Unleash Your Complexity Genius

Growing Your Inner Capacity to Lead

By Mobius Senior Expert Jennifer Garvey Berger and Carolyn Coughlin,
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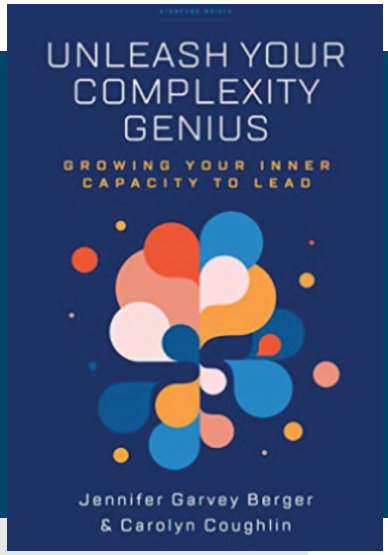

There is a complexity paradox that we all need to understand. Humans have a natural inclination towards connection, engagement, and creativity –all necessary skills to thrive in complexity. The problem is that the stress caused by uncertainty and ambiguity makes it difficult to tap into this inclination when we need it the most. This book offers a set of practices that help you not only understand complexity but manage your own nervous system to bring your natural capacities back online. By paying close attention to your body, redefining your emotional experiences, and connecting more deeply to others, you can transform the anxiety, exhaustion, and overwhelm that complexity creates. Better still, as you unleash your natural complexity genius, you create the conditions for those around you to flourish in an uncertain world.

FROM THE INTRODUCTION

You know those days: you have planned your schedule precariously, one thing hanging off of the next, like a child's balancing game. Then something unexpected happens— you get a call from school that your daughter is sick, you get a ping from a colleague that a major customer is about to make an announcement, your boss walks in with a troubled look on her face. And you think: I simply cannot handle one more thing that is changing or uncertain or difficult on this day—or this week or this month.

And yet the world keeps throwing these things at us. Whether we think we can handle them or not, they come, and they come.

We're here to help. We can't do much to shape what the world throws at you, but one of the things we've learned in our twenty-five years of helping leaders manage difficult situations is that we can do very much to shape how we respond to what the world throws at us. In this book, we're going to let you in on a secret: you have a genius for handling complexity.

We know this as something that humans have excelled at for as long as we have been on this planet—we know how to play and invent and learn our way into new possibilities. If we weren't able to flourish in complexity, we wouldn't have been able to do all the wonderful things humans have done—building thriving societies, writing novels, making vaccines for COVID-19. And this isn't just a modern or just a COVID-era capability. There are complex adaptive ideas woven through our most ancient texts. Humans have been accessing their complexity genius for millennia (which shows that these are both ancient ideas and not as automatic as we might wish).

We understand that it doesn't always feel like you have a complexity genius. That's because alongside your genius for handling complexity, you—like the rest of us—have a rather unsettling human quirk. It turns out that when we need to handle complexity the most, we often are least able to. Here's why. Complexity tends to trigger us, to make us anxious or afraid or overwhelmed. When this happens, our nervous system creates a whole series of shifts in our body that lead to reactivity and oversimplification. So we have a funny paradox woven right into our humanity: when we are calm, we are able to handle complexity better with play and collaboration and co-creation. But complexity kills the calm, making us less able to handle these things.

We two have been puzzling about this conundrum in one way or another for the last twenty years or so. We first met as partners in a small consulting firm, both with little children of our own. Our lives were complex and overwhelming, and we were struggling to stay on top of things. We studied and taught and used the complexity and adult development ideas that had brought us together, and we learned. Over the years, Jennifer has gotten more and more into the world of outer complexity: *What is it about the way complex systems work that is so counterintuitive for us?* Over the years, Carolyn has gotten more and more into the world of the body: *What is it about how we manage our own bodily reactions that makes us more fit to handle the complex world?* The ideas and practices that come together in this book have transformed our lives and have transformed the lives of the thousands of leaders with whom we and our colleagues have worked. And now we're hoping they'll help you too.

