NAVIGATION & GUIDANCE IN THE AGE OF AI

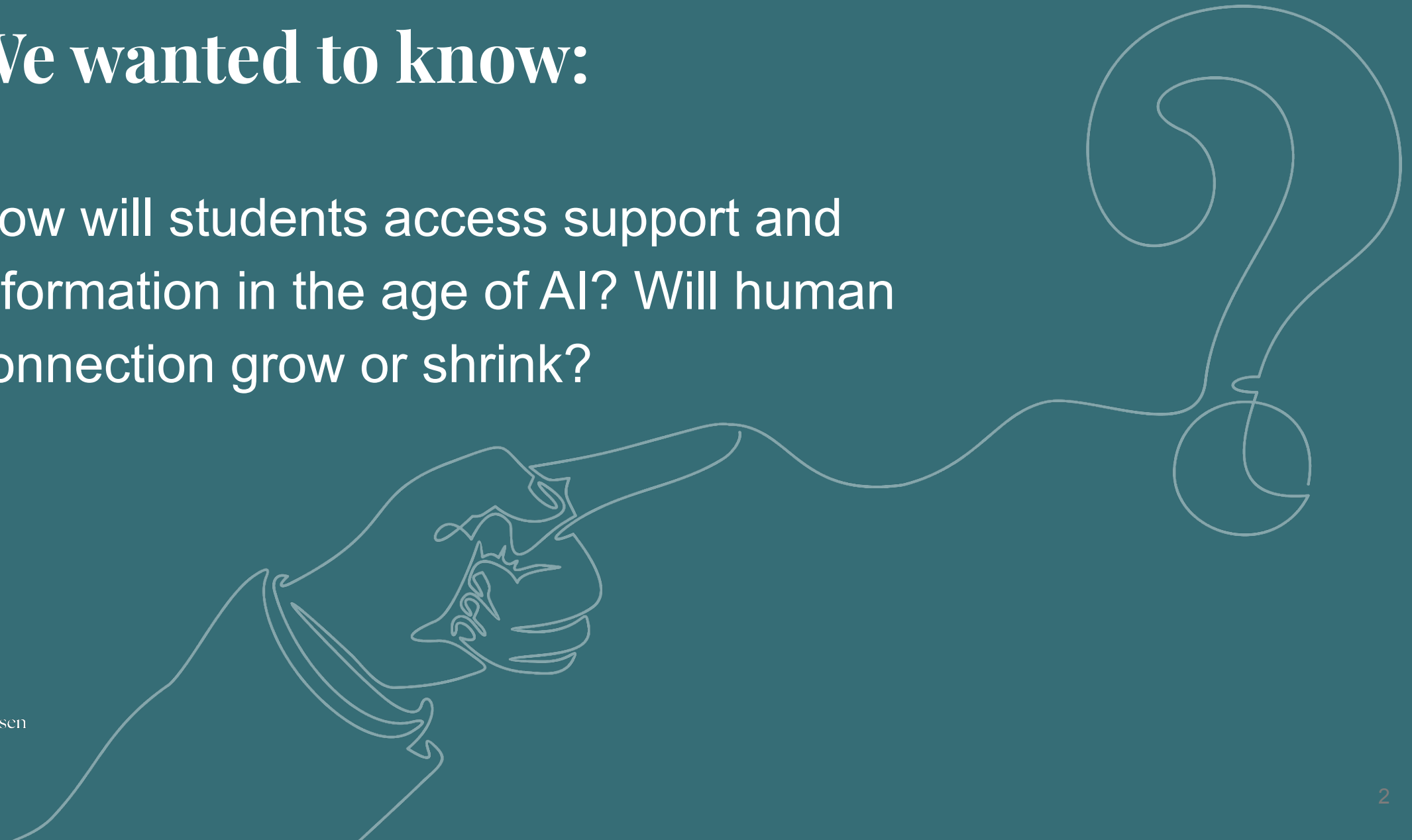
5 TRENDS TO WATCH

Julia Freeland Fisher & Anna Arsenault

Christensen Institute

We wanted to know:

How will students access support and information in the age of AI? Will human connection grow or shrink?



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Navigation & guidance has long been an arena where ratios do not reflect the need.

385:1
average high school student-to-counselor ratio*

6%
of high school counselors' time spent career advising**

2,263:1
average college student-to-career services staff ratio***

* "Student-to-School-Counselor Ratio 2022–2023," American School Counselor Association, https://www.schoolcounselor.org/getmedia/a988972b-1faa-4b5f-8b9e-a73b5ac44476/ratios-22-23-alpha.pdf.
** Specific to public high school counselors. "School Counseling: Caseloads and Responsibilities," National Association for College Admission Counseling, https://www.nacacnet.org/school-counseling/.
*** "2021–22 NACE Career Services Benchmark Survey," National Association of Colleges and Employers, https://www.naceweb.org/uploadedFiles/files/2022/publication/executive-summary/2022-nace-career-services-benchmark-executive-summary.pdf.

Many hope AI can help scale more **efficient and personalized approaches** to guide students' college and career journeys.

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Prior research on chatbots has shown promise.
For example, chatbots at Georgia State University produced:

3%
increase in
re-enrollment rate*

50%
decrease in
withdrawals due to
outstanding balance*

21%
reduction in
summer melt**

* “How Georgia State University Uses Behavioral Intelligence to Improve Student Retention and Persistence,” Mainstay, https://mainstay.com/case-study/how-georgia-state-university-uses-behavioral-intelligence-to-improve-student-retention-and-persistence/.
** “Georgia State University Supports Every Student with Personalized Text Messaging,” Mainstay, https://mainstay.com/case-study/how-georgia-state-university-supports-every-student-with-personalized-text-messaging/.

But there is limited research on the **short- and long-term impact that bot-driven advising has on students' social capital**, or connections that can provide students with valuable resources like support, advice, and ultimately, job referrals.

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We set out to understand where this market is headed, and in particular, **whether AI will be built to help or hinder students' access to experiences and relationships that lead to jobs**.

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Our methodology

We analyzed the market of tools and providers through the lens of **Disruptive Innovation Theory.**

Disruptive Innovations are NOT breakthrough technologies that make good products better; instead, they make products and services more **accessible** and **affordable**. They tend to get their start where lots of customers are shut out of the market.

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Navigation and guidance—where access to high quality information and support are limited—is **primed for disruption**.

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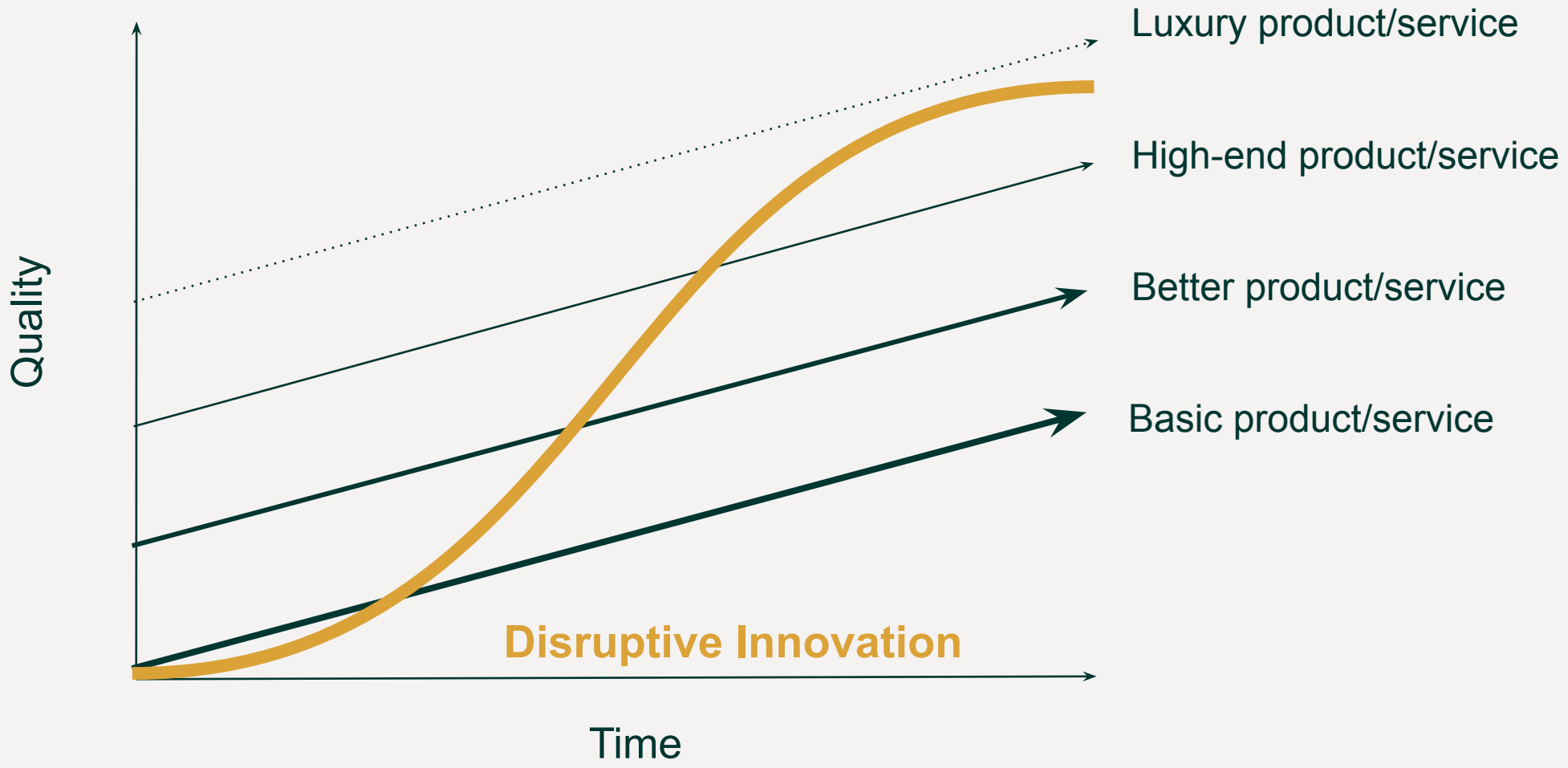
Disruptions start at the lowest tiers of the market, offering a simpler product or service at a lower cost, but over time they get better and better.



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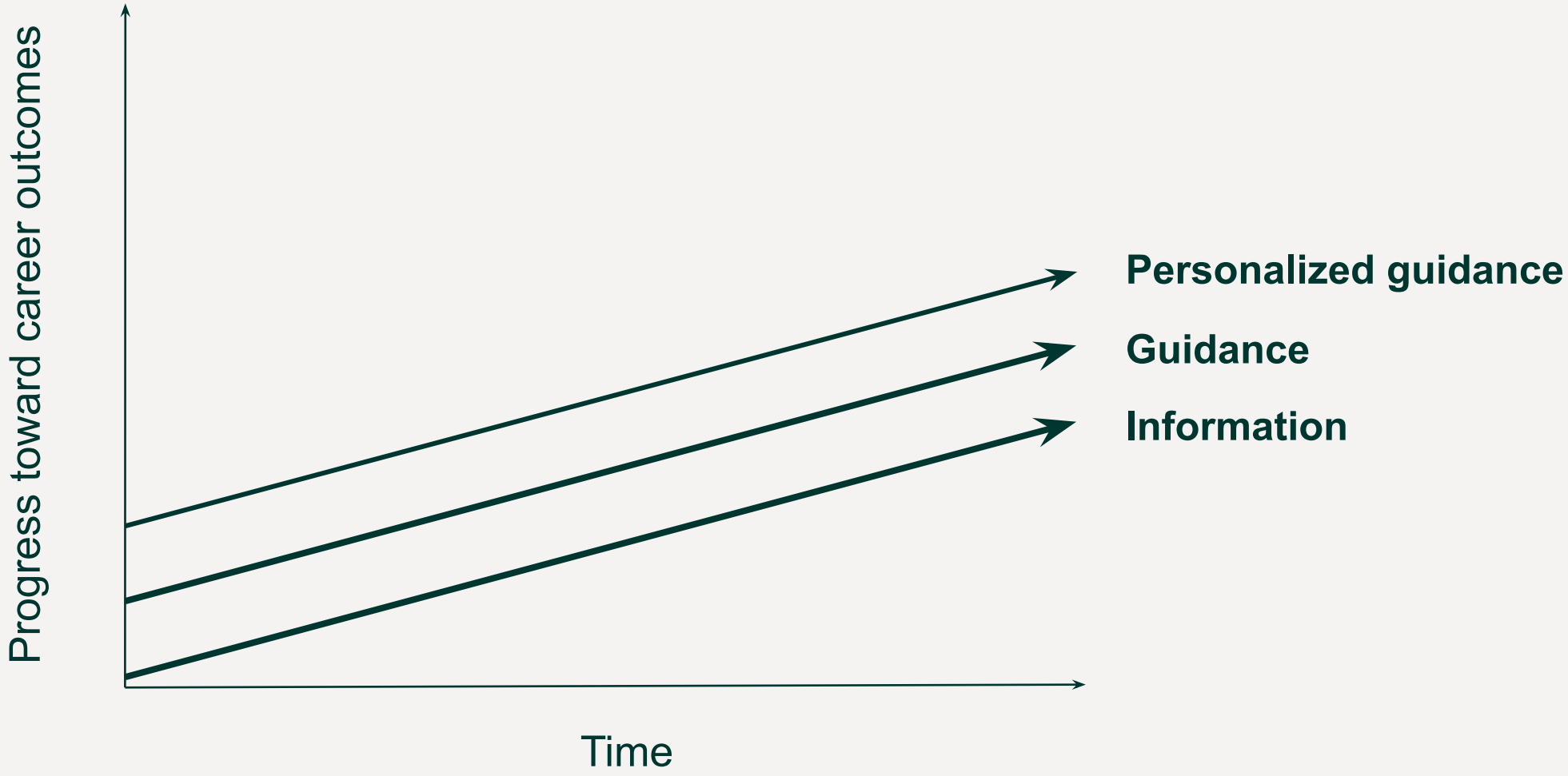
Today, the navigation & guidance market is organized around delivering information and supports that lead students *toward* jobs.



