1086-VO-2059   **Dilum De Silva*** (`dilum@ksu.edu`), 1540 International Court, Apt #27, Manhattan, KS 66502, and **Chris Pinner**. *Lind-Lehmer constant for groups of the form $\mathbb{Z}_p^2$.*

We discuss Lind-Lehmer constant for groups of the form $\mathbb{Z}_p^2$, where p is a prime. We first show that we can obtain a nontrivial lower bound for the Lind-Lehmer constant, specifically $\frac{1}{p^2} \log M_2$ for $p \geq 3$, where $M_2 := \min\{a^p \mod p^2 \mid 2 \leq a \leq p-1\}$. Then we construct an explicit polynomial that attains this minimal value. (Received September 26, 2012)