Here's what we'll explore together: What is already inside us that makes us well adapted to handling complexity, and how can we dial that up when we need it the most? Or, to put it another way: What is our complexity genius and how do we best make use of it for ourselves and others?

It's not just out there, it's in here – Your Nervous System Meets Complexity

From Chapter One

We're going to be thinking a lot together about complexity and what we can do to lead ourselves and others in an increasingly complex world. So let's start with a definition we have found invaluable in our lives: the difference between what's complicated and what's complex.

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Complexity theorist Dave Snowden tells us that some of the tricky things we deal with—challenges, problems, processes—are "complicated." Complicated problems or issues aren't obvious at all—they have too many moving parts, too much background knowledge required. Your taxes are complicated. Your car is complicated. The yearly budgeting process is complicated. Probably lots of things about your life are complicated—and to handle them, you either have to become an expert or to hire experts to help you. Expertise and experience are your friends here, because you need to know what you're doing in order to accomplish your goal. When a problem is a complicated one, the goal tends to be pretty clear: balance the budget, remove the tumor, create the fastest, cheapest, most reliable route to get your partner and your four best friends to your holiday destination. Complicated problems are difficult, but they're solvable. Better still, as you solve one category of them, you get faster and more efficient at solving more and more problems in that category. You can feel like such a hero as you master the complicated!

Your expertise and experience can become your enemy when things are complex.

Complex challenges, on the other hand, are tricky for a different set of reasons. It's not just that there are moving parts and background knowledge, it's that there are so many moving and interacting pieces that they are impossible to predict, and they are not within any one's ability to control. The lines of causality are blurred, and even as you look back on things, you can't always tell which move led to which outcome. Did your team do so well because you were an extraordinary leader? Or do you lead so well because you have an extraordinary team? You can't tell which things are the cause and which things are the *effect*.

Even if you get really, really good at dealing with complex challenges, you'll still be surprised, and you'll still be wrong sometimes, maybe even often. There's no certainty here because, by definition, complex spaces are uncertain and unpredictable. You can't ever perfect your approach because the conditions change and then your approach has to change too. In fact—and here's perhaps the most important part—if you get lulled into believing that you can use your experience and your expertise to predict and control complex things, you're likely in trouble. Your expertise and experience, which were your friends when things were complicated, can become your enemy when things are complex. You need all the creativity, agility, pattern-recognition, experimentation, and learning you can muster when you're dealing with complexity.

We've set up our organizations, our schools—often even our families—to create predictable spaces where we mostly believe we know what's going to happen next. We have created systems and structures that allow us to handle difficult situations with what looks like a kind of predictable ease. We understand how to create clean drinking water and thus how to prevent plagues and illnesses that could kill millions. We understand how to build houses that will stand up to the unpredictability of a gale or an earthquake. We understand how to keep good records of what comes in and what goes out and protect ourselves from financial ruin. We have worked hard as "progress" marched on to slowly move some of the complexities of life into the complicated realm.

But of course, we begin to believe too much that we can control the universe. These systems and structures— particularly in our organizations—trick us into believing that there is much more about the world that is complicated and much less about the world that is complex. We humans enjoy the feeling of being in control and of knowing what happens next, so we act as though that's possible—even when it isn't.

This is not a new trend. Things were complex and uncertain in 2018 and in 2019. People were tired and overwhelmed at work and at home. And then 2020 hit, and everything notched up in difficulty and complexity.

We can no longer believe that the pattern of life will unfold in one fairly predictable way. Hybrid work is unraveling organizational cultures and familiar ways

We are fit for complexity until it gets really complex.

of working. And now we know better than ever that unexpected weather systems, virus variants, social disruption—any of these can upend our experience of our lives at any moment. That was always true, but now we have lived some of the truth of it, and it has changed us.

All of this uncertainty wreaks havoc on our systems— financial systems, political systems, social systems. But the first stressed system that leaders must deal with is their own nervous system. We cannot handle the complexity outside us unless we are able to notice—and ultimately change—what complexity does inside us.

