCapabilityInfo>
    </u:GetMediaCapabilitiesResponse>
  </s:Body>
</s:Envelope>
```

C.23.6 F5

POST /_urn:upnp-org:serviceid:CallManagement_control HTTP/1.1

SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#StartCall"

CONTENT-TYPE: text/xml ; charset="utf-8"

HOST: 192.168.1.1:10001

Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
```



```

<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StartCall xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
      <TelCPName></TelCPName>
      <SecretKey></SecretKey>
      <CalleeID> tel:0774940201</CalleeID>
      <CallPriority>Normal</CallPriority>
      <MediaCapabilityInfo><?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.11
s=-
c=IN IP4 192.168.1.11
t=0 0
m=video 12021 RTP/AVP 96
c=IN IP4 192.168.1.21
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;nativeMediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/nativeMediaCapability&gt;
&lt;/cams:mediaCapabilityInfo&gt;
</MediaCapabilityInfo>
    <CallMode>Non-Monopolize</CallMode>
  </u:StartCall>
</s:Body>
</s:Envelope>

```

C.23.7 F6

```

HTTP/1.1 200 OK
Content-Length: [bytes in body]
CONTENT-TYPE: text/xml; charset="utf-8"
SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0
EXT:

```

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
  <s:Body>
    <m:StartCallResponse xmlns:m="urn:schemas-upnp-org:service:CallManagement:2">
      <CallID>call1101</CallID>
    </m:StartCallResponse>
  </s:Body>
</s:Envelope>

```

C.23.8 F7

```

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
HOST: 192.168.1.11:10011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange

```

SID: uuid:c3580410-1dd1-11b2-8000-10001

SEQ: [sequence number]

Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
    http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
    &lt;callID&gt;call101&lt;/callID&gt;
    &lt;targetNames type="TelCPName"&gt;*&lt;/targetNames&gt;
    &lt;callStatus&gt;Dialing&lt;/callStatus&gt;
    &lt;priority&gt;Normal&lt;/priority&gt;
    &lt;remoteParty&gt;
      &lt;peer:id&gt;0774940201&lt;/peer:id&gt;
    &lt;/remoteParty&gt;
  &lt;/mediaCapability format="SDP"&gt;v=0
o-- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=video 12001 RTP/AVP 96
c=IN IP4 192.168.1.1
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;nativeMediaCapability format="SDP"&gt;v=0
o-- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/nativeMediaCapability&gt;
&lt;/cams:callInfo&gt;</CallInfo>
</e:property>
</e:propertyset>
```

C.23.9 F8

HTTP/1.1 200 OK

Content-Length: 0

C.23.10 F9

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1

HOST: 192.168.2.11:20011

CONTENT-TYPE: text/xml

Content-Length: [bytes in body]

NT: upnp:event

NTS: upnp:propchange

SID: uuid:c3580410-1dd1-11b2-8000-20001

SEQ: [sequence number]

Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
```

```

<lt;cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
  <lt;callID&gt;call201&lt;/callID&gt;
  <lt;targetNames type="TelCPName"&gt;*&lt;/targetNames&gt;
  <lt;callStatus&gt;Ringing&lt;/callStatus&gt;
  <lt;priority&gt;Normal&lt;/priority&gt;
  <lt;remoteParty&gt;
    <lt;peer:id&gt;035550101&lt;/peer:id&gt;
  <lt;/remoteParty&gt;
  <lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.1
s=-
c=IN IP4 192.168.2.1
t=0 0
m=audio 21001 RTP/AVP 0
c=IN IP4 192.168.2.1
a=rtpmap:0 PCMU/8000
a=ptime:20
m=video 22001 RTP/AVP 96
c=IN IP4 192.168.2.1
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;nativeMediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.1
s=-
c=IN IP4 192.168.2.1
t=0 0
m=audio 21001 RTP/AVP 0
c=IN IP4 192.168.2.1
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/nativeMediaCapability&gt;
&lt;/cams:callInfo&gt;</CallInfo>
</e:property>
</e:propertyset>

```

C.23.11 F10

HTTP/1.1 200 OK
Content-Length: 0

C.23.12 F11

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1
SOAPACTION: "urn:schemas-upnp-org:service:MediaManagement:2#GetMediaCapabilities"
CONTENT-TYPE: text/xml ; charset="utf-8"
HOST: 192.168.2.21:20021
Content-Length: [bytes in body]

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
  xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetMediaCapabilities xmlns:u="urn:schemas-upnp-
  org:service:MediaManagement:2" >
      <TSMediaCapabilityInfo></TSMediaCapabilityInfo>
    </u:GetMediaCapabilities>
  </s:Body>
</s:Envelope>

