CM 146: Introduction to Machine Learning (Winter 2023)

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A tentative list of topics

- 1. $1.1 \ 1/9$ Intro, supervised learning setup
- 2. 1.2 1/11 Decision Trees (CIML 1)
- 3. 2.1. 1/16 No class
- 4. 2.2 1/18 Nearest neighbors (CIML 3)
- 5. 3.1 1/23 Linear classification (perceptron) (CIML 4)
- 6. 3.2 1/25 Logistic regression (CIML 9.1-9.2,9.6-9.7)
- 7. $4.1 \ 1/30$ Naive Bayes.
- 8. 4.2 2/1 Linear regression (CIML 6-6.2, 6.4-6.6).
- 9. 5.1 2/6 Overfitting and regularization (CIML 2). Evaluation.
- 10. 5.2 2/8 Neural Nets (CIML 10)
- 11. $6.1 \ 2/13$ Learning theory (CIML 12).
- 12. $6.2 \ 2/15 \ \text{Kernels}$ (CIML 11).
- 13. $7.1 \ 2/20 \ \text{No class}$
- 14. 7.2 2/22 SVMs (CIML 7.7).
- 15. 8.1 2/27 Multi-class classification.
- 16. 8.2 3/1 Ensemble methods (CIML 13).
- 17. 9.1 3/6 PCA (CIML 15.2).
- 18. 9.2 3/8 Clustering (CIML 15.1).
- 19. 10.1 3/13 Mixture models.
- 20. 10.2 3/15 HMMs.