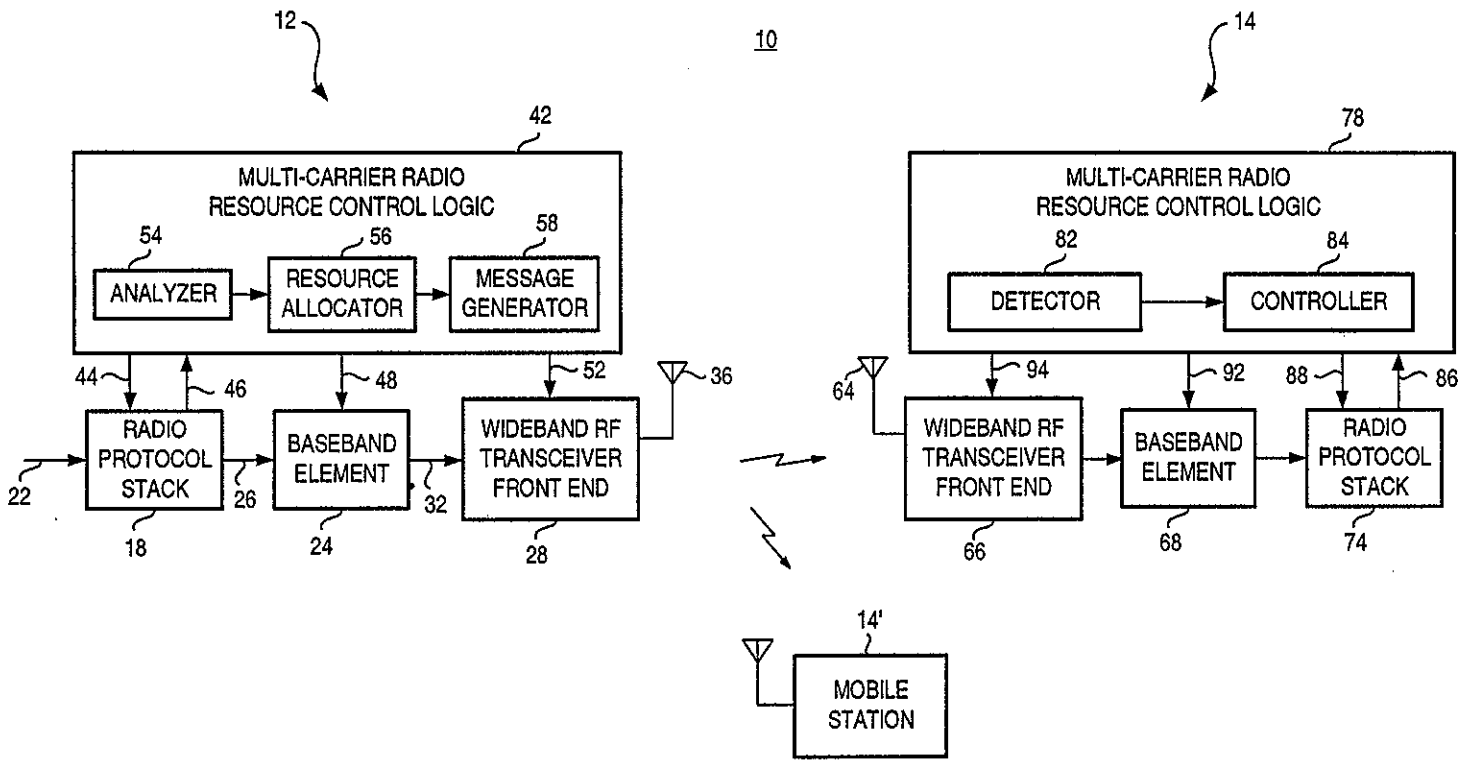

12
10
14
42
MULTI-CARRIER RADIO
RESOURCE CONTROL LOGIC
54
ANALYZER
56
RESOURCE
ALLOCATOR
58
MESSAGE
GENERATOR
44
46
48
52
36
22
RADIO
PROTOCOL
STACK
26
BASEBAND
ELEMENT
32
WIDEBAND RF
TRANSCEIVER
FRONT END
18
24
28
78
MULTI-CARRIER RADIO
RESOURCE CONTROL LOGIC
82
DETECTOR
84
CONTROLLER
64
94
92
88
86
WIDEBAND RF
TRANSCEIVER
FRONT END
BASEBAND
ELEMENT
RADIO
PROTOCOL
STACK
66
68
74
14'
MOBILE
STATION

