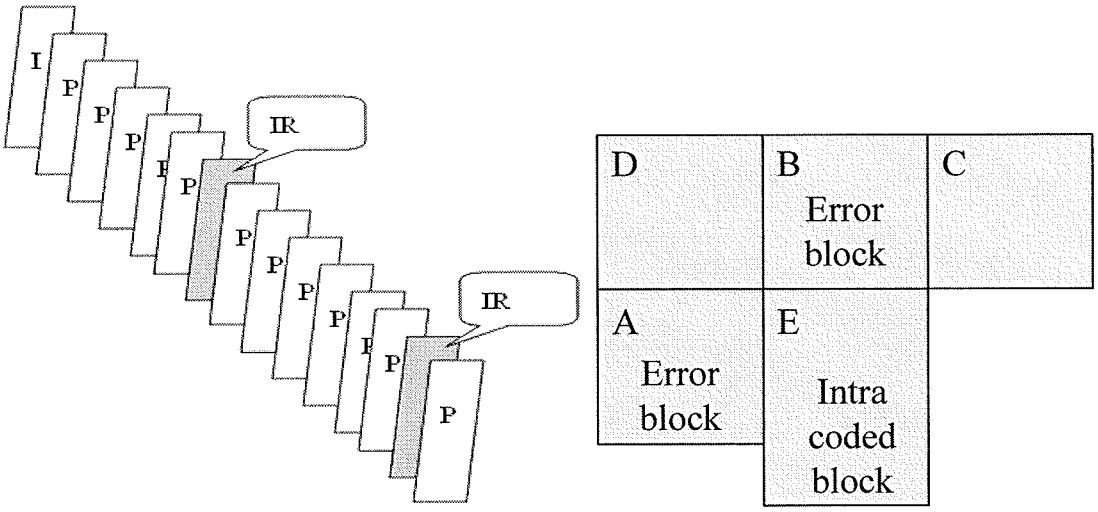

I
P
P
P
P
IR
P
P
P
P
P
P
IR
P
D
B
Error block
C
A
Error block
E
Intra coded block

FIG. 1

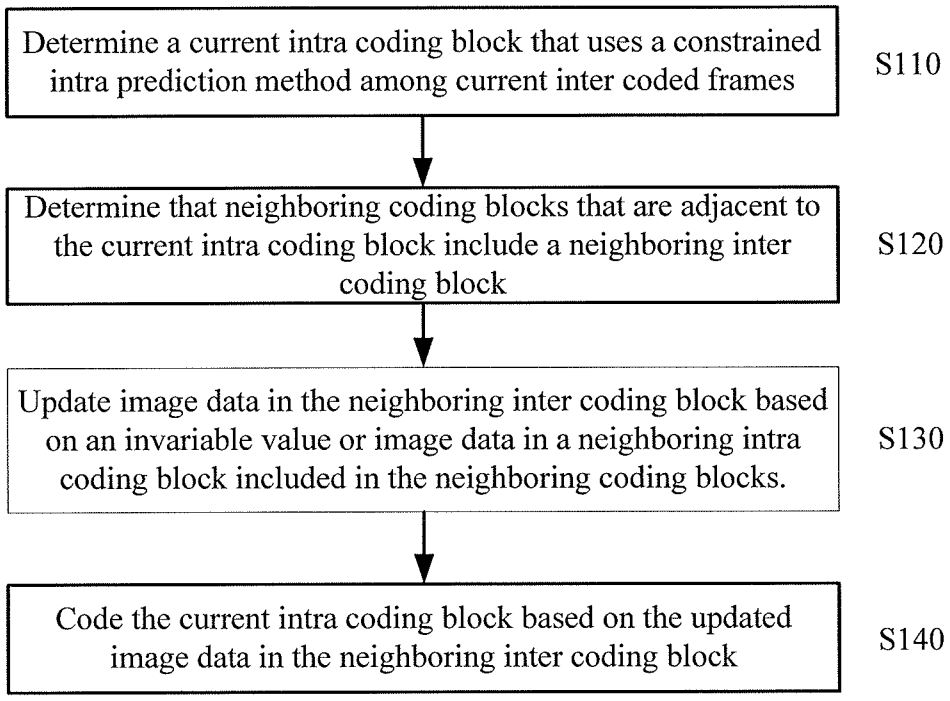

Determine a current intra coding block that uses a constrained intra prediction method among current inter coded frames
S110
Determine that neighboring coding blocks that are adjacent to the current intra coding block include a neighboring inter coding block
S120
Update image data in the neighboring inter coding block based on an invariable value or image data in a neighboring intra coding block included in the neighboring coding blocks.
S130
Code the current intra coding block based on the updated image data in the neighboring inter coding block
S140

