

CLAIMS**What is Claimed:**

1. A wireless transmit receive unit (WTRU) comprising:
 - a processor configured at least to:
 - send a first transmission that comprises a first part associated with a first priority and a second part associated with a second priority, wherein the first transmission is a first grant free transmission, and wherein the first priority is a higher priority than the second priority, and wherein the first transmission uses a first back off value selected from a first range of back off values;
 - determine whether the first transmission is successful;
 - determine, on a condition that it is determined that the first transmission is unsuccessful, to drop the second part from a retransmission of the first transmission; and
 - send the retransmission, wherein the retransmission includes the first part and does not include the second part, and wherein the retransmission is a second grant free transmission, and wherein the retransmission uses a second back off value selected from a second range of back off values, and wherein the second range of back off values is larger than the first range of back off values.
2. The WTRU of claim 1, wherein the second back off value indicates a number of grant free resources to skip prior to sending the retransmission, and wherein the processor is further configured to:
 - skip the number of grant free resources indicated by the second back off value after it is determined that the first transmission is unsuccessful.
3. The WTRU of claim 1, wherein the first transmission is multiplexed on a first transport block using a first redundancy version and the retransmission is multiplexed on a second transport block using a second redundancy version, and wherein the second redundancy version is associated with a higher redundancy than the first redundancy version.
4. The WTRU of claim 1, wherein the first transmission and the retransmission are associated with uplink control information (UCI), and wherein the first transmission and the retransmission are sent on a physical uplink shared channel (PUSCH).
5. The WTRU of claim 1, wherein the processor is further configured to receive an indication of the first range of back off values.

6. The WTRU of claim 1, wherein the processor is further configured to determine the second range of back off values based on a size of the first range of back off values.
7. The WTRU of claim 1, wherein the processor is further configured to:
 - receive a multiplexing priority information;
 - determine the first priority associated with the first part based on the multiplexing priority information; and
 - determine the second priority associated with the second part based on the multiplexing priority information.
8. The WTRU of claim 1, wherein the first part is associated with acknowledgement information and the second part is associated with channel quality information (CQI).
9. A method comprising:
 - sending a first transmission that comprises a first part associated with a first priority and a second part associated with a second priority, wherein the first transmission is a first grant free transmission, and wherein the first priority is a higher priority than the second priority, and wherein the first transmission uses a first back off value selected from a first range of back off values;
 - determining whether the first transmission is successful;
 - determining, on a condition that it is determined that the first transmission is unsuccessful, to drop the second part from a retransmission of the first transmission; and
 - sending the retransmission, wherein the retransmission includes the first part and does not include the second part, and wherein the retransmission is a second grant free transmission, and wherein the retransmission uses a second back off value selected from a second range of back off values, and wherein the second range of back off values is larger than the first range of back off values.
10. The method of claim 9, wherein the second back off value indicates a number of grant free resources to skip prior to sending the retransmission, and wherein the method further comprises:
 - skipping the number of grant free resources indicated by the second back off value after it is determined that the first transmission is unsuccessful.
11. The method of claim 9, wherein the first transmission is multiplexed on a first transport block using a first redundancy version and the retransmission is multiplexed on a second transport block using a

second redundancy version, and wherein the second redundancy version is associated with a higher redundancy than the first redundancy version.

12. The method of claim 9, wherein the first transmission and the retransmission are associated with uplink control information (UCI), and wherein the first transmission and the retransmission are sent on a physical uplink shared channel (PUSCH).

13. The method of claim 9, further comprising receiving an indication of the first range of back off values.

14. The method of claim 9, further comprising determining the second range of back off values based on a size of the first range of back off values.

15. The method of claim 9, further comprising:
receiving a multiplexing priority information;
determining the first priority associated with the first part based on the multiplexing priority information; and
determining the second priority associated with the second part based on the multiplexing priority information.

16. The method of claim 9, wherein the first part is associated with acknowledgement information and the second part is associated with channel quality information (CQI).