CLAIMS

What is Claimed:

1. An apparatus for decoding media content, comprising one or more processors, wherein the one or more processors are configured to:

obtain a parameter set associated with visual volumetric content;

receive a supplemental enhancement information (SEI) message that indicates which subset of a plurality of attribute sub-bitstreams indicated in the parameter set is active;

determine an active attribute sub-bitstream and an inactive attribute sub-bitstream based on the SEI message; and

decode the visual volumetric content using the active attribute sub-bitstream and skip the inactive attribute sub-bitstream.

2. An apparatus for encoding media content, comprising one or more processors, wherein the one or more processors are configured to:

determine that a subset of a plurality of attributes associated with visual volumetric content is active;

encode an attribute sub-bitstream associated with an attribute of the subset of the plurality of attributes;

include, in a bitstream, the attribute sub-bitstream associated with the attribute of the subset of the plurality of attributes; and

generate a message indicating that the subset of the plurality of attributes is active.

3. The apparatus of claim 2, wherein the message comprises a supplemental enhancement information (SEI) message.

4. The apparatus of claim 1, wherein the one or more processors are further configured to receive a bitstream that comprises the SEI message.

5. The apparatus of claim 1 or the apparatus of claim 3, wherein the SEI message has a persistence scope that persists until an end of a bitstream.

6. The apparatus of claim 1 or the apparatus of claim 3, wherein the SEI message has a persistence scope that persists until another SEI message that is different from the SEI message is received.

7. The apparatus of claim 1 or the apparatus of claim 3, wherein the SEI message comprises an indicator that indicates a number of active attribute sub-bitstreams in the subset of the plurality of attribute sub-bitstreams indicated in the parameter set associated with the visual volumetric content.

8. The apparatus of claim 1 or the apparatus of claim 3, wherein the parameter set comprises a visual volumetric video-based parameter set (VPS) that comprises attribute information for the plurality of attribute sub-bitstreams, wherein the SEI message refers to attribute information associated with the subset of the plurality of attribute sub-bitstreams.

9. A method for decoding media content, comprising:

obtaining a parameter set associated with visual volumetric content;

receiving a supplemental enhancement information (SEI) message that indicates which subset of a plurality of attribute sub-bitstreams indicated in the parameter set is active;

determining an active attribute sub-bitstream and an inactive attribute sub-bitstream based on the SEI message; and

decoding the visual volumetric content using the active attribute sub-bitstream and skipping the inactive attribute sub-bitstream.

10. A method for encoding media content, comprising:

determining that a subset of a plurality of attributes associated with visual volumetric content is active;

encoding an attribute sub-bitstream associated with an attribute of the subset of the plurality of attributes;

including, in a bitstream, the attribute sub-bitstream associated with the attribute of the subset of the plurality of attributes; and

generating a message indicating that the subset of the plurality of attributes is active.

11. The method of claim 10, wherein the message comprises a supplemental enhancement information (SEI) message.

12. The method of claim 9, wherein the method further comprises receiving a bitstream that comprises the SEI message.

13. The method of claim 9 or the method of claim 11, wherein the SEI message has a persistence scope that persists until an end of a bitstream, or the SEI message has a persistence scope that persists until another SEI message that is different from the SEI message is received.

14. A computer readable medium including instructions for causing one or more processors to perform the method of any one of claims 9-13.

15. A signal comprising the SEI message according to the method of any one of claims 9 and 11-13.