## Abstract Submitted for the DAMOP12 Meeting of The American Physical Society

Development of 171Yb optical lattice clock at KRISS JONGCHUL MUN, CHANG YONG PARK, DAI-HYUK YU, WON-KYU LEE, SANG EON PARK, TAEG YONG KWON, SANG-BUM LEE, KRISS — We measured the absolute frequency of the optical clock transition 1S0 (F = 1/2) - 3P0 (F = 1/2) of 171Yb atoms confined in a one-dimensional optical lattice and it was determined to be 518 295 836 590 865.7 (9.2) Hz. The measured frequency was calibrated to the Coordinated Universal Time (UTC) by using an optical frequency comb of which frequency was phase-locked to a hydrogen maser as a flywheel oscillator traceable to the UTC. The magic wavelength was also measured as 394 798.48 (79) GHz. The results are in good agreement with two previous measurements of other institutes within the specified uncertainty of this work.

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