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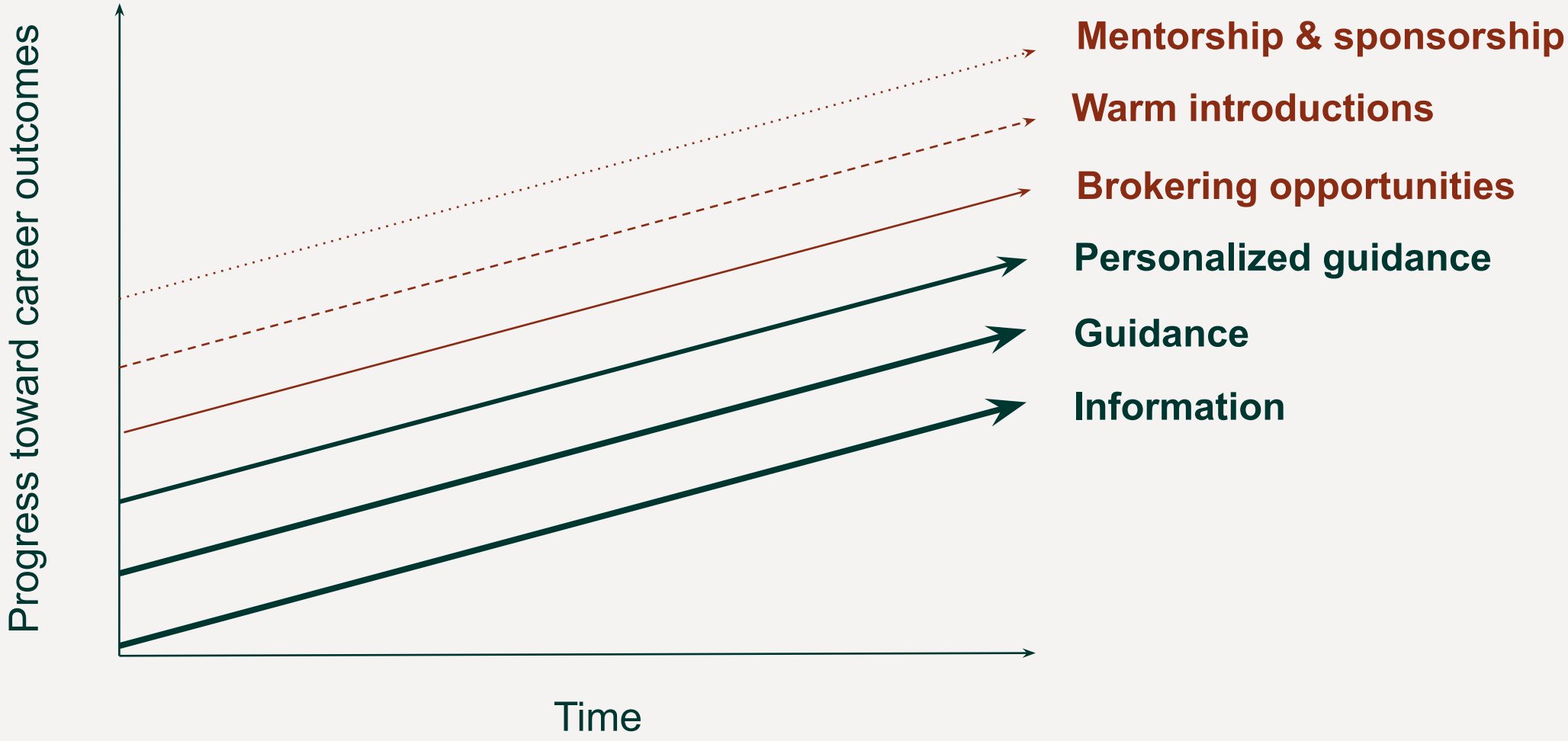
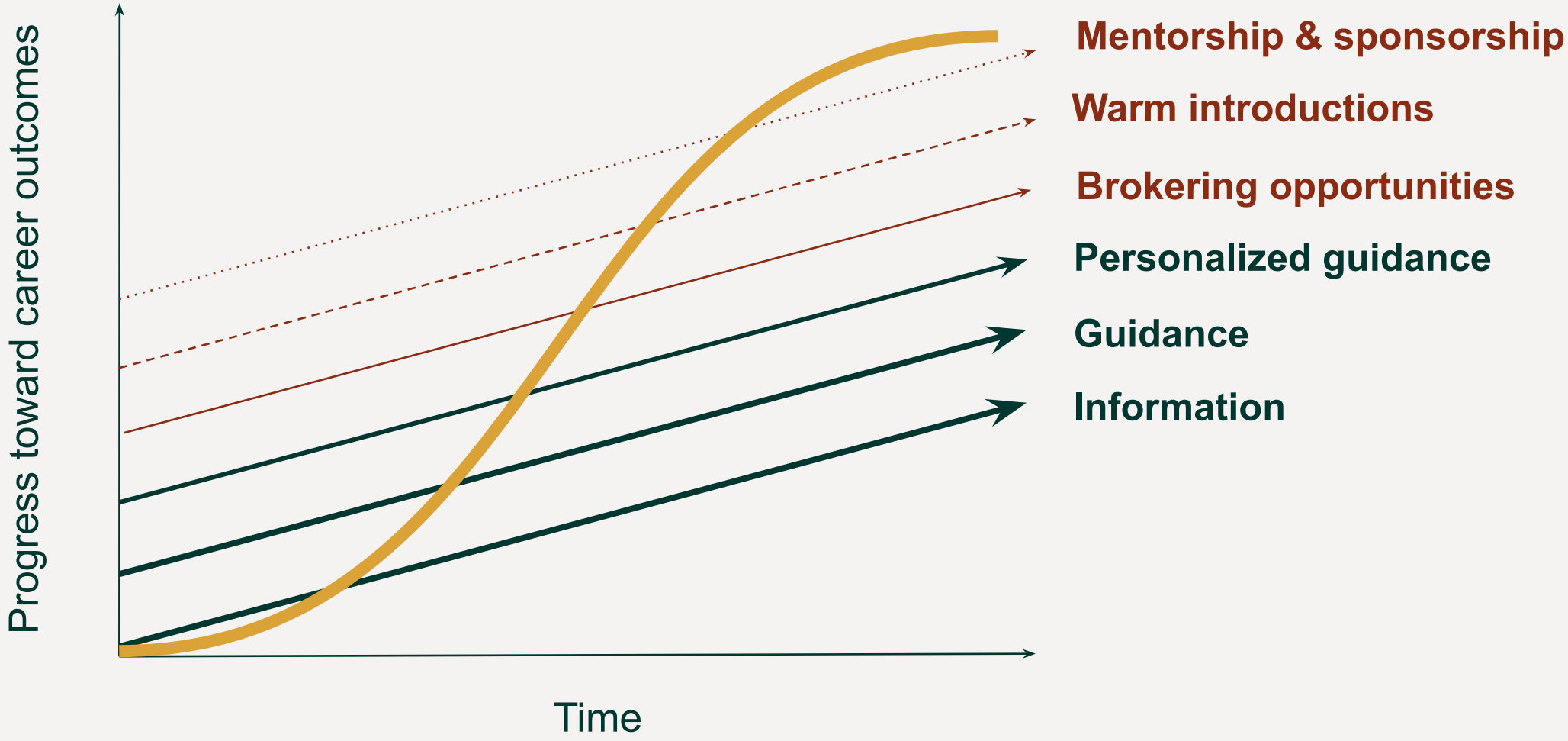
But it's been harder to scale the **opportunities and connections** that *get* students jobs and support job mobility.



Could AI-enabled navigation & guidance disrupt the current market to scale more *networked* supports?



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The **outcomes that the education market prioritizes**, not just the new technology, will determine *if* and *how* AI will disrupt navigation and guidance. That poses **opportunities and threats** to scaling access to higher tiers of support.

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The opportunity

With the right tools and market conditions, **AI could enable more schools to offer high-end, high-touch supports to students**.

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The threat

But without the right incentives, **bots will be on a path to replace, rather than scale, human connections**.

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What we found

AI-enabled guidance is on a clear path to **disrupting traditional forms of human-led guidance**. If the current metrics hold, as Generative AI (GenAI) becomes more sophisticated, students will have more access to affordable, on-demand, bot-generated advice and support.

But against those same metrics, **access to networks is unlikely to grow and could even shrink** as bots are engineered to offer more and more forms of social support—despite the fact that connections matter down the line for career optionality, access, and success.

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Here’s how we reached that conclusion:

We interviewed leaders and advisors at **30** navigation & guidance organizations and tech companies working across the **education-to-career continuum.**

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Who we interviewed

Analytikus
Axio
Backrs
Beyond 12
Bottom Line
CareerVillage.org
CGN
College Advising Corps
CollegeVine
Edifii
Futre
The Future Project
Georgia State University
Get Schooled
Handshake
Hope Street Group
ESAI
Let's Get Ready
Mainstay
Making Waves Foundation
Naviance by PowerSchool
OneGoal
REACH Pathways
Roadtrip Nation
Social Capital Builders
Stanford University
Student Success Academy
Third Road
Uprooted Academy
UStrive

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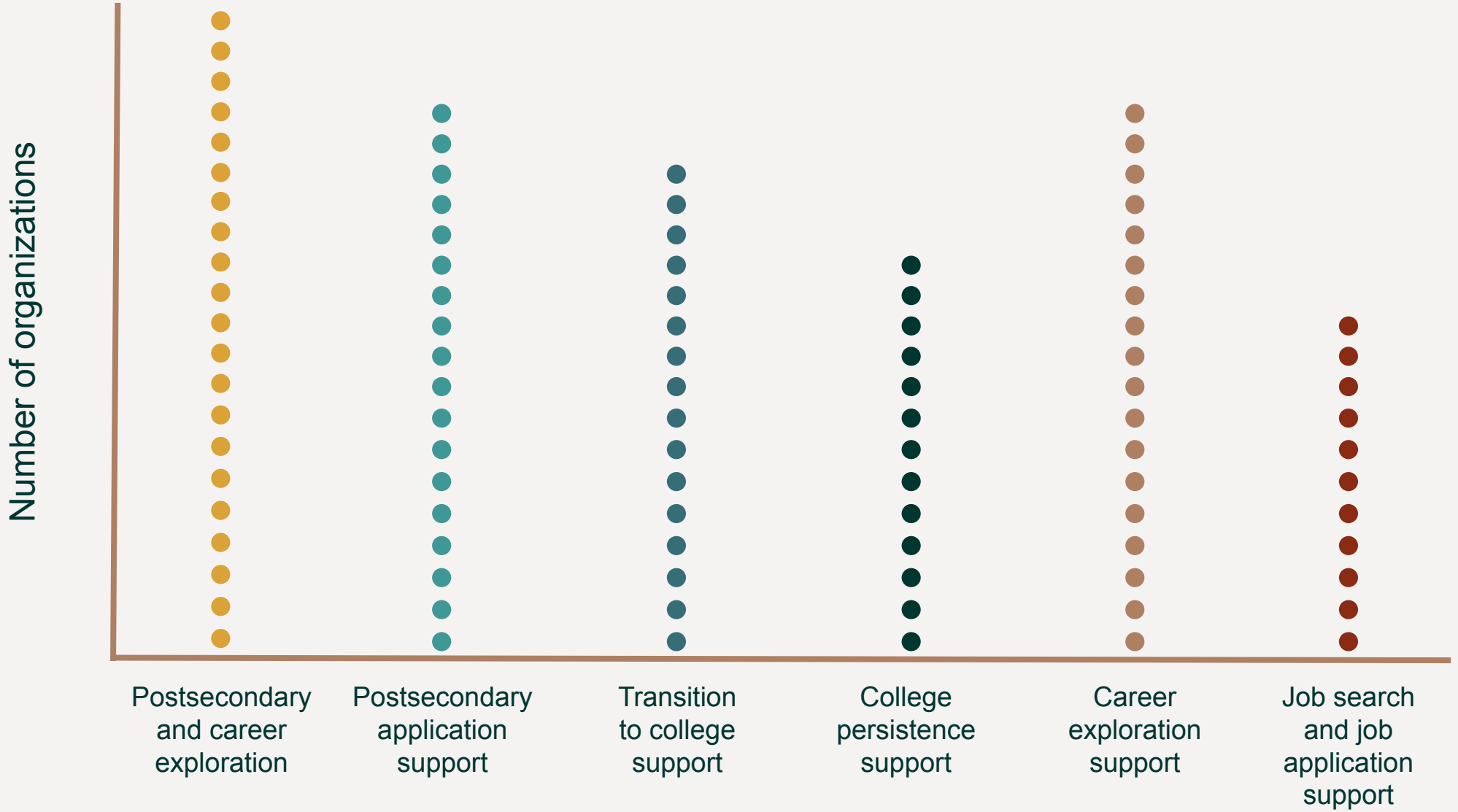
These navigation & guidance organizations provide:



**Note: Nearly all of the 30 organizations we spoke with offered support across multiple domains.*

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These tools represent a range of emerging AI-powered models.*

Bot-first guidance

Bots provide direct support to students and families

Hybrid guidance

Bots drive engagement with advisors & deliver some direct support to students

Human-first guidance

Bots support advisors, but do not provide direct support to students

* For another look at how organizations operate across a similar spectrum, see “Student Support Powered by Artificial + Human Intelligence: AI Enhanced Advising for Postsecondary Pathways: A Playbook,” Shift, https://shift-results.com/block.

