**Notes from [FS\_5G\_ProSe\_Ph2] SA2 Conference Call preparing for SA2#152E**

NOTE: these notes does not necessarily reflect the discussions correctly.

Participants (please, indicate if I missed someone or got wrong attendance):

Ericsson, Intel, Qualcomm, FirstNet, Huawei, InterDigital, LGE, ZTE, OPPO, Samsung, China Telecom, Apple, vivo, CATT, Mitsubishi Electric.

Draft agenda:

* KI#7 update (~15min)
  + 01\_OPPO\_S2-220xxxx\_emergency\_KIupdate
* KI#1 evaluation and conclusion (~60min)
  + 02\_OPPO\_S2-220xxxx\_KI#1 Evaluation for UE-to-UE Relay solutions
  + 03\_HW\_S2-220byyy 23.700-33 KI#1 Evaluation and conclusion (HW)
  + 04\_IDC\_S2-220XXXX\_KI#1\_L2 U2U Relay Evaluation\_IDC
  + 05\_IDC\_S2-220XXXX\_KI#1\_L3 U2U Relay Evaluation\_IDC
  + 06\_CATT\_S2-22xxxxx\_Overall Evaluation on KI#1
  + 07\_OPPO\_S2-220xxxx\_KI#1 Interim conclusion for UE-to-UE Relay
* KI#2 evaluation and conclusion (~15min)
  + 08\_vivo\_S2-220aaaa\_KI#2\_Evaluation and conclusion on KI#2-vivo
* KI#3 evaluation and conclusion (~30min)
  + 09\_LGE\_S2-220xxx1\_ProSe\_KI#3\_eval (LGE)
  + 10\_HW\_S2-220byyy 23.700-33 KI#3 Evaluation and conclusion (HW)
  + 11\_IDC\_S2-220XXXX\_KI#3\_path switch evaluation\_IDC
  + 12\_vivo\_S2-220bbbb\_KI#3\_Evaluation and conclusion on KI#3-vivo
  + 13\_LGE\_S2-220xxx2\_ProSe\_KI#3\_con (LGE)
* Others (not on proposed agenda)
  + 14\_IDC\_S2-220XXXX solution update sol#22 on path switch
  + 15\_HW\_S2-220byyy 23.700-33 Solution 42 Update for EN removal (HW)
  + 16\_HW\_S2-220byyy Discussion on Support of multi-path transmission using Layer-3 UE-to-Network relay (HW)
* KI#7 update (~15min)
  + 01\_OPPO\_S2-220xxxx\_emergency\_KIupdate

E// wonders whether the new added bullet is needed and how to ensure that. QC share the similar view as E// and thinks this should be architecture assumption rather than KI, and clarifies local regulatory requirements, and don’t think require new solution. Apple shares the same view as E// and QC. Oppo clarifies this is new requirement, and can’t be made as assumption. Samsung suggests keeping new notes in KI and moving new bullet to architecture assumption, which is agreeable by several companies. Vivo asks how to address the emergency conflict between Remote UE and Relay UE, which can be further discussed offline.

Way-forward proposal: move new added bullet as architecture assumption.

* KI#1 evaluation and conclusion (~60min)
  + 02\_OPPO\_S2-220xxxx\_KI#1 Evaluation for UE-to-UE Relay solutions

IDC has concerns on the evaluation of sol#1 on the UE complexity, QoS etc, which will be further discussed offline.

* + 03\_HW\_S2-220byyy 23.700-33 KI#1 Evaluation and conclusion (HW)

Samsung suggest to focus on the merged solution. IDC comments sol#1 alt 1 is not covered by sol#10, and we should be careful on which part of each solution was merged. Oppo suggest to separate Layer-2 and Layer-3 evaluations. QC, IDC and Huawei prefer to have common evaluation on Layer-2 and Layer-3, and the adds-on for each type can be clarified. IDC comments sol#7 and sol#10 should be concluded separately. Oppo comments evaluation on sol#34 and conclusion on sol#34 seems not aligned. QC clarifies route discovery is a separate procedure.

* + 04\_IDC\_S2-220XXXX\_KI#1\_L2 U2U Relay Evaluation\_IDC
  + 05\_IDC\_S2-220XXXX\_KI#1\_L3 U2U Relay Evaluation\_IDC

Huawei comments service authorization should be evaluated in KI#6. Samsung comments this kind of evaluation is not aligned with Rel-17.

* + 06\_CATT\_S2-22xxxxx\_Overall Evaluation on KI#1

CATT suggests this can be merged into Oppo paper, and different parts can be highlighted.

* + 07\_OPPO\_S2-220xxxx\_KI#1 Interim conclusion for UE-to-UE Relay

Vivo has concern on the source UE selects Relay UE, Oppo clarifies to Vivo. ZTE ask if there is any difference between Proposal 6 and Proposal 8, Oppo clarifies to ZTE. Huawei comments Layer-2 and Layer-3 should not be separate, and listing the concluded solution will be good. E// comments whether security can be ensured for Layer-2 Relay as some solutions imply PC5-S can be interpreted by Relay UE. Huawei does not think Relay UE aware of e2e PC5-S will break security. IDC has concerns on Q2, Q3 and P7.

Way-forward proposal: continue discussion offline and try to work out a merged proposal.

* KI#2 evaluation and conclusion (~15min)
  + 08\_vivo\_S2-220aaaa\_KI#2\_Evaluation and conclusion on KI#2-vivo

Samsung comments table is not preferred. China Telecom comments application layer solution should also be considered in conclusion. QC comments sol#15 listed two application layer mechanisms which should be mentioned in conclusion. CATT asks what exact impacts on standards. QC clarifies stage 2 description is needed, and stage 3 may decide some triggers. Oppo asks to clarify the RAN dependency. Samsung comments it is not clear what to be concluded for sol#36. QC clarified MOBIKE is an optimization, and should be optional. E// asks whether all cases need to be supported. LGE comments different level continuity for different cases.

Way-forward proposal: update the paper based on the comments and continue the discussion offline.

* KI#3 evaluation and conclusion (~30min)
  + 09\_LGE\_S2-220xxx1\_ProSe\_KI#3\_eval (LGE)

QC asks how to ensure “make-before-break”, and how IP address will be used after switching as IP address for PC5 and Uu are different. Huawei clarifies the IP address usage. E// has concern on security of IP address sharing. China Telecom also thinks IP address sharing has limitation, and should be made optional as for some cases it can’t be used.

* + 10\_HW\_S2-220byyy 23.700-33 KI#3 Evaluation and conclusion (HW)

No comment.

* + 11\_IDC\_S2-220XXXX\_KI#3\_path switch evaluation\_IDC

Samsung comment to avoid using term service continuity.

* + 12\_vivo\_S2-220bbbb\_KI#3\_Evaluation and conclusion on KI#3-vivo

QC made same comments as to 09\_LGE\_S2-220xxx1\_ProSe\_KI#3\_eval (LGE).

* + 13\_LGE\_S2-220xxx2\_ProSe\_KI#3\_con (LGE)

No comment.

Way-forward proposal: continue discussion offline and try to work out a merged proposal.