



INDIAN STATISTICAL INSTITUTE
Theoretical Statistics and Mathematics Unit, Kolkata

NUMBER THEORY SEMINAR

Date: August 01, 2024

Time: 02:30 PM

VENUE:

L- infinity

(5th Floor, A.N. Kolmogorov Bhavan), ISI Kolkata

TITLE:

**Diophantine Approximation with Prime Denominator in
Quadratic Number Fields under GRH**

SPEAKER:

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Stat-Math Unit, ISI Kolkata

ABSTRACT:

Matomi proved that if $\alpha \in \mathbb{R}$ is irrational, then there are infinitely many primes p such that $|\alpha - a/p| \leq p^{-4/3 + \varepsilon}$ for a suitable integer a . In this talk, we extend this result to all quadratic number fields under the condition that the Grand Riemann Hypothesis holds for their Hecke L -functions.

ALL ARE CORDIALLY INVITED