FIG. 1

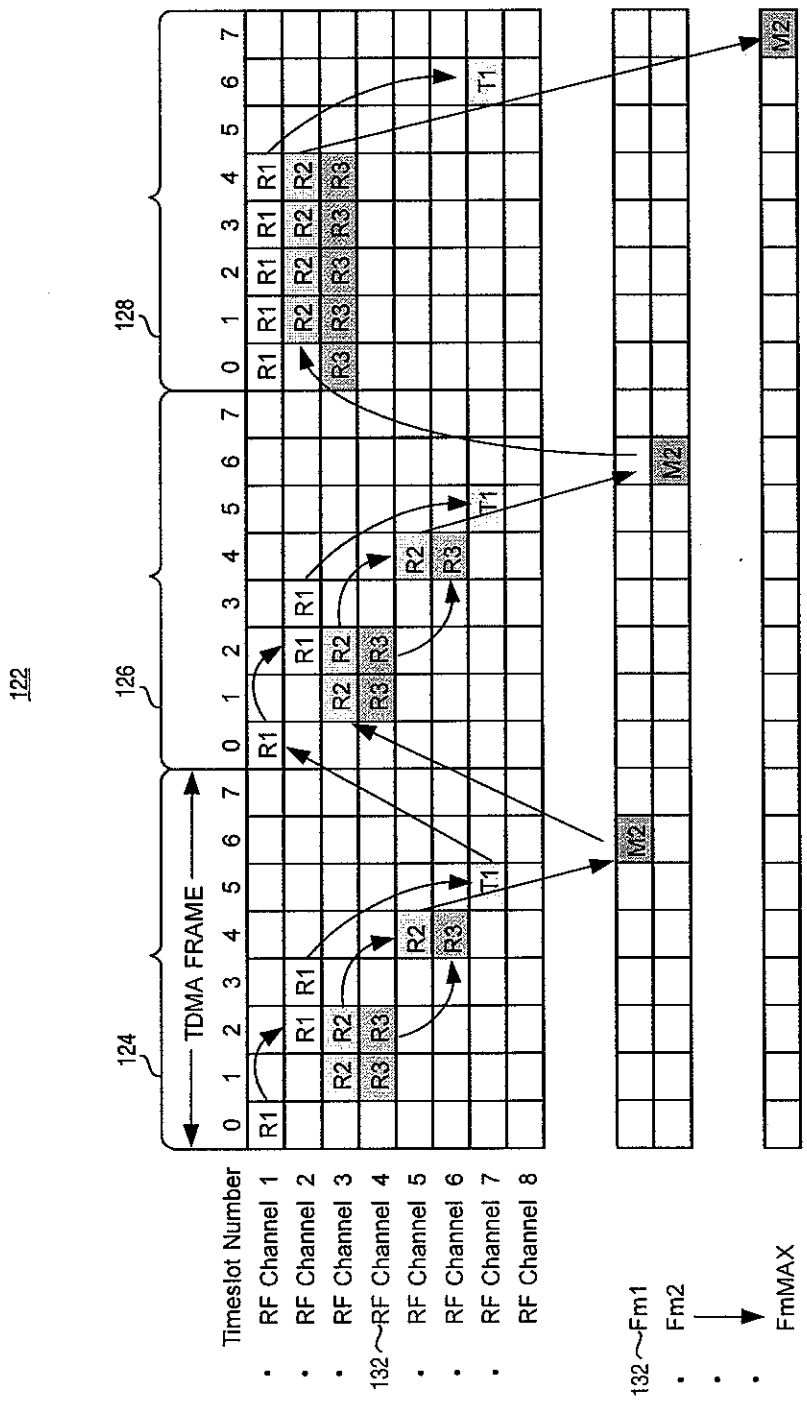

122
124
126
128
TDMA FRAME
Timeslot Number
RF Channel 1
RF Channel 2
RF Channel 3
132 RF Channel 4
RF Channel 5
RF Channel 6
RF Channel 7
RF Channel 8
132 Fm1
Fm2
FmMAX
R1
R2
R3
T1
M2