COMPLEXITY AND THE BODY

You see, humans—like most animals—evolved to face times of threat and times of safety. To handle that difference, our bodies evolved with two different phases for our nervous system: the sympathetic and the parasympathetic.

The sympathetic is often talked about as the fight or flight nervous system. It's the one that's always ready for action. It is perfect for short bursts of physical challenge or threat as we prepare to move our bodies to save our lives. Adrenaline kicks in for energy and focus. Our breath gets shallow, pumping oxygen quickly into our largest muscles so that we can run. We get hyperfocused, with our peripheral vision actually disappearing. And we get incredibly sensitive to danger, ready to lash out at— or run from— anything that might be threatening us.

Even when the threat isn't physical, the reaction is physical. Think back to the last scary movie you watched. This is the sympathetic nervous system at work: your heart beating faster, your stomach churning, your palms sweating, and your muscles tight.

Sometimes what we get with the sympathetic nervous system is the sweet spot of all of the good things that come from stress—which we might think about as thrill or high-intensity flow. When we feel at the top of our game as we step out in front of a crowd to make a speech, or are about to leap off the bungee platform over a deep river gorge, or watch the roulette wheel turn after we have put all of our chips on, we have this delicious—and addictive—sense of excitement. This is what the sympathetic nervous system was made to do! We are hooked!

If the perceived threat continues, though, our body finds things somewhat less thrilling. Our nervous system releases the steroid cortisol which shifts basically every system in our body toward saving our life. And remember, this is an ancient threat we're moving away from, so our body readies itself for running and fighting. Who needs the immune system, the reproductive system, the digestive system to be working if your life is under threat? Cortisol takes command of the entire bodily system as a kind of emergency military leader. If we're not attentive, we won't even notice it, but there is an internal coup afoot.

Over time, this coup—like most coups—gets to an unsavory place. The long-term effects of too much cortisol will literally kill us. For a whole variety of reasons, cortisol becomes corrosive in basically every human system. Robert Sapolsky, the brilliant primatologist, writes, "The human species, despite its talent for solving problems, has managed over the millennia to turn one of its most basic survival mechanisms—the stress response— against itself." When people suggest that stress is hurting our health, what they tend to mean is that cortisol building up and overwhelming our system, doing what it was never meant to do—becoming our destroyer rather than our savior.

What's missing in that picture is the other part of our nervous system, the parasympathetic nervous system, which people sometimes call the "connect and create" nervous system. When our parasympathetic system is in charge, our heart rate becomes slower and oddly more irregular which keeps it healthy and agile. Our breath deepens and slows. Our life-giving systems—our digestive systems, endocrine systems, reproductive systems— just go ahead and

do their thing, digesting, crafting the perfect blend of hormones, and, you know, reproducing. Instead of adrenaline and cortisol, the body releases a different cocktail of dopamine, human growth hormone, and, at night, melatonin. Our immune system pumps up, our peripheral vision expands, and the conditions are created for neurogenesis, the creation of new connections in our brain. Now we are wired for play, connection, and creativity with a wide focus and the more complex view that is required for humor and for innovation.

The parasympathetic system has its own shadow side, though. If we've been stressed out of our minds or under increasing threat, the parasympathetic takes over again— but not in that connecting and creative way. This is when we find ourselves stuck in the part of the nervous system that is meant to basically make us freeze: to conserve our energy, disconnect, and prevent what might be life-threatening movement. Ultimately, this stressed parasympathetic nervous system is a shut-down switch and leaves us feeling hopeless or lost in the face of the profound uncertainty around us.

Instead of this emergency shutdown switch that toggles us between the overactivation of the sympathetic and the overwhelmed circuit breaker of the parasympathetic, in normal times, our bodies are supposed to find their way to a dance between the everyday versions of the sympathetic and the parasympathetic. The sunshine of the parasympathetic nervous system (and the way we'll talk about it from here forward) is supposed to take over when we are free from danger and we can not only rest but also restore, connect, and create.