FIG. 2

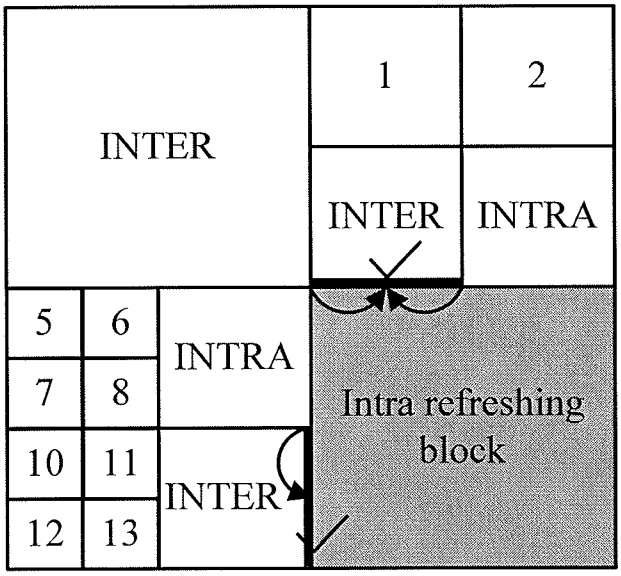

INTER
1
2
INTER
INTRA
5
6
7
8
INTRA
Intra refreshing block
10
11
12
13
INTER

FIG. 3

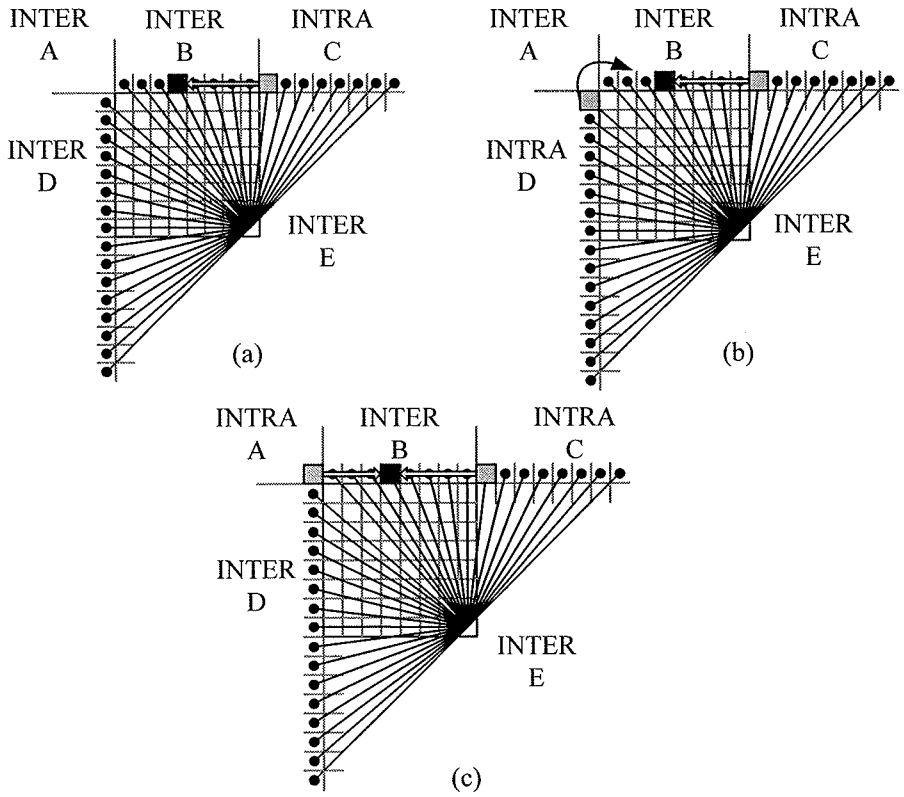

INTER A
INTER B
INTRA C
INTER D
INTER E
(a)
INTER A
INTER B
INTRA C
INTRA D
INTER E
(b)
INTRA A
INTER B
INTRA C
INTER D
INTER E
(c)

