Upstream by Dan Heath

Think you might want to read this book?
In [Upstream](#), Dan Heath teaches us to think about problem solving from the normal focusing on the results. He takes us through the concepts of problem blindness, lack of ownership, and tunneling to explain why origins of problems often go unaddressed. This is a great read for anyone interested in thinking about improving the world through ideas such as deploying ambulances more efficiently, providing housing to more people, and ensuring that more students graduate high school.

What would Socrates ask?
- What if we asked students what they want to learn?
- What if we asked students how they want to learn?
- What if after every realignment with a family, schools sought to eradicate the root of the disagreement?
- What if every student had an adult holistically advocating for them throughout the year?
- What if we tracked reading and math fluency so well that no student progressed without the basics?
- What are the early signs of teachers struggling that we could identify to spark growth?
- What is the ideal training for someone who wants to be a teacher?
- What if we stopped celebrating low-level metrics like attendance?
- What if schools participated in perpetual and transparent feedback loops?

Research
- What the researchers had discovered was that there is something peculiar about a *student's achievement specifically in the ninth grade* that predisposes them to succeed or fail in high school. (Note: Key variable is success in a transition)
- Being poor, for example, reduces a person's cognitive capacity more than going one full night without sleep.
- Small talk leads us to favor "likable" candidates-in other words, candidates who are just like us.

Concepts
- Downstream actions react to problems once they've occurred. Upstream efforts aim to prevent those problems from happening.
- Upstream efforts: those intended to prevent problems before they happen or, alternatively, to systematically reduce the harm caused by those problems.
- Problem blindness- the belief that negative outcomes are natural or inevitable.
- Inattentional Blindness- a phenomenon in which our careful attention to one task leads us to miss important information that's unrelated to that task.
- Tunneling: When people are juggling a lot of problems, they give up trying to solve them all. They adopt tunnel vision. There's no long-term planning; there's no strategic

prioritization of issues. And that's why tunneling is the third barrier to upstream thinking-because it confines us to short-term, reactive thinking.

- Seven Questions for Upstream Leaders
    1. How will you unite the right people?
    2. How will you change the system?
    3. Where can you find a point of leverage?
    4. How will you get early warning of the problem?
    5. How will you know you're succeeding?
    6. How will you avoid doing harm?
    7. Who will pay for what does not happen?
- Wrong pocket problem- a situation where the entity that bears the cost of the intervention does not receive the primary benefit. One pocket pays, but the returns are scattered across many pockets.

Quotes from the author

- So often in life, we get stuck in a cycle of response. We put out fires. We deal with emergencies. We handle one problem after another, but we never get around to fixing the systems that caused the problems.
- ...we tend to favor reaction: Because it's more tangible. Downstream work is easier to see. Easier to measure. There is a maddening ambiguity about upstream efforts.
- Downstream efforts are narrow and fast and tangible. Upstream efforts are broader, slower, and hazier-but when they work, they really work. They can accomplish massive and long-lasting good.
- There are hundreds of agencies and organizations that exist to help the homeless, but how many organizations are dedicated to *preventing people from becoming homeless?*
- We can-and we should-stop dealing with the symptoms of problems, again and again, and start fixing them.
- Escaping the tunnel can be difficult, because organizational structure resists it.
- Focus is both an enemy and an ally. It can accelerate work and make it more efficient, but it puts blinders on people.
- When your emphasis is always *forward, forward,* you never stop to ask whether you're going in the right direction.
- There is no true equivalent of Donors Choose in other countries, perhaps because their schools pay for the supplies that students need.
- Part of *every* social-sector organization's mission should be to push upstream. To prevent wounds as well as bandage them; to eliminate injustices as well as assisting those who suffered them.
- This is the essence of intuitive heuristics: When faced with a difficult question, we often answer an easier one instead, usually without noticing the substitution.
- Feedback loops spur improvement. And where those loops are missing, they can be created.
- You can't help a thousand people, or a million until you understand how to help one.

Quotes from others

- "When you design the system, you should be thinking: How will this data be used by teachers to improve their classrooms? How will this data be used by doctors and nurses to improve patient care? How can the local community use the information? But that's rarely how the systems are designed." - Joe McCannon
- "Every system is perfectly designed to get the results it gets." - W. Edwards Deming
- "Get your model out there where it can be shot at. Invite others to challenge your assumptions and add their own….The thing to do, when you don't know, is not to bluff and not to freeze, but to learn. The way you learn is by experiment-or, as Buckminster Fuller put it, by trial and error, error, error." - Donella Meadows
- "Systems can't be controlled, but they can be designed and redesigned." - Donella Meadows
- "The best time to plant a tree is 20 years ago. The second-best time is now." - Old proverb
- "Be impatient for action but patient for outcomes." - Maureen Bisognano

Organizations/schools working on answers
- [Head Start](#)
- [The Health Initiative](#)
- [CASE (Duke University)](#)
- [Future of Humanity Institute](#)

Gateways to further learning
- [Know the Signs](#)
- [Safe2Say](#)
- [Reply All](#)

Referenced books with the potential to impact leading and learning in education

Author(s) Last Name	Title
Shafir & Mullainathan	*Scarcity*
Kahneman	*Thinking, Fast and Slow*

The applicability of this book to education is ….

Abstract ←———————————✕———————————→ Obvious