James D. Miller

Professor of Economics, Smith College

Jdmiller@Smith.edu

Employment

Smith College: (Professor of Economics) At Smith from 1996 to present.

Advisor to the board of Alcor. Dec 2016-present.

Education

University of Chicago: Ph.D.in Economics January 1997

Stanford Law School: J.D. (Member of Law Review) June 1992

Yale University: M.A. in Economics June 1989

Wesleyan University: B.A. June 1988

Will Artificial Superintelligence Kill US?

An Appeal to Al Superintelligence: Reasons to Preserve Humanity

Prize Administer

Receive up to \$1,000 for writing a short essay that uses the tools of theoretical economics to contribute to the Al alignment problem.

Books

The Technological Singularity: Managing the Journey. May 2017. With three other editors.

On the Question of Free Trade: An Economics Discourse. (A 46 page ebook of a debate between the co-authors.) April 2016.

Singularity Rising. October 2012. First chapter audio.

Principles of Microeconomics. McGraw-Hill. February 2008.

Game Theory At Work. McGraw-Hill, 306 pages. (2003) Translated into Chinese long form, Chinese short form, Japanese, Korean, and formatted for sale in India.

Academic Articles

James D. Miller. Expecting the Future: How AI's Potential Performance Will Shape Current Behavior. To be published in Forecasting with Artificial Intelligence - Theory and Applications, edited by Mohsen Hamoudia, Spyros Makridakis, and Evangelos Spiliotis.

James D. Miller, Roman Yampolskiy, Olle Haggstrom, Stuart Armstrong, "Chess as a Testing Grounds for the Oracle Approach to Al Safety". Poster at AlSafety 2021 conference. https://arxiv.org/abs/2010.02911 October 6, 2020.

James D. Miller, Roman Yampolskiy, Olle Häggström. "An AGI Modifying Its Utility Function in Violation of the Strong Orthogonality Thesis". https://arxiv.org/abs/2003.00812. Published in Philosophies, December 2020.

An AGI with Time-Inconsistent Preferences. James D. Miller, Roman Yampolskiy Delphi, Vol. 2, No.4, 200-2006. 2019.

Miller, James Daniel. "When two existential risks are better than one." *foresight* 21, no. 1 (2019): 130-137.

Baum, S.D., Armstrong, S., Ekenstedt, T., Häggström, O., Hanson, R., Kuhlemann, K., Maas, M.M., Miller, J.D., Salmela, M., Sandberg, A. and Sotala, K., 2019. Long-term trajectories of human civilization. foresight, 21(1), pp.53-83.

James D. Miller. "For Pleasure or Productivity: Divergent Paths in Intelligence Augmentation" Published in Araya, Daniel. *Augmented Intelligence: Smart Systems and the Future of Work and Learning*. Peter Lang International Academic Publishers, 2018.

James D. Miller. "A Rationally Addicted Artificial Superintelligence." Published in the 2018 peer reviewed book Artificial Intelligence Safety and Security by Roman V. Yampolskiy.

James D. Miller. "Reflections on the Singularity Journey." In the 2017 peer reviewed book *The Technological Singularity: Managing the Journey.*

James D. Miller. "Singularity Blog Insights." In the 2017 peer reviewed book *The Technological Singularity: Managing the Journey.* A collection of four blog posts by other authors.

James D. Miller and Debbie Felton. "<u>The Fermi Paradox, Bayes' Rule, and Existential Risk Management</u>." *Futures*, June 2016.

James D. Miller. "Rifts in Rationality." Review of Rationality: From AI to Zombies, by Eliezer Yudkowsky. Published in The New Rambler. August, 2015.

Billion Dollar Bots, published in The Hanson-Yudkowsky Al-Foom Debate, 2013.

James D. Miller. "Some Economics Incentives Facing a Business That Might Bring About a <u>Technological Singularity</u>." Published in the peer reviewed book *The Singularity Hypothesis: A Scientific and Philosophical Assessment.* Springer, 2012.

