

FIG. 1

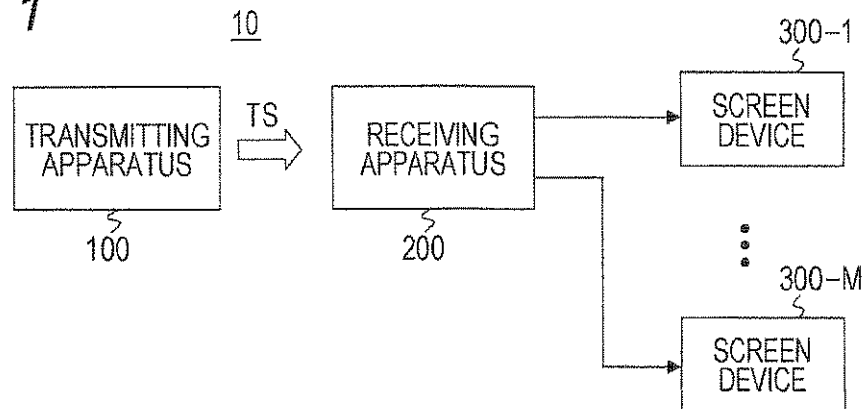


FIG. 2

(a)

Screen_id Table	
Screen_id	BASIC SCREEN
Screen_id = 0	reserved
Screen_id = 1	(Forward Center)
Screen_id = 2	(Forward Left)
Screen_id = 3	(Forward Right)
Screen_id = 4	(Side Left)
Screen_id = 5	(Side Right)
Screen_id = 6	(Rear Left)
Screen_id = 7	(Rear Right)
Screen_id = 8	(Rear Center)

(b)

TABLE INDICATIVE OF DISPLAY TARGET SCREEN SPECIFICATION OF Stream_screen_id	
Screen_id	Stream_screen_id
1	1
2	2
3	3
•	•
•	•

