

# Improved Boosting with Better Margin-Maximization?

- can design algorithms **more effective** than AdaBoost at maximizing the minimum margin
  - in practice, often perform **worse** [Breiman]
  - **why??**
  - more aggressive margin maximization seems to lead to:
    - more **complex** weak classifiers  
(even using same weak learner); or
    - **higher minimum** margins,  
but margin **distributions** that are **lower overall**
- [with Reyzin]