N. Boris Margolin, Brian Neil Levine, James D. Miller, and Matthew Wright. Economic Incentives for Protecting Digital Rights Online. Electronic Commerce Research and Applications, 10(5):553-564, September 2011.

James D. Miller and Matt Morey. 2003. "Power Markets: Transferring Systematic Risk to Lottery Players." *Public Budgeting & Finance.*

James D. Miller and D. Felton. 2002. "Using Greek Mythology to Teach Game Theory." *The American Economist*. Vol. 46.

D. Felton and James D. Miller. 2002. "Truth Inducement In Greek Myth." *Syllecta Classica* Vol. 13: 104-125.

James D. Miller. 2001. "Perjury and Information Weighting." *International Review of Law and Economics* Vol. 21: 329-341.

James D. Miller and Lixin Gao. 2001. "Creating A Subpoena-Proof Diary: A Technological Solution to A Legal Problem." *Journal of Information, Law and Technology* 10/31/01. In its August 6, 2001 issue *Forbes* devoted a paragraph to the significance of this article.

James D. Miller. 1997. "Using Lotteries To Expand The Range of Litigation Settlements." *Journal of Legal Studies* Vol. 26.1: 69-94.

Grants

6/19

<u>Future of Life Institute grant</u> for "Utility Functions: A Guide for Artificial General Intelligence Theorists." 2018. Grant for \$78,289. Resulted in the publication of two academic articles.

Journalistic Publications

It's Time to Start Treating High School Math Like Football	Quillette	2/22
Machine Learning, Deep Fakes, and the Threat of an Artificially	Intelligent Hate-Bot Quillette	11/21
The Apocalyptic Threat from Artificial Intelligence Isn't Science Fiction Quillette		12/20
Microbes on Venus May Herald Human Extinction 9/20	Quillette.com	
Want to Reduce Police Brutality? 7/20	ArcDigital	
Combating China's Threat to American Free Speech 10/19	TriggerWarning.us	
Against Big Tech Viewpoint Discrimination	Quillette.com	

Like the Campus Thought Police 4/19	Quillette .com	
Google's China Ambitions Threaten U.S. National Security 10/18	Quillette.com	
Exterminate Mosquitoes for the Sake of Humanity 9/18	Quillette.com	
Banning Bitcoin to Complete Big Tech Censorship 8/18	Quillette.com	
Trump and Mexcio's next president can build the wall 7/18	FoxNews.com	
To Solve the immigration crisis 6/18	FoxNews.com	
Trump's plan to tax colleges will harm higher 11/17	Business Insider	
Get ready for the 'tech alt-right' to gain power and influence Business Insider 8/17		
Online Education: What I got Wrong 4/5/17	Inside Higher Ed	
Move the University of California, Berkeley to Garland TX 2/17	Frontpagemag.com	
The Stock market doesn't fear a Trump presidency 11/16	Business Insider	
The Stock market doesn't fear a Trump presidency 11/16	The Independent	
Genetically enhancing our children could raise interest rates 7/16	Business Insider	
Help the World's Poorest by Harvesting Their Organs 4/16	Trigger Warning	
6 Steps to the 'get rich slow' scheme 12/15	Business Insider	
What College Safe Spaces Should Be 12/15	Frontpagemag	
10 Tips from a Silicon Valley bootcamp 12/15	Business Insider	
Why Pretty Girls Hate Being Asked Out on Dates 4/15	Trigger Warning	

Expect Nuclear War 10/14

Trigger Warning

Accessorize With a Medical Device 5/14

Better Investing Mag.

Managed Funds With a Naughty Secret

Better Investing Mag.

What if Antibiotics Lose Their Effect 3/14

Better Investing Mag.

Better Investing Mag.

How Nobel Laureates View the Market 1/14

h+ magazine

The singularity and mutational load

A Bigger Pie Slice for Stock Owners 12/13

Better Investing Mag.

Pie in the Sky Accounting

11/13

Better Investing Mag.

View Your Decisions For A New Angle

10/13

Better Investing Mag.

