Claims

1. A method of decoding a video, the method comprising:

obtaining, from a bitstream, a skip flag for a coding unit which indicates whether a encoding mode of the coding unit is a skip mode;

when the skip flag indicates a skip mode of the coding unit, obtaining, from the bitstream, a merge index indicating one block among a candidate block group of the skip mode;

when the skip flag indicates a non-skip mode of the coding unit, obtaining, information about a partition type and merge information for a partition among the at least one partition;

when the merge information for a partition indicates a merge mode for a current partition, obtaining, from the bitstream, a merge index of the current partition which indicates a block among a candidate block group of the merge mode; and

determining motion information of the current partition using motion information of the block indicated by the merge index of the current partition,

wherein the candidate block group of the merge mode includes at least one candidate block among neighboring blocks of the current partition, the neighboring blocks include a lower-left block which is diagonally adjacent to a lower-left corner of the coding unit,

when the information about a partition type is obtained from the bitstream, at least one partition including the current partition is determined from the coding unit based on the information about partition type, and

when a left partition and a right partition are determined as at least one partition and the current partition is the right partition, the candidate block group of the merge mode does not include the left partition.

2. The method of claim 1 further comprises performing motion compensation on the coding unit using motion information of a block indicated by the merge index,

wherein the merge index of the coding unit indicates one among a left block, a upper block, a upper-left block, a upper-right block and the diagonally lower-left block which are adjacent to the borders of the coding unit.

3. The method of claim 1, wherein the candidate block group of the merge mode includes blocks of predetermined locations among neighboring blocks of the coding unit, and the neighboring blocks include a lower-left block which is diagonally adjacent to a lower-left corner of the coding unit.

4. The method of claim 1 further comprises:

when the merge information of the partition indicates the merge mode, performing motion compensation on the current partition using motion information of a block among blocks adjacent to the current partition; and

when the merge information of the partition does not indicate the merge mode, obtaining motin information of the current partition from the bitstream and performing motion compensation on the current partition using the obtained motion information of the current partition.

Claims

1.

1. A method of decoding a video, the method comprising:

obtaining, from a bitstream, a skip flag of a coding unit indicating whether an prediction mode of the coding unit is a skip mode;

when the prediction mode of the coding unit is the skip mode according to the skip flag, obtaining, from the bitstream, a merge index indicating one block in a candidate block group of the skip mode;

when the prediction mode of the coding unit is not the skip mode according to the skip flag, obtaining, from the bitstream, information about a partition type and merge information of a partition;

when the merge information of the partition indicates a merge mode of a current partition, obtaining, from the bitstream, a merge index of the current partition indicating one block in a candidate block group of the merge mode; and

determining motion information of the current partition by using motion information of a block indicated by the merge index of the current partition,

wherein the candidate block group of the merge mode comprises one or more blocks among neighboring blocks of the current partition, and the neighboring blocks comprise a lower left block that is diagonally adjacent to a lower left corner of the current partition,

wherein when the information about the partition type is extracted from the bitstream, one or more partitions comprising the current partition are determined from the coding unit based on the information about the partition type,

wherein when the one or more partitions are determined as a left partition and a right partition and the current partition is the right partition, the candidate block group of the merge mode does not comprise the left partition.

2. The method of claim 1, further comprising performing motion compensation on the coding unit by using motion information of a block indicated by a merge index of the coding unit,

wherein the merge index of the coding unit indicates one of a left neighboring block, an upper neighboring block, an upper left neighboring block, and an upper right neighboring block that are adjacent to a boundary of the coding unit and a lower left neighboring block that is diagonally adjacent to a lower left corner of the coding unit.

3. The method of claim 1, wherein the candidate block group of the skip mode comprises blocks whose positions are previously determined among neighboring blocks of the coding unit, and the neighboring blocks comprise a lower left block that is diagonally adjacent to a lower left corner of the coding unit.

4. The method of claim 1, further comprising:

when merge information of the current partition indicates the merge mode, performing motion compensation on the current partition by using the motion information of the block indicated by the merge index of the current partition; and

when the merge information of the current partition does not indicate the merge mode, obtaining the motion information of the current partition from the bitstream and performing motion compensation on the current partition by using the obtained motion information.