DSG – HDice Meeting

Date: September 17, 2020
Time: 2:00PM – 2:30PM

Attendees: Aaron Brown, Pablo Campero, Brian Eng, Tyler Lemon, Marc McMullen, Tom O'Connell, Xiangdong Wei

1. Discussed Zurich lock-in amplifier settings for fsNMR program
    - 1.1. Reference signal power should be less than -25 dB
    - 1.2. Full capabilities of the lock-in amplifier's frquency range should be usable
        - 1.2.1. Lock-in amplifier capable of outputting 0 – 600 MHz signals
        - 1.2.2. User should have capability to select frequency range
    - 1.3. Typically, 1000 sweeps will be used
        - 1.3.1. User should have capability to set number of sweeps
    - 1.4. Tyler Lemon will continue development of new fsNMR program

2. Discussed inconsistencies in setting of NMR excitation signal power
    - 2.1. Settings are not saved and are unable to be loaded from a configuration file
        - 2.1.1. All other settings can be saved and recovered from a configuration file
    - 2.2. Logic will have to be added to new program to set, check, and ensure signal power remains at correct value for sweeps

3. UITF run status
    - 3.1. HDice equipment has been moved to UITF, but setup has not been completed
    - 3.2. Once setup is complete in UITF within next week, Xiangdong Wei expects to be able to test fsNMR program