CS394R
Reinforcement Learning: Theory and Practice

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Good Morning Colleagues

• Are there any questions?
Logistics

• First 3 programming assignments past due
Logistics

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  - Until literature survey is due: 1 point off
  - Until last day of class: 2 points off
  - After last day of class: 3 points off
  - After final project is due: 4 points off
Logistics

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- Complete the class survey by Wed. at 5pm
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- Literature review due November 10th
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- Literature review due November 10th
  - At least 10 refs
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- Literature review due November 10th
  - At least 10 refs
  - Also reiterate proposal; be more concrete; answer the biggest questions; preliminary results
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  - Also reiterate proposal; be more concrete; answer the biggest questions; preliminary results
  - Partial draft for final project
Overview

- RMax: model-based learning in polynomial time
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  - High-level idea (pdf)
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  - Q-learning vs. RMax (videos)
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- MBIE: more practical
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- MBIE: more practical

- Fitted R-Max: Extend to continuous state space (pdf)
Discussion

What’s more interesting? Theoretically grounded algorithms? Or algorithms that work in practice?
Discussion

- What’s more interesting? Sample complexity? Or average loss?