Pick Up Milk and Bread at Amazon.com

9/13

Better Investing Mag.

Mint Your Own Money: Bitcoins

8/13

Better Investing Mag.

Extrasensory Market Perception

6/13

Better Investing Mag.

The Secret to Happiness

4/13

Better Investing Mag.

"Dilbert" Creator on Hedge Funds

Better Investing Mag.

The Market as a Model of Efficiency

Better Investing Mag.

Golden Years for Money Fears?

12/12

Better Investing Mag.

Why One for All Isn't Working in Europe

11/12

Better Investing Mag.

Amazon's Same-Day Service

10/12

Better Investing Mag.

Space, the Final Investing Frontier Better Investing Mag. 9/12 All Eyes on Google Better Investing Mag. 8/12 Cryonics and the Singularity Alcor's Magazine 7/12 An Economic Rationale for Resurrecting Neanderthals h+ Magazine 7/12 Savvy Investing Might Be in Your DNA Better Investing Mag. 6/12 Is the U.S. Slouching Towards Athens Better Investing Mag. When the Game's Rules Are Stacked Better Investing Mag. 4/12 Will Shots at Wall Street Backfire? Better Investing Mag. 3/12 The Politics of Medical Immortality h+ Magazine 2/12 Who's Got the Jumper Cables? Better Investing Mag. 2/12 Graduating from the University of Debt Better Investing Mag. 1/12 Unemployment and the Stock Market Better Investing Mag. 12/01 Upbeat Economics: 10 Good Signs Better Investing Mag. 11/11 Insider Trading Inside the Beltway Better Investing Mag. 10/11 The Singleton Solution h+ Magazine Is Groupon a Bargain for Merchants? Better Investing Mag. 9/11 DNA Politics: Science and Sociopathy h+ Magazine 8/11 Get Out While You Can Inside Higher Ed 8/11

Predicted to Fail, Amazon Lives On Better Investing Mag. 8/11 You Can Learn How to Become More Rational **Business Insider** Is Apple Sound to the Core? Better Investing Mag. The Constitution and Obamacare Better Investing Mag. 3/11 The Google, Facebook Face-Off Better Investing Mag. VAT Proposal Would Hurt Seniors Better Investing Mag. Philanthropy With Eyes Wide Open Better Investing Mag. 12/10 Excuse Me, Your Bias is Showing Better Investing Mag. 11/10 Corporations as Cannibals Better Investing Mag. 10/10 11 Keys Forces Sway the Economy Better Investing Mag. 9/10 Finding Your Bliss in 3-D Better Investing Mag. 8/10 Time Bomb: Unfunded Pensions Better Investing Mag. 6/10 Of Paulson and Brinkmanship Better Investing Mag. 5/10 Noncompete Cause Better Investing Mag. 4/10 Hidden Risks Behind the Sparkle... Better Investing Mag. 3/10 Risk. Bail Out. Repeat. Better Investing Mag. 1/10 A Matter of Trust Better Investing Mag. 12/09 Oil's Well With Price Volatility Better Investing Mag. 11/09

Battle of the Bonds Better Investing Mag. 9/09 Savings by the Book Better Investing Mag. 8/09 Money Crazy Better Investing Mag. 6/09 The Recession's Silver Lining Better Investing Mag. 5/09 Reallocation Nation Better Investing Mag. 4/09 An All-Consuming Issue Better Investing Mag. Let Professors Choose Inside Higher Ed 2/09 State of the Union Better Investing Mag. 2/09 Betting the House Better Investing Mag. 1/09 Take this job and Ship It! Smith Alumnae Quarterly Fall 08 Why Assistant Professors Should Earn More Inside Higher Ed 9/2/08 Than the Tenured The Trouble with Bubbles Better Investing Mag. 9/08 Amazon's POD Policy Threatens Its Value Better Investing Mag. 8/08 Bear on the Run Better Investing Mag. 6&7/08 Wealthy Colleges: Ante Up BusinessWeek.com 6/3/08 Massachusetts Should Tax Harvard Inside Higher Ed. 5/19/08

Better Investing Mag.