FIG. 4

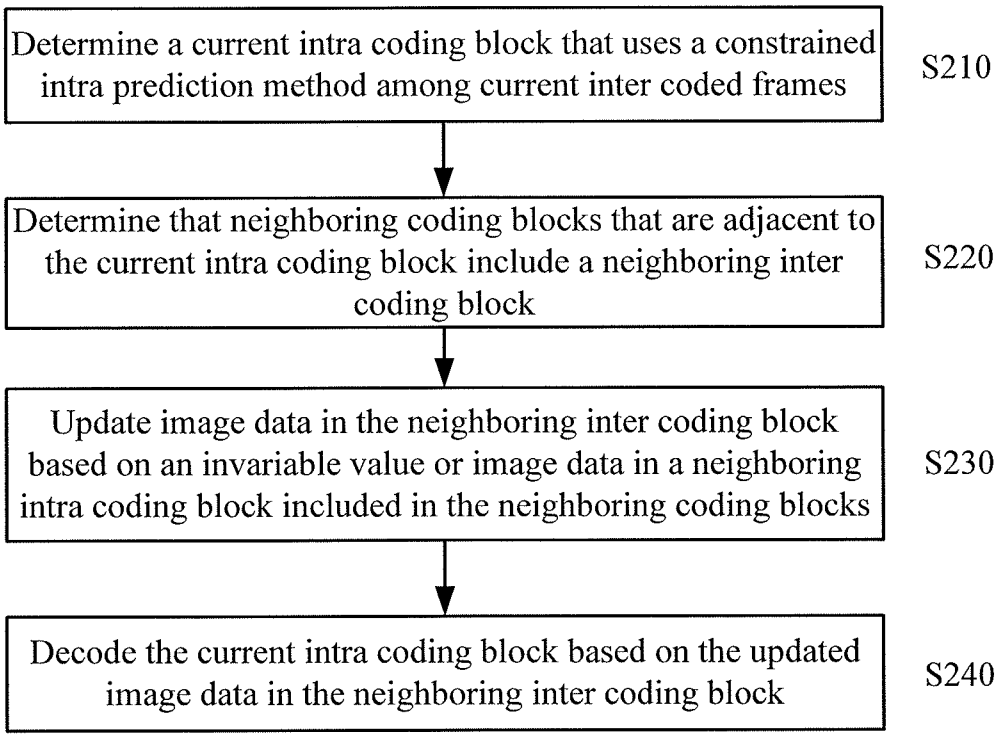

Determine a current intra coding block that uses a constrained intra prediction method among current inter coded frames
S210
Determine that neighboring coding blocks that are adjacent to the current intra coding block include a neighboring inter coding block
S220
Update image data in the neighboring inter coding block based on an invariable value or image data in a neighboring intra coding block included in the neighboring coding blocks
S230
Decode the current intra coding block based on the updated image data in the neighboring inter coding block
S240

