

CLAIMS

1. A communication method, the method being applied for ultra-wideband sensing and comprising:

obtaining, by a responder, multiple measurement report frames based on a measurement report, wherein the measurement report is used to provide a result of measurement performed by the responder, the result of the measurement is carried in the multiple measurement report frames, and a respective measurement report frame of the multiple measurement report frames has a length not greater than a payload limit of a measurement report frame; transmitting, by the responder, the multiple measurement report frames to an initiator.

2. The method according to claim 1, wherein obtaining, by the responder, the multiple measurement report frames based on the measurement report comprises:
performing, by the responder, fragmentation on the measurement report; and
obtaining, by the responder, the multiple measurement report frames based on the measurement report.

3. The method according to claim 1 or 2, further comprising:
performing, by the responder, compression on the measurement report.

4. The method according to any one of claims 1 to 3, wherein the respective measurement report frame comprises a first fragment field for indicating whether a fragment carried in the respective measurement report frame is a first fragment of the measurement report.

5. The method according to any one of claims 1 to 4, wherein the respective measurement report frame comprises a remaining fragment field for indicating a number of remaining fragments in the measurement report.

6. The method according to any one of claims 1 to 5, wherein the respective measurement report frame comprises a measurement number for identifying the measurement.

7. The method according to any one of claims 1 to 6, wherein the respective measurement report frame comprises a segment field for identifying a segment to which a fragment of the measurement report carried by the

respective measurement report frame belongs, an antenna field for identifying an antenna of the responder for receiving the segment and a channel field for identifying the channel on which the segment is received.

8. The method according to any one of claims 1 to 7, wherein the respective measurement report frame
5 comprises a CIR Bitmap field and CIR Taps field, wherein the CIR Taps field includes CIR tap values, one value of the CIR tap values corresponds to each bit in the CIR Bitmap that is set to one.

9. An apparatus, wherein the apparatus is a responder applied for ultra-wideband sensing, the apparatus comprising:

10 at least one memory storing program instructions;
and at least one processor coupled to the at least one memory, wherein the program instructions, when executed by the at least one processor, enable the apparatus to:

obtain multiple measurement report frames based on a measurement report, wherein the measurement report is used to provide a result of measurement performed by the responder, the result of the measurement is carried in the
15 multiple measurement report frames, and a respective measurement report frame of the multiple measurement report frames has a length not greater than a payload limit of a measurement report frame;
transmit the multiple measurement report frames to an initiator.

10. The apparatus according to claim 9, wherein the apparatus is configured to:
20 perform fragmentation on the measurement report.

11. The apparatus according to claim 9 or 10, wherein the apparatus is configured to:
perform compression on the measurement report.

25 12. The apparatus according to any one of claims 1 to 11, wherein the respective measurement report frame comprises a first fragment field for indicating whether a fragment carried in the respective measurement report frame is a first fragment of the measurement report.

13. The apparatus according to any one of claims 1 to 12, wherein the respective measurement report frame
30 comprises a remaining fragment field for indicating a number of remaining fragments in the measurement report.

14. The apparatus according to any one of claims 1 to 13, wherein the respective measurement report frame comprises a measurement number for identifying the measurement.

5 15. The apparatus according to any one of claims 1 to 14, wherein the respective measurement report frame comprises a segment field for identifying a segment to which a fragment of the measurement report carried by the respective measurement report frame belongs, an antenna field for identifying an antenna of the responder for receiving the segment and a channel field for identifying the channel on which the segment is received.

10 16. The apparatus according to any one of claims 1 to 15, wherein the respective measurement report frame comprises a CIR Bitmap field and CIR Taps field, wherein the CIR Taps field includes CIR tap values, one value of the CIR tap values corresponds to each bit in the CIR Bitmap that is set to one.

17. A responder, comprising modules for executing the method according to any one of claims 1 to 8.

15 18. A communication apparatus, comprising one or more processor, the one or more processors that are configured to execute instructions stored in a memory, enables the communication apparatus to perform the method according to any one of claims 1 to 8.

20 19. A computer-readable medium storing computer execution instructions which, when executed by a processor, causes the processor to execute the method according to any one according to claims 1 to 8.