APA Wiring Requirements

Prior to beginning winding of a layer:

1. Will confirm that all machine components consistent with default configuration (Carlos)
2. Will confirm that all required maintenance on winding head has been performed (Dave)
3. Will confirm that machine has been properly tuned for layer to be wound (Carlos)

During winding of a layer:

1. Tensions are continually monitored.
2. If a tension reading above 10N is observed, an alarm leads to the following actions:
   1. Winding is halted.

* 1. Solder connection is made to the temporary end-board at the position of the last (next-to-last?) fully completed wire loop.
  2. Remaining wire is removed, and winding is re-started.

After winding of a layer:

1. Wires are required to have measured tensions of 7.0 +/- 2.0 N. In addition, no more than ten percent of wires on individual layers are permitted to have tensions lying within the outer portions of the allowed region (5.0-5.5N and 8.5-9.0N).
2. Wires with lengths less than or equal to 5cm cannot be measured and are therefore not checked. The five shortest wires on the v- and u-layers are automatically re-tensioned to “zero”.
3. The tension requirements above apply to wires with lengths between 5cm and 50cm (no special consideration for these wires)?
4. Wires not meeting the above requirements are removed and replaced.