

GUT INSPIRED GAUGE-HIGGS UNIFICATION MODEL

YUTA ORIKASA

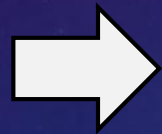
(CZECH TECHNICAL UNIVERSITY IN PRAGUE)

Collaborators: Shuichiro Funatsu, Yutaka Hosotani, Hisaki Hatanaka, Naoki Yamatsu

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GAUGE-HIGGS UNIFICATION MODEL

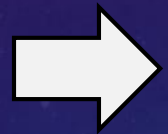
- 5D Randall-Sundrum spacetime
- Gauge Symmetry $SU(3) \times SO(5) \times U(1)$
- Higgs boson is the fifth dimensional component of the gauge field



**One solution of
the hierarchy problem**

COLLIDER

- Z' bosons are heavy (>10 TeV)
- LHC doesn't observe the signal
- GHU models have large parity violation



ILC can detect the asymmetry

FORWARD-BACKWARD ASYMMETRY

