



Future
Connect
Media

Machine learning Part F

Part of Future Connect Media's IT
Course

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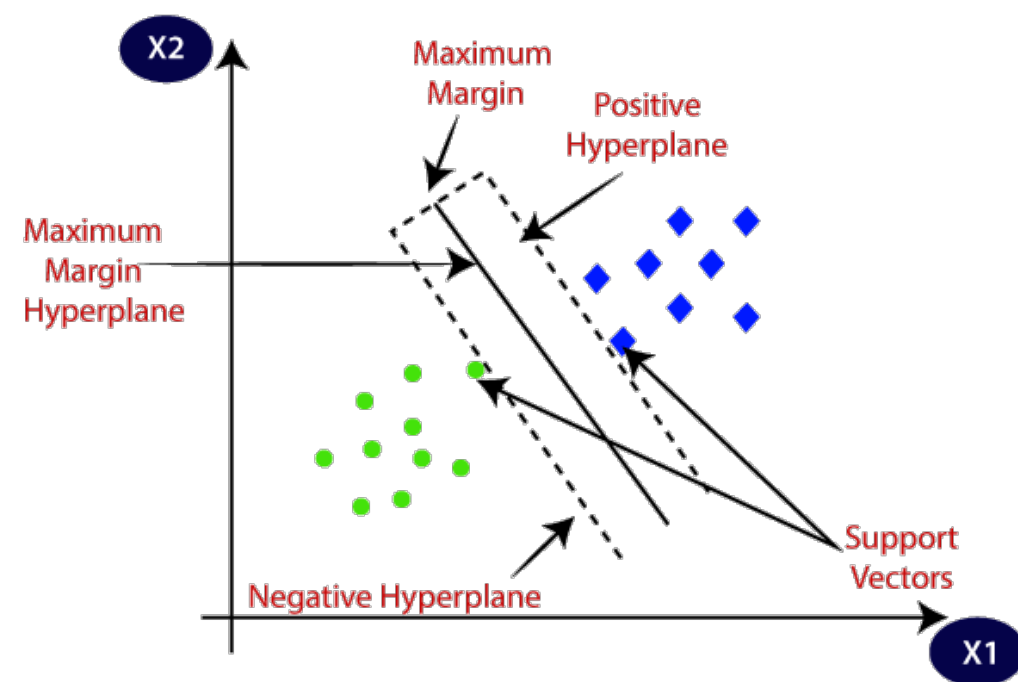
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Topics to be covered:

- Support Vector Machines
- Kernal Support Vector Machines

Support Vector Machines

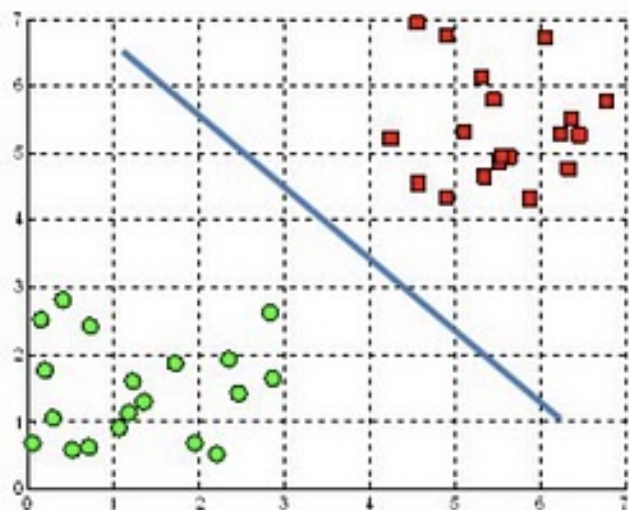
- Support vector machines so called as SVM is a supervised learning algorithm which can be used for classification and regression problems as support vector classification (SVC) and support vector regression (SVR). SVM is based on the idea of finding a hyperplane that best separates the features into different domains.