FIG. 2

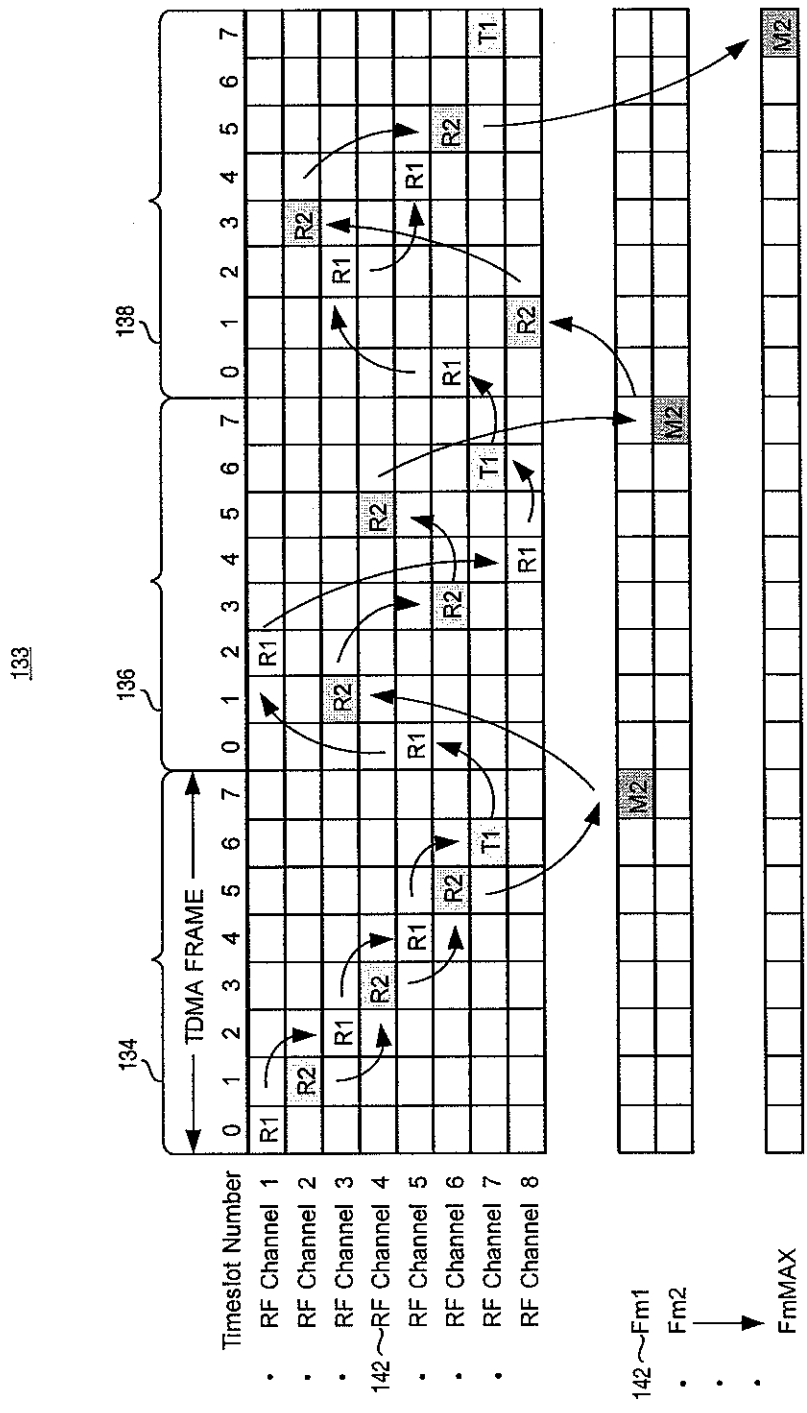

133
134
136
138
TDMA FRAME
0 1 2 3 4 5 6 7
Timeslot Number
RF Channel 1
RF Channel 2
RF Channel 3
142 RF Channel 4
RF Channel 5
RF Channel 6
RF Channel 7
RF Channel 8
R1
R2
T1
M2
142 Fm1
Fm2
FmMAX

FIG. 3

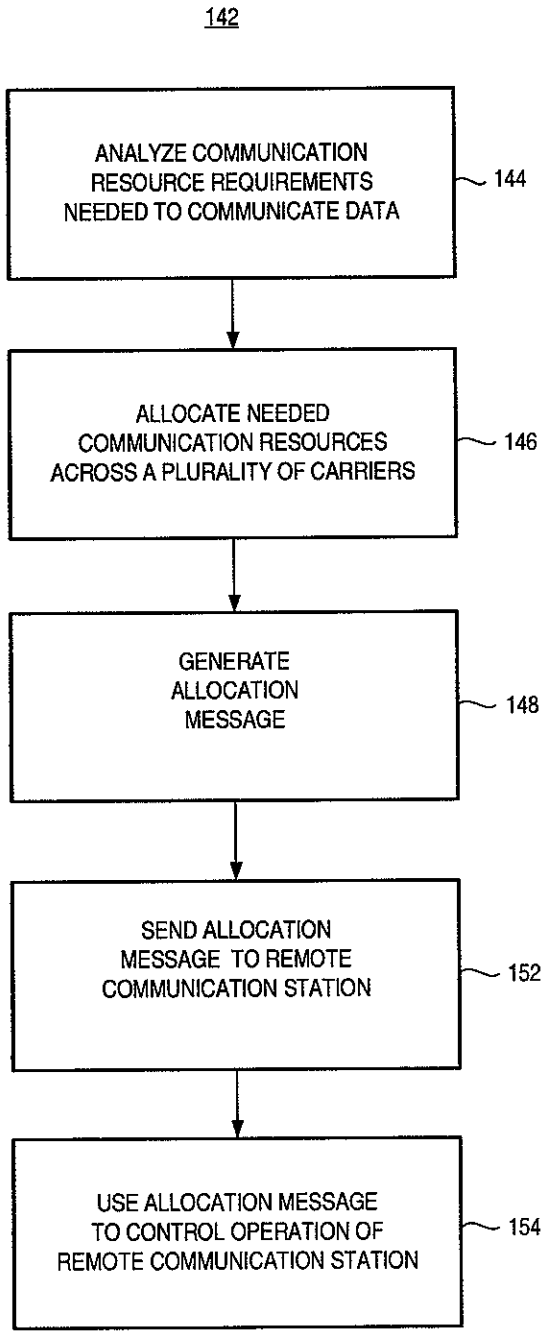

142
ANALYZE COMMUNICATION RESOURCE REQUIREMENTS NEEDED TO COMMUNICATE DATA
144
ALLOCATE NEEDED COMMUNICATION RESOURCES ACROSS A PLURALITY OF CARRIERS
146
GENERATE ALLOCATION MESSAGE
148
SEND ALLOCATION MESSAGE TO REMOTE COMMUNICATION STATION
152
USE ALLOCATION MESSAGE TO CONTROL OPERATION OF REMOTE COMMUNICATION STATION
154

FIG. 4