

CLAIMS

What is claimed is:

1. A transmission method of multicast service, ~~applied to~~performed by a first terminal and comprising:

5 receiving a unicast-to-multicast request sent by a network device for a multicast service; and

receiving the multicast service through a target mode, wherein the target mode comprises a unicast mode and/or a multicast mode.

2. The method according to claim 1, wherein after the receiving a unicast-to-multicast request sent by a network device for a multicast service, the method further comprises:

determining the target mode based on a service area of the multicast service.

3. The method according to claim 2, further comprising:

15 sending a first response message to the network device when the first terminal is within the service area of the multicast service, wherein the first response message is used to indicate that the first terminal agrees to receive the multicast service through the multicast mode.

4. The method according to claim 3, wherein the target mode comprises the unicast mode and the multicast mode.

20 5. The method according to claim 2, further comprising:

sending a second response message to the network device when the first terminal is within the service area of the multicast service, wherein the second response message is used to indicate that the first terminal rejects to receive the multicast service through the multicast mode-; or

25 ~~6. The method according to claim 2, further comprising:~~

sending a second response message to the network device when the first terminal is outside the service area of the multicast service, wherein the second response message is used to indicate that the first terminal rejects to receive the multicast service through the multicast mode; or-

~~7. The method according to claim 2, further comprising:~~

sending a second multicast session join request for the multicast service to the network device when the first terminal is within the service area of the multicast service.

5 | ~~68.~~ The method according to claim 1, wherein in a case that the target mode comprises the unicast mode and the multicast mode, the method further comprises:

sending a first request message to the network device when service data of the multicast service has been received in the multicast mode, wherein the first request message is used to request to deactivate a unicast mode data channel.

10 | ~~79.~~ The method according to claim 1, wherein in a case that the target mode comprises the unicast mode and the multicast mode, the method further comprises:

receiving the multicast service through the unicast mode when no service data of the multicast service has been received in the multicast mode in a preset time period.

15 | ~~810.~~ The method according to claim 1, wherein in a case that the target mode comprises the unicast mode and the multicast mode, the method further comprises:

sending a second request message to the network device when service data of the multicast service has been received in the multicast mode in a preset time period, wherein the second request message is used to deactivate a unicast mode data
20 | channel.

~~911.~~ The method according to claim 1, wherein in a case that the target mode comprises the unicast mode and the multicast mode, the method further comprises:

receiving the multicast service through the multicast mode when the first terminal is within the service area of the multicast service and has received
25 | first indication information sent by the network device; and

sending a third request message to the network device, wherein the third request message is used to deactivate a unicast mode data channel; wherein

the first indication information is used to indicate to receive the multicast service through the multicast mode;;

30 | ~~or-~~

~~12. The method according to claim 1,~~ wherein in ~~athe~~ case that the target mode comprises the unicast mode and the multicast mode, the method further comprises:

receiving the multicast service through the unicast mode when the first terminal is within the service area of the multicast service and has received second indication information sent by the network device, wherein the second indication information is used to indicate to receive the multicast service through the unicast mode.

~~1013.~~ The method according to claim 1, wherein the first terminal is a terminal that receives the multicast service in the unicast mode.

~~1411.~~ A transmission processing method of multicast service, ~~applied to~~
~~performed by~~ a network device and comprising:

sending a unicast-to-multicast request for a multicast service to a first terminal, wherein the unicast-to-multicast request is used to trigger the first terminal to receive the multicast service through a target mode, and the target mode comprises a unicast mode and/or a multicast mode.

~~125.~~ The method according to claim ~~114~~, wherein the sending a unicast-to-multicast request for a multicast service to a first terminal comprises:

sending the unicast-to-multicast request for the multicast service to the first terminal when a first multicast session join request sent by a second terminal for the multicast service has been received.

