

42 nd WLTP Sub Group EV Meeting	
Date	14 May 2020
Time	9:00 to 12:30 CEST
Title	42 nd WLTP Sub Group EV Meeting – Minutes
Location	Web-Audio

0	Revision & adoption of meeting minutes & agenda
	<ul style="list-style-type: none"> - Meeting minutes of web-audio meeting on 28 April 2020 01 WLTP SG EV Minutes 28 April 2020.pdf → adopted - Adoption of the agenda 00 WLTP SG EV Agenda 14 May 2020.pdf → adopted
1	GTR#15 Amd#6 WD: SG EV square brackets topics (Low Temp → EV_LT_#)
	<p><u>Square bracket topics in GTR#15 Amd#6 WD related to Low Temp</u></p> <p>The discussion and conclusion of remaining square bracket items was based on the latest version of the following document (<i>managed and updated by the drafting coordinator Rob Gardner</i>):</p> <p>20xxyy - GTR15 Amnd 6 - updates for Informal to amend GRPE-2020-14e.docx to be found in the UNECE wiki area: GTR15 Amnd 6 Drafting</p> <p>An overview list of the remaining square bracket items to ease the discussion and conclusion within SG EV was given in the following document (EV related Low Temp topics are labelled “EV_LT_#”):</p> <p>20xxyy_Status Square bracket topics_Amd#6 WD.xlsx to be found in the UNECE wiki area: Optional annex Low T - Drafting</p>
1.1	GTR#15 Amd#6 WD: OVC-HEV & PEV battery charging & remaining topics (EV_LT_#)
	<p><i>Information about the drafting status of closed Low Temp topics (including topics from item 1.3 below)</i></p> <p><i>Latest version of draft text (including all received feedback up to now):</i> 200514 Proposed draft text for EV LT # (except family related topics).docx</p> <p>→ Interested SG EV members are asked to review and comment on this draft text version (exchange via e-mail or in dedicated drafting meeting)</p> <p>In order to keep the overview, the latest version of the draft text for closed EV_LT_#’s can now be found in the UNECE wiki area: GTR15 Amnd 6 Drafting</p>

1.2	GTR#15 Amd#6 WD: EV Low Temp Family concept
	<p>EV_LT_#: 1 / 2 / 14 / 15 / 16 / 17 / 18 / 19 / 20 / 39</p> <p>Bart Thedinga (EC) introduced EC's comments on the Low Temp family concept (200416 WLTP-30-06 - ECE-TRANS-WP29-GRPE-2020-14e Low Temp EV family rev7 EC.docx). Related to paragraph 5.14.2. in the main body of GTR#15 Amd#6 WD (in square brackets), he provided explanations to additional UBE family criteria seen as important by EC. These criteria were already mentioned by EC in previous meetings.</p> <p>Nick Ichikawa (co-TS, JASIC) stated that JAMA is supportive of the concept, but details need to be discussed.</p> <p>For criteria “(a) REESS (type and chemistry)”, it was discussed that the term “chemistry” could possibly be removed as “type” might be sufficient. Rob Gardner (DC) suggested to consult the text of the ATCT method to find appropriate wording.</p> <p>Furthermore, Nick Ichikawa (co-TS, JASIC) brought up an important point by asking if concerning any vehicle with an internal combustion engine, which are NOVC-HEVs and OVC-HEVs in case of electrified vehicles, the same vehicle can be tested for the emission, range and energy consumption in the type 6 test.</p> <p>Bart Thedinga (EC) replied that this needs to be discussed internally within EC as there is the dilemma for OVC-HEVs that the worst case vehicle in terms of pollutant emissions is not necessarily the same as the worst case vehicle in terms of CO₂ and range. As emissions are covered by RDE regulation, focus of OVC-HEVs in the Type 6 test could be on CO₂ and range and therefore OVC-HEVs could use a similar concept than PEVs.</p> <p>→ Feedback from EC is required as soon as possible, as this is crucial for the development of the family concepts and for final drafting.</p> <p>The following points were raised in the context of merging different battery sizes into one UBE family:</p> <ul style="list-style-type: none"> - Does the delta in energy have an impact on the UBE ratio? → is the influence negligible (yes/no)? - Does the different cycle energy demand (due to the heavier battery and therefore increased road load) have an impact on the UBE ratio? → if not, what is the main driver? Is there any need to limit the possible battery sizes which can be merged? <p>ACEA EV has agreed to investigate these points. This will support the decision on whether to apply a UBE ratio or UBE value approach.</p> <p>→ Based on the outcome, the task for EC, JPN and other CP's will then be to decide on which solution, UBE ratio or UBE value, should be followed for final drafting.</p>

