

WHAT IS CLAIMED IS:

1. A method (300) implemented in a first communication device (110, 700) operating in a wireless network, the method comprising:

obtaining (305) capability information indicating a processing time of a second communication device (120, 800), the processing time being related to the generating of feedback at the second communication device for transmission to the first communication device;

selecting (310) a frame structure to be used for communicating with the second communication device, in dependence on the processing time of the second communication device, the selected frame structure having a corresponding feedback timing that is compatible with the processing time of the second communication device, and in further dependence on a timing advance with respect to the second communication device, such that the processing time plus the timing advance does not violate the corresponding feedback timing of the selected frame structure;

sending (315) an indication of the selected frame structure to the second communication device; and

communicating with the second communication device in accordance with the selected frame structure, including receiving feedback from the second communication device according to the selected frame structure.

2. The method (300) of claim 1, wherein selecting (310) the frame structure comprises:

selecting the frame structure based on an association between the feedback timing requirement and the processing time of the second communication device (120, 800).

3. The method (300) of any of the preceding claims, wherein obtaining (305) the capability information comprises:

receiving the capability information from the second communication device (120, 800).

4. The method (300) of claim 3, further comprising:

sending, to the second communication device (120, 800), a request for the capability information.

5. The method (300) of claim 3 or 4, wherein selecting (310) the frame structure comprises:

selecting, based on the obtained capability information, a feedback timing from a set of feedback timing values associated with respective communication configurations.

6. The method (300) of claim 5, wherein sending (315) the indication of the selected frame structure comprises:

sending, to the second communication device (120, 800), an indication of a communication configuration associated with the feedback timing.

7. The method (300) of claim 6, further comprising:

sending, to the second communication device (120, 800), an association between the communication configuration and the feedback timing.

8. A method (600) implemented in a second communication device (120, 800) operating in a wireless network, the method comprising:

generating (605) a message comprising capability information indicating a processing time of the second communication device (120, 800), the processing time being related to the generating of feedback at the second communication device for transmission to a first communication device of the wireless network;

sending (610) the message to a first communication device (110, 700), for use by the first communication device in selecting a frame structure to be used for communications between the first communication device and the second communication device, the selected frame structure having a corresponding feedback timing that is compatible with the processing time of the second communication device and that is not violated by the processing time plus a timing advance with respect to the first communication device;

receiving (615) an indication of the selected frame structure from the first communication device (110, 700); and

communicating with the first communication device (110, 700) in accordance with the selected frame structure, including transmitting feedback from the second communication device according to the selected frame structure.

9. The method (600) of claim 8, further comprising:

receiving, from the first communication device (110, 700), a request for the capability information.

10. The method (600) of claim 8, wherein generating (605) the message comprising capability information indicating the processing time comprises:

determining the processing time of the second communication device (120, 800) in a communication configuration.

11. The method (600) of any of claims 8 to 10, wherein receiving (615) the indication of the selected frame structure comprises:

receiving, from the first communication device (110, 700), an indication of a communication configuration associated with the feedback timing.

12. The method (600) of claim 11, further comprising:

receiving, from the first communication device (110, 700), an association between the communication configuration and the feedback timing.

13. A communication device (110, 700) configured to operate in a wireless network, the communication device comprising:

a first obtaining unit (705) configured to obtain capability information indicating a processing time of a further communication device (120, 800), the processing time being related to the generating of feedback at the further communication device for transmission to the communication device;

a first determining unit (710) configured to select a frame structure to be used for communicating with the further communication device, in dependence on the processing time of the further communication device, the selected frame structure having a corresponding feedback timing that is compatible with the processing time of the further communication device, and in further dependence on a timing advance with respect to the further communication device, such that the processing time plus the timing advance does not violate the corresponding feedback timing of the selected frame structure; and

a first sending unit (715) configured to send an indication of the selected frame structure to the further communication device (120, 800) and to communicate with the further communication device (120, 800) in accordance with the selected frame structure, including receiving feedback from the further communication device according to the

selected frame structure.

14. A communication device (120, 800) configured to operate in a wireless network, the communication device comprising:

a second determining unit (805) configured to generate a message comprising capability information indicating a processing time of the communication device (120, 800), the processing time being related to the generating of feedback at the communication device for transmission to a further communication device;

a second sending unit (810) configured to send the message to the further communication device (110, 700) for use by the further communication device in selecting a frame structure to be used for communications between the communication device and the further communication device, the selected frame structure having a corresponding feedback timing that is compatible with the processing time of the communication device and that is not violated by the processing time plus a timing advance with respect to the further communication device; and

a receiving unit (815) configured to receive an indication of the selected frame structure from the further communication device (110, 700) and to communicate with the further communication device (110, 700) in accordance with the selected frame structure, including transmitting feedback from the communication device according to the selected frame structure.

15. A computer program including instructions which, when executed on at least one processor, cause the at least one processor to carry out the method (300, 600) according to any of claims 1 to 12.