Here's why this matters as we're dealing with complexity. It turns out you want that restorative parasympathetic nervous system switched on when you are facing a complex situation where it's not movement and thrill but creativity and connection that will meet the challenge. Unfortunately, though, one of the biggest stressors in our lives is that brew of ambiguity, complexity, and uncertainty that the modern world serves up at every meal. The sense that you don't know what's going to happen next is itself experienced as a threat by your body. Neuroscientist Lisa Feldman Barrett has found that "uncertainty is more unpleasant and arousing than assured harm, because if the future is a mystery, you can't prepare for it." She goes on to write, "When people are seriously ill but have an excellent chance of recovery, they are less satisfied with life than people who know their disease is permanent."

Take that in for a minute. If you're *sure* that something is going to end badly—this is it for you—it is less troubling than thinking that something *might* end badly. We humans tend to really, really hate uncertainty.

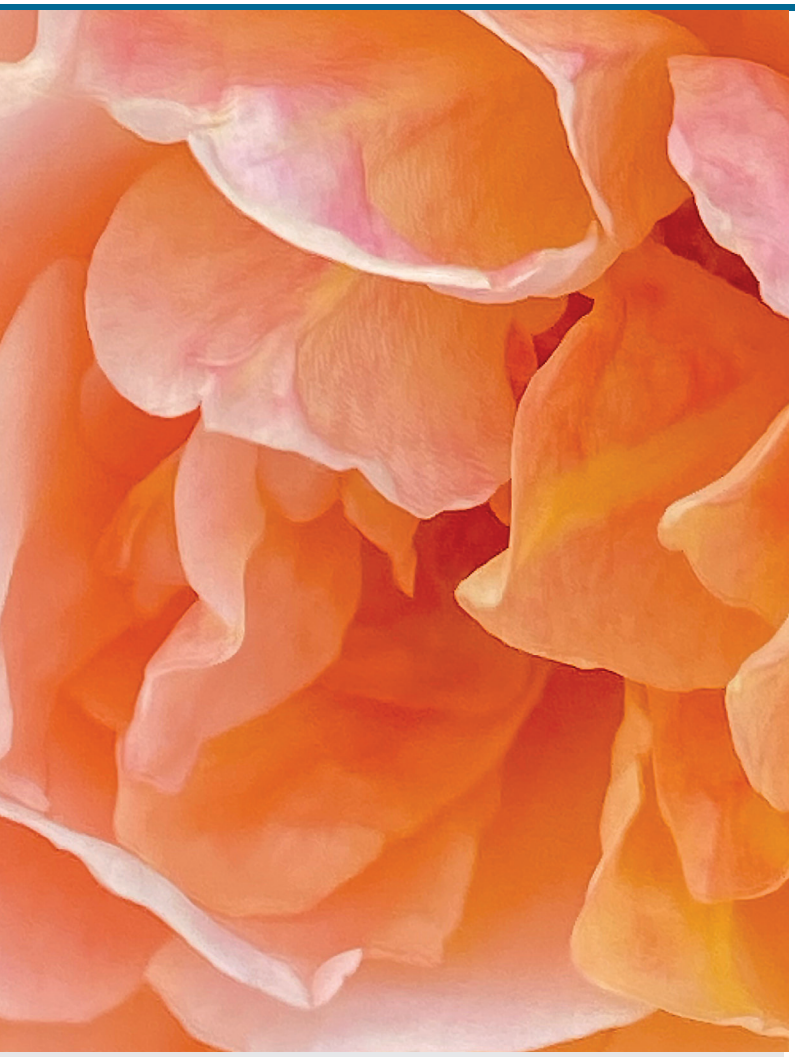
The uncertainties and complexities of the modern world are the equivalent of your heart racing as you watch the hero go down the basement stairs after all the lights have gone out unexpectedly. What these last couple of years have shown us is that we are all always going down into the basement in the dark. The world has become a set of stairs leading into an uncertain

Recommended further reading from the authors:

Stephen W. Porges, *The Pocket Guide to the Polyvagal Theory: The Transformative Power of Feeling Safe* (New York: W. W. Norton, 2017)

Guy Claxton, *Intelligence in the Flesh: Why Your Mind Needs Your Body Much More Than It Thinks* (New Haven: Yale University Press, 2016)

Deb Dana, *The Polyvagal Theory in Therapy: Engaging the Rhythm of Regulation* (New York: W. W. Norton, 2018).