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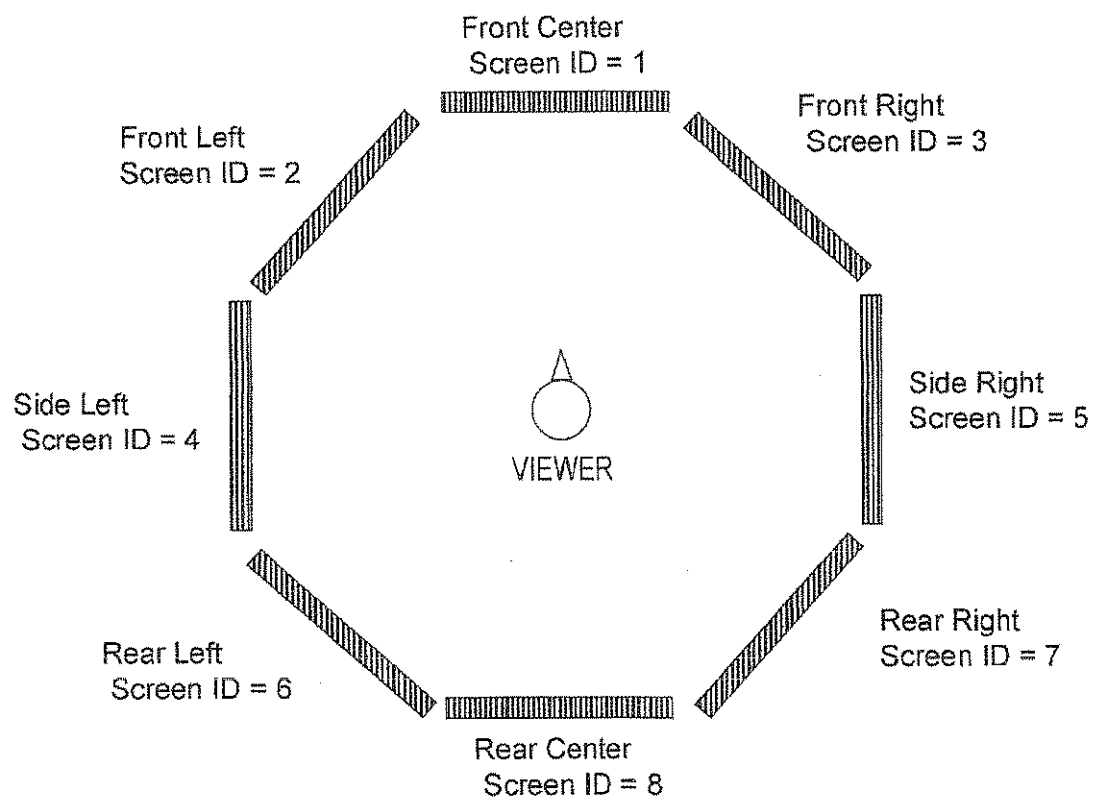
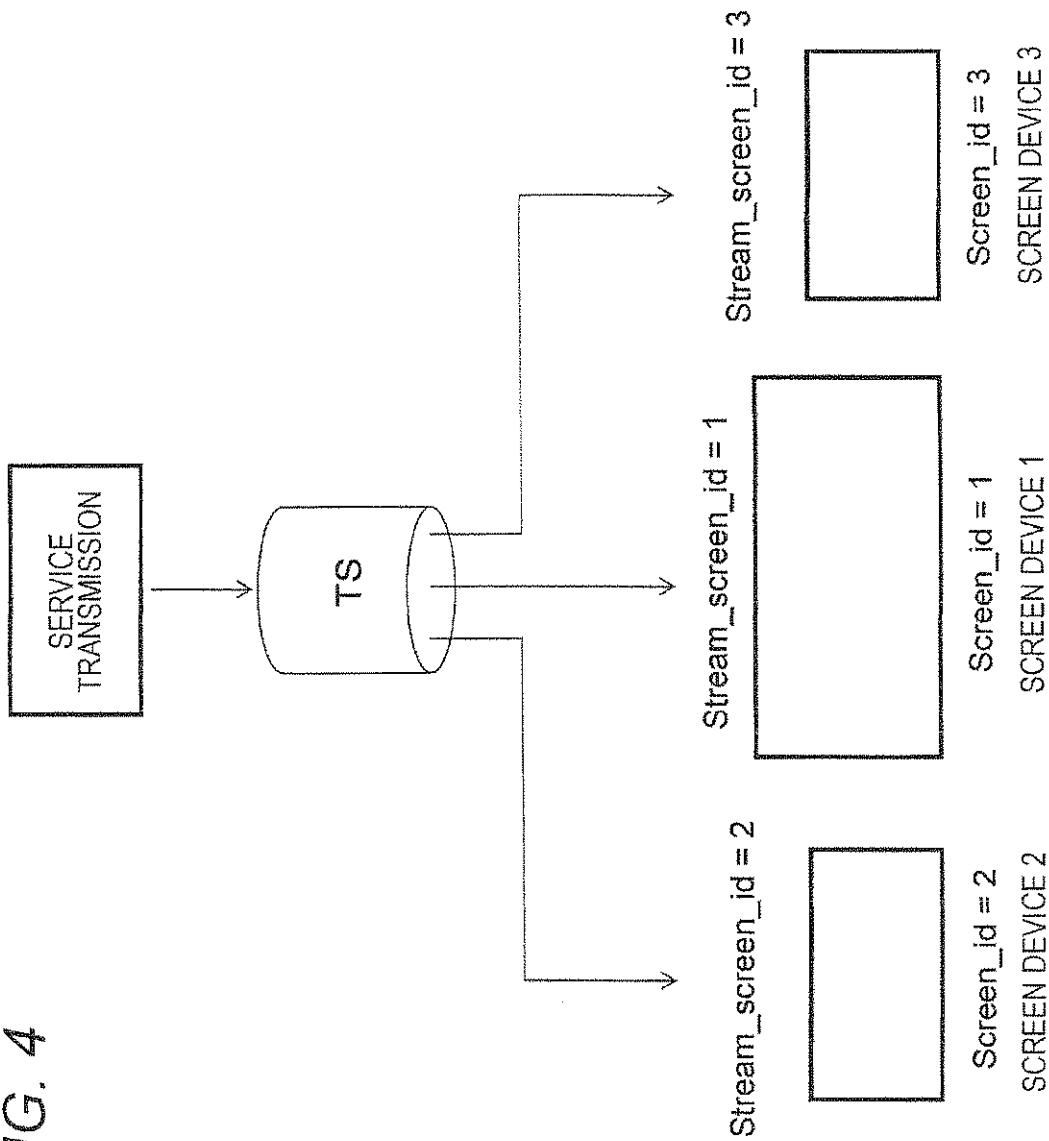
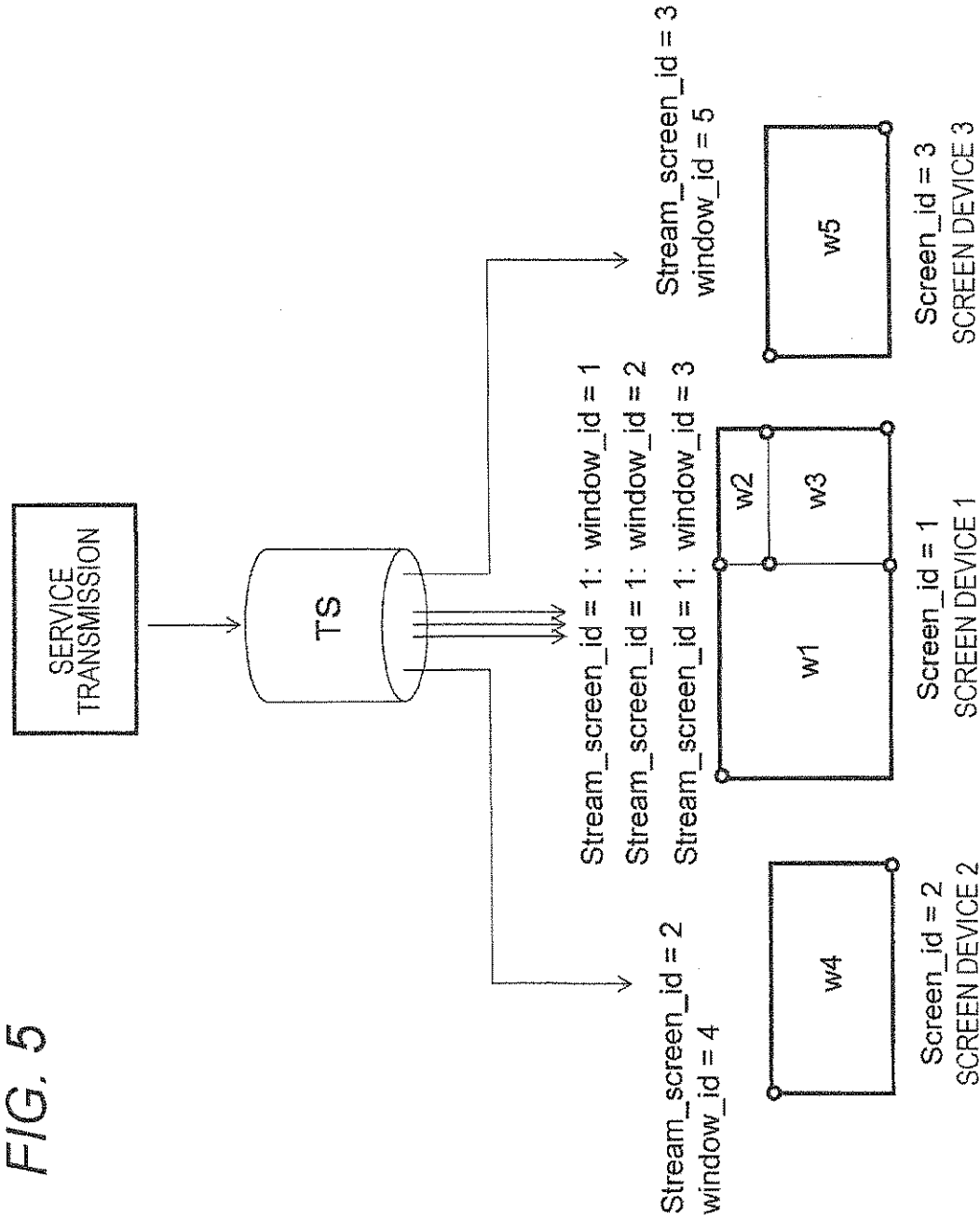
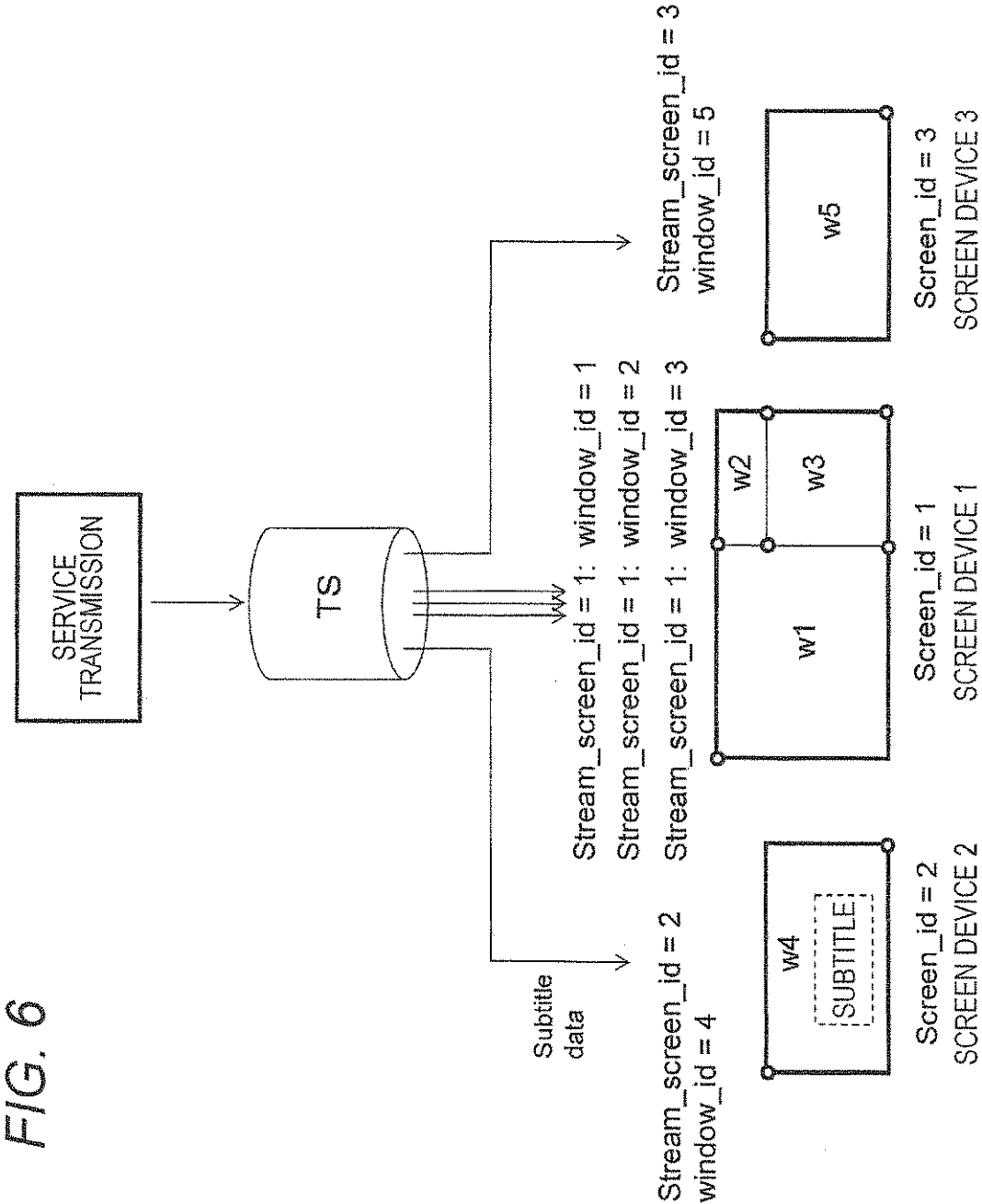
FIG. 3

