Dear Jeff Sanderfer, Laura Sanderfer, and Acton Academy Community,

I believe we are connected because of a shared value of education and liberty. Many of us are connected to Acton because we desire high-quality education, as we have seen the limitations and failures of what has been standardized in public education. Personally, I was attracted to the idea of self-directed learning, which is fundamentally in opposition to rewards-based environments.

Alfie Kohn, Punished by Rewards: The Trouble with Gold Stars, Incentive Plans, A's, Praise and Other Bribes: https://www.alfiekohn.org/punished-rewards/

My intent for this letter is to offer information so that all who are connected with Acton or interested in Acton can examine the international agenda for education, and determine whether it aligns with the desired future for children. In this process, I have found the Acton framework to have the elements of a social credit system, behavior and education fully incentivized, and widely utilizing classroom surveillance with cameras, online tracking, and education technology. I have offered Jeff and Laura Sanderfer the opportunity to speak to the ways Acton mirrors the educational 'reset' described below by organizations such as the World Economic Forum. By reading this letter, my hope is that you will have additional information to inform your consent to participate in current and possible outcomes described below.

There is a need to consider how to best educate children for a future that could incorporate technology not yet created. But, this does not mean I desire to create a future where children attend a 'smart school' and the school or stakeholders can benefit from the data collected from the children with the ability to alter their outcomes using algorithms. 'Smart schools' utilize classroom surveillance, online tracking platforms, wearables, or education technology for learning, as they have the ability to collect data from the students. Data from children is being used in the creation of technology outlined below, as well as to create algorithmed paths, social credit scores to make predictions about the whole child, and digital wallets housing a lifetime of surveillance data. Professor Yuval Noah Harari has raised many ethical questions about dystopias that can be created with collected data, as humans are considered hackable, or engineerable by algorithms that can make decisions for us and can manipulate us based on AI's ability to 'know us' from the collected surveillance and biometric data.

Yuval Noah Harari: Humans are Hackable/The Future of Education; algorithms to help you 'know yourself', AI Decision making, free-markets gone, engineer programming biases: https://www.youtube.com/watch?v=j0uw7Xc0fLk; Davos 2020: How to Survive the 21st Century: https://www.youtube.com/watch?v=gG6WnMb9Fho

*World Economic Forum: New Vision for Education: Fostering Social and Emotional Learning through Technology: "Advanced analytics and machine learning hold significant potential for social and emotional learning because they allow educators to personalize instruction through **predictive** computing." "The Civitas algorithms **identify data signals that correlate to a student's success**." "ZooU's **analytics can determine**, with potentially increasing accuracy, a child's baseline social and emotional skill level and target skills that need development." "Their research uses virtual peers, also known as "embodied conversational agents", to study human interaction and teach social skills.": https://www3.weforum.org/docs/WEF_New_Vision_for_Education.pdf*

Below is information about what has been publicly described for 'resetting' education, as well as questions as to possible consequences for our children and ethical considerations.

Do solutions utilizing 'smart schools' and digital i.d.'s/wallets have the best interest of our children in mind?
Do these solutions solve the historic education issues that lead to undesired outcomes?
How do we teach the skills to avoid a generation or even an individual child from seeking the rewards promised in exchange for compliance?

We have witnessed the destructive nature of compliance when it is out of harmony with the law of 'doing no harm' by loving others, and loving oneself. Our world has been 'gamified' so that points are assigned for eating out, getting health services, or exercising. Research has shown (some listed below) that incentivizing behaviors has little to no effect on addressing intrinsic motivation, or self-motivation. Instead, in behaviorism, incentives are given on a schedule and randomly in order to promote engagement long after interest ends. Ultimately, this creates mindless interactions, and not a deep understanding, critical thinking, integrity, ethics, intuition, or reasoning.

