

Màj 01/06/2020

UE 2.1. Current concepts in Precision Health

15 ECTS

Parcours « *Precision Health* »

ST4: Artificial intelligence and precision health

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An increasing amount of medical data is routinely generated by the health care system and is reused in a biomedical research perspective. The volume and type of this data raises specific methodological issues. In parallel to this explosion in the volume of data, machine learning now allows the construction of algorithms that can be used to support medical decisions. The objective of this seminar is to present both these innovative tools but also the methods that allow their evaluation in a perspective of their use for care.

Duration: 1 day

Program

Provisional schedule

AM

Dynamic Dempster Multi-Layer Perceptron for the patient admission in emergency department (0h30)
Khouloud Fakhfakh, Pr Slim Hammadi, OSL CRISTAL Centrale Lille slim.hammadi@centralelille.fr

A clinical Decision Support System to handle uncertainties in the pancreatic Cancer care (0h30)
Sabrine Chebbi, Pr Slim Hammadi, OSL CRISTAL Centrale Lille slim.hammadi@centralelille.fr

Reinforced learning: understanding dynamic and sequential decision-making models (1h00)
Abir Karami, Guillaume Lozenguez, IMT Lille Douai, ISITE project APACHES abir.karami@imt-lille-douai.fr,
guillaume.lozenguez@imt-lille-douai.fr

Computerized Decision Support Systems for the prevention of adverse drug event - expert systems (1h00)
Pr Jean-Baptiste Beuscart, Faculté de médecine de Lille, ULR2694-METRICS jean-baptiste.beuscart@univ-lille.fr

PM

Computerized Decision Support Systems for the prevention of adverse drug event - induction of rules by statistical learning (1h00)
Pr Emmanuel Chazard, Faculté de médecine de Lille, ULR2694-METRICS emmanuel.chazard@univ-lille.fr

Bioinformatics: how omics data analysis is promoting statistical learning? (1h30)
Guillemette Marot, Univ Lille ULR2694-METRICS, Inria MODAL, co-head of bilille, member of the PIA French Institute of Bioinformatics guillemette.marot@univ-lille.fr

Build a patient embedding mixing structured and unstructured medical data (0h30)
Vincent Sobanski, Grégoire Ficheur, Faculté de médecine de Lille, INFINITE / ULR2694-METRICS, co-heads of INCLUDE, ISITE project PHENOMIX vincent.sobanski@univ-lille.fr, gregoire.ficheur@univ-lille.fr