

INDIAN ASSOCIATION FOR THE CULTIVATION OF SCIENCE
2A&B, Raja S.C. Mullick Road, Jadavpur, Kolkata-700032, India

Seminar Notice

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Theoretical Physics Department

Title:	Unraveling the couplings of a Drell-Yan produced Z' with heavy-flavor tagging
Speaker:	Tanmoy Modak, National Taiwan University, Taipei, Taiwan
Date:	February 20, 2018 (Tuesday)
Time:	3:30 p.m.
Venue:	Theoretical Physics Seminar Room (C406), 3rd Floor, Centenary Building, IACS
Abstract:	<p>In this talk, I will discuss how heavy-flavor tagging can probe the coupling structure of a Drell-Yan produced Z' at LHC. A weakly coupled Z', mass around few hundred GeV can emerge in the near future at LHC. However, the coupling structure will not be revealed in the Drell-Yan process. The process $q g \rightarrow q Z'$ provides a probe to the coupling structure, if the flavor of the final state jet is identified. The charm-tagging and b-tagging algorithms, developed by ATLAS and CMS would allow us to probe the coupling structure of such a Z'. I will further discuss the connection between our study with the recent $B \rightarrow K^{(*)}$ anomalies.</p>

All are cordially invited to attend the seminar