

## Minutes of WP-meeting 355

### Attendance:

Zoom: Yumi Aoki, Paul Colas, Ulrich Einhaus, Jochen Kaminski, Claus Kleinwort, Huirong Qi, Ron Settles, Jan Timmermans, Maxim Titov, Keita Yumino

### General News:

Maxim shortly summarized the political situation in Japan: There will be a general election in September or October (the date has not been settled yet). Therefore, there will be no political action before this event. The advisory panel will meet a second time at the end of September and discuss the next steps. Maxim expects that given the Corona situation, the upcoming meetings will all be online and this will not be helpful to speed up the process.

Maxim and Paul mentioned, that several meetings will take place soon:

MPGD 14.-19.11.2021 at Weizmann Institute (as of 27.8.: delayed by about one year)

ILCX 25.-29.10. discussing additional new experiments at the ILC.

EU-ILC Meeting on 2.9. in the morning, here it will be discussed how Europe can contribute to the ILC

### News from the groups:

Uli showed an improved presentation of the revised calculation on the separation power. He explained in detail how he converts the  $dE/dx$  measurement of electron tracks into the separation power of pions and Kaon. A longer discussion about the numbers and the method in particular regarding the GridPix followed and was continued after the meeting. A confirmation from Peter and Kees is still needed.

Huirong started with pointing out that there were several cases of Corona in some regions of China, in particular also in Beijing, and therefore he was in home office for some time and all meeting of this month have been canceled and will be held hopefully in September or later this year.

He then presented some new measurements with the setup at IHEP, where a laser is used to ionize the gas along the 1x6mm pads. First the detector performance was tested with an  $^{55}\text{Fe}$  source. Then several different gas mixtures were tested with the laser beam. The short tracks were scaled to a full size chamber (220 pad rows) by adding the information of several/many different events. The intensity of the laser was changed (70% removed/ 80 % removed) studying the impact of the different ionization densities on the  $dE/dx$  resolution. Huirong showed the results for the 80% and the 70% dimming, as expected the performance for the brighter beam was better (3.36 %) compared to the dimmer beam (4.36 %). Finally, Huirong also showed the performance of the detector for different drift distances. The result for longer drift distances (38 cm) was significantly better than the one for shorter drift distances (16 cm).

Paul reported that the data taking with T2K at the DESY test beam in June/July went well. So far, the analysis hasn't started, because of the vacation season. Paul is now concentrating on finishing writing the LCTPC Micromegas paper. After that he will study the track distortions seen in the T2K test detector more closely.

Jan said that also for the pixel test beam the analysis was not started because of vacations. Peter has started the event/track building, but there was a bug in the program before he left. He has now solved the issue and the event building will be redone. New insides on the data are found continuously. In particular the number of tracks were not expected, as the trigger was thought to be more efficient.

AOB:

The next workpackage meeting will take place on September 9<sup>th</sup>.