FIG. 4







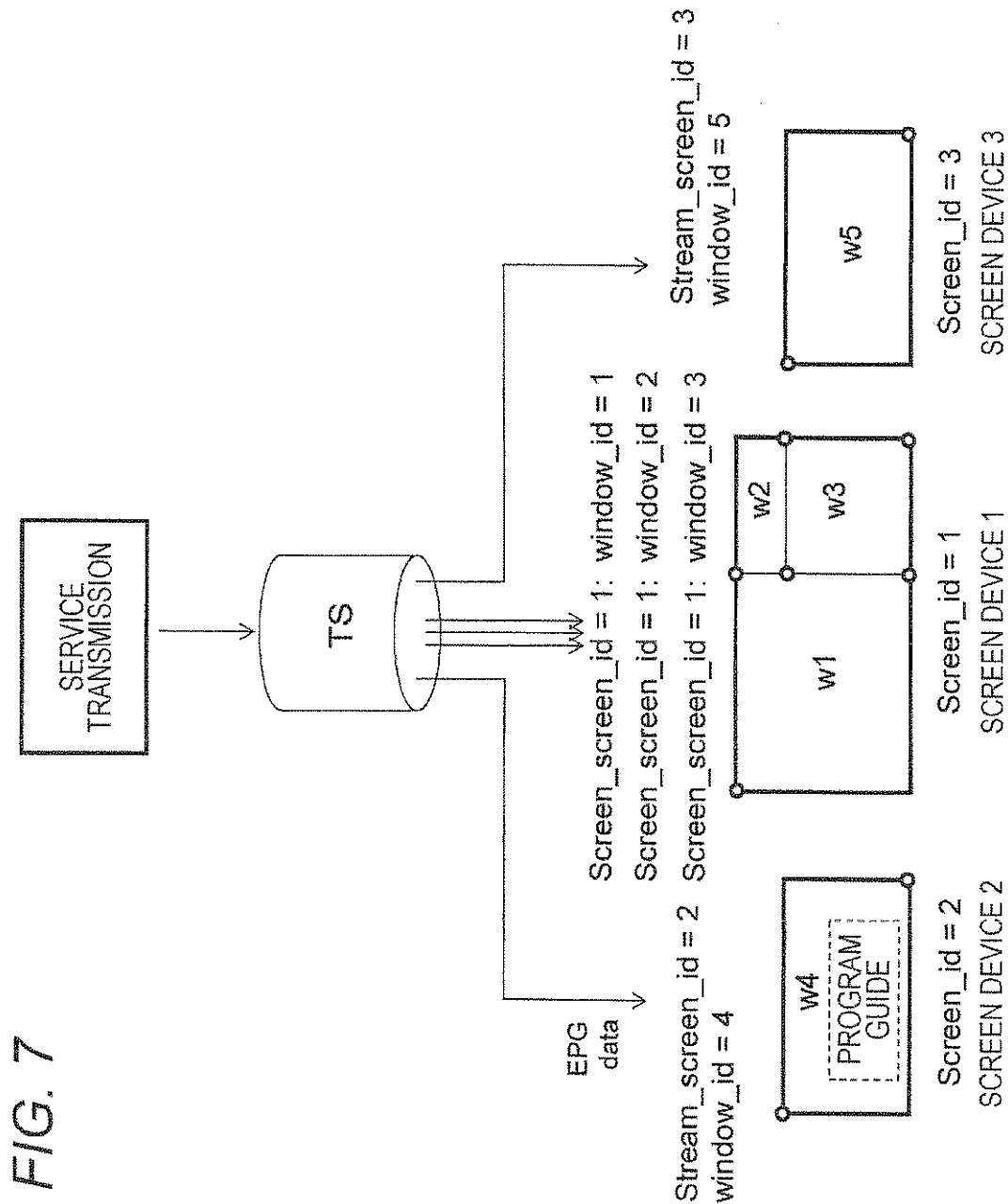


FIG. 8

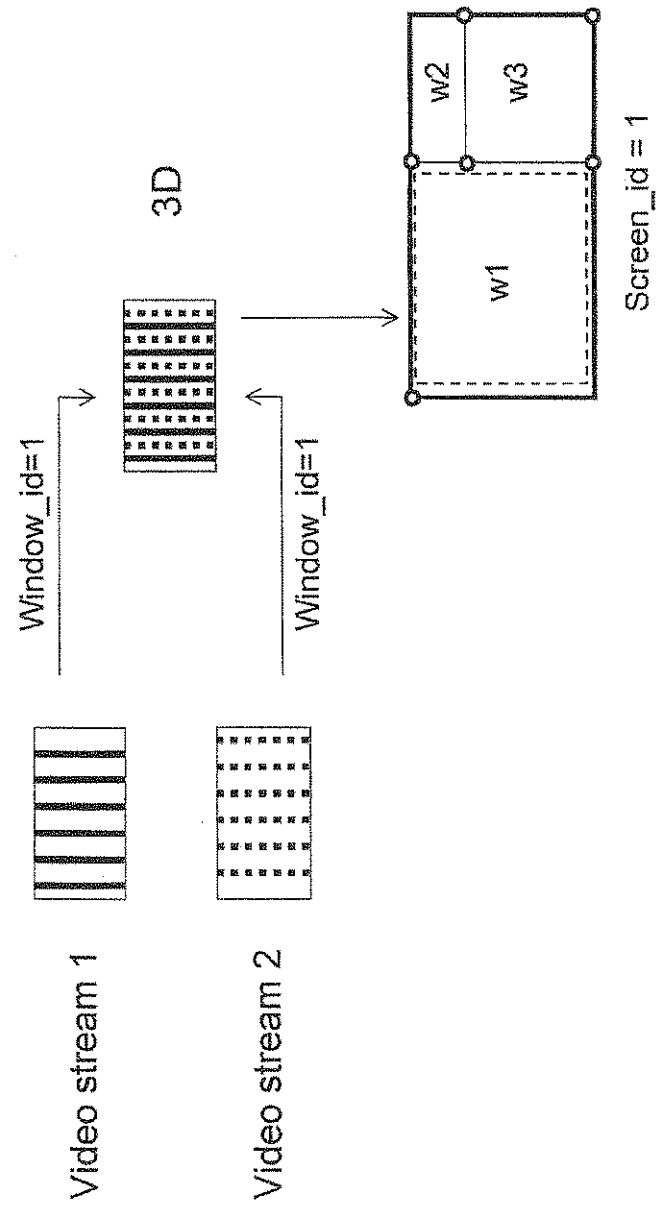


FIG. 9

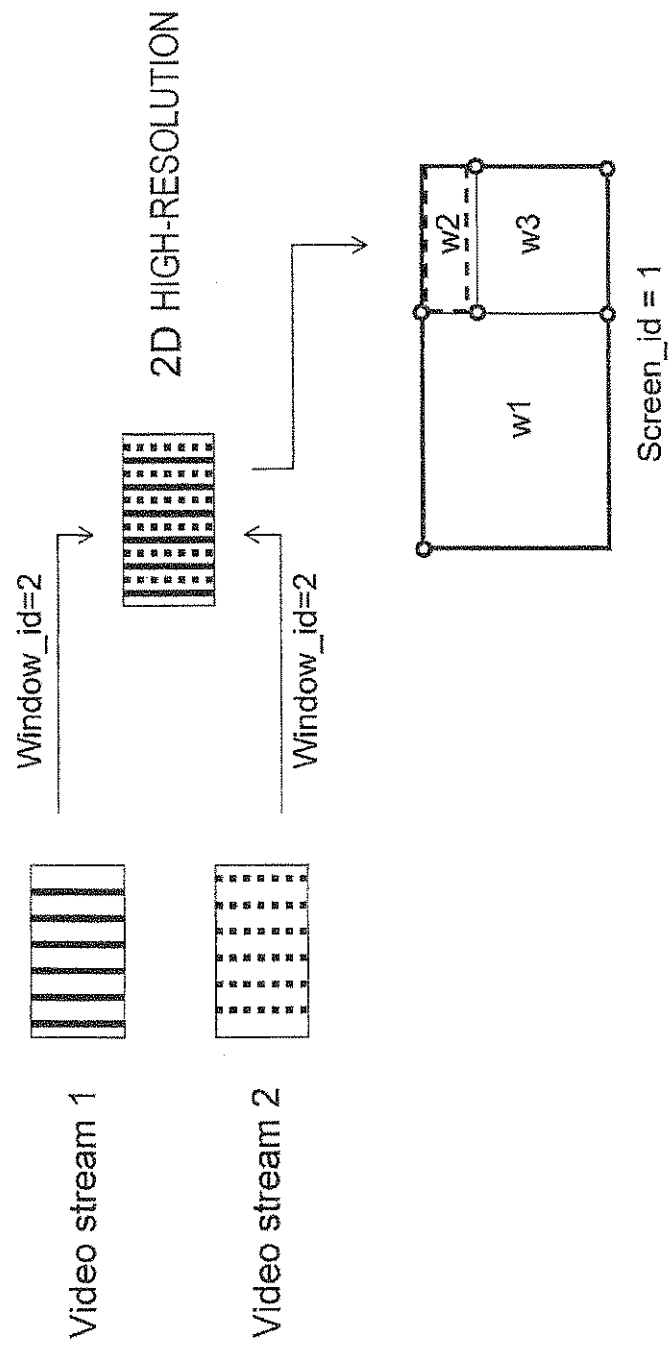
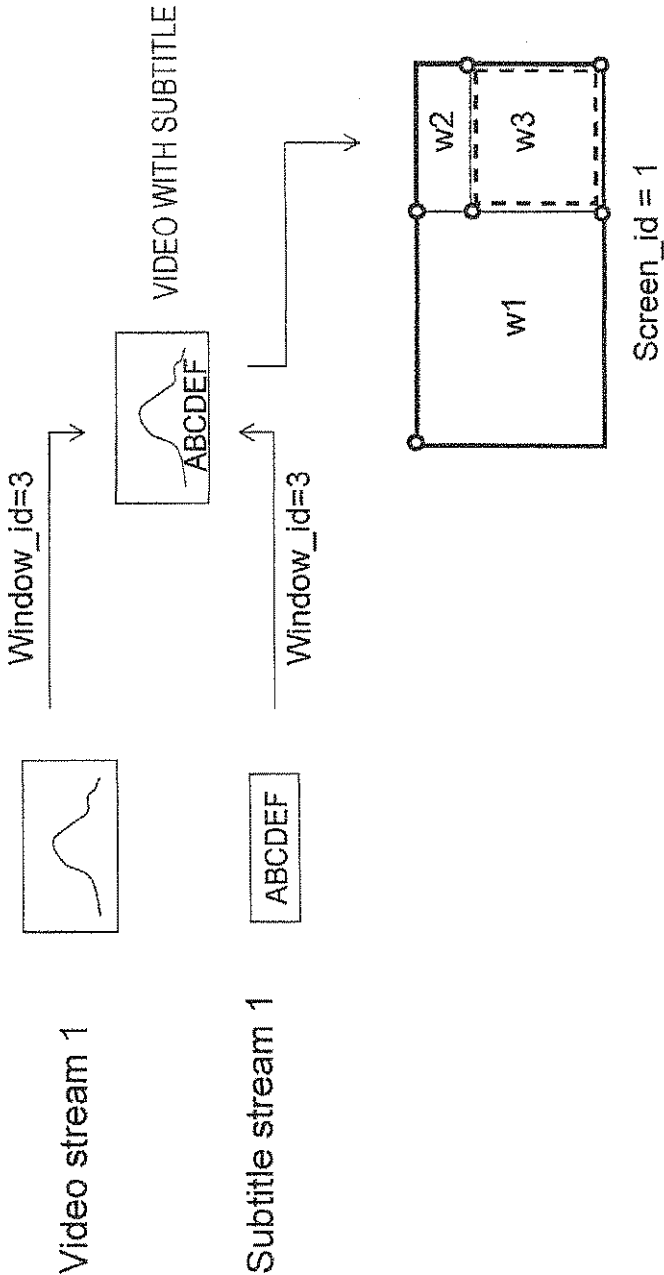


