

**BAYESIAN MEDICAL EXPERT**  
**A PROBABILISTIC HEALTH CARE**  
**SYSTEM FOR DIAGNOSTICS**

# INDEX

Topic	Page number
Abstract	3
Features of the Bayesian Diagnostic System	3
Usage Manual	4

## Abstract:

Bayesian Medical Expert system is a probabilistic inference system that assesses the probability of a patient having a heart related disease and diabetes. The system takes into account numerous symptoms into consideration and build a Bayesian Network on the basis of that. The symptoms for heart diseases and diabetes are categorized into three main parts viz. less critical symptom, medium critical symptoms and very critical symptoms. The conditional probability tables of these are generated by individual root node symptoms that can be **directly observed** by a physician. Many of the symptoms are qualitative and it is not possible to quantify it because of which existence of a probabilistic system is highly beneficial.

The relationships between various stages can be clearly represented by the Bayesian Network.

## Usage Manual:

Copy the file BayesianDiagnostic.dne in any location and open the file in Netica. Compile the network and input values by clicking on all the root nodes (node without parents) to see the changes flowing through the Bayesian Network.