FIG. 5

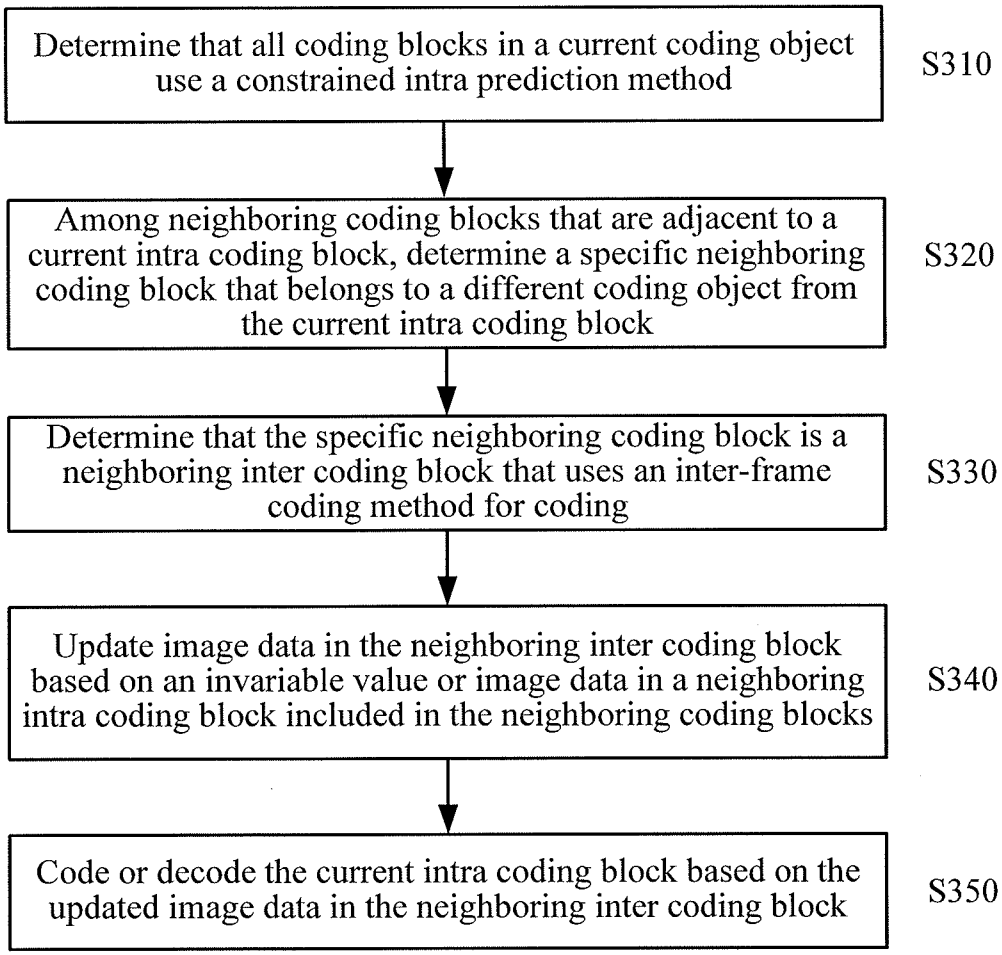

Determine that all coding blocks in a current coding object use a constrained intra prediction method
S310
Among neighboring coding blocks that are adjacent to a current intra coding block, determine a specific neighboring coding block that belongs to a different coding object from the current intra coding block
S320
Determine that the specific neighboring coding block is a neighboring inter coding block that uses an inter-frame coding method for coding
S330
Update image data in the neighboring inter coding block based on an invariable value or image data in a neighboring intra coding block included in the neighboring coding blocks
S340
Code or decode the current intra coding block based on the updated image data in the neighboring inter coding block
S350

FIG. 6

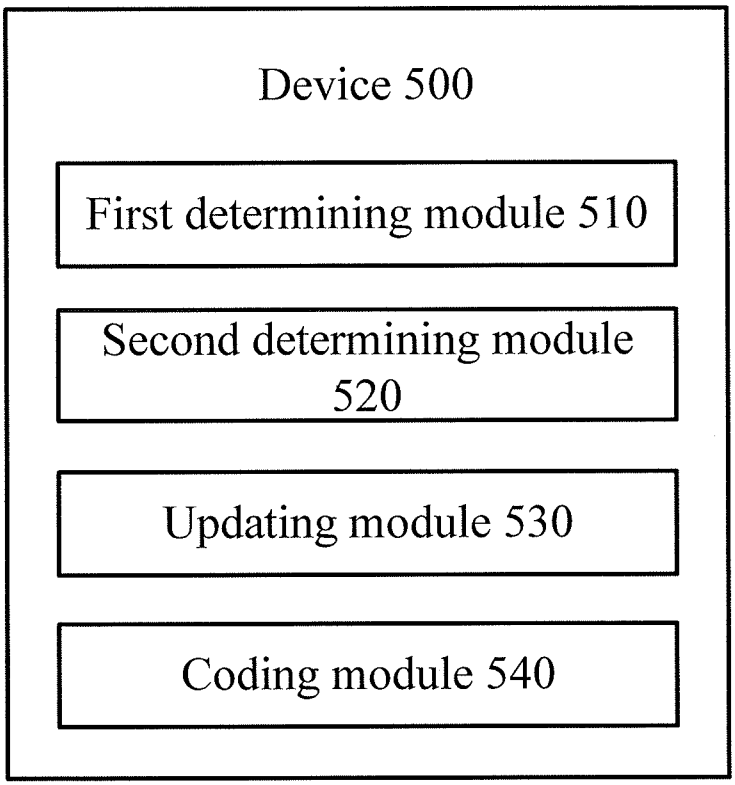

Device 500
First determining module 510
Second determining module 520
Updating module 530
Coding module 540

