1147-11-431 **Fu-Tsun Wei*** (ftwei@math.nthu.edu.tw), Department of Mathematics, National Tsing Hua University, No. 101, Sec. 2, Kuang-Fu Rd., Hsinchu, 30013, Taiwan. *Green's functions on Mumford curves*.

In this talk, we shall introduce an analogue of Green's function on Mumford curves. The special value of Green's function at s = 0 interprets the volume of the corresponding curve. Using harmonic analysis on Bruhat-Tits trees, we connect the derivative of Green's functions at s = 0 with the Manin-Drinfeld theta functions, which enables us to show that the special derivative here is equal to twice of the Néron's local height with sign changed. (Received January 23, 2019)