FIG. 10



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FIG. 11

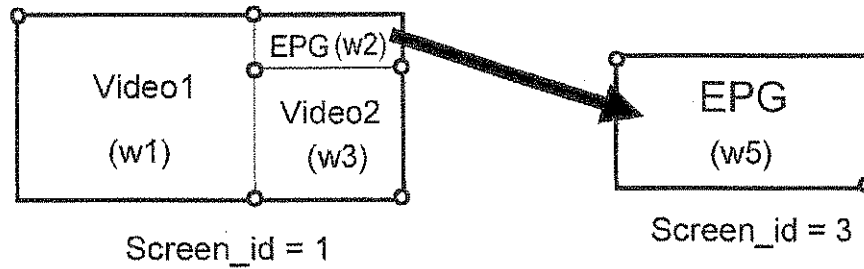
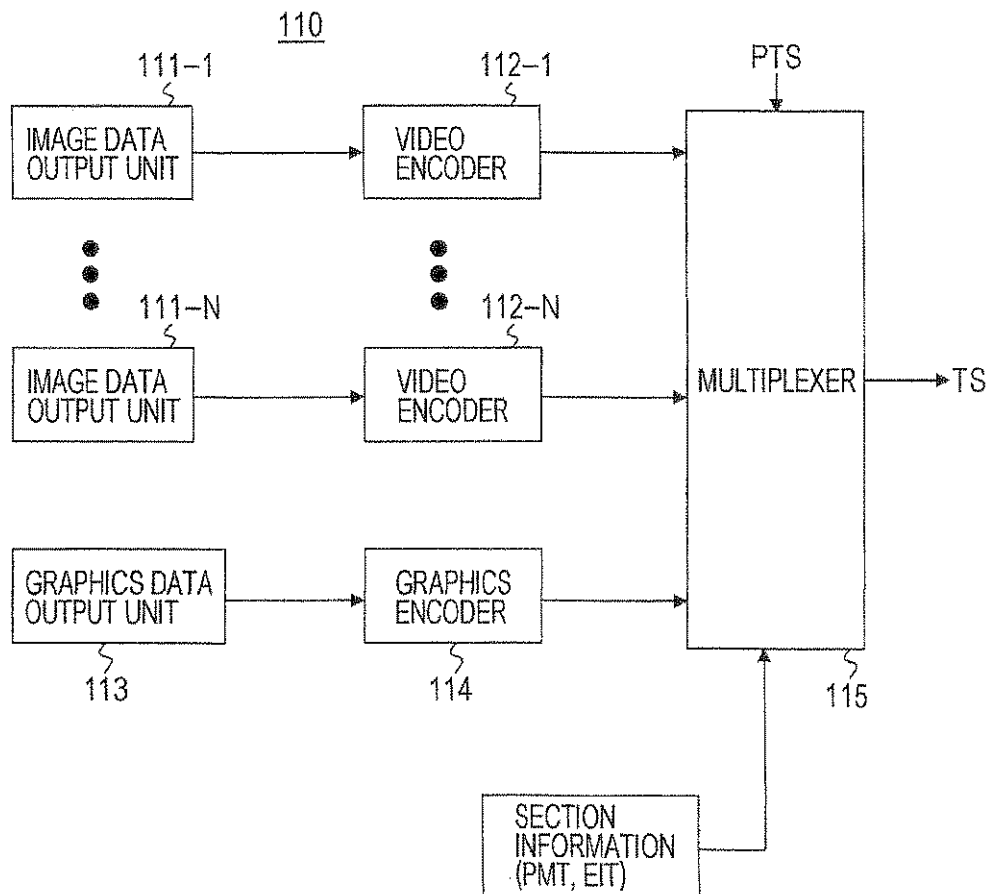


FIG. 12



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FIG. 13

display_window_positioning_descriptor syntax

Syntax	No. of Bits	Format
display_window_positioning_descriptor() {		
display_window_positioning_descriptor_tag	8	uimslbf
display_window_positioning_descriptor_length	8	uimslbf
display_unconstraint_flag	1	bslbf
reserved	3	'111'
stream_screen_id	4	bslbf
window_id	4	bslbf
rendering_model	4	bslbf
V_start_offset	16	uimslbf
V_end_offset	16	uimslbf
H_start_offset	16	uimslbf
H_end_offset	16	uimslbf
}		

display_window_positioning descriptor semantics

FIG. 14

display_unconstraint_flag (1bit)		INDICATE THAT RECEIVER SIDE CAN SET DISPLAY POSITION TO POSITION OTHER THAN SPECIFIED DISPLAY POSITION AT DISPLAY.	
1		RENDERING AT DISPLAY POSITION ON RECEIVER SIDE HAS FREEDOM	
0		RENDERING AT DISPLAY POSITION ON RECEIVER SIDE IS REQUIRED TO FOLLOW INSTRUCTION BY THIS descriptor	
stream_screen_id		(4bits)	IDENTIFIER THAT IDENTIFIES SCREEN OF DISPLAY TARGET
		VALUE OF screen_id FINDS POSITIONAL RELATIONSHIP BETWEEN screens.	
		unspecified	
0000		rendering is on the target screen identical to screen #1	
0001			
0010		rendering is on the target screen identical to screen #2	
window_id		(4bits)	IDENTIFIER THAT IDENTIFIES DISPLAY UNIT (WINDOW) ON SCREEN OF DISPLAY TARGET
		unspecified	
0000		window #1	
0001			
0010		window #2	
rendering_model		(4bits)	DISPLAY RESOLUTION MODEL ON DISPLAY TARGET SCREEN
		reserved	
0000		1920(H) x 1080(V)	
0001			
0010		3840(H) x 2160(V)	
0100		7680(H) x 4320(V)	
others		reserved	
V_start_offset		(16bits)	VERTICAL DISPLAY START POSITION OF window AT RESOLUTION COORDINATE SPECIFIED BY rendering_model
V_end_offset		(16bits)	VERTICAL DISPLAY END POSITION OF window AT RESOLUTION COORDINATE SPECIFIED BY rendering_model
H_start_offset		(16bits)	HORIZONTAL DISPLAY START POSITION OF window AT RESOLUTION COORDINATE SPECIFIED BY rendering_model
H_end_offset		(16bits)	HORIZONTAL DISPLAY END POSITION OF window AT RESOLUTION COORDINATE SPECIFIED BY rendering_model

FIG. 15 multi_windows_service_descriptor syntax

Syntax	No. of Bits	Format
multi_windows_service_descriptor() {		
multi_windows_service_descriptor_tag	8	uimslbf
multi_windows_service_descriptor_length	8	uimslbf
multiple_stream_service_flag	1	bslbf
reserved	3	'111'
number_of_streams	4	bslbf
}		

