CLAIMS

1. A method of coding implemented by a decoding device or an encoding device, the method comprising:

obtaining a value of an angle parameter for a current block, a value of a distance index, a value of a width of the current block and a value of a height of the current block;

obtaining a first value according to the value of the angle parameter and a value obtained by comparing the value of the width and the value of the height;

calculating a sample distance value for a sample in the current block according to the first value, the value of the angle parameter, the value of the distance index and the value of the width and the value of the height; and

obtaining a prediction value for the sample in the current block according to the sample distance value,

wherein the obtaining a prediction value for the sample in the current block according to the sample distance value comprises:

calculating two weighting factors according to the sample distance value;

obtaining the prediction value for the sample in the current block according to a first prediction value, a second prediction value and the two weighting factors.

2.The method of claim 1, wherein the sample distance value represents the horizontal distance or the vertical distance, or a combination of the vertical and horizontal distance, of the sample to a separation line, wherein the separation line is used to divide a coding block into two subblocks.

3. The method of claim 1, wherein the ratio value is obtained according to,

whRatio = (W >= H) ? W/H : H/W,

wherein whRatio is the ratio value, W is the value of the width, H is the value of the height.

4.The method of any one of claims 1 to 3, wherein the value of angle parameter is an integer value, and a value range for the value of angle parameter is between 0 to 31, including 0 and 31.

5. The method of claim 1 or claim 4, wherein the ratio value is obtained according to,

whRratio = (wIdx >= hIdx) ? wIdx − hIdx : hIdx – wIdx,

where whRatio is the ratio value, W is the value of the width, H is the value of the height, a value of wIdx is equal to log2(W) – 3, and a value of hIdx is equal to log2(H) – 3.

6. The method of any one of claims 1 to 5, wherein the sample distance value is calculated according to,

sample_dist = ((2*x) − W + K)*f1(alpha) + ((2*y) − H + K))*f2(alpha) − distanceIdx*stepD*scaleStep,

wherein sample_dist is the sample distance value, f1() and f2() are functions, and alpha is the value of the angle parameter; stepD is the first value, a value of scaleStep is equal to either the value of the width W or the value of the height H; x and y are the coordinates of the sample with respect to the top-left sample of the current block; and K is an integer offset value.

7. The method of any one of claims 1 to 5, wherein the sample distance value is calculated according to,

sample_dist = ((2*x) − W + K)*f(dispIdxN) + ((2*y) − H + K))*f(dispIdxS) − distanceIdx*stepD*scaleStep,

where sample_dist is the sample distance value, f() is a function, dispIdxN or dispIdxS are index values, stepD is the first value, a value of scaleStep is equal to either the value of the width W or the value of the height H, x and y are the coordinates of the sample with respect to

the top-left sample of the current block, K is an integer offset value.

8. The method of any one of claims 1 to 7, wherein the ratio value between the value of the width and the value of height is greater than 0, when the value of height is greater than the value of the width.

9. A decoder (30) or an encoder comprising processing circuitry for carrying out the method according to any one of claims 1 to 8.

10. A computer program product comprising a program code for performing the method according to any one of claims 1 to 8.

11. A decoder or an encoder, comprising:

one or more processors; and

a non-transitory computer-readable storage medium coupled to the processors and storing programming for execution by the processors, wherein the programming, when executed by the processors, configures the decoder to carry out the method according to any one of claims 1 to 8.

12. A computer-readable medium comprising a bitstream encoded/decoded by the method of any one of claims 1 to 8.