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While scripted chatbots and virtual coaching platforms are not new, **GenAI guidance tools and services are still very early stage.**

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"The market is so new. I don't think anybody can say that they're beyond a **crawl**."

—Jon, CGN

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For some providers, that means we’re in a **critical window of opportunity** to shape what gets built and scaled.

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"AI is coming whether we want it or not. … If we yield this space to the consumer market, it's not going to be left unfilled. It will **reproduce the very same missteps and inequities** for first-gen students and students of color as exist within college advising and support writ large."

—Eve, Beyond 12

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Even though the market is in early days, there are **signals** of what lies ahead.

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We identified **5 key trends** shaping human relationships in navigation & guidance systems in the age of AI.

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These trends are deeply informed by the voices of **innovators in the field.**

Their perspectives illustrate a **dynamic market** that is raising **more questions than answers**.

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Trend #1

The lines between human- and bot-driven support are getting blurrier.

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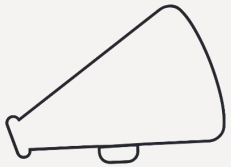
We know students need various types of support to navigate and succeed in their educational and career journeys.



Esteem
Cheerleading, expressing belief in students

Informational
Accurate information about education and careers

Emotional
Care and addressing social and emotional needs

Instrumental
Teaching skills, interview prep

Motivational
Future-facing support, co-constructing a vision of life/purpose/potential

Tangible
Cash, rides, scholarship

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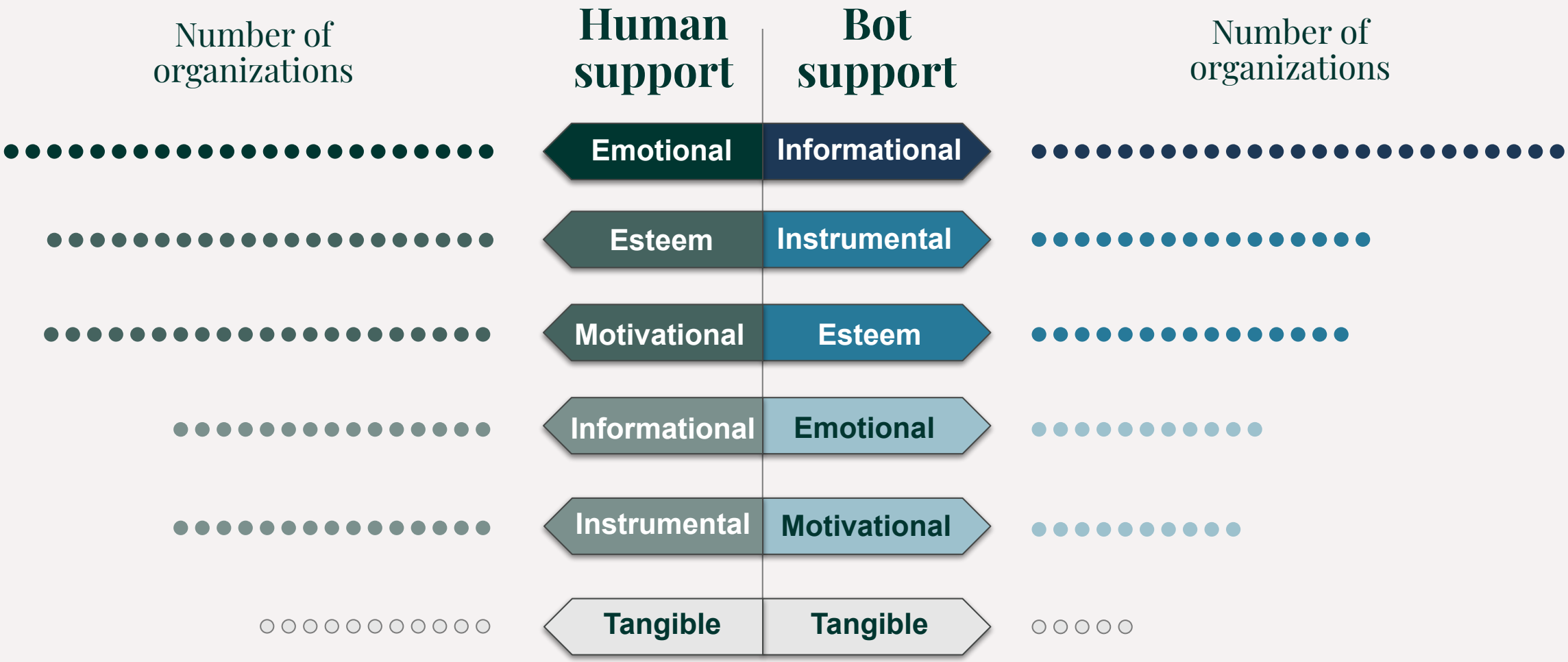
We asked leaders: What forms of support are humans versus chatbots ideally providing?



Nearly all leaders agreed that all bots should handle **basic, informational support**, especially answering time-consuming FAQs, and providing reminders about time-sensitive tasks.

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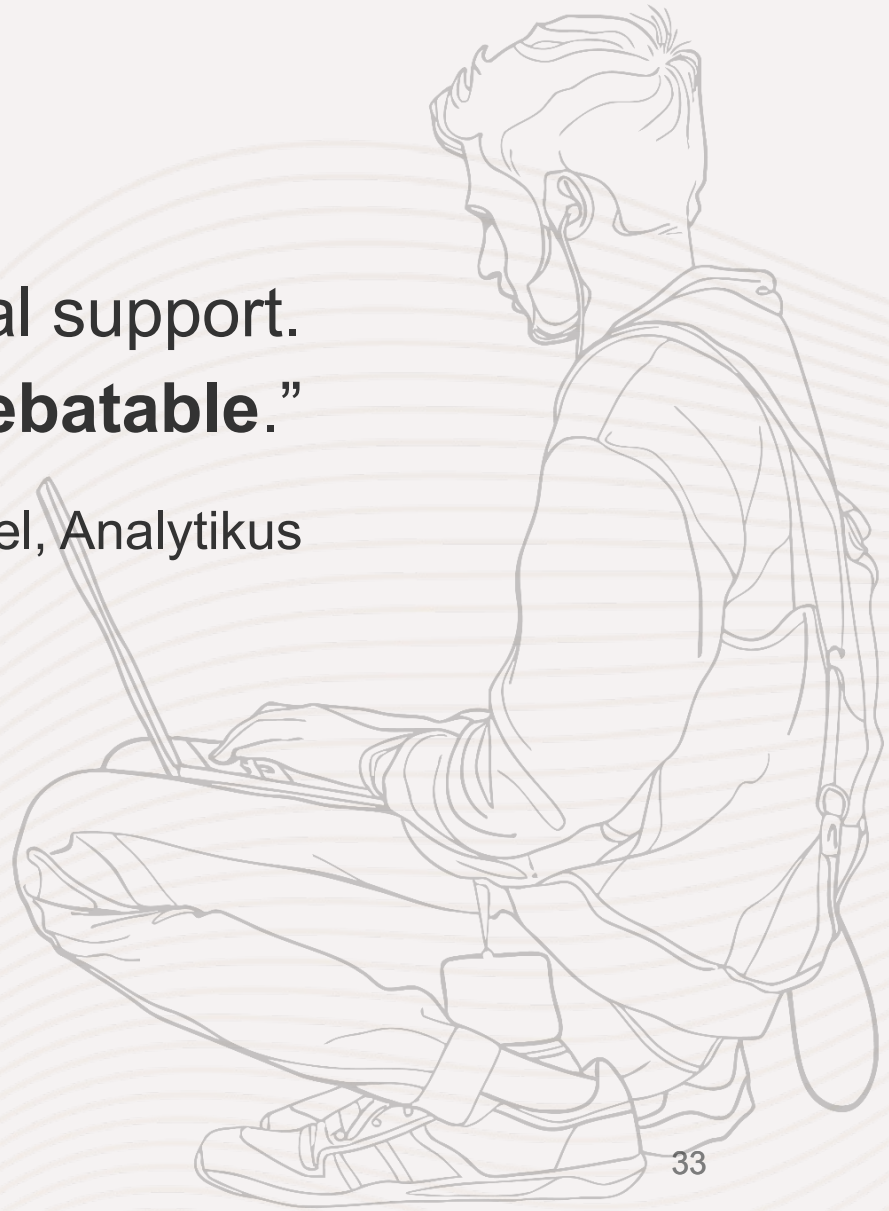
“The chatbots excel at informational support. That one is **not debatable**.”

—Miguel, Analytikus



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“AI tools have a **pretty strict comparative advantage** when it comes to informational tasks, instrumental tasks, checklist tasks.”

—Vinay, CollegeVine

“What we heard over and over from partners was, ‘We never have enough people. We **would love to not repeat ourselves**. It feels like every appointment I say the same thing over and over again.’”

—Christine, Handshake

“So much of advising is de facto based on word of mouth, where **there’s a lot of unreliable or subjective advice**. AI has fewer educational risks if it’s positioned as administrative technology rather than learning technology.”

—Matthew, Stanford University

But some warned about **what can get lost** with bot-first emotional support.

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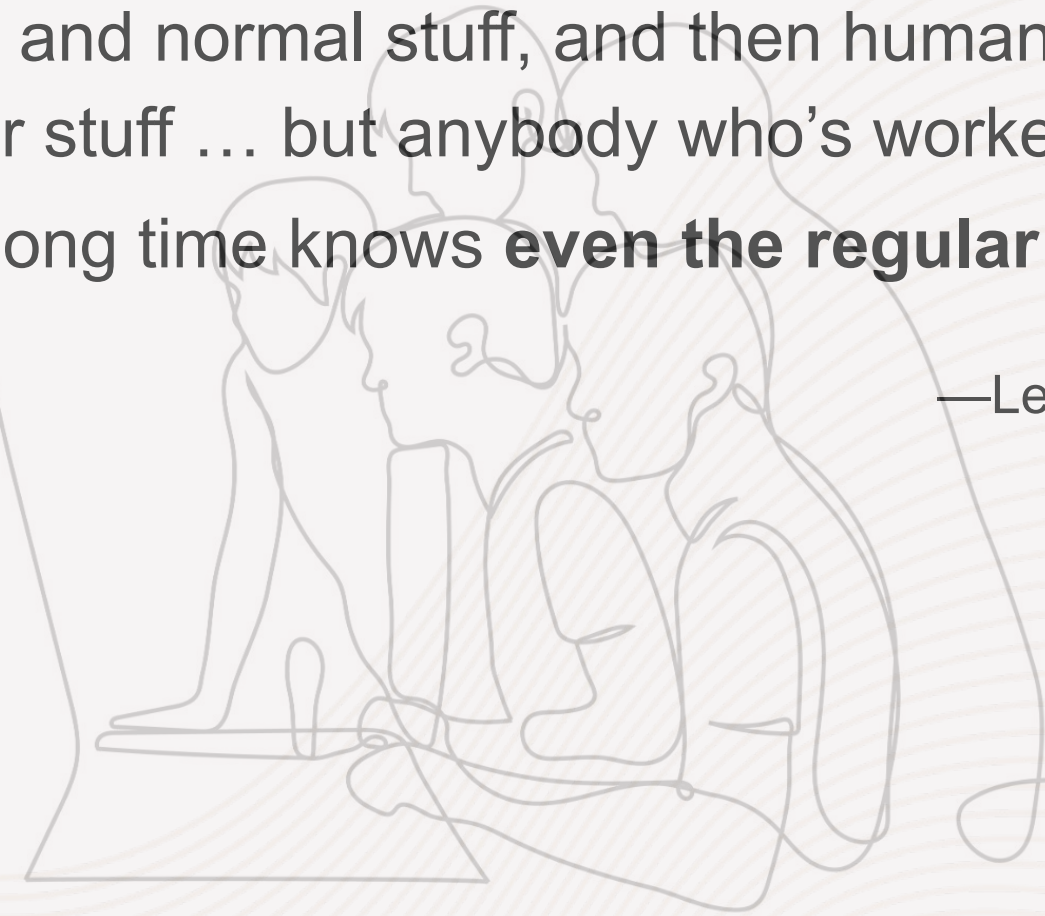
“There’s an idea that AI can handle all the regular questions and normal stuff, and then humans will handle all the other stuff … but anybody who’s worked with students for a long time knows **even the regular stuff matters**.”

—Lena, Let’s Get Ready



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“I think bots continue to be tough when it comes to knowing ‘What is that student actually asking? What’s **the question behind the question**?’”

—Steve, Bottom Line

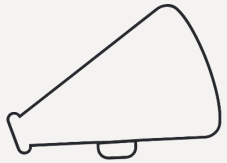
“Where we’ve landed on AI in texting and chatbots is that each and every question from a young person is actually important. Some may be easier to answer, but all of them are important and **worthy of human attention**.”

—John, Get Schooled

“**Experiences are what human advisors can relate and project** to students that chatbots can’t.”

—Denzel (advisor), College Advising Corps

Leaders asserted that humans are still preferred for esteem and emotional support …



Esteem

Emotional

Number of organizations

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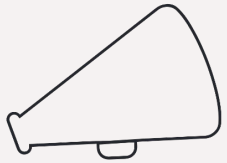
… but bots are starting to catch up.



Esteem — Humans

Esteem — Bots

Emotional — Humans

Emotional — Bots

Number of organizations

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To drive engagement, most providers are building bots with **an emotionally supportive tone.**

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“The emotional tone for **Coco** right now is very encouraging. The prompt we gave it was to be like the **cool older cousin that supports you** in your process.”

—Christine, Handshake

“Part of building the bot is giving the bot a persona and building that relationship between the bot and the students as well. Our bot, **Blu, is a cheerleader**.”

