# Computational Medical Diagnosis

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**Abstract**

Computers are increasingly being used in the medical industry. They are used to provide structure and efficiency to record management and patient organization to both hospitals and medical labs, but the intelligence and efficiency of computers is also advanced enough to be able to analyze massive quantities of information and produce intelligent, reasonable conclusions. Of course in the context of diagnosis and medication, the data can consist of human medical records and genetic sequencing of genetic material and conclusions be diagnoses and care planning. Analysis of this information is currently conducted by one or more highly trained doctors or medical experts. The cost of these trained professionals is relatively high compared to the time it takes to perform the analysis per patient. Using computers, with advanced algorithm and high level cognitive science research, we are able to replicate the team of specialists and come to the same results in significantly less time and hard work, freeing those professionals to be able to perform harder problems. Another advantage to have expert diagnostic systems is having available oversight for work done by human doctors. Research has shown a connection to linguistic expression and diagnostic correctness. A computer that is programmed to diagnose can evaluate a doctor's work and catch costly misdiagnoses before they can occur.

## References


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