



Contribution ID: 31

Type: **not specified**

## Chiral and deconfinement transitions in strong coupling lattice QCD

*Tuesday, 15 June 2010 17:00 (20 minutes)*

We investigate the QCD phase diagram based on the strong coupling lattice QCD. In particular, we focus on the interplay between the chiral and deconfinement transitions in the strong coupling framework. We show that the critical temperature at zero chemical potential becomes lower and closer to Mont-Carlo data due to the Polyakov loop effects. We will show some results on finite chemical potential cases.

**Please, insert your presentation type (talk, poster)**

talk

**Primary author:** MIURA, Kohtaroh (Yukawa Institute for Theoretical Physics, Kyoto University)

**Co-authors:** Prof. OHNISHI, Akira (Yukawa Institute for Theoretical Physics, Kyoto University); Prof. KAWAMOTO, Noboru (Department of Physics, Hokkaido University); Mr NAKANO Z., Takashi (Department of Physics, Kyoto University)

**Presenter:** MIURA, Kohtaroh (Yukawa Institute for Theoretical Physics, Kyoto University)

**Session Classification:** Parallel 28: Nonzero temperature and density

**Track Classification:** Nonzero temperature and density