What solutions will provide our children with the education and skills we have seen are desperately needed in every level of leadership? The 'smart school' solution model rewards compliance and complacency for following the rules, staying on the personalized path, earning the tokens and being well-rated (on the leaderboard, highest level, liked by peers) in the 'game' of lifelong education.
Is a future where learning is confined, tracked through surveillance, pre-programmed for specific outcomes based on algorithms, or disconnected from the natural world, something that we want to create? 'Smart schools' are creating learning pathways that are programmed, which means the destination point and possible outcomes are programmed.

Yes, this is already happening. There are many sources and examples I have outlined below. There are links to videos to hear from a variety of experts that describe their projects on what has been termed things like: **the learning economy, the internet of education, transhumanism (or AI/human/robot synergistics), education gamification, skills learning and lifelong learning.**

Current ed-tech sources on the harvesting and aggregating classroom data:
1. Sensei - MIT Thesis on IoT Montessori on the creating a classroom model for data collection from surveillance tracking (bluetooth enabled materials, trackers on shoes, classroom cameras, etc.): Thesis:
https://wrenchinthegears.com/wp-content/uploads/2022/02/Dissertation-Sensei-IoT-Classroom-Tracking-Wildflower.pdf
a. EdSurge article:
https://www.edsurge.com/news/2018-11-20-kid-tracking-sensors-may-not-be-the-wildest-thing-about-this-montessori-model
b. clips: Tedx talk and Wildflower guide on collecting children's data-
https://www.youtube.com/watch?v=mfji9IVTUt0
2. China school's "Smart uniforms" to track students. Facial recognition cameras to gauge their

[attentiveness](#) and *[comprehension](#)*. An "*[all-seeing credit score system](#)*" that ascertains who is trustworthy, who has access to housing and healthcare, who can apply to certain schools and certain jobs.

How can 'smart schools' benefit from the data collected from classroom surveillance or online learning?

There are many ways, but a few are: generating funds through impact investing, harvesting data for machine learning or artificial intelligence, building social/educational credit systems for digital i.d.'s, normalizing the metaverse, and training for a token based economy where earnings can be programmed for specific use.

A. 'Smart schools' can profit from data collected from the children by creating outcome measurements to quantify 'impacts', and using the impact data for social impact investing (or impact bonds).

*1. Clip - 2018 SEL Conference University of Chicago Data Aggregation, Wearables, Gamification, **creating outcome data points and universal digital records***:
https://www.youtube.com/watch?v=vzBRFQdF1DY
*2. 2014 panel introducing those involved in **'pay for success' and 'social impact bond' markets** to create revenue (market created by Goldman Sachs mentioned in first few mins): https://www.youtube.com/watch?v=NhM7JyV6Ugo*
3. Alison explaining gaming companies, measured behavior change and living in the metaverse: https://www.youtube.com/watch?v=JbyWShLqZJk
4. Impact data will be commodified via Ocean Protocol and Singularity.net https://www.youtube.com/watch?v=kr6LPBpFY2c
5. Even on blockchain data can be accessed for impact. See MIT's "Secret Network" formerly Enigma Protocol: https://scrt.network
*6. Wharton People Analytics Conference: How game companies collect and use data to improve **retention and profit**: https://www.youtube.com/watch?v=zrvnXq93bYQ&t=0s*

B. 'Smart schools' can use the data for Machine learning or Artificial intelligence. Or said another way, the data collected as the children work, play, interact socially, move, engage with materials, and complete learning challenges can be harvested in order to create new, smarter, more intelligent technology, deep learning, or AI robots.

