



**The Hong Kong Polytechnic University
Department of Applied Mathematics**

Colloquium

Moreau's Proximity Operator: From Unilateral Mechanics to Data Science

by

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Proximity operators were introduced by Jean Jacques Moreau in 1962 in connection with problems in unilateral mechanics. They have recently become prominent tools in the modeling and the numerical solution of problems in data science. In this talk, an overview of proximity operators will be provided as well as recent developments in the area of complex structured optimization problems. Applications to machine learning, inverse problems, and image recovery will be discussed. Open conjectures and mathematical challenges in the field will also be presented.

Date : 6 October, 2015 (Tuesday)

Time : 12:00noon – 1: 00p.m.

Venue : TU801, The Hong Kong Polytechnic University

*** * * ALL ARE WELCOME * * ***