```

C.23.13 F12

HTTP/1.1 200 OK

EXT:

CONTENT-TYPE: text/xml ; charset="utf-8"

SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0

Content-Length: [bytes in body]

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:GetMediaCapabilitiesResponse xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2">
<SupportedMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.21
s=-
c=IN IP4 192.168.2.21
t=0 0
m=video 22021 RTP/AVP 96
c=IN IP4 192.168.2.21
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/mms:mediaCapabilityInfo&gt;</SupportedMediaCapabilityInfo>
  </u:GetMediaCapabilitiesResponse>
</s:Body>
</s:Envelope>

```

C.23.14 F13

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1

HOST: 192.168.1.11:10011

CONTENT-TYPE: text/xml

Content-Length: [bytes in body]

NT: upnp:event

NTS: upnp:propchange

SID: uuid:c3580410-1dd1-11b2-8000-10001

SEQ: [sequence number]

Connection: Keep-Alive

```

<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:callInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:cams"
xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
&lt;callID&gt;call1101&lt;/callID&gt;
&lt;targetNames type="TelCPName"&gt;*&lt;/targetNames&gt;
&lt;callStatus&gt;Calling&lt;/callStatus&gt;
&lt;priority&gt;Normal&lt;/priority&gt;
&lt;remoteParty&gt;
&lt;peer:id&gt;0774940201&lt;/peer:id&gt;
&lt;/remoteParty&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.1
s=-

```

```

c=IN IP4 192.168.1.1
t=0 0
m=video 12001 RTP/AVP 96
c=IN IP4 192.168.1.1
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
</mediaCapability>
</nativeMediaCapability format="SDP">v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
</nativeMediaCapability>
</cams:callInfo></CallInfo>
</e:property>
</e:propertyset>

```

C.23.15 F14

HTTP/1.1 200 OK
Content-Length: 0

C.23.16 F15

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1
SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#AcceptCall"
CONTENT-TYPE: text/xml ; charset="utf-8"
HOST: 192.168.2.1:20001
Content-Length: [bytes in body]

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:AcceptCall xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
      <TelCPName></TelCPName>
      <SecretKey></SecretKey>
      <TargetCallID>call1201</TargetCallID>
      <MediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?>
&lt;cams:mediaCapabilityInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams">
    &lt;mediaCapability format="SDP">v=0
o=- 0 0 IN IP4 192.168.2.11
s=-
c=IN IP4 192.168.2.11
t=0 0
m=video 22021 RTP/AVP 96
c=IN IP4 192.168.2.21
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
</mediaCapability>
</nativeMediaCapability format="SDP">v=0
o=- 0 0 IN IP4 192.168.2.1
s=-
c=IN IP4 192.168.2.1
t=0 0
m=audio 21001 RTP/AVP 0

```

```
c=IN IP4 192.168.2.1
a=rtpmap:0 PCMU/8000
a=ptime:20
<u><nativeMediaCapability>&gt;
</u></cams:mediaCapabilityInfo>&gt;</MediaCapabilityInfo>
  <CallMode>"Non-Monopolize"</CallMode>
</u></s:Body>
</s:Envelope>
```

C.23.17 F16

HTTP/1.1 200 OK
Content-Length: [bytes in body]
CONTENT-TYPE: text/xml; charset="utf-8"
SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0
EXT:

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
<s:Body>
<m:AcceptCallResponse xmlns:m="urn:schemas-upnp-org:service:CallManagement:2" />
</s:Body>
</s:Envelope>
```

C.23.18 F17

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
HOST: 192.168.1.11:10011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-10001
SEQ: [sequence number]
Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
  &lt;callID&gt;call1101&lt;/callID&gt;
  &lt;targetNames type="TelCPName"&gt;*&lt;/targetNames&gt;
  &lt;callStatus&gt;Connected&lt;/callStatus&gt;
  &lt;priority&gt;Normal&lt;/priority&gt;
  &lt;remoteParty&gt;
    &lt;peer:id&gt;0774940201&lt;/peer:id&gt;
  &lt;/remoteParty&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=video 12001 RTP/AVP 96
c=IN IP4 192.168.1.1
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;nativeMediaCapability format="SDP"&gt;v=0
```

```

o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
<!--nativeMediaCapability-->
<!--cams:callInfo-->
</e:property>
</e:propertyset>