Better Investing Mag.

Cuts Always of Interest to Investors

4/08

Subprime Suspects

3/08

Quantum Leaps in Wealth Creation Better Investing Mag. 2/08 Stimulating Ideas **TCSDaily** 1/15/08 Microsoft's Strategy with Health Vault Better Investing Mag. Branded Unsafe Better Investing Mag. 11/07 A Thousand Chinese Einsteins Every Year **TCSDaily** 10/2/07 The Implications of Crowd Sourcing Better Investing Mag. 10/07 Beyond Merit Pay and Student Evaluations Inside Higher Ed 9/7/07 A Deer Price to Curb Global Warming Better Investing Mag. 9/07 Markets for Predictions Better Investing Mag. 8/07 Bogle Explains the Math Behind Indexing Better Investing Mag. 7/07 The Free Market Case Against the Immigration Bill **TCSDaily** 6/1/07 With Genetic Discrimination Ban Better Investing Mag. 6/07 Aging Difficulties Better Investing Mag. 5/07 The Benefits and Costs of Transparency Better Investing Mag. 3/07 Price Controls for Pills Better Investing Mag. 2/07 Free the Elderly **TCSDaily** 1/31/07 A Minimum of Understanding TCS Daily 1/10/07

Better Investing Mag.

Why Poison Pills are Bad Medicine

Silicon Medicine 12/06

Better Investing Mag.

Face Value 11/06 Better Investing Mag.

The Internet Has a Knack for Niches 10/06

Better Investing Mag.

It's About Time 9/06

Better Investing Mag.

Saying No to Stock Boycotts

Better Investing Mag.

8/06

Lurking Risk

Better Investing Mag

How Price Discrimination Works

Better Investing Mag.

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Is Google Uncoachable?

5/06

Better Investing Mag.

War Games 2006 04/14/06

TCS Daily

Getting Mexico on Our Side

04/04/06

TCS Daily

Which Colleges Will Make the Grade? 4/06

Better Investing Mag.

TCS Daily

Elevating Elephants 3/14/06

A Star System for Technology 3/06

Better Investing Mag.

Hey, Harvard, Hire Me!

2/22/06

TCS Daily

How To Fight RateMyProfessor.com

1/31/06

Inside Higher Ed.

Exposing Moral Free-Riders

1/20/06

TCS Daily

The Index Fund's Risk Advantage

1/06

Better Investing Mag.

Fund Stars Hard To Spot From Ratings

12/05

Better Investing Mag.

The Conduct of Standards Wars Better Investing Mag. 11/05 The Futility of Battling Internet Piracy Better Investing Mag. Feelers vs. Thinkers Tech Central Station 10/03/05 Barriers to Google's Future Better Investing Mag. 9/05 Make San Francisco the Leftwing Paradise It Hopes to Be **Tech Central Station** 8/29/05 The Singular Sensation **Tech Central Station** 8/15/05 Charging for Content: The Coming Test Better Investing Mag. 8/05 French-ifying Retail America **Tech Central Station** 6/09/05 **Outsourcing Teaching Tech Central Station** 5/27/05 Campaign Money for Bloggers **Tech Central Station** 5/16/05 Bulls#@* and the Academic Left **Tech Central Station** 5/3/05 The Science Haters Tech Central Station 4/6/05 Academia's Religion Orlando Sentinel 4/3/05 Harvard Forgives Larry Summers **Tech Central Station** 4/1/05 The Coming War on Blogs **Tech Central Station** 3/25/05 Let the Students Vote **Tech Central Station** 3/17/05 Our Battery-Powered Economy **Tech Central Station** 3/14/05

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Ward Churchill: Republican Civil Rights Pioneer

