



JCTVC-M0042: No display SEI message

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Problem

- Enable middle box to indicate that a particular coded picture be decoded but not displayed
- HEVC design includes `pic_output_flag` in slice segment header
 - Conditionally present based on presence flag in PPS
 - Following variable length coded syntax elements
- Difficult for a middle box to change the value of `pic_output_flag`

- JCTVC-L0179 proposed several solutions to enable easier middle box indication to not display a particular picture
- During the Geneva meeting discussion on several SEI messages was postponed until after the technical freeze of HEVC version 1
- Meeting notes for the review of JCTVC-L0179 note at the end, "Tentative plan is to consider creating an SEI message in a future version."

Proposed SEI message

- No payload data
- Prefix SEI message
- No persistence – applies only to current access unit

no_display(payloadSize) {	Descriptor
}	

D.3.25 No display SEI message semantics

The no display SEI message indicates that the current picture should not affect the content of the display.

Table D-1 – Persistence scope of SEI messages (informative)

SEI message	Persistence scope
..	
No display	The access unit containing the SEI message

sei_payload(payloadType, payloadSize) {	Descriptor
if(nal_unit_type == PREFIX_SEI_NUT)	
...	
else if(payloadType == 134)	
region_refresh_info(payloadSize)	
else if(payloadType == 135)	
no_display(payloadSize)	
else	
reserved_sei_message(payloadSize)	
else /* nal_unit_type == SUFFIX_SEI_NUT */	
if(payloadType == 3)	
filler_payload(payloadSize)	
...	

Conclusions

- Recommend to adopt for next release of HEVC