

RTSP Inspector Report

Generated	2026-06-21T09:52:33.365Z
Session	sample-missing-sps-pps
URL	rtsp://camera.local/Streaming/Channels/101
Status	finished
Started	2026-06-21T09:18:41.557Z
Ended	2026-06-21T09:52:33.365Z
Transport	Tcp
User agent	rtsp-inspector/sample-report
Timeout	8000 ms

Diagnostic conclusion

Verdict	Action required
Root cause	Camera firmware, relay, or NVR path is sending media before required H.264 parameter sets are available.
Next action	Enable SPS/PPS with IDR frames, test the substream, and compare direct camera RTSP against the relayed path.
Confidence	96%
Failing step	H264 parameter sets missing before video payload
Stream score	92/100
Protocol health	100/100
Network health	100/100
Codec health	76/100

Evidence coverage

Coverage level	media
RTSP messages	10
SDP tracks	1
RTP packets	5
RTCP packets	1
Codec events	3
DESCRIBE OK	true
SETUP OK	true
PLAY OK	true
H264 parameter sets	false
H264 IDR	false

Missing for full media baseline: H264 SPS/PPS evidence, H264 IDR evidence

Video evidence

Codec	H264
Decode readiness	WaitingForKeyframe
Top finding	H264 parameter sets exist but no recovery frame was captured
Parameter sets	SPS, PPS
First recovery point	none
Access units	1

Video warning: fragment end missing

Video warning: RTP duplicated packets: 4

Video warning: RTP reordered packets: 3

Recommended fixes

Capture longer or reduce GOP/keyframe interval so startup sees an IDR/CRA.

Investigate network loss/reorder and compare RTP sequence lane with RTCP reports.

RTSP request/response summary

Time	Direction	Message	CSeq	Session	Notes
2026-06-21T09:18:41.557Z	client -> server	OPTIONS	1		
00:00:01.000	server -> client	401 Unauthorized	1		
00:00:02.000	client -> server	OPTIONS	2		
00:00:02.000	server -> client	200 OK	2		
00:00:03.000	client -> server	DESCRIBE	3		
00:00:03.000	server -> client	200 OK	3		body 612 bytes
00:00:04.000	client -> server	SETUP	4	4f2a9b88	
00:00:04.000	server -> client	200 OK	4	4f2a9b88	
00:00:05.000	client -> server	PLAY	5	4f2a9b88	
00:00:05.000	server -> client	200 OK	5	4f2a9b88	

RTP statistics

Stream	Track	SSRC	PT	Packets	Loss	Jitter	Bitrate	Window
video-main -ssrc-8f22 a11c	sdp-video-main	0x8f22a11c	96	1284	lost 0 / dup 4 / reorder 3	18.72 ms	3856000 bps	00:00:00.4 12 - 00:00:07.9...

RTCP information

Time	Packet type	SSRC	Channel	Length	Warning
00:00:01.230	Sender Report	0x8f22a11c	1	6	

Diagnostics

Severity	Confidence	Title	Evidence	Cause	Action
Error	96%	H264 parameter sets missing before video payload	DESCRIBE, SETUP, and PLAY succeeded, but RTP video started...	Camera firmware, relay, or NVR path is sending media before...	Enable SPS/PPS with IDR frames, test the substream, and...

Timeline timestamps

Time	Event	Severity	Details
00:00:00.000	RTSP control succeeded	Info	OPTIONS, DESCRIBE, SETUP, and PLAY returned 200 OK
00:00:01.220	Codec readiness failed	Error	RTP arrived before stable SPS/PPS evidence