FIG. 7

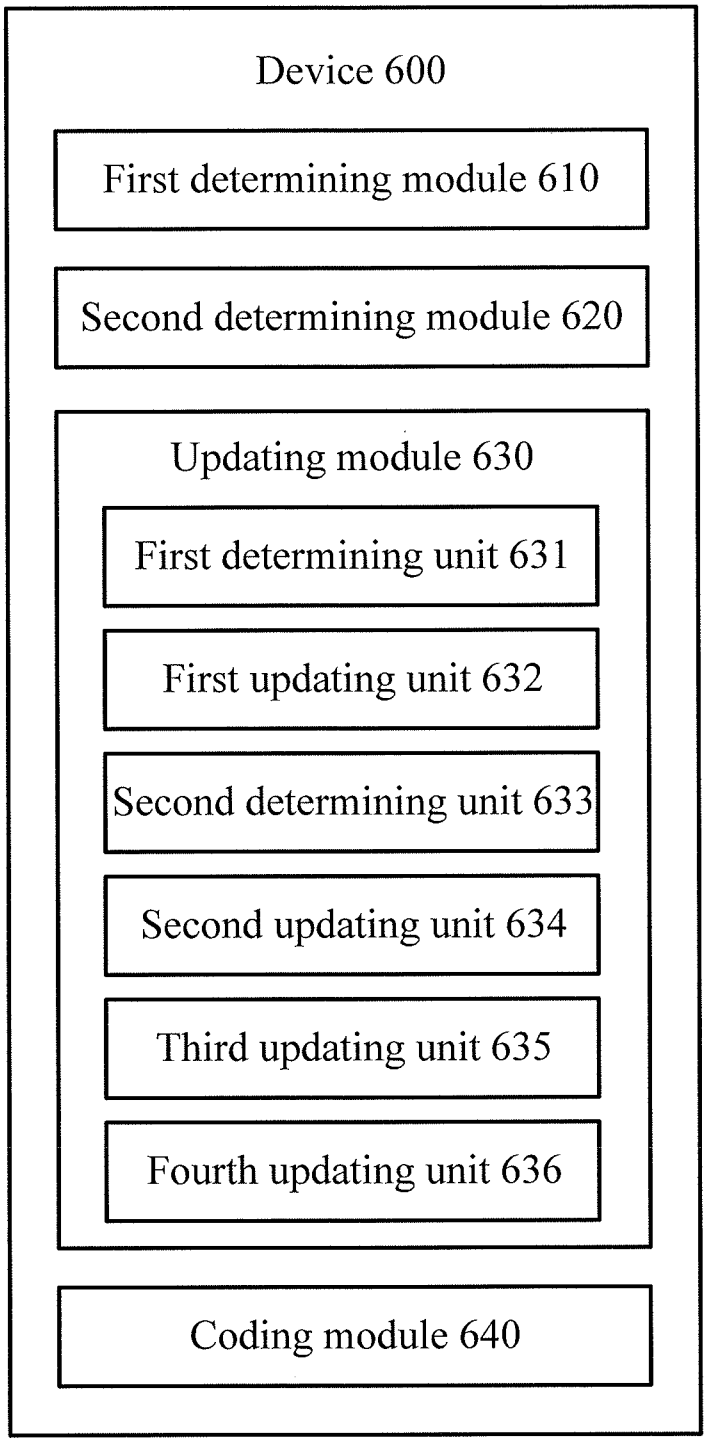

Device 600
First determining module 610
Second determining module 620
Updating module 630
First determining unit 631
First updating unit 632
Second determining unit 633
Second updating unit 634
Third updating unit 635
Fourth updating unit 636
Coding module 640