*1. "A rise in artificial intelligence and cognitive computing is creating a new workforce of robots, simulating human thought and transforming industries. At the apex of this emerging tech is a new field of sensory technology known as **emotive computing**."
https://www.edsurge.com/news/2017-01-04-does-emotive-computing-belong-in-the-classroom*
*2. MIT research project of 'magic hat' "In an initialization phase, the "magic hat" uses established Brain-Computer Interface **algorithms to recognize certain mental processes of the child** and the child is then able to use their brain signals to control a robot.": https://dl.acm.org/doi/10.1145/3392063.3394424*
*3. Robots trained by **connecting humans and ai** to compete for a task and train the robot: https://www.youtube.com/watch?v=0NoB_ji2GM8&t=229s*

C. 'Smart schools' can utilize the aggregated data for each individual child to help to

build social credit, token/badge, and digital 'pathway' systems. By aggregating the surveillance data collected, the child can be given scores far beyond grades or community service points. Surveillance data, especially once associated with a user's block-chain, can monitor and assess every habit and behavior they exhibit when they are in range of a camera (sensing all social interactions, tone, facial expressions, words spoken), using a wearable sensor (which can track heart rate variability, movement, geo-location, etc), and every online behavior (ranging from spending habits, online communications, web browser activity, educational engagement, etc). Aggregated data can then be used to make predictions about a person's character, their 'trustworthiness', or their likelihood to reach particular potentials. In some societies, scores based on aggregated data determine a citizen's access, or their level of freedom.

*1. What is the learning economy? person learns on blockchain, machine learning aggregates data, and feedback loop and **algorithms are created***: *https://www.youtube.com/watch?v=e2ar8trC0JI*
*2. Learning Economy Foundation and the World Bank conducted a series of presentations with various organizations to coalesce understanding of how blockchain is being used for **creating digital education systems** called: [The World Bank's Blockchain for Education Community of Practice](#). Reflection on series: https://siliconicarus.org/2022/02/10/the-world-bank-speculators-and-gamers-join-to-build-a-learning-economy-on-the-blockchain/*

How do 'smart schools' help to create algorithms and how are the algorithm's being used in education?

Creating algorithm's to make predictions about a child is one of the uses of harvested data. Learning 'pathways', or 'lifelong learning' journey's can be 'personalized' based on the data of the individual. This can place a limit on the individual's potential based on the prediction (or algorithm) of the computer program or programmer.

A. By utilizing education technology, data is being aggregated to develop algorithms aimed at predicting outcomes, and creating desired outcomes. Currently AI based algorithms are being used to control learning pathways, predict what college applicants should be accepted, and create connections between our brains and cloud-based AI. **Do we want our hero's journey to be limited, capped, profiled, or manipulated based on an algorithm?**

*1. Education data harvesting from online learning, **controlled learning paths** clip: https://www.youtube.com/watch?v=GeajedxpWJA*
*2. Humanity + prize speech for blockchain and transhumanism project building a future based on smart contracts, **algorithms, rewarded behavior through games, and cloud minds**: https://www.youtube.com/watch?v=tNwiGo8AFRs; https://wrenchinthegears.com/wp-content/uploads/2022/03/Melanie-Swan-Blockchain-Quantum-Computing-BCI-Brain.pdf; Melanie Swan's research and writings on connecting our brains to a cloud to access AI: https://www.melanieswan.com/publications.html*
*3. University of Colorado using **algorithms to determine admissions**, and uses Education Data Architecture (EDA): https://www.salesforce.org/highered/admissions-connect/*
4. The Tin Can API (sometimes referred to as the Experience API) solves many of the problems that are inherent in older e-learning standards. The Tin Can API is a common language for all

*learning and training platforms to use, and it makes it **possible to collect data about the wide range of experiences** a person has within online and offline training activities.*
: https://www.youtube.com/watch?v=I1yDN1BCJMo&t=0s; https://xapi.com/

B. Education Technology connects an individual to a digital wallet filled with all of their harvested surveillance data. Colorado, Utah, California, and New York have rolled out government issued digital ids as a step towards the fourth industrial revolution, and the Ukraine government has endorsed an app-based wallet housing all personal, governmental, and financial data. A child who has been utilizing online learning could have all of their aggregated data attached to their digital i.d. So far we have seen digital id's being used to control, restrict, discriminate, and hinder liberty. The states rolling out the digital i.d.'s have announced a person's vaccine history/health 'status' will be linked to the i.d., and in some areas a person's health status determines their ability to access grocery stores, attend recreational or social events, or conduct business. The infrastructure for this social credit based system of compliance has now been implemented and tested in many places in the U.S. and internationally. A digital i.d. paves the way for every element of life to be controlled, as digital currency can be programmed, and access is provided to those who are in compliance, and is denied based on algorithms, or arbitrary conditions set by controllers.