—Sarah, Bottom Line

Beyond just tone, some see bots as a means to expand access to **more emotional support** than current systems can offer.

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“As a first line of defense, the chatbot is really good because now you can **massively democratize** emotional support.”

—Miguel, Analytikus

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But leaders also expressed some **reservations** about bot-driven emotional support.

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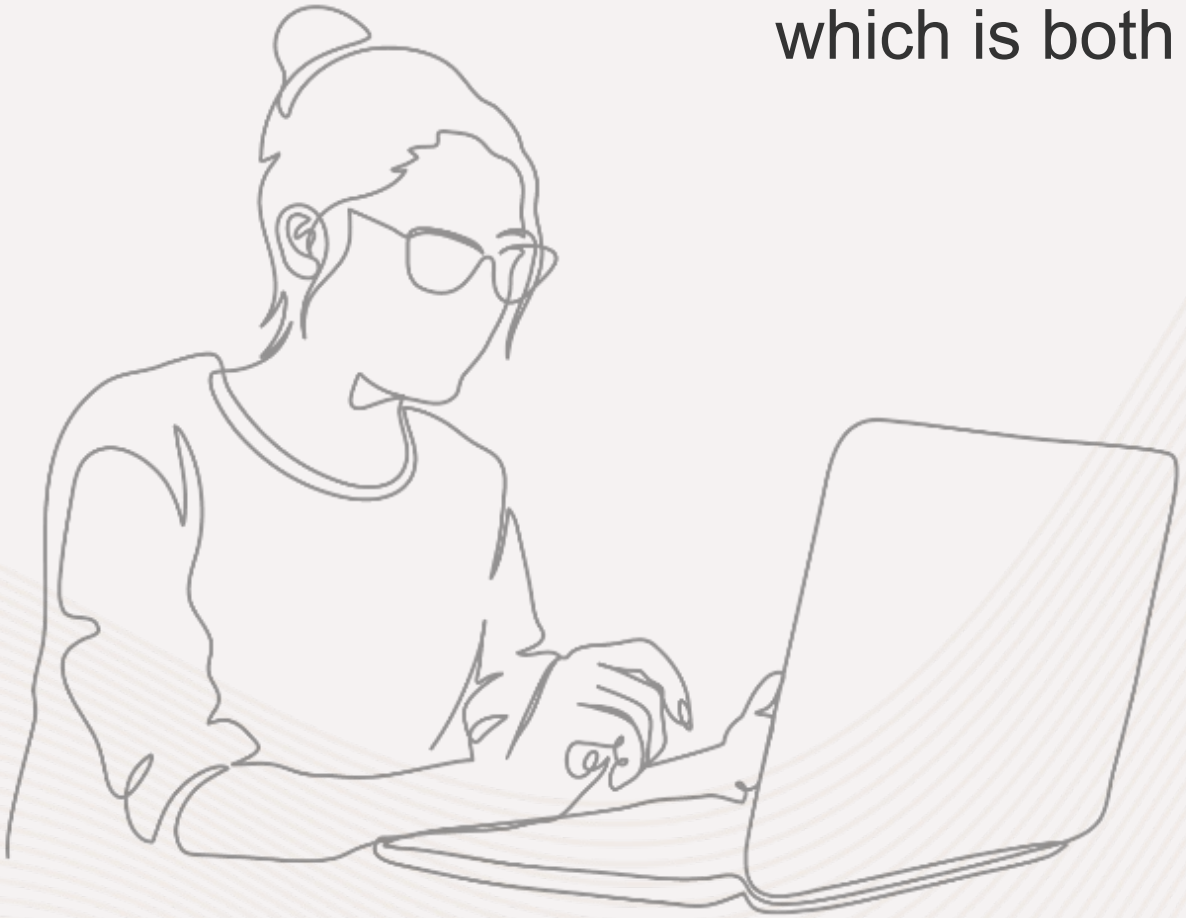
“I’ve seen chat logs where students say, ‘Ivy, thank you so much. **You’re like my best friend**,’ which is both heartwarming, but also kind of scary. It’s a little bit of both.”

—Vinay, CollegeVine



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"The chatbot does give social-emotional support. And that's something the students have expressed a lot of gratitude towards. But it's not the same as an advisor because it's **limited in its responses**."

—Ryan, College Advising Corps

"I don't know that I would trust the bot's response if a student really wanted to get into more **life support**."

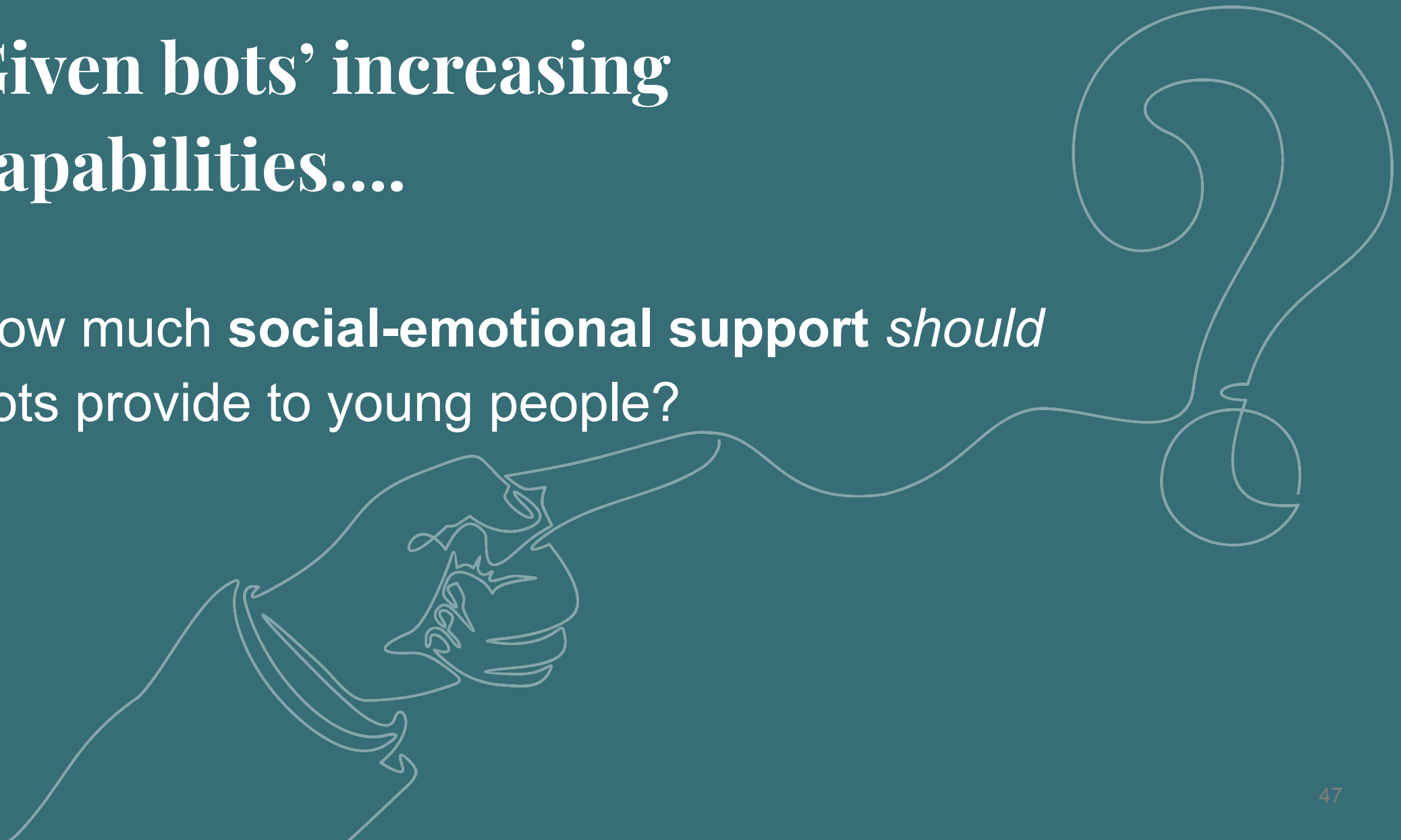
—Sarah, Bottom Line

"AI should **drive me to a human, not be the human**. …A chatbot doesn't have imperfections. We develop because of our imperfections. Will the student continue to go down a path of vulnerability or imperfection, which is necessary to build out their potential, if the chatbot can't really give anything back?"

—Tiffany, Uprooted Academy

Given bots' increasing capabilities....

How much **social-emotional support** *should* bots provide to young people?



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The answer doesn't just depend on what technology *can* do or what humans *should* do. **It also depends on market dynamics** around logistics, efficiency, and students' preferences.

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Trend #2

Both logistical and psychological factors are driving student-bot engagement.

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In our interviews, leaders described **four distinct drivers** of student engagement with bots.

Total lack of access to an advisor.

Lack of access to on-demand support.

Logistical & psychological factors driving demand.

Organizations are building for a lack of overall access to support, but are also responding to students' desire to avoid human contact.

Shame or fear about talking to humans.

Desire to avoid human interaction.

Access is key.

Chatbots and AI coaches are seen as promising solutions to overwhelming student-to-advisor ratios.

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"The people on the ground doing student success work day to day are not pushing back about using AI at all. ...They're **not fearful of losing their jobs**. They're **fearful of continuing to have students drop out** because they don't get the support."

—Tim, Georgia State University

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And for many organizations, **access is about more than ratios.** The promise of 24/7 information and support better aligns to students' needs.

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“One of the things I really like about the chatbot is that it’s always on. So there’s this safety net **if the advisor is clocked out for the day or it’s over the weekend** and the student is having an emergency.”

—Sarah, Bottom Line

At the same time, social and emotional factors like **fear, embarrassment, and shame** are shaping student demands for bots.

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“Sometimes the kids don’t say everything to us. Even if we ask the question, **they won’t say it to us**, but they’ll type it to a chatbot."

—Adia (advisor), College Advising Corps

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"A lot of our students are first-generation, low-income students, and they were not comfortable interacting directly with a human being. They **wanted the impersonalization of being able to ask embarrassing questions** and not feel singled out. …We have seen documented cases where students have talked about being depressed to Pounce, but not to their roommate or their family."

—Tim, George State University

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"There is an **equity component** to this. Because in order for a student to get information from an advisor, they either need to read the information that their advisor sent or they need to talk to them. And there are groups of students that are **intimidated by having conversations** or talking."

—Tobi, College Advising Corps

"There are a number of students who **feel more comfortable talking to a robot** than a human when they are asking for financial help. Because they don't feel embarrassed when they're like, 'I just need some money,' versus I have to look you in the eye."

—Kait, One Goal

"There are **a lot of students who feel a sense of shame around their life choices** that they're imagining for themselves. Let's take a kid who's at a school where most kids go to college and they don't want to go to college. They want to go pursue a career path. Texting with our copilot could be a safe-space, **pre-human conversation** to engage."

—Patrick, Making Waves

These psychological factors are real.

Bots are emerging as a viable, low-stakes alternative, but they also threaten to worsen isolation.

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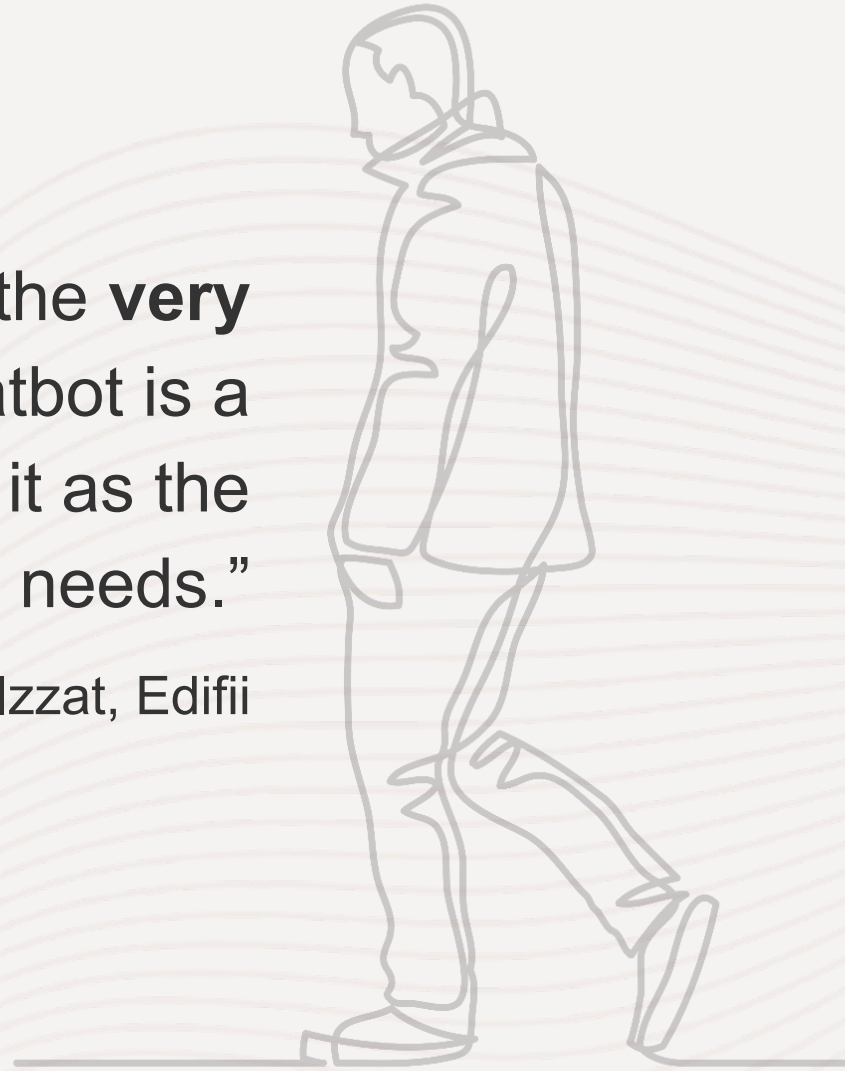
“Students avoiding personal contact might be the **very ones who actually need it the most**. A chatbot is a good accessory tool, but we shouldn’t look to it as the sole means of addressing student needs.”