FIG. 8

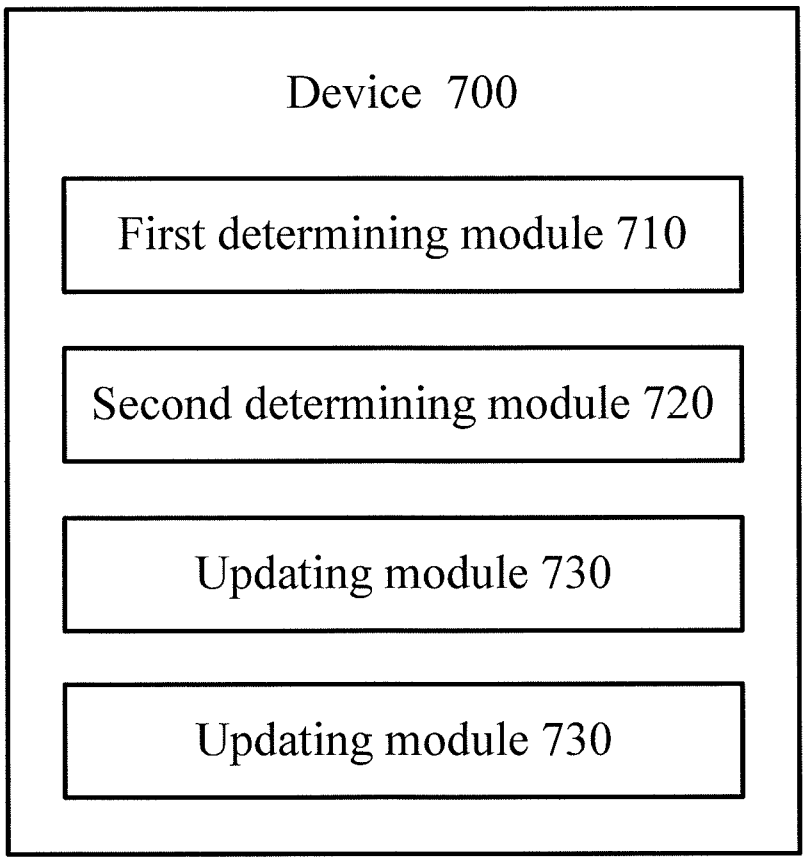

Device 700
First determining module 710
Second determining module 720
Updating module 730
Updating module 730