1. Colorado to use crypto and blockchain for digital i.d.'s:
a.
https://www.pymnts.com/authentication/2019/inside-the-launch-of-colorados-new-state-run-digital-drivers-license/
b. https://www.cryptotimes.io/colorado-prepares-to-become-the-nations-first-digital-state/
2. Work in the future requires frequent upskilling and reskilling:
https://www.forbes.com/sites/paulmcdonald/2021/06/09/as-businesses-prepare-for-the-future-of-work-the-need-to-upskill-and-reskill-workers-becomes-more-essential/?sh=530c8967a78c
3. Project in CO to recreate job market skills:
https://www.markle.org/skills: https://reliabilityweb.com/news/article/the-markle-foundation-and-microsoft-partner-to-accelerate-a-skills-based-la
4. Ukraine using digital I.D./wallet with 50+ government services/certifications, ministry TV, government relief funds, submitting war info, and crypto
currency: https://ukraine.ua/invest-trade/digitalization/; https://www.kmu.gov.ua/en/news/mincifri-ukrayinske-telebachennya-teper-u-diyi
5. African kids blockchained so education metadata follows them for a lifetime on digital i.d.:
https://www.youtube.com/watch?v=DaER344dhhU
6. trust over IP, 3rd party reviewer for access permissions (if it can allow access-it can also deny it to create digital prisons):
https://www.youtube.com/watch?v=RpopoScFt6Uhttps://www.youtube.com/watch?v=wd5lBP0atu0

C. Education Technology is utilizing virtual and augmented reality as a way to teach, but is also harvesting biometric data and encouraging children to create digital twins (avatars). Recently, Facebook's 'Meta', an international Metaverse, was introduced as the new space to be. Our children will be the first possible generation to widely adopt the metaverse. The metaverse is a deeper disconnect from nature, and natural reality. Meta is designed to be a space where people design an avatar, and spend their time playing games, meeting up with friends, working on projects professionally or for their digital life. In the metaverse, a person can

have a 'digital twin'. This digital version of themselves can carry all of their metadata. The twin can be paid to interact with the digital world in a digital currency, and the digital currency is used in the metaverse or at the grocery store in their natural world. There is also the potential to earn badges for professional development, interacting with advertising, watching government funded news, or rating others. All of these ideas are not far-fetched, as they are currently happening online through social media, in countries on social credit systems, and inside games like Roblox, SIMS, and Minecraft. Online games are already hosting events like concerts and meet-ups that are attended virtually, and made more 'real' with VR headsets. (Side note: social media platforms where users rate each other and encourage socially accepted images and narratives have recently been declared harmful to the health and development of young people, and it was made known that companies, such as facebook, knew there was a potential for harm and did not provide any warning or remedy.)

1. NTT Research: Creation of human digital twins ("Human digital twins will live in a virtual society even though they are connected to humans in the real world." "Human digital twins will be used not only for monitoring the corresponding individuals' current states but also for **predicting their future states, substituting their activities, and conducting simulations** *of various future societies. Therefore, a human digital twin should not just be a collection of information,..., but also have processes to perform human-like behaviors.":* https://wrenchinthegears.com/wp-content/uploads/2021/07/NTT-Digital-Twin-Reference-Model-2021.pdf
2. Connectivity and Sensing at the Human-Machine Frontier (GM/Facebook/Universities working on building and implementing VR/AR/XR metaverse for work and learning):
3:10:03.6 https://youtu.be/AUkz1av8RiI?t=11409
3. kids teaching robots to help kids 'learn': https://www.youtube.com/watch?v=FvefBvoJ44c