```

C.23.19 F18

```

HTTP/1.1 200 OK
Content-Length: 0

```

C.23.20 F19

```

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
HOST: 192.168.2.11:20011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-20001
SEQ: [sequence number]
Connection: Keep-Alive

```

```

<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo><!--?xml version="1.0" encoding="utf-8"?-->
<!--cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
    http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer">
  <!--callID-->call201<!--/callID-->
  <!--targetNames type="TelCPName"-->*-->
  <!--/targetNames-->
  <!--callStatus-->Connected<!--/callStatus-->
  <!--priority-->Normal<!--/priority-->
  <!--remoteParty-->
    <!--peer:id-->0355550101<!--/peer:id-->
  <!--/remoteParty-->
  <!--mediaCapability format="SDP"-->v=0
o=- 0 0 IN IP4 192.168.2.1
s=-
c=IN IP4 192.168.2.1
t=0 0
m=video 22001 RTP/AVP 96
c=IN IP4 192.168.2.1
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
<!--mediaCapability-->
<!--nativeMediaCapability format="SDP"-->v=0
o=- 0 0 IN IP4 192.168.2.1
s=-
c=IN IP4 192.168.2.1
t=0 0
m=audio 21001 RTP/AVP 0
c=IN IP4 192.168.2.1
a=rtpmap:0 PCMU/8000
a=ptime:20
<!--nativeMediaCapability-->

```

```
</cams:callInfo></CallInfo>
</e:property>
</e:propertyset>
```

C.23.21 F20

HTTP/1.1 200 OK
Content-Length: 0

C.23.22 F21

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1
SOAPACTION: "urn:schemas-upnp-org:service:MediaManagement:2#StartMediaSession"
CONTENT-TYPE: text/xml ; charset="utf-8"
HOST: 192.168.1.21:10021
Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StartMediaSession xmlns:u="urn:schemas-upnp-org:service:MediaManagement:2">
      <TSMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.11
s=-
c=IN IP4 192.168.1.11
t=0 0
m=video 12001 RTP/AVP 96
c=IN IP4 192.168.1.1
b=AS:2500
a=rtptime:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/mms:mediaCapabilityInfo&gt;
</TSMediaCapabilityInfo>
    </u:StartMediaSession>
  </s:Body>
</s:Envelope>
```

C.23.23 F22

HTTP/1.1 200 OK
EXT:
CONTENT-TYPE: text/xml ; charset="utf-8"
SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0
Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StartMediaSessionResponse xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2">
      <MediaSessionID>media101</MediaSessionID>
      <TCMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
&lt;mediaCapability format="SDP"&gt;v=0
```



```
o=- 0 0 IN IP4 192.168.1.21
s=-
c=IN IP4 192.168.1.21
t=0 0
m=video 12021 RTP/AVP 96
c=IN IP4 192.168.1.21
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
<mediaCapability />
<mms:mediaCapabilityInfo />
</TSMediaCapabilityInfo />
</u:StartMediaSessionResponse />
</s:Body />
</s:Envelope />
```