(a)

multi_window_service_descriptor semantics

multiple_stream_service_flag	(1bit)	FLAG INDICATIVE OF MULTIPLE DELIVERY SERVICE
1		MULTIPLE DELIVERY SERVICE
0		NON-MULTIPLE DELIVERY SERVICE
number_of_streams	(4bits)	TOTAL COUNT OF STREAMS INVOLVING DELIVERY SERVICE
0000		reserved
0001		1 stream
:		
1111		15 streams

(b)

FIG. 16

DATA STRUCTURE OF ACCESS UNIT

ACCESS UNIT AT HEAD OF GOP

AU Delimiter (ONE)	SPS (ONE)	PPS (ONE)	SEIs	Slices(Primary Coded Picture) (ONE OR MORE)	Filler data (ONE)	End of sequence (ONE)
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(a)

Buffering period SEI message (ONE)	Recovery point SEI message (ONLY REQUIRED IN CASE OF open GOP, ONE)	Picture timing SEI message (ONE)	Pan-scan rectangle SEI message (ONE)	Decoded reference Picture marking SEI message (ONE)	Decoded reference window_attribute SEI message (ONE)
--	--	--	--	--	---

ACCESS UNIT OTHER THAN ACCESS UNIT AT HEAD OF GOP

AU Delimiter (ONE)	PPS (ONE)	SEIs	Slices(Primary Coded Picture) (ONE OR MORE)	Filler data (ONE)	End of sequence (ONE)
-----------------------	--------------	------	---	----------------------	-----------------------------

(b)

Picture timing SEI message (ONE)	Pan-scan rectangle SEI message (ONE)	Decoded reference Picture marking SEI message (ONE)	Decoded reference window_attribute SEI message (ONE)
--	--	--	---

☐ : REQUIRED
☐ : NOT REQUIRED

FIG. 17

Syntax	No. of Bits	Format
user_data_unregistered (size) {		
uuid_iso_iec_11578	128	uimslbf
for(i = 16; i < payloadSize; i++)		
user_data_payload_byte	8	bslbf
}		

(a)

Syntax	No. of Bits	Format
window_attribute_data () {		
userdata_id	16	uimslbf
window_attribute_sei_length	8	bslbf
window_attribute_sei ()		
}		

(b)

FIG. 18

Syntax	No. of Bits	Format
window_attribute_sei() {		
window_position_change_flag	1	bslbf
reserved	3	0x7f
rendering_model	4	bslbf
V_start_offset	16	uimslbf
V_end_offset	16	uimslbf
H_start_offset	16	uimslbf
H_end_offset	16	uimslbf
}		

FIG. 19

window_position_change_flag (1bit)	INDICATES CHANGE OF DISPLAY POSITION OF window	
1	DISPLAY POSITION CHANGED	
0	DISPLAY POSITION NOT CHANGED	
rendering_model	(4bits)	DISPLAY RESOLUTION MODEL AT DISPLAY TARGET SCREEN
0000	reserved	
0001	1920(H) x 1080(V)	
0010	3840(H) x 2160(V)	
0100	7680(H) x 4320(V)	
others	reserved	
V_start_offset	(16bits)	VERTICAL DISPLAY START POSITION OF window AT RESOLUTION COORDINATE SPECIFIED BY rendering_model
V_end_offset	(16bits)	VERTICAL DISPLAY END POSITION OF window AT RESOLUTION COORDINATE SPECIFIED BY rendering_model
H_start_offset	(16bits)	HORIZONTAL DISPLAY START POSITION OF window AT RESOLUTION COORDINATE SPECIFIED BY rendering_model
H_end_offset	(16bits)	HORIZONTAL DISPLAY END POSITION OF window AT RESOLUTION COORDINATE SPECIFIED BY rendering_model