~~163.~~ The method according to claim ~~1512~~, wherein the first multicast session join request comprises at least one of the following:

a multicast session establishment request; and

a unicast session establishment request, wherein the unicast session establishment request carries third indication information, and the third indication information is used to indicate to establish a multicast mode data channel of the multicast service.

~~1714.~~ The method according to claim ~~1411~~, wherein after the sending a unicast-to-multicast request for a multicast service to a first terminal, the method further comprises:

receiving a response message sent by the first terminal for the unicast-to-multicast request;

determining a transmission mode of the multicast service based on the response message; and

5 sending the multicast service through the transmission mode, wherein the transmission mode comprises the unicast mode and/or the multicast mode.

10 ~~18~~15. The method according to claim ~~17~~14, wherein when the first terminal is within a service area of the multicast service, the response message corresponding to the first terminal is a first response message, and the first response message is used to indicate that the first terminal agrees to receive the multicast service through the multicast mode;

15 ~~19. The method according to claim 17,~~ wherein when the first terminal is within a service area of the multicast service, the response message corresponding to the first terminal is a second response message, and the second response message is used to indicate that the first terminal rejects to receive the multicast service through the multicast mode;

20 ~~20. The method according to claim 17,~~ wherein when the first terminal is outside a service area of the multicast service, the response message corresponding to the first terminal is a second response message, and the second response message is used to indicate that the first terminal rejects to receive the multicast service through the multicast mode.

~~16~~21. The method according to ~~any one of claims 18 to 20~~claim 15, wherein the determining a transmission mode of the multicast service based on the response message comprises:

25 determining, based on the response message, a quantity value of the first terminals that agree to receive the multicast service through the multicast mode; and

when the quantity value is greater than a first preset value, determining that the transmission mode comprises the multicast mode.

30 ~~22~~17. The method according to claim ~~17~~14, wherein in a case that the target mode comprises the multicast mode, the method further comprises:

establishing a multicast mode data channel of the multicast service.

~~23~~18. The method according to claim ~~14~~11, wherein the method further comprisesing:

5 sending indication information to the first terminal, wherein the indication information is used to indicate the first terminal within a service area of the multicast service to receive the multicast service in the multicast or unicast mode;:- and

~~24. The method according to claim 14,~~ wherein after the sending a unicast-to-multicast request for a multicast service to a first terminal, the method further comprises:

10 deactivating a unicast mode data channel corresponding to the first terminal when a request message sent by the first terminal has been received, wherein the request message is used to deactivate the unicast mode data channel.

~~25. The method according to claim 14, wherein the first terminal is a terminal that receives the multicast service in the unicast mode.~~

15 ~~26. A first terminal, comprising:
a first receiving module, configured to receive a unicast-to-multicast request sent by a network device for a multicast service; and receive the multicast service through a target mode, wherein the target mode comprises a unicast mode and/or a multicast mode.~~

20 ~~27. A network device, comprising:
a first sending module, configured to send a unicast-to-multicast request for a multicast service to a first terminal, wherein the unicast-to-multicast request is used to trigger the first terminal to receive the multicast service through a target mode, and the target mode comprises a unicast mode and/or a multicast mode.~~

25 ~~28~~19. A first terminal, comprising a memory, a processor, and a program stored in the memory and capable of running on the processor, wherein when the program is executed by the processor, the steps of the transmission method of multicast service according to any one of claims 1 to ~~13~~10 are implemented.

30 ~~29~~20. A network device, comprising a memory, a processor, and a program stored in the memory and capable of running on the processor, wherein when the

program is executed by the processor, the steps of the transmission processing method of multicast service according to any one of claims ~~14 to 25~~1 to 18 are implemented.

~~30. A computer-readable storage medium, wherein the computer-readable storage medium stores a computer program, and when the computer program is executed by a processor, the steps of the transmission method of multicast service according to any one of claims 1 to 13 are implemented; or when the computer program is executed by a processor, the steps of the transmission processing method of multicast service according to any one of claims 14 to 25 are implemented.~~