



Two-way Audio Protocol  
for Grandstream DVS/IP camera

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## Introduction

This document defines the protocol which is used by the DVS/IP camera to establish a two-way audio call, as well as the format of audio packet.

## Two-way Audio Protocol

### Audio Packet Format

**Transport Protocol:** TCP

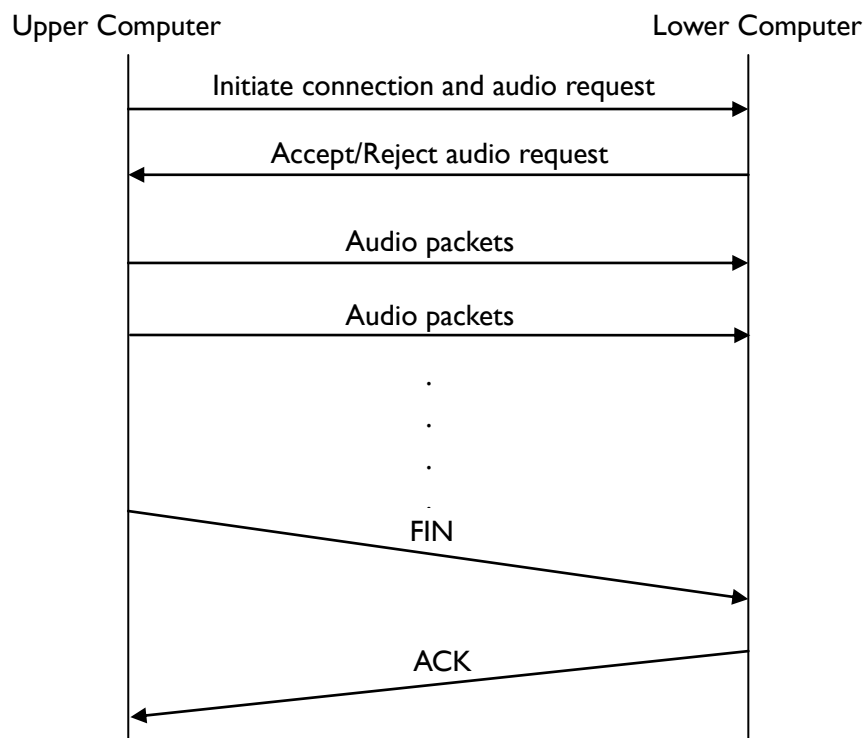
**Packet Format:** private header + audio frame + private header + audio frame...

**Private header Format:**

```
struct HEAD
{
    unsigned long    len : 10 ;          // In BYTE
    unsigned long    reserved : 22 ;
    unsinged long    timestamp ;
};
```

**DVS/IP camera:** reuse console port

### Communication diagram between client application and DVS/IP Camera



## Two-way Audio request and response

### 1. *Client sends two-way audio Request to the DVS/IP camera*

CMD:TALK MCTP/1.0 CS\n

@C@P@\n

**NOTE:** C – Channel ID

P – Audio Codec.

P = 0 for G726\_16K,

P = 1 for G726\_24K,

P = 2 for G726\_32K,

P = 3 for G726\_40K

### 2. *DVS/IP Camera responds to the request*

CMD:TALK MCTP/1.0 SC\n

@C@R@\n

**NOTE:** C – Channel ID

R – Execution Result. R=1 indicates success; R=0 indicates failure

## S NOTE

1. DVS/IP camera does not accept concurrent two-way audio requests. It would only accept one two-way audio request at one time.
2. If the DVS/IP camera does not receive audio packets within 10 seconds after connection is established, it will be disconnected from the client application.
3. The DVS/IP camera will drop some bad packets depends on the network situation if necessary.