FIG. 9

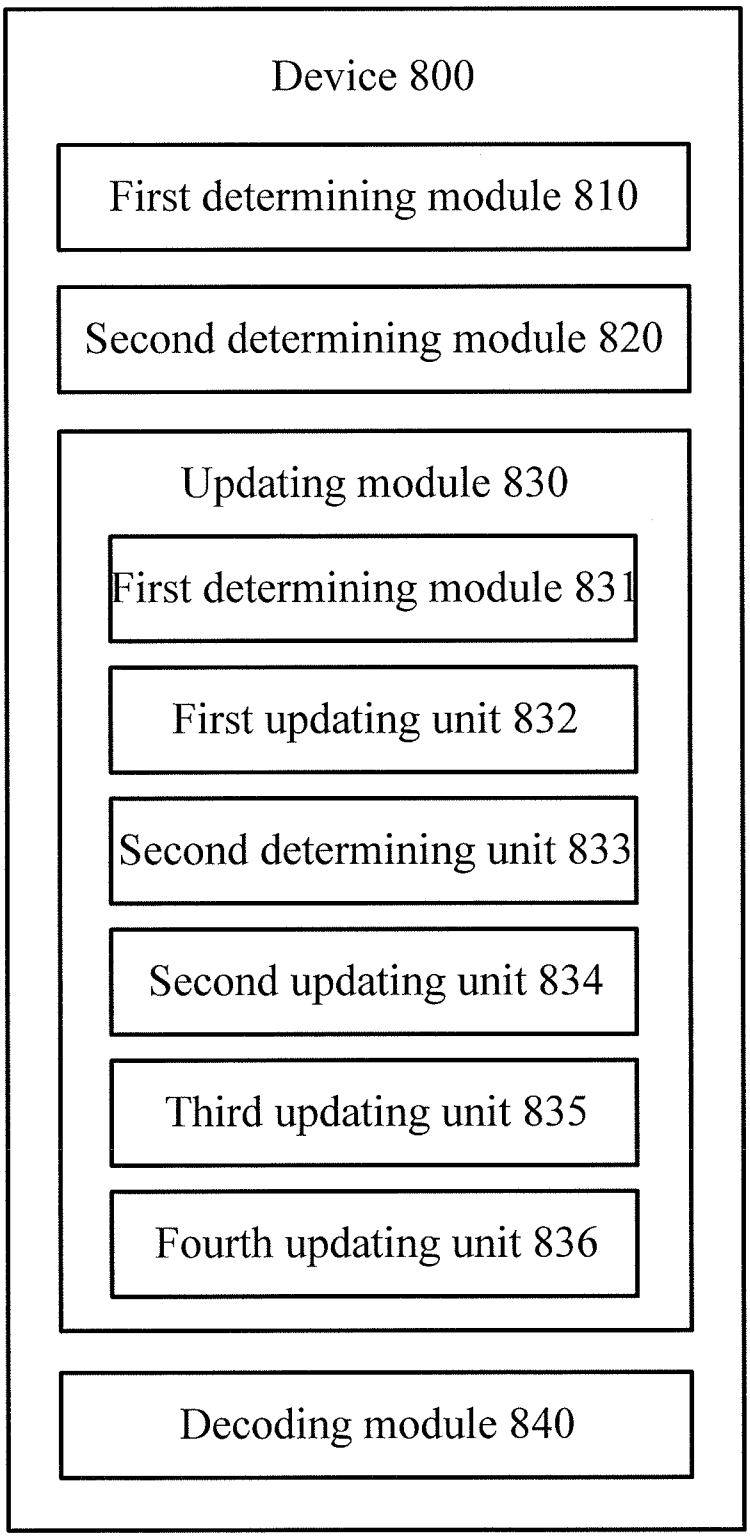

Device 800
First determining module 810
Second determining module 820
Updating module 830
First determining module 831
First updating unit 832
Second determining unit 833
Second updating unit 834
Third updating unit 835
Fourth updating unit 836
Decoding module 840

FIG. 10

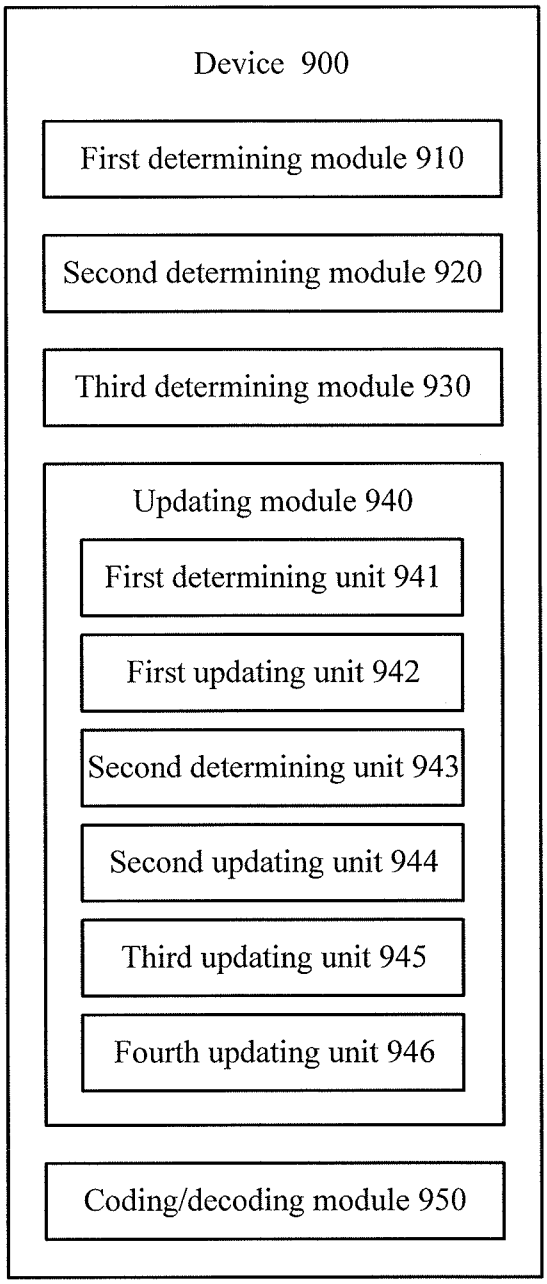

Device 900
First determining module 910
Second determining module 920
Third determining module 930
Updating module 940
First determining unit 941
First updating unit 942
Second determining unit 943
Second updating unit 944
Third updating unit 945
Fourth updating unit 946
Coding/decoding module 950

FIG. 11