C.23.24 F23

POST /_urn:upnp-org:serviceId:MediaManagement_control HTTP/1.1
SOAPACTION: "urn:schemas-upnp-org:service:MediaManagement:2#StartMediaSession"
CONTENT-TYPE: text/xml ; charset="utf-8"
HOST: 192.168.2:21:20021
Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StartMediaSession xmlns:u="urn:schemas-upnp-org:service:MediaManagement:2">
      <TSMediaCapabilityInfo />
      <mms:mediaCapabilityInfo
xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
xmlns:cams="urn:schemas-upnp-org:phone:mms" />
      <mediaCapability format="SDP" />
      o=- 0 0 IN IP4 192.168.2.11
      s=-
      c=IN IP4 192.168.2.11
      t=0 0
      m=video 22001 RTP/AVP 96
      c=IN IP4 192.168.2.1
      b=AS:2500
      a=rtpmap:96 MP4V-ES/90000
      a=fmtp:96 profile-level-
      id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
      a=framerate:30
      <mediaCapability />
      <mms:mediaCapabilityInfo />
    </TSMediaCapabilityInfo />
    </u:StartMediaSession />
  </s:Body />
</s:Envelope />
```

C.23.25 F24

HTTP/1.1 200 OK
EXT:
CONTENT-TYPE: text/xml ; charset="utf-8"
SERVER: Windows NT/5.0, UPnP/1.0, Intel CLR SDK/1.0
Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
  <s:Body>
    <u:StartMediaSessionResponse xmlns:u="urn:schemas-upnp-
org:service:MediaManagement:2">
```

```

<MediaSessionID>media201</MediaSessionID>
<TCMediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaCapabilityInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:mms"&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.21
s=-
c=IN IP4 192.168.2.21
t=0 0
m=video 22021 RTP/AVP 96
c=IN IP4 192.168.2.21
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/mms:mediaCapabilityInfo&gt;</TCMediaCapabilityInfo>
</u:StartMediaSessionResponse>
</s:Body>
</s:Envelope>

```

C.23.26 F25

```

NOTIFY /_urn:upnp-org:serviceId:MediaManagement HTTP/1.1
HOST: 192.168.1.11:10011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]
NT: upnp:event
NTS: upnp:propchange
SID: uuid:c3580410-1dd1-11b2-8000-10021
SEQ: [sequence number]
Connection: Keep-Alive

```

```

<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<MediaSessionInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaSessionInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
http://www.upnp.org/schemas/phone/mms-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:mms="urn:schemas-upnp-org:phone:mms"&gt;
  &lt;mediaSessionID&gt;media101&lt;/mediaSessionID&gt;
  &lt;mediaSessionStatus&gt;Started&lt;/mediaSessionStatus&gt;
&lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.21
s=-
c=IN IP4 192.168.1.21
t=0 0
m=video 12021 RTP/AVP 96
c=IN IP4 192.168.1.21
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/cams:callInfo&gt;</CallInfo>
</e:property>
</e:propertyset>

```

C.23.27 F26

```

HTTP/1.1 200 OK
Content-Length: 0

```

C.23.28 F27

NOTIFY /_urn:upnp-org:serviceId:MediaManagement HTTP/1.1
 HOST: 192.168.2.11:20011
 CONTENT-TYPE: text/xml
 Content-Length: [bytes in body]
 NT: upnp:event
 NTS: upnp:propchange
 SID: uuid:c3580410-1dd1-11b2-8000-20021
 SEQ: [sequence number]
 Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<MediaSessionInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;mms:mediaSessionInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:mms
  http://www.upnp.org/schemas/phone/mms-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:mms="urn:schemas-upnp-org:phone:mms"&gt;
  &lt;mediaSessionID&gt;media201&lt;/mediaSessionID&gt;
  &lt;mediaSessionStatus&gt;Started&lt;/mediaSessionStatus&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.21
s=-
c=IN IP4 192.168.2.21
t=0 0
m=video 22021 RTP/AVP 96
c=IN IP4 192.168.2.21
b=AS:2500
a=rtptime:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;/cams:callInfo&gt;</CallInfo>
</e:property>
</e:propertyset>
```

C.23.29 F28

HTTP/1.1 200 OK
 Content-Length: 0

C.23.30 F29

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1
 SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#StartMediaTransfer"
 CONTENT-TYPE: text/xml ; charset="utf-8"
 HOST: 192.168.1.1:10001
 Content-Length: [bytes in body]

```
<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
<s:Body>
<u:StartMediaTransfer xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
<TelCPName></TelCPName>
<SecretKey></SecretKey>
<TargetCallID>call101</TargetCallID>
<TCList>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:TCList
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
  &lt;TC&gt;
  &lt;UDN&gt;uid:97ef6efa-ac89-4ea2-0001-udn101&lt;/UDN&gt;
```