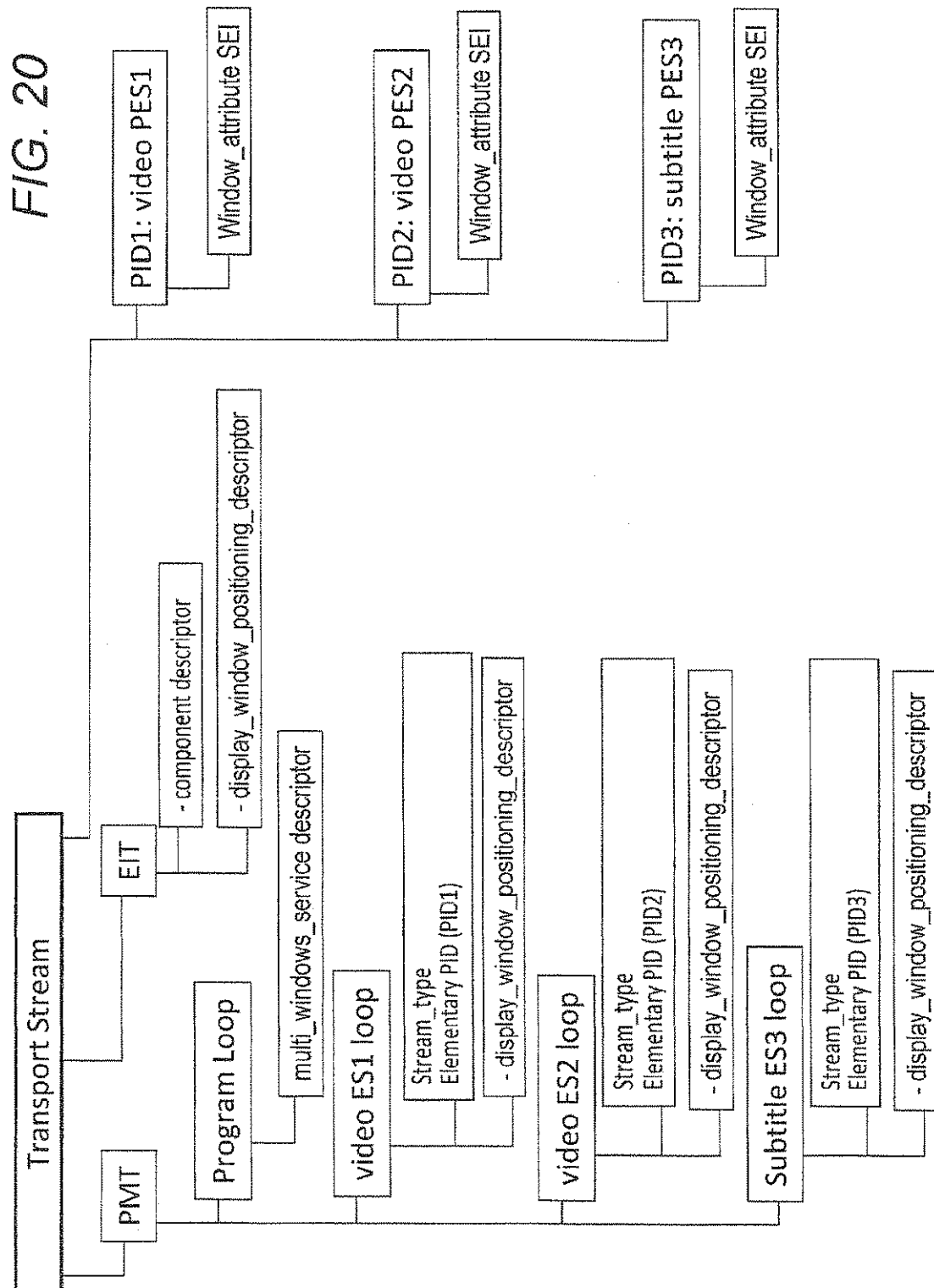


FIG. 21

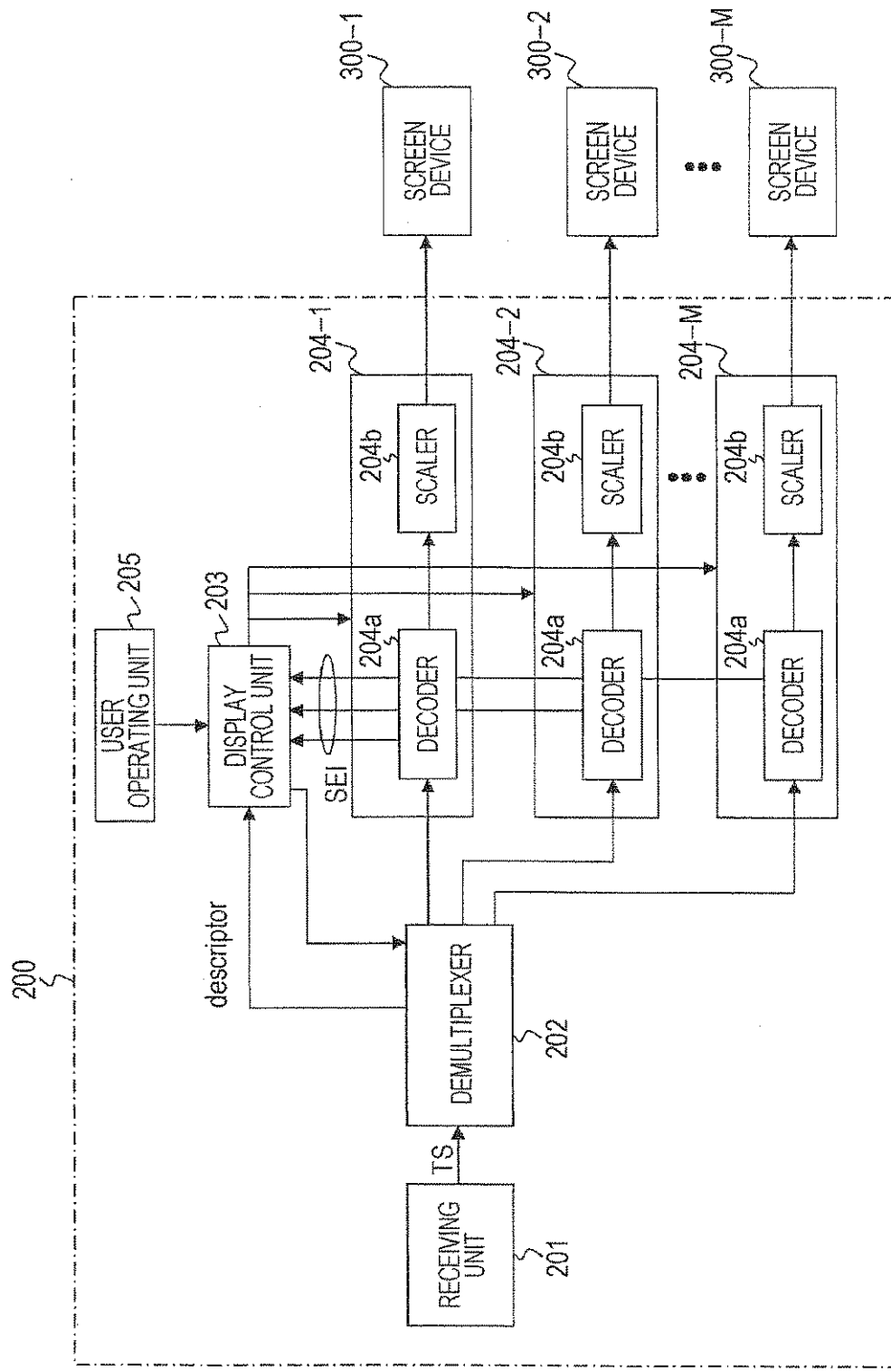
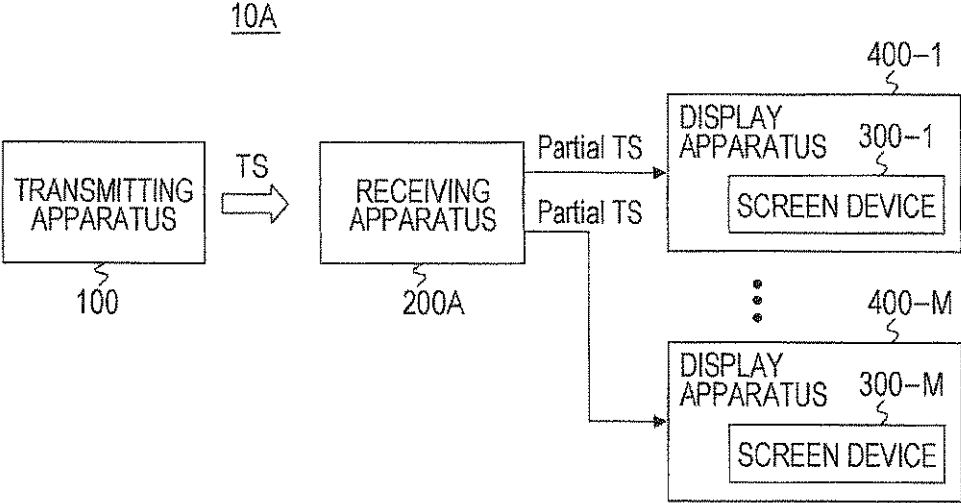