—Izzat, Edifii



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Lack of access to on-demand support.

Logistical & psychological factors driving demand.

Organizations are building for a lack of overall access to support, but are also responding to students' desire to avoid human contact.

Isolation & antisocial behaviors

Shame or fear about talking to humans.

Desire to avoid human interaction.

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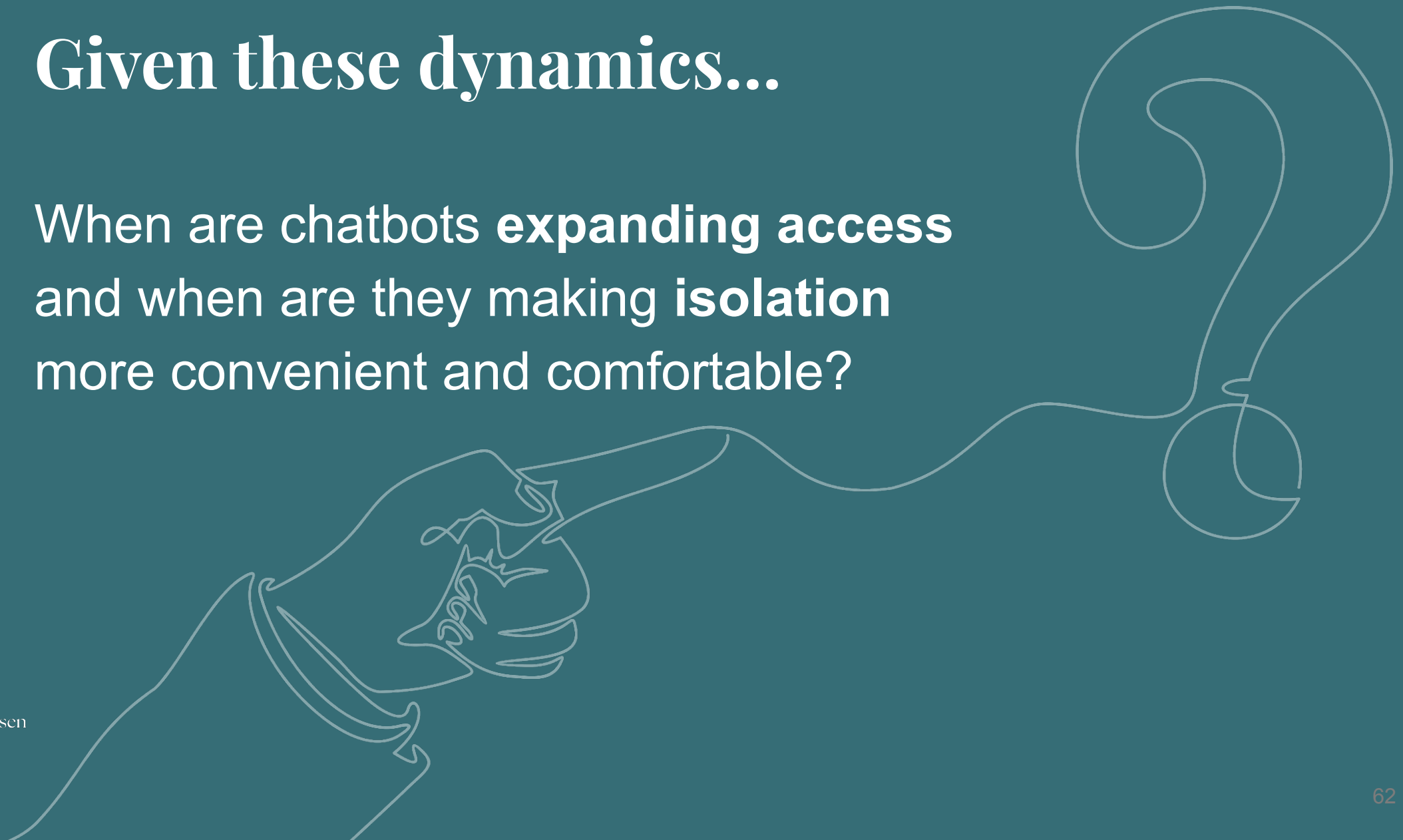
Given these dynamics...

When are chatbots **expanding access** and when are they making **isolation** more convenient and comfortable?



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The answer depends on **whether and how much** the market prioritizes human connections and networks.

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Trend #3

Today’s navigation & guidance market doesn’t treat relationships as a core outcome.

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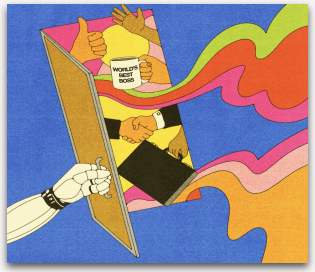
Research has shown that relationships shape career aspirations and unlock jobs. An estimated

50%

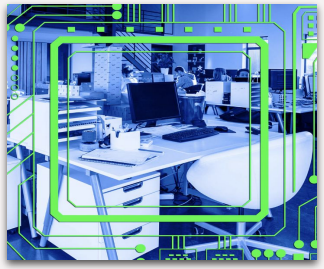
of jobs and internships come through personal connections.*

* “Searching for Work in the Digital Era,” Pew Research Center, https://www.pewresearch.org/internet/2015/11/19/searching-for-work-in-the-digital-era, and “Exploring online internships amidst the COVID-19 Pandemic in 2020: Results from a mixed-methods study,” CCWT, https://ccwt.wisc.edu/wp-content/uploads/2022/04/CCWT_report_Exploring-online-internships-amidst-the-COVID-19-pandemic-in-2020.pdf.

And with the rise of AI in the workplace, **experience, connections, and social skills** all command a growing premium.



When Your Technical Skills Are Eclipsed, Your Humanity Will Matter More Than Ever



05-18-2023 | THE FUTURE OF WORK

How ChatGPT will raise the bar for millions of entry-level jobs

Getting a job fresh out of college may get harder as AI snaps up good entry-level positions, this work futurist says. Employers will be looking for more skills and experience than many early-career workers have.

LIFESTYLE | CAREERS

Landing a Job Is All About Who You Know (Again)

Networking is making a comeback as employers drown in computer-generated job applications

Despite these market dynamics and enthusiasm among leaders to preserve human connection, **most navigation & guidance models don’t treat relationships as a key milestone or core outcome.**

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Top progress indicators guiding most organizations' strategies:

Engagement with tool or service

Tracked by 59% of organizations

Scale of students reached

Tracked by 48% of organizations

Postsecondary progress

Tracked by 58% of organizations

Only 8 of 30 organizations or

27%

reported that they track consistent measures of whether students are building human connections with people who can support their college and career journeys.

Without **relationship metrics** driving product and program development, the market is unlikely to discriminate between bots and humans to drive success.

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As a result of these market dynamics, very few of the tools and services we analyzed focus specifically on **brokering new opportunities** or **expanding new access to mentors and sponsors.**

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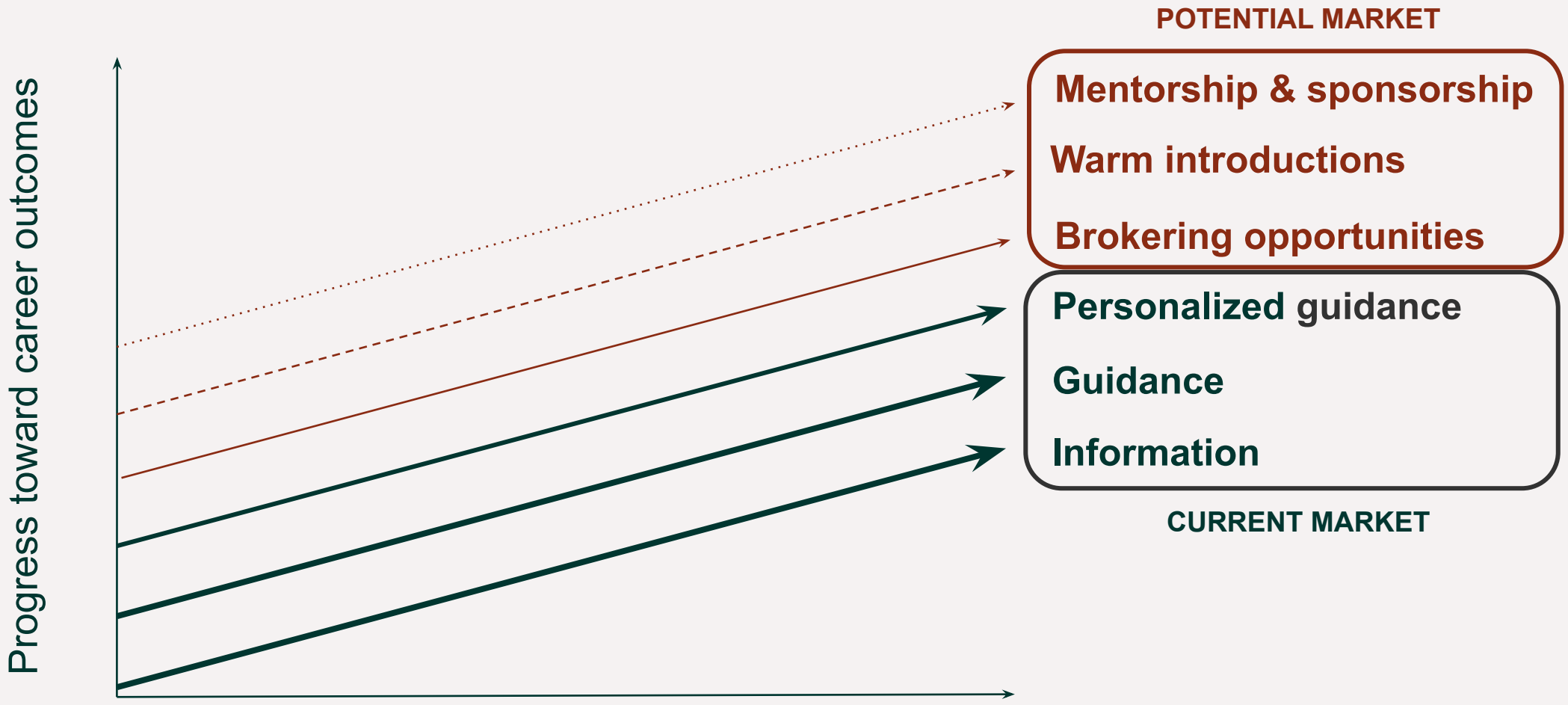
Few solutions offer **high tiers of human connection and support** to jumpstart careers.



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In other words, human connection is valuable but it is **undervalued by the market and therefore increasingly vulnerable** as AI-enabled tools become more commonplace and sophisticated.

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Given these current limitations...

Could **navigation and guidance** become more **relational and networked** in the age of AI?

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The answer depends on how much AI enables advisors and educators to move upmarket away from transactional work **toward more relational work**.

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Trend #4

Leaders are hopeful that AI will enable advisors to take on more relational work as both coaches and connectors.

Many hybrid models are already using AI to explicitly drive students to have **more and deeper** conversations with their advisors.

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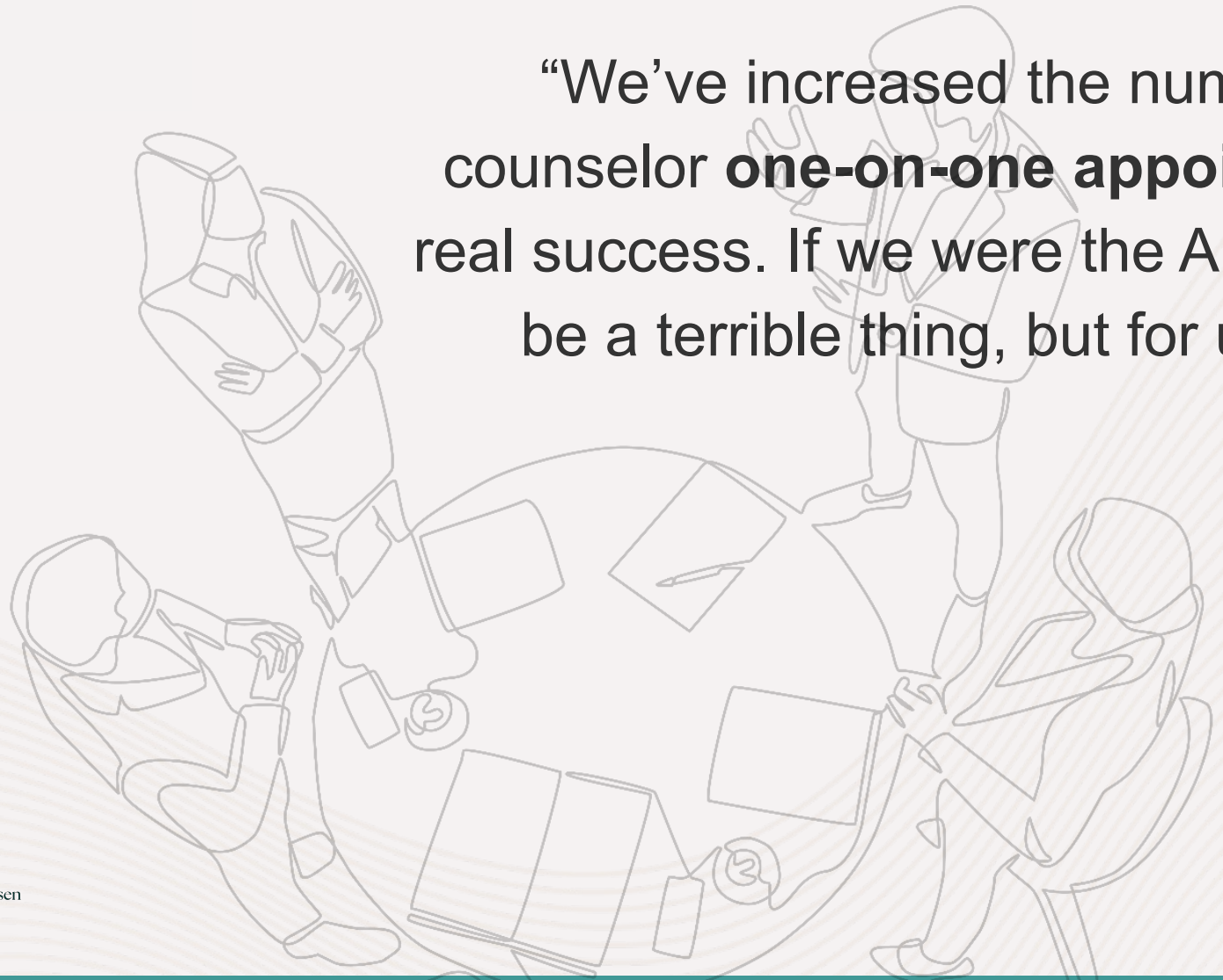

"We've increased the number of meetings with career counselor **one-on-one appointments by 400%**. That's a real success. If we were the Amazon call center that might be a terrible thing, but for us that's a complete victory."