```

    <mediaSessionID>media101</mediaSessionID>
  </TC>
</cams:TCList></TCList>
<MediaCapabilityInfo><?xml version="1.0" encoding="utf-8"?>
<cams:mediaCapabilityInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams">
  <mediaCapability format="SDP">v=0
o=- 0 0 IN IP4 192.168.1.11
s=-
c=IN IP4 192.168.1.11
t=0 0
m=video 12021 RTP/AVP 96
c=IN IP4 192.168.1.21
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
  </mediaCapability>
  <nativeMediaCapability format="SDP">v=0
o=- 0 0 IN IP4 192.168.1.11
s=-
c=IN IP4 192.168.1.11
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
  </nativeMediaCapability>
</cams:mediaCapabilityInfo></MediaCapabilityInfo>
</u:StartMediaTransfer>
</s:Body>
</s:Envelope>

```

C.23.31 F30

HTTP/1.1 200 OK
 Content-Length: [bytes in body]
 CONTENT-TYPE: text/xml; charset="utf-8"
 SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0
 EXT:

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
  <s:Body>
    <m:StartMediaTransferResponse xmlns:m="urn:schemas-upnp-
org:service:CallManagement:2" />
  </s:Body>
</s:Envelope>

```

C.23.32 F31

POST /_urn:upnp-org:serviceId:CallManagement_control HTTP/1.1
 SOAPACTION: "urn:schemas-upnp-org:service:CallManagement:2#StartMediaTransfer"
 CONTENT-TYPE: text/xml ; charset="utf-8"
 HOST: 192.168.2.1:20001
 Content-Length: [bytes in body]

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/"
xmlns:s="http://schemas.xmlsoap.org/soap/envelope/">
<s:Body>
<u:StartMediaTransfer xmlns:u="urn:schemas-upnp-org:service:CallManagement:2">
<TelCPName></TelCPName>
<SecretKey></SecretKey>

```

```

<TargetCallID>call201</TargetCallID>
<TCList>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:TCList
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
  &lt;TC&gt;
    &lt;UDN&gt;uid:97ef6efa-ac89-4ea2-0001-udn201&lt;/UDN&gt;
    &lt;mediaSessionID&gt;media201&lt;/mediaSessionID&gt;
  &lt;/TC&gt;
  &lt;/cams:TCList&gt;</TCList>
<MediaCapabilityInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:mediaCapabilityInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.11
s=-
c=IN IP4 192.168.2.11
t=0 0
m=video 22021 RTP/AVP 96
c=IN IP4 192.168.2.21
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;nativeMediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.11
s=-
c=IN IP4 192.168.2.11
t=0 0
m=audio 21001 RTP/AVP 0
c=IN IP4 192.168.2.1
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/nativeMediaCapability&gt;
&lt;/mediaCapability&gt;
&lt;/cams:mediaCapabilityInfo&gt;</MediaCapabilityInfo>
</u:StartMediaTransfer>
</s:Body>
</s:Envelope>

```

C.23.33 F32

```

HTTP/1.1 200 OK
Content-Length: [bytes in body]
CONTENT-TYPE: text/xml; charset="utf-8"
SERVER: TS-HTTP/1.1 UPnP/1.0 UPnP-Device-Host/1.0
EXT:

```

```

<?xml version="1.0" encoding="utf-8"?>
<s:Envelope xmlns:s="http://schemas.xmlsoap.org/soap/envelope/"
s:encodingStyle="http://schemas.xmlsoap.org/soap/encoding/">
  <s:Body>
    <m:StartMediaTransferResponse xmlns:m="urn:schemas-upnp-
org:service:CallManagement:2" />
  </s:Body>
</s:Envelope>

```

C.23.34 F33

```

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
HOST: 192.168.1.11:10011
CONTENT-TYPE: text/xml
Content-Length: [bytes in body]

```

NT: upnp:event
 NTS: upnp:propchange
 SID: uuid:c3580410-1dd1-11b2-8000-10001
 SEQ: [sequence number]
 Connection: Keep-Alive