2/24/05

Will Blogs Produce a Chilling Effect **Tech Central Station** 2/14/05 Explaining Brad and Jennifer (same as below) The Orange County Reg. The Importance of Brad and Jennifer ... **Tech Central Station** 1/31/05 Social Security's Uncertain Future Orlando Sentinel 1/30/05 The Depolarizing Power of the Blogosphere **Tech Central Station** 1/17/05 Why is James Glassman Worried? **Tech Central Station** 1/3/05 The Economics of Gift Giving **Tech Central Station** 12/23/04 How to Determine Whether Social Security... **Tech Central Station** 12/21/04 Republicans Shouldn't Fear Eliminating Judicial Filibusters **Tech Central Station** 12/16/04 Freedom Bonuses: Welcoming Gifts for Ukraine **Tech Central Station** 12/03/04 Fear Not the Risky Scheme **Tech Central Station** 11/22/04 Database Blues? Tech Central Station 11/15/04 Should We Fear 'Cosmetic Neurology' **Tech Central Station** 10/29/04 A Trillion Lies **Tech Central Station** 9/28/04 Top Ten Tips for Bush **Tech Central Station** 9/23/04 If You Can't Beat 'Em, Co-Opt 'Em **Tech Central Station** 9/13/04 The World's Best College **Tech Central Station** 8/24/04 A Billion for Bin Laden **Tech Central Station**

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Saudi Terror Insurance **Tech Central Station** 10/24/03 **Tech Central Station** Needed: A U.S. Foreign Legion 9/24/03 Markets Reward Eco-Terror. So Let's Fix Them. **Tech Central Station** 8/28/03 Robot Economics **Tech Central Station** 8/19/03 More Equal Than Others **Tech Central Station** 8/7/03 **Brand Matters** Tech Central Station 7/10/03 A Recipe for Growth **Tech Central Station** 5/29/03 North Korean Extremes **Tech Central Station** 5/07/03 Digital Communism National Review Online 5/06/03 Information Sexternalities **Tech Central Station** 4/24/03 The CIA/Zionist Plot **Tech Central Station** 4/16/03 **Economic Mecca Tech Central Station** 4/10/03 **Tech Central Station** French Freeze 4/02/03 **Bathroom Duty** Tech Central Station 3/26/03 Future Search Tech Central Station 3/7/03 The Valentine's Day Trap **Tech Central Station** 2/14/03

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Blogging: An Economist's View

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National Review Online

The Marketplace of Faith

11/12/01

National Review Online

Security, Smith's Way

10/30/01

National Review Online

The Patient's Right Not To Sue

8/13/01

The Weekly Standard

If We Can't Choose Our School, ...

7/13/01

FrontPageMag.com

Can Intellectual Property Be Protected

Without Invading Privacy?

Foxnews.com

7/4/01

Pirates of the Future (Same as above.)

7/2/01

The Weekly Standard

Games Countries Play 5/21/01

The Weekly Standard

The Pros and Cons of Partially Privatizing Social Security

3/25/01

Orlando Sentinel

A First-Rate Aid Plan for Third World Countries

9/24/00

Orlando Sentinel

Brain Arbitrage: The Next Internet Frontier

9/12/00

Dismal.com

Genetic Testing and Health Insurance 8/17/00

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Let Them Eat Patents 7/31/00

The Weekly Standard

Strategies For Pricing Internet Content SIIA Trends Report 7/24/00

Articles published on CNBC.com

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Hunting For Interactive-TV Profits	1/22/01
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Profit Pipe Dream for Many E-Tailers	10/10/00
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Political Activities

A Republican Nominee for the Massachusetts State Senate (2004) Hampshire and Franklin district. Won uncontested primary. Defeated in the general election.

Other Writings

Presented paper titled "Teaching Innovation in Principles of Microeconomics Classes" at the Association of Private Enterprise Education conference at Las Vegas, Nevada on April 4, 2008.

Shaking up the electoral college for Massachusetts, The Beacon Hill Institute at Suffolk University, November 2003.

James D. Miller, "Profit Pipe Dreams for Many E-Tailers." Published in *Small Business: an Entrepreneur's Business Plan* 6th edition (2003) by J.D. Ryan and Gail P. Hiduke, pages 153-154. Originally published on CNBC.com, 10/10/00.