—Tim, Georgia State University

"Our bot is there as support **to push the student to the advisor** to try to get them to meet in person and talk."

—Ryan, College Advising Corps

"When I presented my GPT tool, advisors said, 'I want to go deeper with the students. **I don't want to be doing the student's schedule. That's the bottom of the pyramid in terms of value.** But what is your purpose in life? That's a conversation I want to help you uncover. And I'll help you think through … the courses that you could take. And I'll introduce you to the faculty.' Advisors know students have a hierarchy of needs and would like to go further up once they are confident that the base levels were taken care of effectively."

—Matthew, Stanford University

Leaders described future relational work going a step further: not just as deepening advisor-student relationships, but also **brokering connections to others**.

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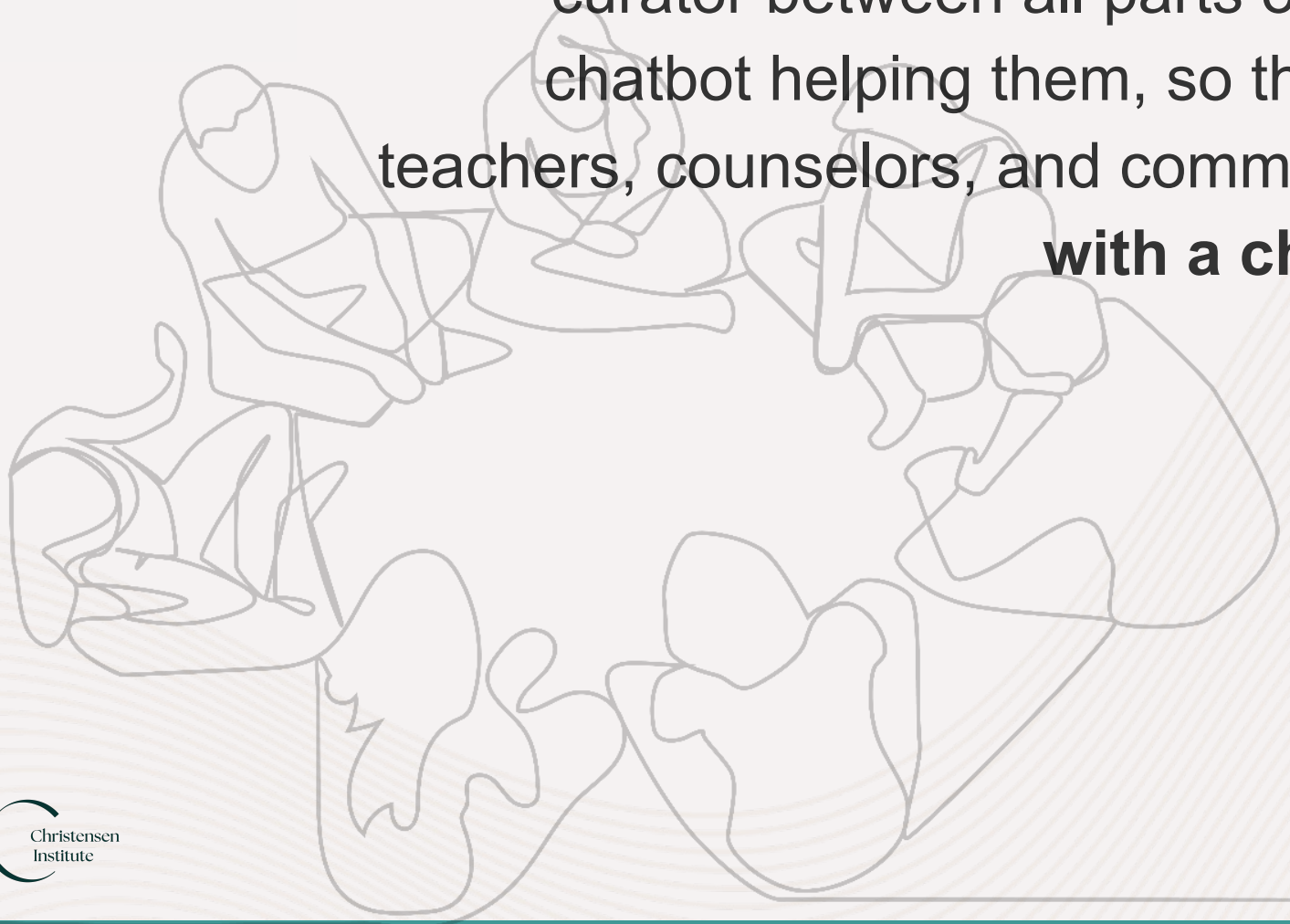

"A standout advisor five years from now will be more of a curator between all parts of the student's life, with the chatbot helping them, so there's more interaction with teachers, counselors, and community members. An **advisor with a chatbot partner is curating the village online**."

—EJ, Student Success Agency

In fact, introductions stood out as deeply human work that **leaders believe bots *can't* deliver**.

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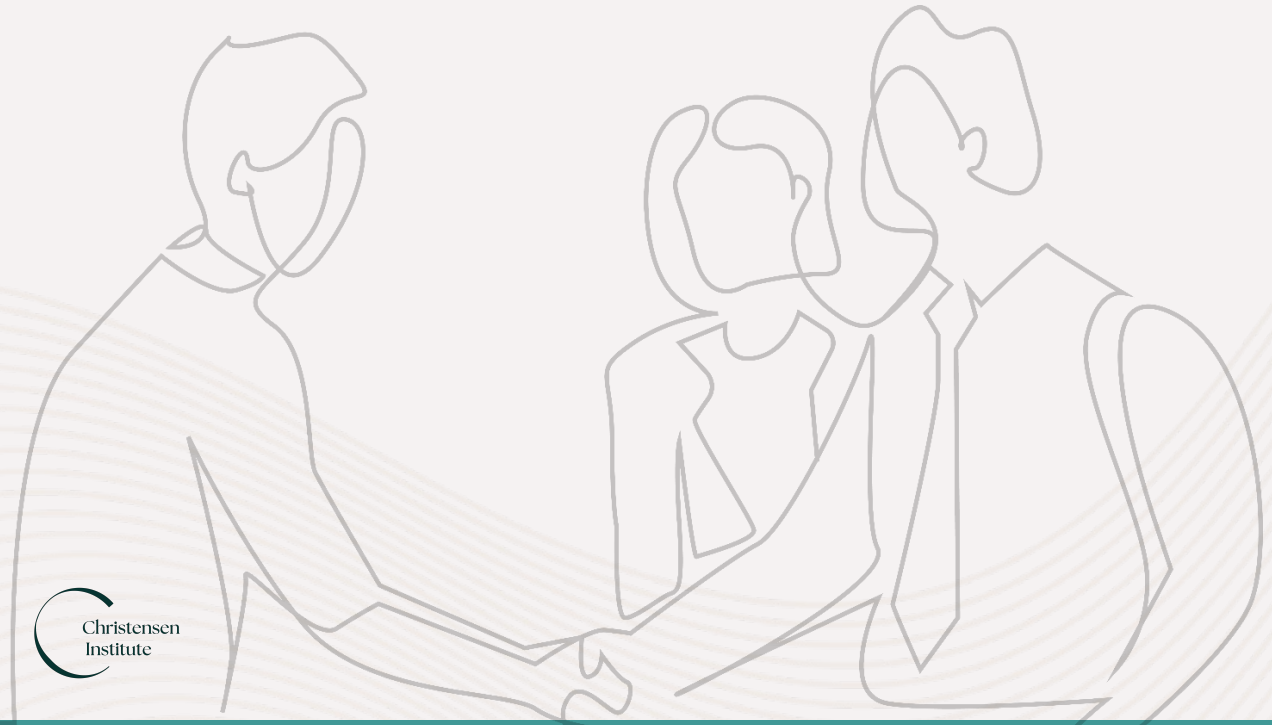
“Technology can always provide you with ‘Here are all the people that you could potentially talk to.’ But **AI can’t give you that warm introduction** in a way that a human can, and it just feels different. That is fundamentally a huge value proposition for career centers as they work to stay relevant alongside GenAI.”

—Christine, Handshake



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"What **humans can do for humans** that AI cannot do is make introductions."
—Brooke, REACH Pathways

"The copilot will prompt students to connect with people and resources in their network. It **stops short of a nice warm hand-off**."
—Patrick, Making Waves

"I think about my students that I worked with 20 years ago. **They still contact me** like 'Hey, do you know someone in such and such field?'... And I don't know that the chatbot can do those kinds of things."
—Tobi, College Advising Corps

Other leaders emphasized a new relational competency advisors will need to master: **coordinating connections across humans, virtual networks, and bots**.

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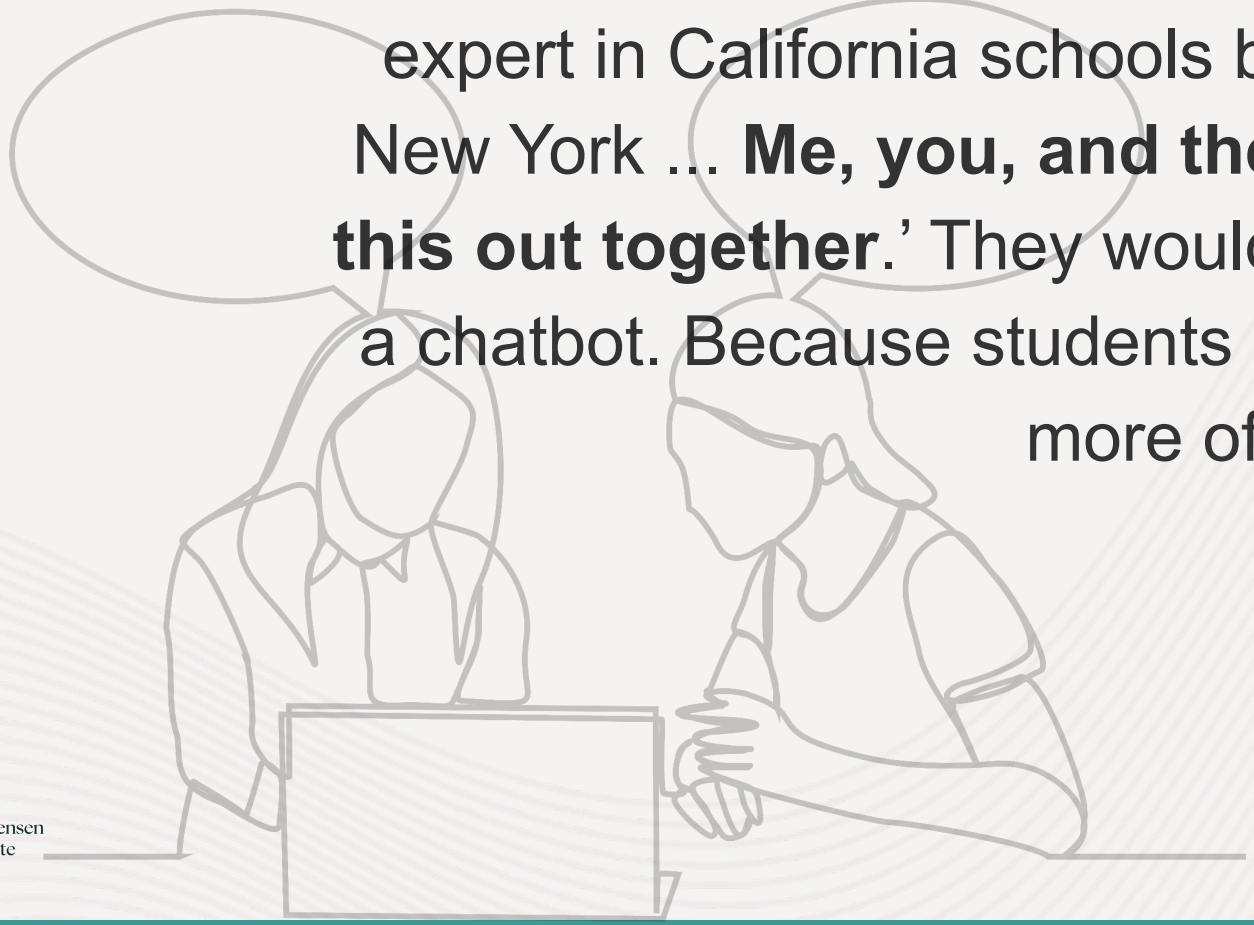
“A standout advisor would talk about their AI companion to their students. They would distinguish between them ... ‘I have a chatbot buddy who is here to help me when it’s nighttime, when it’s the weekend, when I’m actually not an expert in California schools because I’m born and raised in New York ... **Me, you, and the chatbot are going to figure this out together**.’ They would show the student how to use a chatbot. Because students are going to interact with them more often in other areas of their life.”