D. 'Smart schools' are promoting lifelong gamified learning, or learning paths designed using algorithms for programmed outcomes for all ages. Lifelong learning is being designed through online gaming and has been implemented and tested on all sorts of communities; from impoverished children in India and Brazil to US universities. It's often called 'gamified' education. The completion of the gamified education course often results in a badge or token, that can be used for credits towards currency, and hopefully towards something that would be considered a transcript with the potential for a degree or career.
Though we all aim to never stop learning, this learning is confined and tracked through surveillance and rewards compliance. This would be a programmed world. The outcomes would be pre-programmed. The child would certainly be programmed, as the digital world is engineered by algorithms, and the algorithms were created from harvested data, which were developed by humans who created codes for programs to aggregate the data.

1. Promote lifelong Education for all is UN Sustainable Development Goal
4: https://sdgs.un.org/goals/goal4
2. Learning Economy/Learning 'Wallets'/Skill learning that can be re-skilled up leveled up:
a. CO pilot program for education badges in a **digitalized 'learning ledger'** *and 'digital wallet' (partners include CU, CDPHE, Salesforce, Evernym, Amazon Web):* https://assets.website-files.com/5b9a8e54a7afff2664ce734d/5f58458383811b6a930df146_C-Lab%20Action%20Guide_final.pdf
b. What is the Learning Economy? "Algorithms quantify the learning that produces skills & jobs." "Algorithms quantify the impact of every influencer in the life of a student." "Skills data becomes

*the gold standard for a Learning Economy." "Skills Valued Like Assets & Currency" **"Earn to learn tokens Incentivize Learning & Teaching**" (Partners: World Bank, IBM, : https://www.dropbox.com/s/iwlvyqryb3772hb/Internet%20of%20Education%20%2B%20LEF%20Deck.pdf?dl=0*

*c. "SuperSkills! tl;dr — children go on quests (playful experiences) to learn core skills, collect resources and creations, and adventure in seasonal narratives. This partnership was forged to assist in **championing the importance of three learning primitives of tomorrow's educational landscape: decentralized identifiers (DIDs), verifiable credentials (VCs), and digital wallets**.": https://www.learningeconomy.io/post/superskillstech*

3. The Advanced Distributed Learning (ADL) Initiative is a government program reporting to the Office of the Secretary of Defense. on the future of training: https://www.youtube.com/watch?v=nTDS6YHvJrg&t=0s

*4. 2020: PCG Consulting On **The Internet of Education and Digital Learner Wallets to exchange skills like money**, metaregistry pathways designed for 'learner' (applied to Covid testing and H.S. transcript): https://www.youtube.com/watch?v=TYFy6-al5-Q*

Is it likely or even possible for gamified education to teach the skills necessary for critical thinking, research (scientific methods), ethics, and integrity? What is the result of rewarding educational and virtual behaviors? The science of gamification is based in the theory of behaviorism, where engagement can be prolonged mindlessly after being trained through timely and surprise rewards (this is now very common in kid video games like Roblox).

Like most technology, the source of this advancement for the fourth industrial revolution has been designed and tested in military environments. Drones have been involved in acts of war, and are controlled via programs that look like video games. While some of it can be harmless, there are risks that need to be considered. What if a child or person believes they are playing a video game, but they are controlling a real drone, or a real robot? In Japan they have developed a way for people with physical disabilities to work off site by controlling a robot. **But what if this person is told the only way they can 'earn tokens' to eat or survive is by controlling the robot, and what if they don't know for sure what the robot is actually doing because it's all in the metaverse?** Again, this is not far-fetched considering examples we already see internationally as technology develops for warfare that can be executed digitally, and as coin/token mining becomes the solution for poverty.