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Grow your inner capacity – five practices the book delves into

1. Start with the Present – the Genius of Noticing
2. Adjust Yourself First – The Genius of Breathing, Moving, and Sleeping
3. Create the Conditions for Things to Change – The Genius of Experimenting
4. Emotions are the New Facts – The Genius of Laughing and Wondering
5. Connections Matter More Than Competence: The Genius of Loving

future, and we have to find a different way to deal with the anxiety that automatically arises in us. We have to figure out how to avoid activating the shadowy sides of our nervous system and activate intentional parasympathetic goodness.

AUTOMATIC MESSAGE SYSTEM: I'M OUT OF CONTROL TODAY SO I'LL BE MOVING TO SAFETY

Of course, we don't think much about our nervous system at work. We experience it as a set of thoughts or emotions that set us off to *do* something. This makes sense. We have evolved to stay one step ahead of the dangers of our outside world—literally. There is more and more evidence that many of our internal systems are, in fact, attempting to predict our way into making the appropriate physical movement to escape trouble. Barrett tells us, "Prediction is such a fundamental activity of the human brain that some scientists consider it the brain's primary mode of operation." Neuroscientist John Coates takes it one step farther when he writes that evolutionary science suggests "the brain is fundamentally very practical, that its main role is not to engage in pure thought but to plan and execute physical movement. What is the point…of our sensations, our memories, our cognitive abilities, if these do not lead at some point to action?" Our emotions, our thoughts, our impulses all arise from this body whose primary job is removing us from danger so as to keep us alive.

Our nervous system doesn't know whether it's our lives or our identities that are threatened, though. Whether we are dealing with the essential question of a threatening noise downstairs or the existential question of whether this terrible feedback means we should just quit our jobs and join the circus, our nervous system understands these different types of threat the same way and wants to act—to move—to make the threat go away. This means that often our impulse when we're feeling triggered by our anxiety is do something—grab the wheel, answer the question, come to a conclusion. Or we numb out—have a beer, check our Instagram, binge watch the latest Netflix series.

Leaders discover this impulse in themselves when they see a problem: a missed launch date, falling quarter three numbers, two teams that seem to be

blaming each other more than working together—and they want to get in there and take action. We can hardly count the number of times we have heard leaders say something like, "I know this might look like micromanagement, but really it's necessary given the circumstances." And maybe those leaders are right. But what they might not notice is that this "action urge" is their nervous system telling them that they are at risk and they need to move. The logic about why we should move is generally a back-filled rationalization—we are justifying the action urge that stress delivers to us rather than rationally deciding to take action. In most cases these days, the risk is to our reputation, our bonus, our need for harmony rather than our lives, but it's all the same to the nervous system.

"If you want to improve the world, start by making people feel safer."

STEPHEN PORGES

GO SLOW TO GO FAST

One of the core paradoxes of complex systems is that a lot of effort can have no impact and a tiny bit of effort can have a lot of impact. And of course, in complex systems the bummer is that you can't know which is which until afterward. But this means that continuing to act at speed can be counterproductive for a couple of different reasons.

First of all, it can take a while for a new pattern to emerge in complexity, and you can't always tell whether what you're seeing is a new pattern or a momentary aberration. This means that rushing in too fast to make a change can be a total waste of effort or worse. You probably recognize this in your own history. You know, like when you come home from a holiday to a full in-box, and you notice as you slog through the piles of emails awaiting you that many of your challenges resolved themselves without your doing anything. After these moments we tend to breathe a sigh of relief—to have acted right away would probably have made everything worse. But we forget this.