—Kait, One Goal



“Collaborating with an LLM will be a high-demand skill set for humans in this new learning frontier. In an AI world, **knowing how to curate AI into the conversation will be really useful**. There will be power in the person who can moderate a circle of learners, which will include a chatbot.”

—EJ, Student Success Agency

"One of the realities of the educational landscape right now is also **checking in about virtual networks.** I’ve had students say, ‘There’s this TikTok person and they told me all this and it’s been so helpful.’ It's always great to be on the cutting edge, but sometimes it’s good to check in—not in a competitive way, because this is a team sport—but if they’re basing their information off TikTok, let’s check in about that.”

—Samuel (advisor), Bottom Line

We also spoke to **8 advisors from 4 organizations** about the shifts AI is bringing to their role. There are signs that bots are allowing advisors to **move into more relational work**.

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Since incorporating chatbots and AI, of the 8 advisors we interviewed:

62.5% had different types of conversations with students and urged students to talk to or activate their existing networks.

50% addressed more interpersonal challenges.

37.5% talked about more specific next steps with students.

25% discussed longer-term future planning with students.

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At the same time, as AI scales, advisors may be handed larger caseloads, which could **limit their capacity** to engage in highly relational work.

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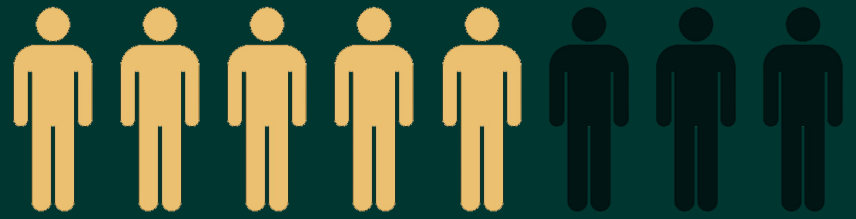
Since incorporating chatbots and AI,
of the 8 advisors we interviewed:



62.5% expanded their caseload
to include new students.

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In other words, pressure to scale caseloads could hold back AI's potential to free advisors to spend **more time building and brokering relationships** with and for students.

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Given those competing forces...

How will the navigation and guidance market need to evolve to **prioritize and scale** relational work?

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The answer doesn’t just depend on what leaders hope or what students need, but **how much both schools and tools** can engineer their way toward human connection as an outcome in its own right.

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Trend #5

Despite limited demand for building relationships, innovators are spearheading creative ways to scale human connections.

There are promising practices emerging among the early innovators we spoke to.

Here are some examples that stand out:

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Reinvest resources back into human capacity

Emerging Practice #1

Organizations seeking to deepen human connection can commit upfront to putting any costs savings back into humans.

Reinvest resources back into human capacity

Emerging Practice #1

At Georgia State University, using Mainstay chatbots to increase student persistence has led to revenue gains through enrollment increases. This revenue was put toward hiring more staff for student support.

"Some people think we're trading technology and getting rid of staff members. Our advisor ratio 10 years ago when we didn't have the technology was in some cases a thousand students to every academic advisor. Now we're down to 350 to one. …The technology has allowed us to hold on to students, which means holding on to tuition dollars, which ***allows us to plow more resources into hiring*** *more people."*

—Tim, Georgia State University

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Engineer away from isolation

Emerging Practice #2

Technology tools can be programmed to promote prosocial behavior, not just productivity.

Emerging Practice #2

Engineer away from isolation

Axio is designed to constantly nudge students to build and maintain relationships and to disengage if students are not connecting to humans.

"When you tell Axio you're bored, it intelligently queries your system of people and shared interests that it tracks through conversations. It might say, 'Mark, you haven't talked to your mom in two months and you both love playing backgammon. You should reach out.' The ability to triangulate who you are, your interests, and the people in your life with what you're trying to learn is at the core of our platform. …If ***it detects that you're falling behind socially, it will push you to engage more and may even disengage with you to promote real-world interactions****."*

—Mark, Axio

Prompt AI to encourage relationship building across existing networks

Emerging Practice #3

Technology can be built to coordinate and scale more regular communication and support across students' communities of care.

Prompt AI to encourage relationship building across existing networks

Emerging Practice #3

Uprooted Academy asks students to identify up to five supportive individuals in their lives and automatically updates those individuals on students' progress and needs every two weeks.

"Students learn that no matter what season of life you're in, you always need a 'Tribe of 5.' You always need a friend or someone who's going along with you, a mentor, an accountability partner, an encourager, and a thought partner. We teach them what those are and who it could be. We think that ***the best people to do it are the people in their ecosystem****."*

—Tiffany, Uprooted Academy

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Exploit AI's memory and matching capabilities to drive positive connection

Emerging Practice #4

Technology can be built to support students in maintaining strong relationships and even fixing broken ones.

Exploit AI's memory and matching capabilities to drive positive connection

Emerging Practice #4

CollegeVine keeps track of students' history of social interactions to help guide them toward healthy, positive relationships.

"There's a concept we call conversational intelligence that's built into Ivy. When a student says, 'I'm thinking about asking this teacher for a recommendation letter. Is it a good idea?' Ivy ***can recall teachers they have a good relationship with or teachers that they have an adverse relationship with that they maybe want to try and fix****. We incorporate all of those into the back end as a way of providing better advice down the line. So that the next time they're coming in and talking about their biology class, it can say, 'The last time you mentioned this teacher, you and Mr. Smith were having problems.'"*

—Vinay, CollegeVine

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Deepen family engagement by supporting student-caregiver conversations

Emerging Practice #5

Technology can prompt deeper and more aligned conversations between students and caregivers who have an outsized impact on their college and career journeys.

Deepen family engagement by supporting student-caregiver conversations

Emerging Practice #5

College Guidance Network (CGN) built parent- and student-facing "roadmaps" to guide conversations about postsecondary planning, identify misalignments, and support caregivers in supporting students.

"We're trying to turn parents into an army of counseling assistants. …The big thing that's in front of us is ***the data architecture for student and parent roadmaps so that they talk to each other****. When you go through the upfront personalization, I, as a parent, might check off selective schools because hope springs eternal, and the kid is like, 'I don't want that, I want to become a carpenter.' You want the parent to be like, 'Oh, wait a minute, there's sort of a disconnect here.' And now how do I talk about that with my kid?"*

—Jon, CGN

Based on these 5 trends...

Where is navigation and guidance headed in the age of AI? Will students' **access to relationships** grow or suffer?

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The rise of AI will mean **we are all walking a tightrope** between democratized access to resources and depleted access to social connection.

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Taken together, these 5 trends point to a future where **human connection is vulnerable to being disrupted** unless the market course corrects.

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Diagnosing Disruption

Disruptive Innovations tend to start off in areas of "nonconsumption" where access is limited and affordability is a challenge.

In navigation & guidance, **bots today are clearly seen as "not as good" as human advisors … but better than nothing**. That's a hallmark of Disruptive Innovations, where customers trade quality for access.

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“Yes, everybody should have a human coach. And in the absence of that, **isn’t something better than nothing**?”

—Eve, Beyond 12

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"Did they **ever have the human-to-human interaction in the first place**? Like the valuable kind? … A lot of kids aren't getting human support, or the right kind of human-to-human interaction, anyway."

—Julia, ESAI

"We're trying to use the term 'help desk.' We talk a lot about FAQs because research shows the counselors get a lot of them. They know they don't do it well because they're so busy and they only have 180- to 185-day-a-year contracts. They're **literally not even available for half the year**."

—Jon, CGN

Diagnosing Disruption

Although they start at the low end of the market, over time, **Disruptive Innovations get better and better** on the metrics that customers care about.

As GenAI becomes more widespread and capable of providing on-demand, emotionally attuned guidance and support, bots will likely overtake more and more aspects of “human” support.

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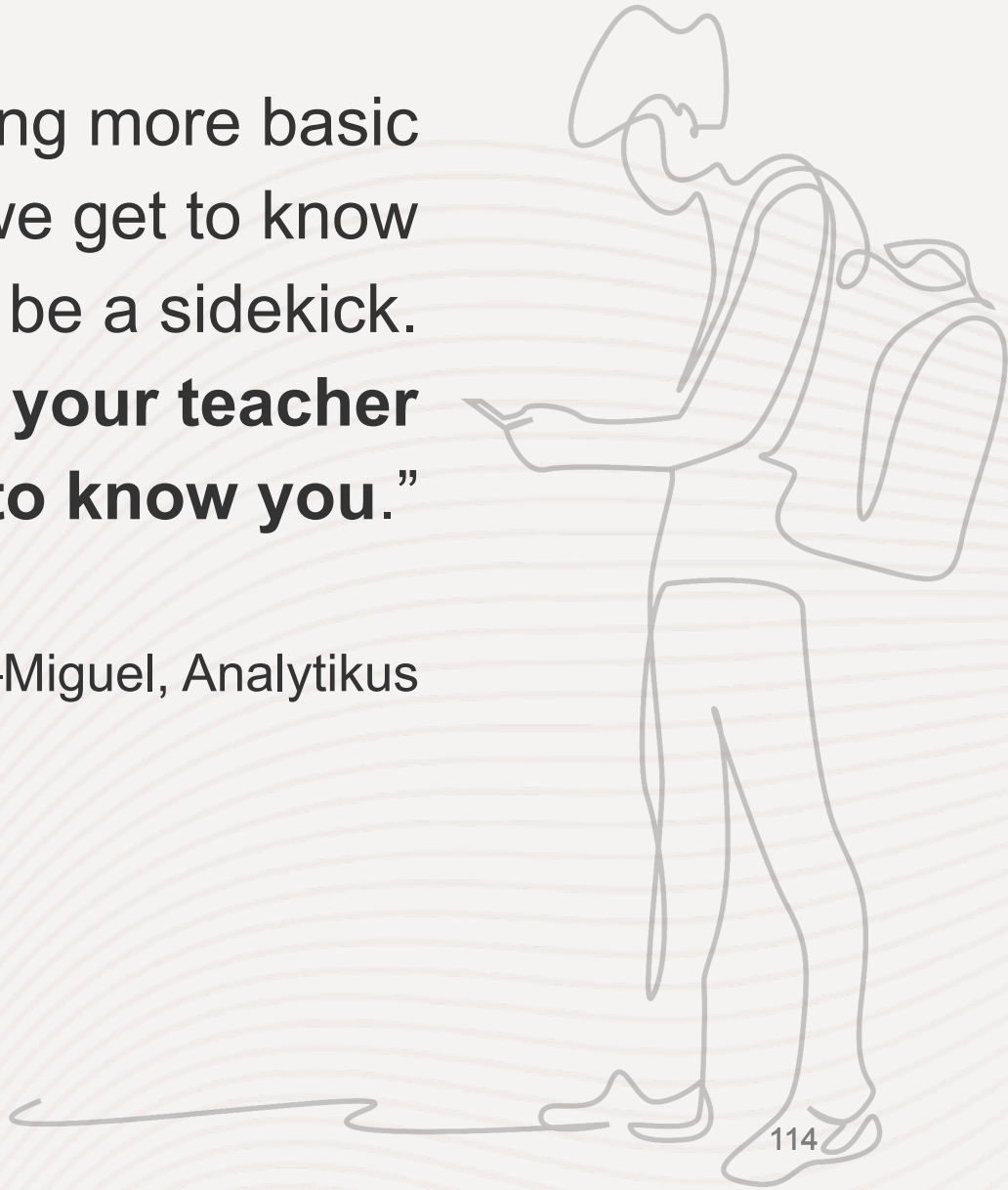
“At this point the bots are solving more basic problems, but as they evolve and we get to know more about the students, it’s going to be a sidekick. **It’s going to know you more than your teacher is going to know you**.”

—Miguel, Analytikus



In turn, “parasocial” relationships with bots could easily start to **replace students’ weak-tie human networks**, or looser connections.