1. Disabled workforce in japan: https://www.france24.com/en/live-news/20210820-tokyo-robot-cafe-offers-new-spin-on-disability-inclusion

2. Japan robot's human controlled workforce: https://newatlas.com/robotics/telexistence-model-t-robot-shelf-stacker/

3. Human-like intelligence robotics: https://www.sanctuary.ai/

4. Robots crossing between AI and human pilots to less of a robot and more of a brain (transhumanism): https://www.youtube.com/watch?v=Ai4en3_Bxlo&t=0s

5. 2016 Megacity Mad Scientist Conference, Arizona State (military speakers, video showing plans up to 2050 for transhumanism--includes prediction for nanoparticle use; after intro video go to min 45:00-discusses transhumans, game based learning for credits with Gates): https://www.youtube.com/watch?v=cfQL0sf6jQ0&t=0s

As a community who upholds the value of children, education, and liberty, how can we

safeguard and protect our children?

Acton Academy does have elements of overlap with the education systems described above. **Can Acton guarantee by way of evidence that they do not benefit from the surveillance utilized at Acton schools by demonstrating Acton:**
-does not have any venture fund capitalists,
-does not have impact funds or impact bonds,
-does not store or aggregate data,
-does not sell or share any data,
-does not report on collected metrics or data internally or externally,
-does not have each child on blockchain (or similar),
-does not have a backdoor opportunity for external access to the data,
-does not have partners,
-does not have stakeholders,
-is not counseling, contracting, or advising anyone or any organizations with any connections to education technology?
Can Acton show by way of evidence that the use of a modified social credit system, gamified education, incentivized learning, and badge systems:
-do not 'program' children for specific behaviors, engagement, or outcomes/impacts,
-do not encourage compliance by way of reward,
-are not coercive, and
-can create extrinsic motivation and critical thinking?

Our children are in need of meaningful, and engaging education environments. Our children do need to be prepared for a world of programming, which will require the ability to question with critical thinking and not be conditioned for compliance so that they have the integrity to maneuver away from participating in injustice or tyranny. There are things we value at our Acton community and our desire would be to stay in our community, but that would only be possible if the school were to disconnect from the classroom surveillance, gamification, and incentivization.

More infomation:
Definitions/concepts defined:
1. behaviorism:
a. basic bullet points (gamification):
https://gamification21.wordpress.com/learning-content-3/13-behaviorism
b. descriptions/resources: https://helpfulprofessor.com/behaviorism/
c. discussion of the use of behaviorism's skinner box ideology to manipulate 21st century behavior: https://behavioralscientist.org/21st-century-skinner-box/
2. social credit system:
a. how it works:
https://medium.com/yardcouch-com/how-does-chinas-social-credit-system-work-650f318a0cfd
b. Blacklisting:
https://www.breitbart.com/asia/2019/05/14/china-social-credit-system-has-restored-morality-by-blacklisting-over-13-million-people/
c. good citizens first (higher 'freedom level'):
https://www.breitbart.com/asia/2021/03/11/beijing-lets-people-high-social-credit-score-board-subway-first/

3. self-directed learning:
a. description: https://www.self-directed.org/sde/
4. studies on intrinsic/extrinsic motivations:
a. summer reading experiment:
https://econpapers.repec.org/article/eeeecoedu/v_3a55_3ay_3a2016_3ai_3ac_3ap_3a1-20.htm
b. self-determined article: http://www.rochester.edu/pr/Review/V72N6/0401_feature1.html
c. self-determined research:
https://www.tandfonline.com/doi/abs/10.1207/S15327965PLI1104_01; https://doi.org/10.1006/ceps.1999.1020
d. undermining with extrinsic reward:
https://www.heartofcharacter.org/wp-content/uploads/Undermining_Childrens_Intrinsic_Interest_with_Ext-1.pdf
e. Why effort praise can backfire:
https://srcd.onlinelibrary.wiley.com/doi/abs/10.1111/cdep.12284
f. Informational vs conrolling verbal rewards 'assess the joint effects of type of verbal reward and level of surveillance' :
https://www.researchgate.net/publication/247745555_Informational_Versus_Controlling_Verbal_Rewards
g. discussion of research: https://www.alfiekohn.org/article/rewards-25-years-later/
5. The paradox of achievement:
https://www.sciencedirect.com/science/article/pii/B9780120644551500075?via%3Dihub
"The chapter reviews an array of evidence suggesting that intrinsic motivation and the internalization of extrinsic motivation flourish in situations of secure relationships that provide opportunities for need satisfaction. By offering optimal **challenges**, providing **feedback that is not evaluative of the person**, giving a meaningful rationale for requested behavior, acknowledging feelings, providing greater choice, and setting up co-operative learning opportunities, teachers can foster students' self-determination."
6. Youth perceive social media as harmful to mental and physical health:
https://journals.sagepub.com/doi/abs/10.1177/1359104518775154