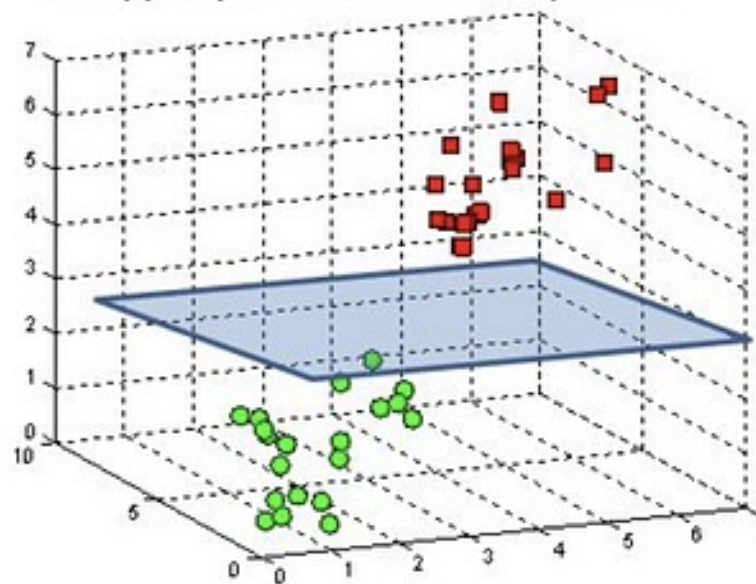
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- Hyper plane
- Margin
- Maximum plane

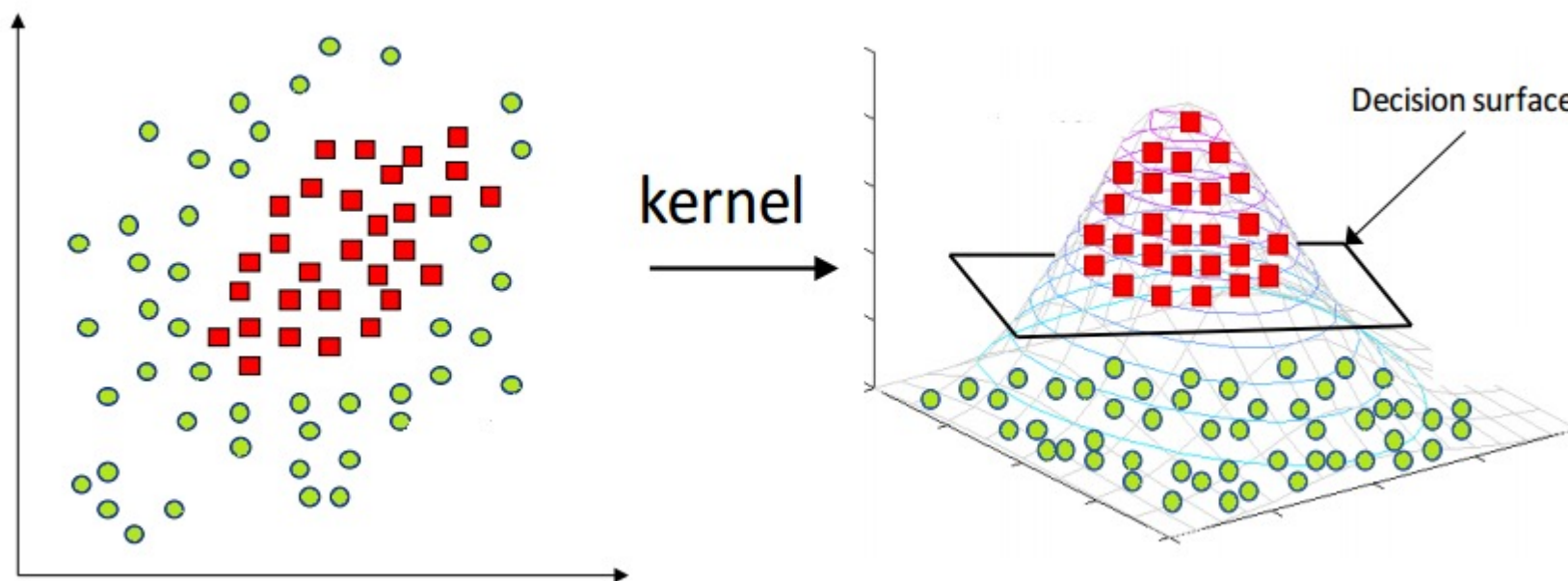
A hyperplane in \mathbb{R}^2 is a line



A hyperplane in \mathbb{R}^3 is a plane



Kernel Support Vector Machine



Kernal in SVM

- Linear Kernal
- Radial Basis Kernal
- Polynomial Kernal
- Sigmoid Kernal