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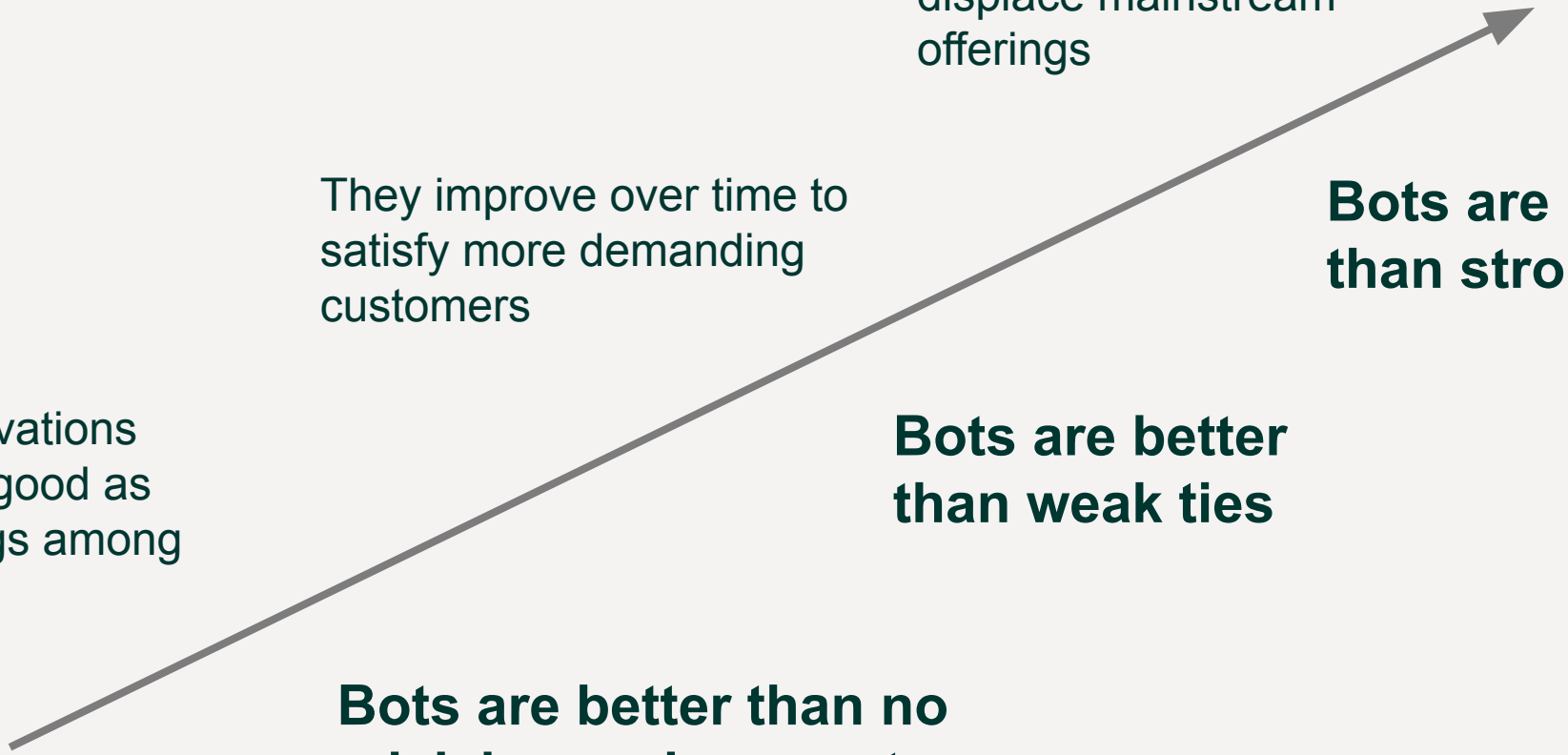
Disrupting human relationships



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Some leaders are optimistic that bots can **supplement rather than replace** human relationships.

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“I don’t think that the next generation is going to have the same definition of ‘real’ as ours does. I think that **AI will be perceived as more real, or just as real as a human**. And I think that’s going to change the way people interact and engage with the world. I don’t think it will replace human-to-human connection. But I think **the way that people perceive those relationships will change**.”

—Brooke, REACH Pathways

Others are worried about **isolation.**

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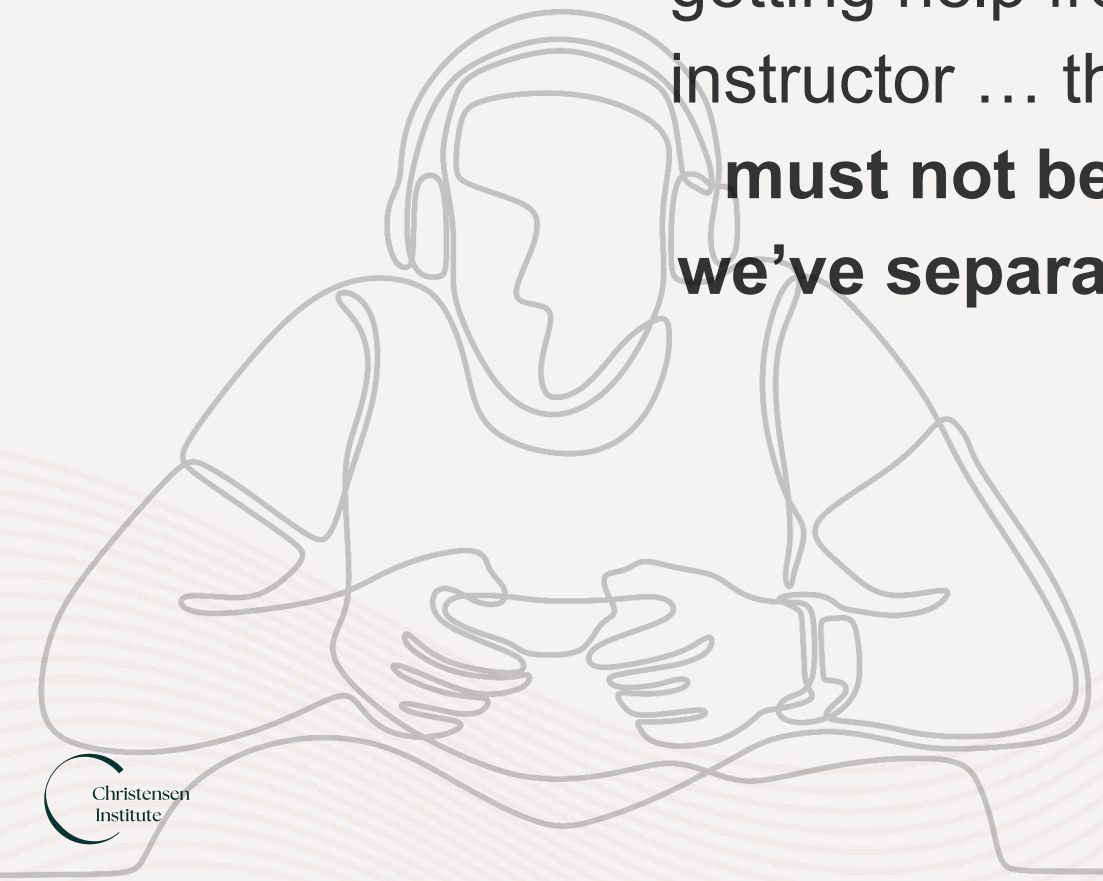

"You could easily imagine everybody in their own dark room, doors closed, typing with their own AI therapist, getting help from their AI coach, learning with their AI instructor … that sounds apocalyptic to me. **Schools must not become digital echo chambers, where we've separated ourselves from one another and harmed our ability to interact**."

—Matthew, Stanford University

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Short term

Navigation & guidance **bots will lend breakthrough efficiencies to a resource-constrained market**. They are unlikely to displace already scarce human resources.

But they aren’t necessarily going to be built to promote human connections.

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Long term

Without explicit metrics and goals incentivizing schools to deepen relationships and expand students' networks, **bots could be on a path to disrupting relationships with advisors** rather than enabling advisors to expand students' connections.

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And while bots taking on more and more human support roles may not impact short-term outcomes like access and persistence, **it could shrink students' long-term access to career opportunities**, which are most likely to come through their weaker-tie networks.

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“On one hand, students could have access to timely information that they might not otherwise have. I think the flip side of that is, **if everyone has access, it will raise the importance of the people that have human access** and have those networks and connections.”

—Samuel (advisor), Bottom Line

Pressure to **scale** from investors and funders could speed up this disruption.

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We asked leaders what **goals** their organizations, funders, and partners were most focused on.

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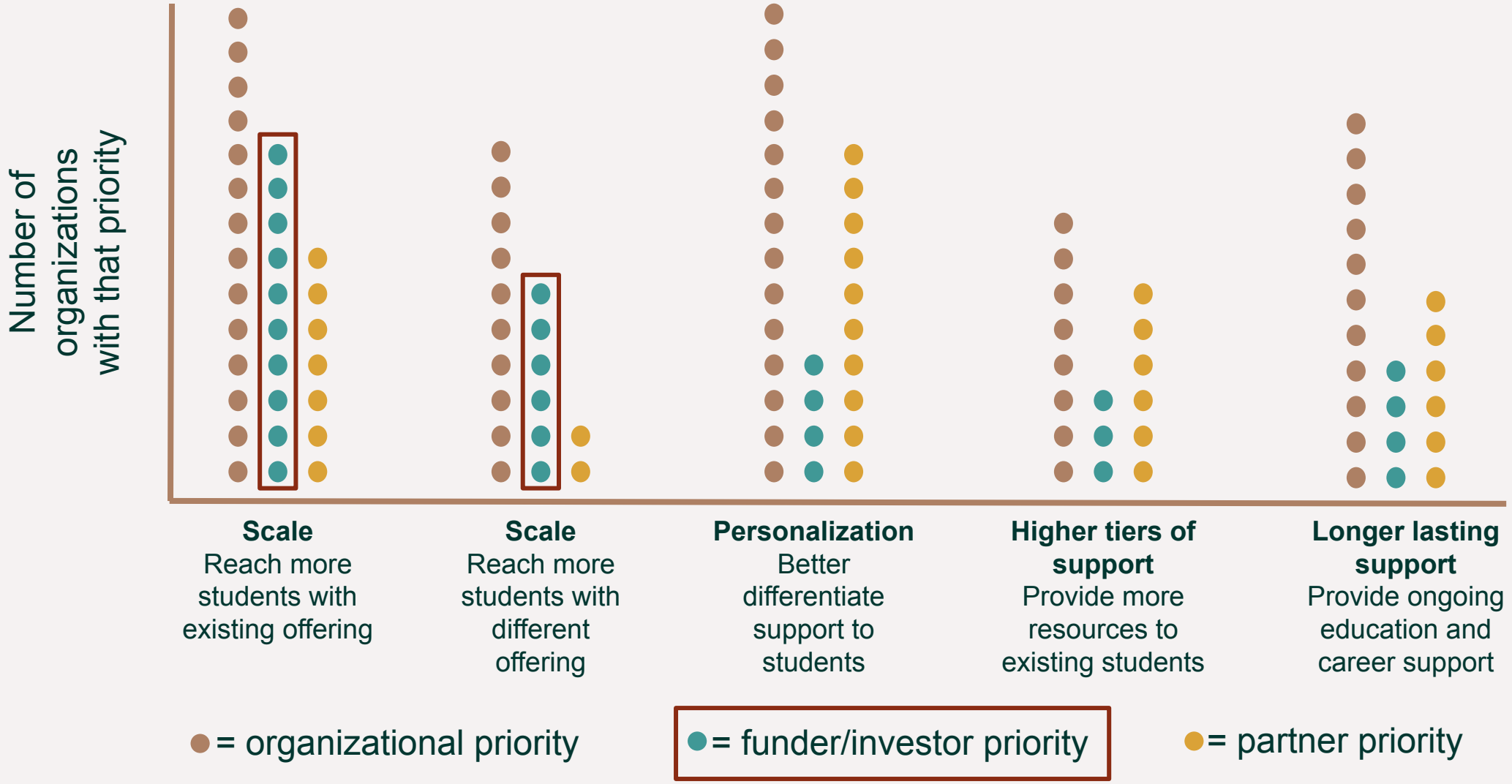
What are the different priorities shaping your approach to AI?



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Funders and investors are putting a **premium on reaching more students** against existing metrics through proven programs. But fewer are focused on expanding to more **personalized, higher-tier, or longer-lasting support** that organizations and school partners care about.

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Given these trends and pressures...

How might we **safeguard and scale human connection** in the navigation & guidance field in the age of AI?

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On the demand side...

We need **schools to prioritize human connection** as a core component of navigation & guidance systems, in turn pulling more tech-enabled solutions into higher tiers of networked supports.

On the supply side...

Innovators should **build in measures and safeguards** to preserve human connection, and continue to explore new ways to shift advisors into playing the role of connector and broker.

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This is an evolving market that presents more questions than answers.

But one thing is clear: If the market rewards scale against current metrics that don't prioritize human relationships, **AI-enabled navigation & guidance tools won't be built to ensure that students have access to the networks they need to get the jobs they want.**

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With the advent of GenAI, **we're entering a time when human connection is more valuable *and* more vulnerable.** If we want navigation & guidance to level the playing field, it needs to **address network gaps**, not just information and support gaps.

Learn more about models, measures and tools to expand students' networks: WhoYouKnow.org

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Thank you for your contributions!

The following people shared their independent views from April–September 2024 as a part of this research: Adia Adams (College Advising Corps), Melissa Ayala (Bottom Line), Kanya Balakrishna (Future Coach), Vinay Bhaskara (CollegeVine), Andy Bobowski (Backrs), John Branam (Get Schooled), Ellen Bzomowski (Mainstay), EJ Carrion (Student Success Academy), Jon Carson (CGN), Michael J. Carter (UStrive), Jared Chung (Career Village), Steve Colón (Bottom Line), Ian Connell (Charter School Growth Fund), Christine Cruzvergara (Handshake), Nancy Daves (Naviance), Ed DeJesus (Social Capital Builders), Julie Delich (Mainstay), Julia Dixon (ESAI), Lena Eberhart (Let's Get Ready), Maria Francisco (Bottom Line), Denzel Frimpong (College Advising Corps), Nathan Gebhard (Roadtrip Nation), Tiffany Green (Uprooted Academy), Sharyn Grose (Career Village), Michael B. Horn, Tiffany Hsieh (JFF), Izzat Jarudi (Edifii), Sam Kennedy (Bottom Line), Tobi Kinsell (College Advising Corps), Tom Latkovic (Backrs), Jeff Livingston (EdSolutions), David Ma (Hope Street Group), Mike Marriner (Roadtrip Nation), John Maycock (Mainstay), Brooke McKean (REACH Pathways), Miguel Molina (Analytikus), Michael Morris, Susan Morrow (Third Road), Mark Naufel (Axio), Patrick O'Donnell (Making Waves), Sarah Place (Bottom Line), Matthew Rascoff (Stanford University), Timothy Renick (Georgia State University), Raquel Rodriguez (Year Up), Eve Shapiro (Beyond 12), Ali Stachura (Hope Street Group), Kait Sweetman (OneGoal), Yutaka Tamura (nXu), Diane Tavenner (Futre), Ryan Thompson (College Advising Corps), Mariama Toffa (OneGoal),Tom Vander Ark (Getting Smart), and Kenneth Woodard (REACH Pathways).

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