FIG. 22



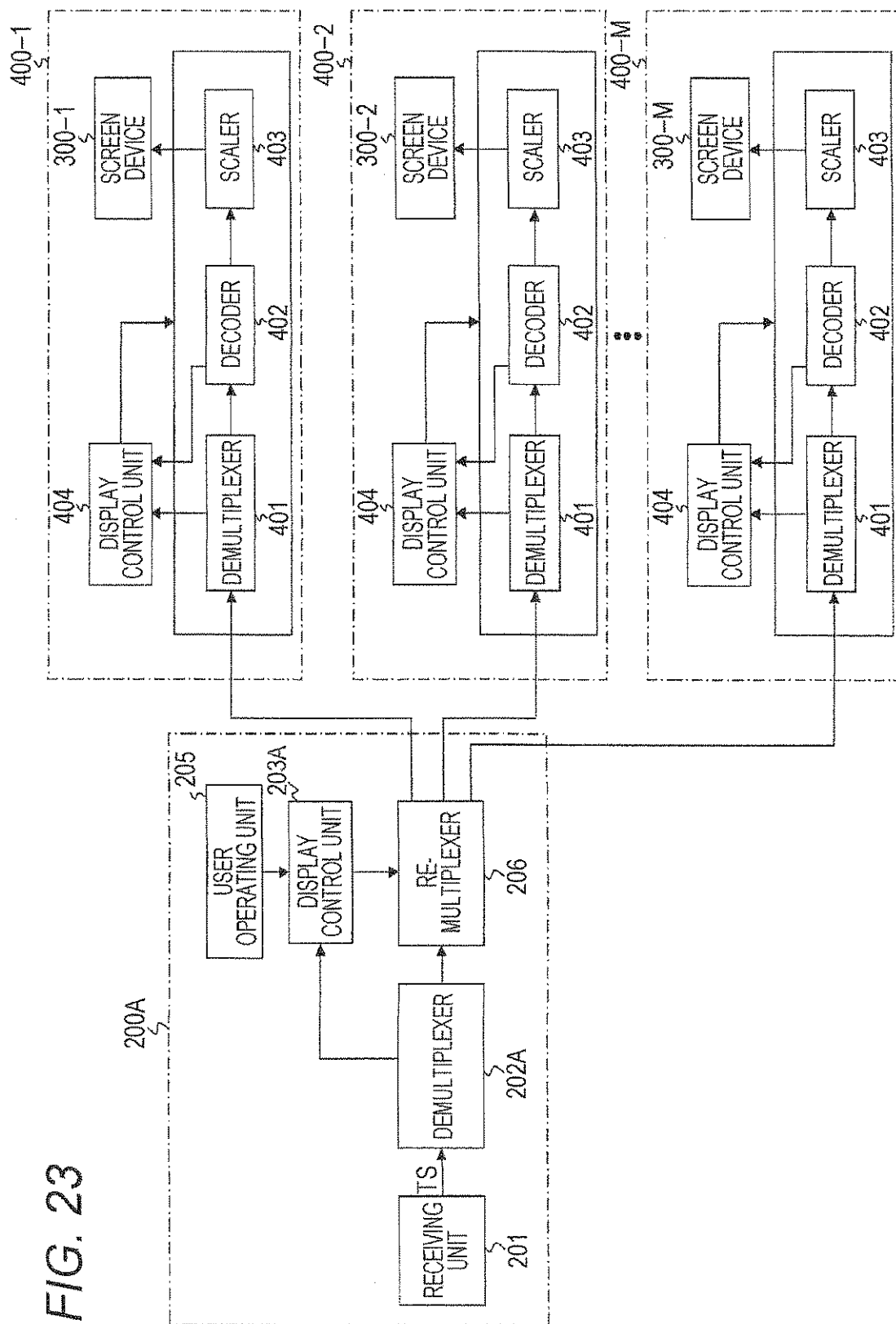


FIG. 24

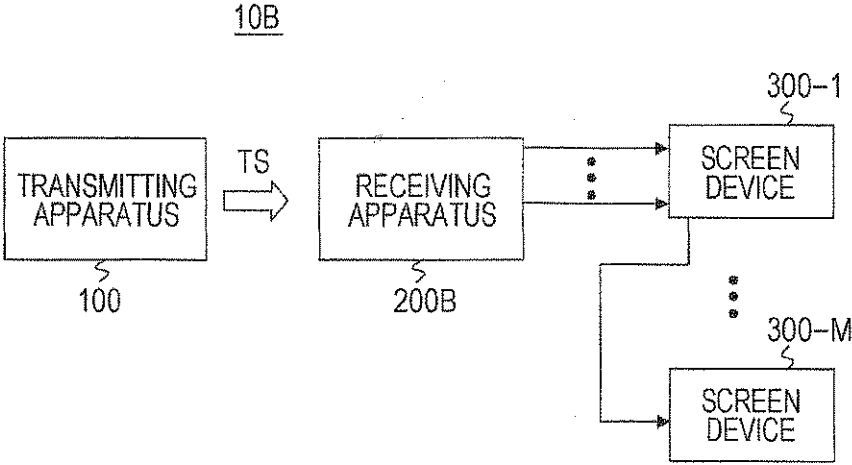


FIG. 25

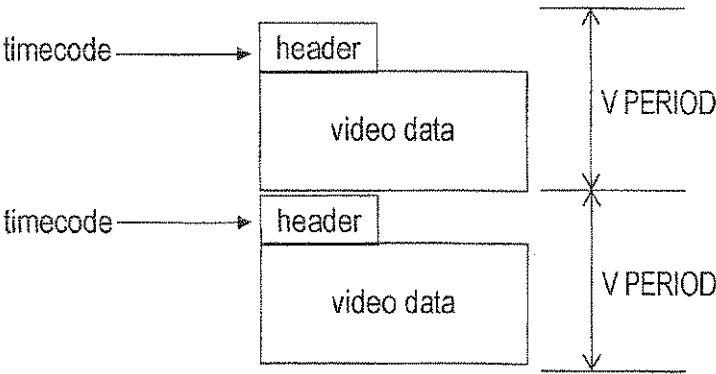


FIG. 26

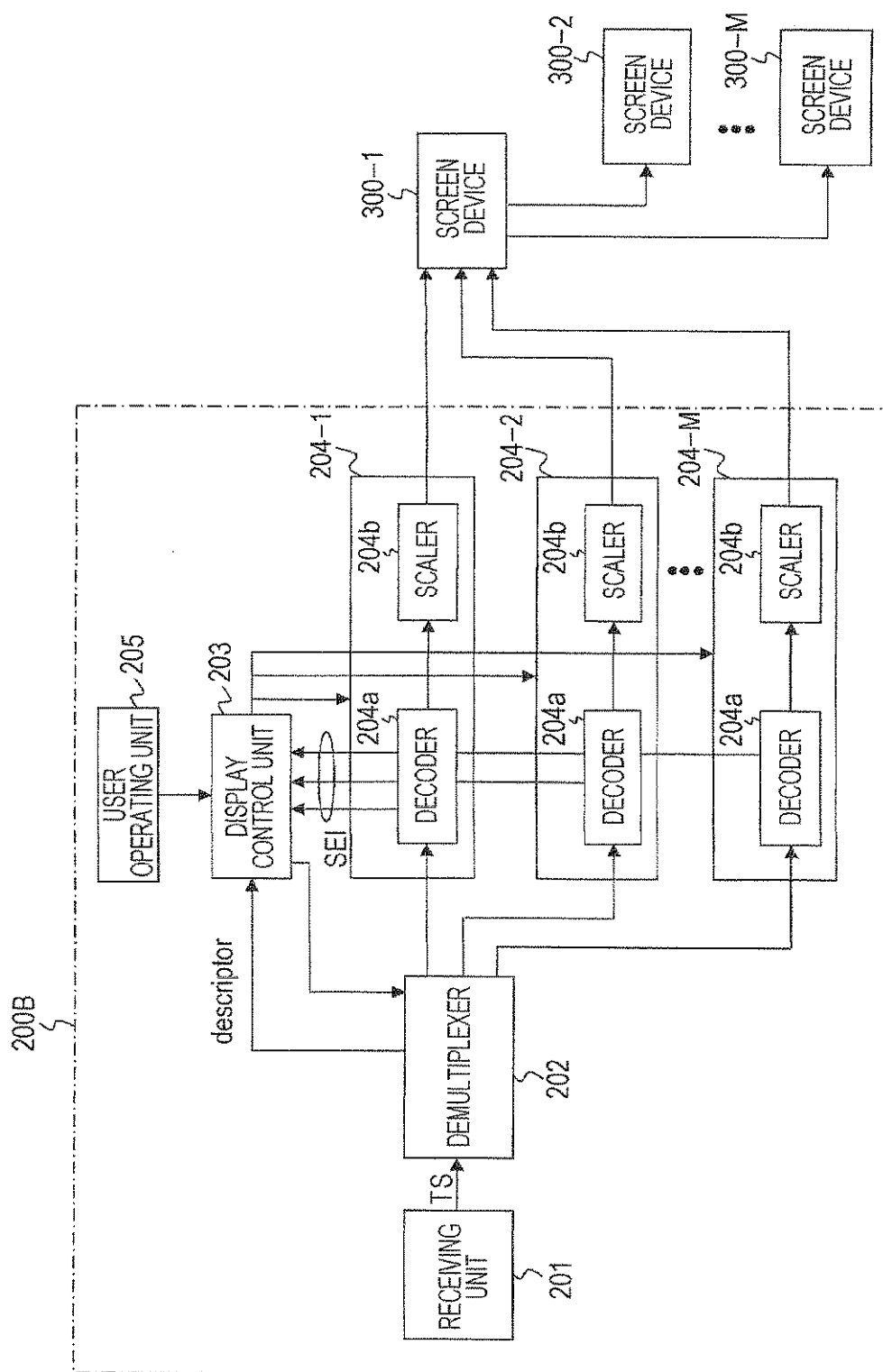


