

I IISPV Scientific Session 2019

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Sharing medical data to build Bio Big Data. Why and how?

Life as we see it in our planet today has been shaped by many different **biological processes** during billions of years. These processes leave a signature in our genomes in the form of differences between species, or between individuals of the same species. By interrogating these patterns of **genome diversity** we can infer what are the forces that affect living organisms, how and when they act and how do they affect such various things as **biodiversity**, **ageing** or the differential **susceptibility of different persons to certain diseases**.

The abundance of data that has been made possible by modern technologies generates novel opportunities to get answers to these very exciting questions.

Keywords: genome evolution; computational genomics; human genome diversity; genomic architecture of complex traits; evolutionary medicine; pleiotropy