```
<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
  http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
  &lt;callID&gt;call101&lt;/callID&gt;
  &lt;targetNames type="TelCPName"&gt;*&lt;/targetNames&gt;
  &lt;callStatus&gt;Talking&lt;/callStatus&gt;
  &lt;priority&gt;Normal&lt;/priority&gt;
  &lt;remoteParty&gt;
    &lt;peer:id&gt;0774940201&lt;/peer:id&gt;
  &lt;/remoteParty&gt;
  &lt;TCList&gt;
    &lt;TC&gt;
      &lt;UDN&gt;uuid:97ef6efa-ac89-4ea2-0001-udn101&lt;/UDN&gt;
      &lt;mediaSessionID&gt;media101&lt;/mediaSessionID&gt;
    &lt;/TC&gt;
  &lt;/TCList&gt;
  &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=video 12001 RTP/AVP 96
c=IN IP4 192.168.1.1
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;nativeMediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.1.1
s=-
c=IN IP4 192.168.1.1
t=0 0
m=audio 11001 RTP/AVP 0
c=IN IP4 192.168.1.1
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/nativeMediaCapability&gt;
&lt;/cams:callInfo&gt;</CallInfo>
</e:property>
</e:propertyset>
```

C.23.35 F34

HTTP/1.1 200 OK
 Content-Length: 0

C.23.36 F35

NOTIFY /_urn:upnp-org:serviceId:CallManagement HTTP/1.1
 HOST: 192.168.2.11:20011
 CONTENT-TYPE: text/xml
 Content-Length: [bytes in body]
 NT: upnp:event
 NTS: upnp:propchange

SID: uuid:c3580410-1dd1-11b2-8000-20001

SEQ: [sequence number]

Connection: Keep-Alive

```

<?xml version="1.0" encoding="utf-8"?>
<e:propertyset xmlns:e="urn:schemas-upnp-org:event-1-0">
<e:property>
<CallInfo>&lt;?xml version="1.0" encoding="utf-8"?&gt;
&lt;cams:callInfo
  xsi:schemaLocation="urn:schemas-upnp-org:phone:cams
    http://www.upnp.org/schemas/phone/cams-v2.xsd"
  xmlns:xsi="http://www.w3.org/2001/XMLSchema-instance"
  xmlns:cams="urn:schemas-upnp-org:phone:cams"
  xmlns:peer="urn:schemas-upnp-org:phone:peer"&gt;
    &lt;callID&gt;call201&lt;/callID&gt;
    &lt;targetNames type="TelCPName"&gt;*&lt;/targetNames&gt;
    &lt;callStatus&gt;Talking&lt;/callStatus&gt;
    &lt;priority&gt;Normal&lt;/priority&gt;
    &lt;remoteParty&gt;
      &lt;peer:id&gt;0355550101&lt;/peer:id&gt;
    &lt;/remoteParty&gt;
    &lt;TCList&gt;
      &lt;TC&gt;
        &lt;UDN&gt;uuid:97ef6efa-ac89-4ea2-0001-udn201&lt;/UDN&gt;
        &lt;mediaSessionID&gt;media201&lt;/mediaSessionID&gt;
      &lt;/TC&gt;
    &lt;/TCList&gt;
    &lt;mediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.1
s=-
c=IN IP4 192.168.2.1
t=0 0
m=video 22001 RTP/AVP 96
c=IN IP4 192.168.2.1
b=AS:2500
a=rtpmap:96 MP4V-ES/90000
a=fmtp:96 profile-level-
id=4;config=000001b004000001b50900000100000001200086c40fa28a021e0a21
a=framerate:30
&lt;/mediaCapability&gt;
&lt;nativeMediaCapability format="SDP"&gt;v=0
o=- 0 0 IN IP4 192.168.2.1
s=-
c=IN IP4 192.168.2.1
t=0 0
m=audio 21001 RTP/AVP 0
c=IN IP4 192.168.2.1
a=rtpmap:0 PCMU/8000
a=ptime:20
&lt;/nativeMediaCapability&gt;
&lt;/cams:callInfo&gt;</CallInfo>
</e:property>
</e:propertyset>

```

C.23.37 F36

HTTP/1.1 200 OK

Content-Length: 0

Annex D (informative)

Bibliography

The following documents, in whole or in part, may be useful for understanding this document but they are not essential for its application. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

[10] *TelephonyArchitecture:2*, UPnP Forum, December 10, 2012. Available at: <http://www.upnp.org/specs/phone/UPnP-phone-TelephonyArchitecture-v2-20121210.pdf>. Latest version available at: <http://www.upnp.org/specs/phone/UPnP-phone-TelephonyArchitecture.pdf>.