FIG. 27

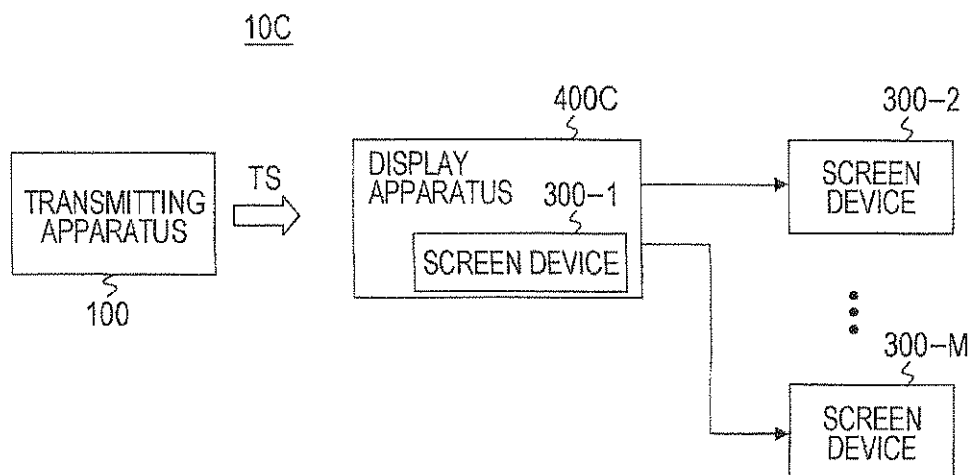


FIG. 28

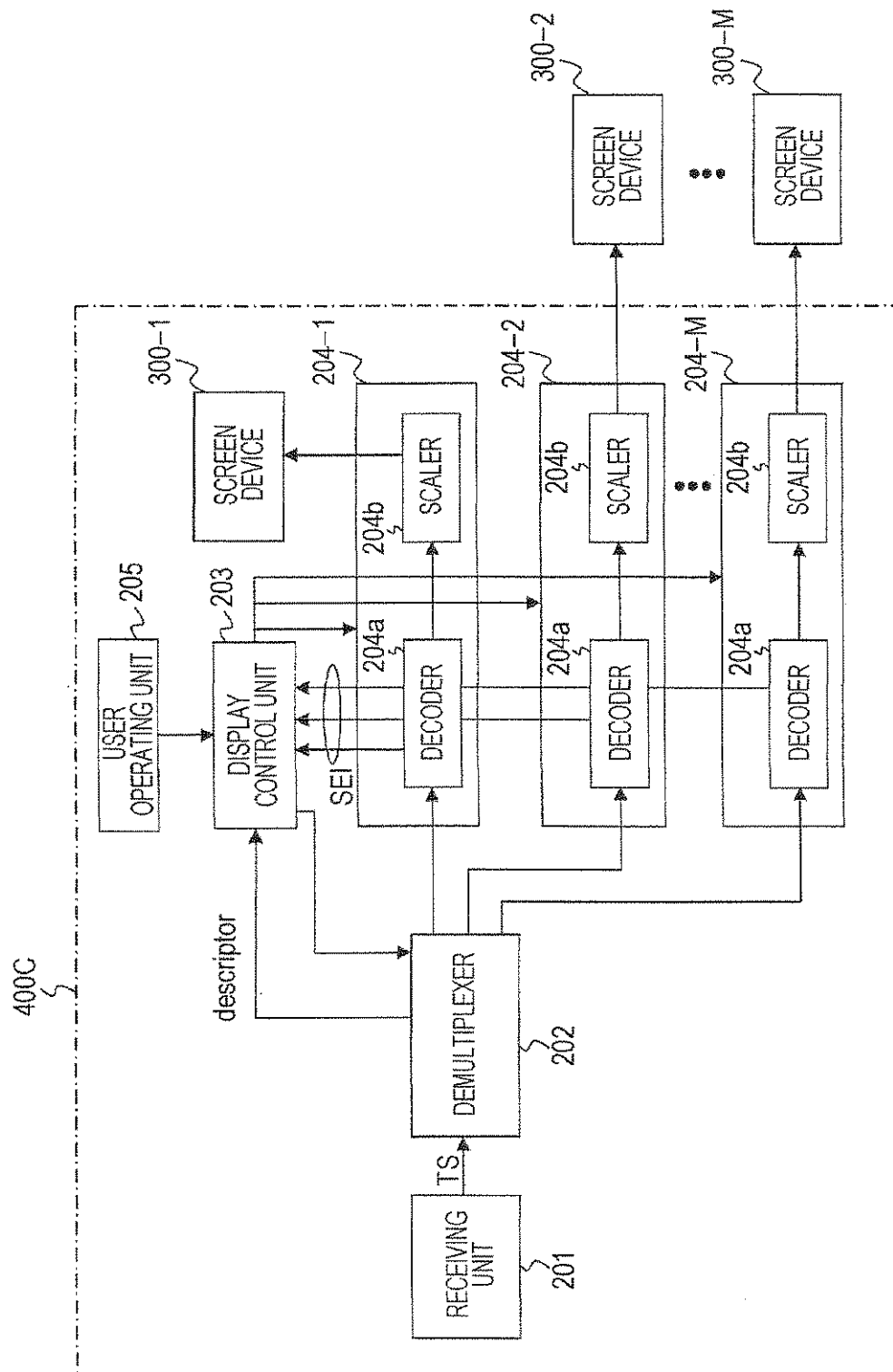


FIG. 29

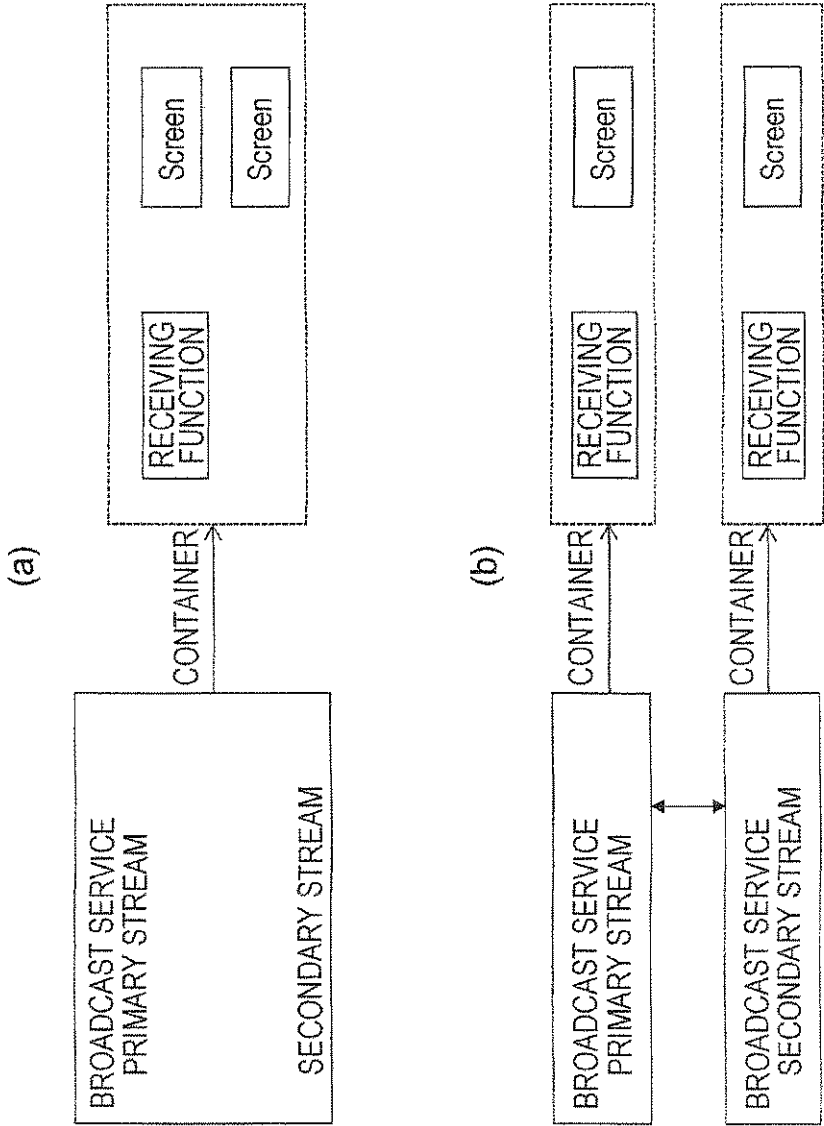


FIG. 30

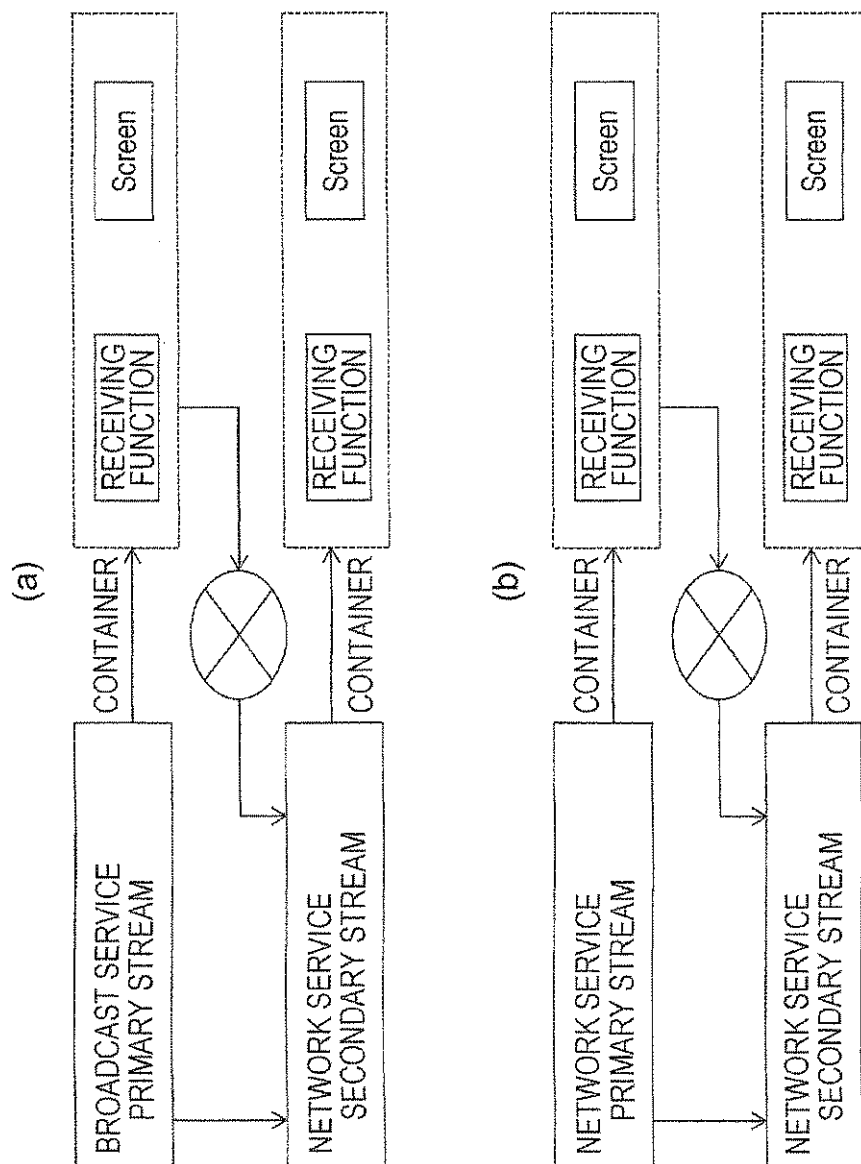


FIG. 31

