

## HDice Status Meeting

**Date: October 16, 2020**

**Time: 11:00AM – 11:30PM**

*Attendees: Peter Bonneau, Aaron Brown, Pablo Campero, Tyler Lemon, Marc McMullen, Amrit Yegneswaran*

### 1. Discussed HDF5 file format

- 1.1. Example HDF5 file from Zurich Lock-in amplifier viewed using HDFView program
- 1.2. Discussed proposed strategy for converting a CSV containing averaged data to HDF5
  - 1.2.1. Read in template
  - 1.2.2. Determine number of samples in averaged data
  - 1.2.3. Ensure all HDF5 fields are as long as the number of samples of averaged data; expand or reduce as necessary
  - 1.2.4. Overwrite template HDF5 file's frequency R, phase X, and Y fields with data from average CSV
  - 1.2.5. Save HDF5 file as a new file

### 2. Trial period for boxcar averager started October 12, 2020

- 2.1. Tyler Lemon will investigate using boxcar averager once cabling is re-connected to lock-in amplifier

### 3. Procedure to install LabOne to access Zurich lock-in amplifier

- 3.1. Log on to Hall B subnet PC
- 3.2. Install LabOne software from either O Drive installation executable or from Zurich website
  - 3.2.1.1. O Drive: O:\DSG\_Slow\_Controls\HDIceLabOne64-20.07.2325.msi
  - 3.2.1.2. Zurich website: <https://www.zhinst.com/americas/en/support/download-center>
- 3.3. Open LabOne
- 3.4. If available, select DEV2465 to connect and open interface to Zurich lock-in amplifier