Report on 37th NS/IN Research Workshop

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1. Introduction
The 37th NS/IN Research Workshop took place in online on March 4, 2021. Here, all invited speakers and panelists of panel session were attended at a hall in Tokyo, Japan, to provide high quality live streaming. And all the audience participated online. The workshop was sponsored by Future Society Initiative of Tokyo University, the Beyond 5G Promotion Consortium, the technical committee on Local 5G Promotion, the Ministry of Internal Affairs and Communication, the IEICE Communications Society, the technical committee on Network Systems (NS), and Information Networks (IN) of the IEICE Communications Society. The overall theme was “Evolution of Beyond 5G from new normal”. The workshop’s aim was to discuss the technical direction and research topics for Beyond 5G. A record showing of 293 participants testified to the success of the workshop. The workshop featured one invited talk session (four speakers) and one panel session.

2. Invited Speakers
The general chair of the workshop, Prof. Akihiro Nakao (The University of Tokyo), invited four distinguished leaders in evolution of information networks (Fig. 1). These speakers addressed the topics related to beyond 5G in the university, government, and industry. Figures 2 to 5 show photographs of the speakers.

Fig. 1 Opening speech of the workshop Prof. Nakao.

Fig. 2 Invited speaker: Pres. Gonokami.

- President Makoto Gonokami (The University of Tokyo) presented the prospect of Beyond 5G and role of universities.

Fig. 3 Invited speaker: Dr. Suzuki.

- Dr. Shinya Suzuki (Ministry of Internal Affairs and Communication) presented the effort for realization of data centric society.
• President Hideyuki Tokuda (National Institute of Information and Communications Technology) presented the R&D strategies of Beyond 5G and 6G in NICT.

Fig. 4 Invited speaker: Pres. Tokuda.

• Dr. Katsuhiko Kawazoe (NTT corporation) presented the effort of NTT for Beyond 5G (the IOWN).

Fig. 5 Invited speaker: Dr. Kawazoe.

3. Panel Session
   After the invited talks, the panel session was held (Fig. 6). The session was moderated by the general char, Prof. Nakao. All of the invited speakers were invited as panelists. In this session, the trends, the future visions, problems of utility, policy for Beyond 5G and future technologies after COVID-19 pandemic were discussed. There was also a lively discussion between the audience and the panelists at the end of the session.

Fig. 6 Panel Session: Panelists.

4. Conclusion
   This year’s workshop invited key persons to speak on the evolution of Beyond 5G from new normal. We believe that the presentations given by them and the subsequent panel discussion provided intellectual stimulation to the audience and fruitful insight into future research and development.

   The technical committee on IN and NS plans to hold next year’s workshop in March 2022. Finally, we would like to express our gratitude to the workshop committee members, particularly to Shigefumi Naito (NEC Corp.), Akira Murakami (TOSHIBA Corp.), Kouki Inoue (FUJITSU LABORATORIES Ltd.), Yuta Muto (Hitachi, Ltd.), Keiichi Iwata (Mitsubishi Electric Corp.), and Koji Sugizono (NTT Corp.) who made this workshop possible.