Additional references for education's 'reset':
- *World bank and gamers on "learning economy/blockchain" presentation reflections (CO Dept of Higher Ed involved): https://siliconicarus.org/2022/02/10/the-world-bank-speculators-and-gamers-join-to-build-a-learning-economy-on-the-blockchain/*
- *2030 Psychological Agenda – Obedience Training for PreK-Adults, 9-Part Series: https://www.coreysdigs.com/education-system/alert-2030-psychological-agenda-obedience-training-for-prek-adults-already-global-with-billions-in-funding-for-full-control-part-1-introduction/*
- *more on transhumanism history and application: https://siliconicarus.org/2021/11/01/the-eternal-life-of-data-at-the-altar-of-the-transhumanist-death-cult/*
- *Wrench in the Gears video's on 4th industrial revolution: https://wrenchinthegears.com/video/*
- *explanation of augmented reality: https://www.youtube.com/watch?v=pnJkmjuAXRA*
- *goals of readynation to create new 'workforce' at closing bell: https://www.youtube.com/watch?v=OBjXDejDkpo*
- *Overview clip STEMuli Dallas Pilot School As Workforce-Aligned Video Game:*

https://www.youtube.com/watch?v=vc4OEcseMhs

- *Alison describing digital i.d.'s in TX: https://www.youtube.com/watch?v=YLgNUW05Hls*
- *Alison describing digital i.d.'s in UT: https://www.youtube.com/watch?v=wTXQsd7SvSk*
- *Alison describing Instructure and Canvas e-learning: https://www.youtube.com/watch?v=hZIGS_KVcfs*
- *Bill Gates Foundation to reimagine education: https://www.edweek.org/education/new-york-state-teams-with-gates-foundation-to-reimagine-education-amid-pandemic/2020/05*
- *Facebook and others want to personalize education: http://2016trends.hackeducation.com/personalization.html*
- *2015 MIT Media Lab: creating blockchain badges for lifelong access: https://medium.com/mit-media-lab/certificates-reputation-and-the-blockchain-aee03622426f#.hf5ur1fir*
- *Blockchain vouchers are being created for 'school choice', but only "evidence-based" options will be funded, data will be shared:*
  1. How to use education voucher for approved school who is sharing student data: https://www.youtube.com/watch?v=7ZVwoxY5WhM
  2. Policy encouragement for connecting financial tech options for education vouchers: https://www.heritage.org/education/report/financial-technology-and-parental-choice-education
  3. Edu Savings Accounts described as a banking program for monetary benefit: https://www.youtube.com/watch?v=4scpNeNqx1U
- ***Globotics**: https://www.youtube.com/watch?v=pbUtW0WEIac*
  1. UN, "Digitech will make manufactured goods less traded but services more traded. It goes on to conjecture about the implications for twenty-first century 'development journeys'."
  https://www.wider.unu.edu/plenary-session/globotics-transformation-and-development
  2. UN, "Goals..Enabling digital infrastructure, enabling legal and regulatory frameworks, enabling human capital, enabling finance, and enabling coordination." "Governments should start thinking of cities as production hubs, not just living quarters. Winning cities will attract high-quality jobs and lock them in with agglomeration forces.": https://www.wider.unu.edu/sites/default/files/Publications/Working-paper/PDF/wp-2019-94.pdf