	<p>In addition, Matthias Nägeli (co-TS on behalf of ACEA EV) presented an update from ACEA EV on the Low Temp family concept (200514 Update EV Low Temp Family explanation slides ACEA TF EV.pptx).</p> <p>The document was updated after the meeting reflecting the discussion points brought up by SG EV members during the meeting.</p> <p><i>Updated document:</i> 200515 Update EV Low Temp Family explanation slides after SG EV.pptx</p> <p>Furthermore, Nick Ichikawa (co-TS, JASIC) informed the group that JAMA withdraws the topic EV_LT_39 at this stage. Therefore, EV_LT_39 was closed in this meeting.</p> <p>The latest version of the draft text(s) for EV_LT_#'s related to the Low Temp family concept can be found in the folder of the upcoming WLTP SG EV meeting: https://wiki.unece.org/display/trans/43rd+Meeting+of+WLTP+Sub-Group+EV (expected for Monday, May 18th)</p>
1.3	GTR#15 Amd#6 WD: remaining topics EV_LT_#
	<p>Further remaining open topics (EV_LT_#: 11 / 22 / 28) were discussed and conclusions could be reached in this meeting. Comments and final conclusions were included in the latest version of the overview list of the remaining square bracket items:</p> <p>20xyy_Status Square bracket topics_Amd#6 WD.xlsx to be found in the UNECE wiki area: Optional annex Low T - Drafting</p>
2	GTR#15 Amd#6 WD: SG EV square brackets topics (non Low Temp → A...E)
	<p><u>Square bracket topics in GTR#15 Amd#6 WD not related to Low Temp</u></p> <p>The discussion and conclusion of remaining square bracket items was based on the latest version of the following document (<i>managed and updated by the drafting coordinator Rob Gardner</i>):</p> <p>20xyy - GTR15 Amnd 6 - updates for Informal to amend GRPE-2020-14e.docx to be found in the UNECE wiki area: GTR15 Amnd 6 Drafting</p> <p><i>Updated document:</i> <i>Overview presentation of square bracket topics to be agreed upon (slides 3 to 6)</i> 200515 Overview square brackets SG EV GTR15Amd6 draft.pdf</p> <p>See also overview table in document 20xyy_Status Square bracket topics_Amd#6 WD.xlsx to be found in the UNECE wiki area: Optional annex Low T - Drafting</p> <p>The latest version of the draft text(s) for non Low Temp topics (A to E) can be found in the folder of the upcoming WLTP SG EV meeting: https://wiki.unece.org/display/trans/43rd+Meeting+of+WLTP+Sub-Group+EV</p>

	<p><u>Discussion/conclusion on topics (links to updated supporting documents including updates can be found in overview presentation of square bracket topics above):</u></p> <p>(1) Proposal 1 in the context of the CO₂ correction factor application of NOVC-HEVs (<i>generic approach; slide 3, topic B</i>)</p> <p>An academic explanation from ACEA EV (as requested by JPN) was provided for this meeting.</p> <p>Iddo Riemersma (on behalf of EC) stated that the explanation is sufficient for the EC and therefore supports the proposal.</p> <p>→ final feedback from JPN is expected before 28 May 2020 (next SG EV web-audio meeting)</p> <p>(2) Proposal 2 in the context of the CO₂ correction factor application of OVC- and NOVC-HEVs (<i>K_{CO2} correction factor family; slide 4, topic D</i>)</p> <p>Nick Ichikawa (co-TS, JASIC) mentioned that no final conclusion was reached yet; keep this point open.</p> <p>→ no final conclusion yet</p> <p>(3) Expected number of cycles in CD mode for OVC-HEV (<i>slide 5, topic C</i>)</p> <p>An updated proposal by ACEA EV including the feedbacks from EC and JPN will be provided before 28 May 2020 (next SG EV web-audio meeting).</p> <p>→ no final conclusion yet</p> <p>(4) CD fuel efficiency calculation in case of pure electric CD cycles (<i>slide 6, topic E</i>) and further amendments to calculation schemes in Annex 8 Chapter 4</p> <p>A document was provided for this meeting. It was concluded to leave out the proposed corrections concerning the sum formulas in order not to create confusion to readers of the GTR.</p> <p>→ final feedback from SG EV members is expected before 28 May 2020 (next SG EV web-audio meeting)</p>
3	Next meetings (WLTP calendar)
	<p><u>WLTP LowT TF web-audio meeting:</u></p> <p>20 May 2020 (9:00 to 12:00 CEST)</p> <p><u>WLTP SG EV web-audio meeting:</u></p> <p>28 May 2020 (09:00 to 12:00 CEST)</p> <p><u>WLTP SG EV drafting web-audio meeting</u></p> <p>2 June 2020 (8:00 to 11:00 CEST)</p> <p><u>WLTP LowT TF drafting web-audio meetings (ICE & EV):</u></p> <p>18 May 2020 (09:00 to 12:00 CEST)</p> <p>3 June 2020 (09:00 to 12:00 CEST)</p>

	<p><u>31st WLTP IWG web-audio meeting:</u> 4 June 2020 (08:30 to 12:30 CEST)</p> <p><u>Final drafting web-audio session:</u> 4 June 2020 (13:30 to 15:30 CEST)</p>
4	AOB