The second reason is that it can take a while to see what is emerging. This is the classic delay in the system, like a shower tap in an old London flat. You turn both taps on equally, expecting warm water, and you get freezing water. So you turn the cold down and the hot up—still freezing. So you turn the cold off and the hot on full and suddenly the water heats up to scalding. So you turn the hot down and the cold up—still scalding. You get the point.

This also happens in organizations, of course, or anywhere there are "taps" with delays. You find your team is frustratingly slow with delivering projects because they are trying to get them perfect before they send them out, so you push them to send work in progress and to move faster and not count on perfection. Still, it seems slow to you, so you institute more changes that are designed to move work through faster. But this changes hardly anything. Then you try another initiative and then suddenly there is a flood of very fast, very mediocre work, and you have to begin to scramble to increase your quality again.

The third reason that going slow can help you go fast is an unexpected quirk of human systems: just putting your attention on something—without doing anything—can change what happens. You've seen this one too. You get feedback that you've been interrupting others in meetings, and you set out to prove that it's wrong. As you watch yourself, you notice that you don't interrupt at all! And then your feedback-giver comes back to congratulate you on your changed behavior when you hadn't intended to change anything. This also happens at scale, when we begin to notice something collectively. Drawing attention to the idea that people have been a little profligate with their use of office supplies can have an effect on how people use office supplies (although, like so many complex systemic effects, you can't know whether people will begin to use fewer supplies—because they're being mindful about it—or more supplies—because they're being passive aggressive about it).

So while action is useful in complexity, not all actions are useful. And the kind of reflexive action that is created by our sympathetic nervous system is

rarely useful. We need to slow down and learn as well as speed up to fix. We know that our bodies will pull us to motion. But to truly learn enough to change our perspective and then change the system, we need to resist that action urge.

INTENTIONAL EVOLUTION: FIND YOUR COMPLEXITY GENIUS AND AMPLIFY IT

So far what we've been talking about is the system that evolution has created for us. We get it automatically, just for being born: hundreds of thousands of years of experimentation into how we protect ourselves and keep ourselves alive long enough to reproduce and raise our young. This is what evolution offers to all living things on the planet.

But evolution has also given humans an unusual extra genius, one that might be our birthright alone: a relationship to our own minds and bodies that grows and changes over time. This relationship creates a developmental path—a small evolutionary impulse in each of us. And unlike the evolving nervous system, which might take hundreds or thousands of years to catch up with the demands of our current lives, this evolutionary impulse of our minds unfolds anew in each human lifetime. All of us have the capacity for our own intentional evolution.

This means that over time we can shape what our nervous system offers. When we are very young, there is no separation from the signals our nervous system sends us and the actions that we take. When we are frightened, we wail. When we want to touch the shiny sharp object, our hands dart out. Growing up is in part a journey of learning to recognize and manage our impulses – a capacity that can evolve quickly, even over the course of reading this book. ■

JENNIFER GARVEY BERGER *is a Mobius Senior Expert and a globally renowned expert in complexity, leadership and adult development. She is the founder of Cultivating Leadership, the author of* Changing on the Job: Developing Leaders for a Complex World *and co-author of* Simple Habits for Complex Times: Powerful Practices for Leaders. *Jennifer has worked with executives in a wildly diverse set of organizations like Microsoft, Fidelity Investments, the New Zealand Department of Conservation, and Lion, helping leaders increase their own capacity to think well about problems and people.*

CAROLYN COUGHLIN *is a Founding Partner of Cultivating Leadership, a firm that works with organizations and individuals to help them increase their capacity to lead across complexity, ambiguity, and change. She is also the co-founder of Growth Edge Coaching, where she trains coaches, and writes and talks about developmental coaching as an integrated mind/body/linguistic practice. She is the author of a chapter called "Developmental Coaching to Support the Transition to Self-Authorship" in the Jossy Bass Sourcebook,* Transforming Adults through Coaching. *At the 2023 Annual Gathering of the Next Practice Institute, she will, along with Cultivating Leadership colleague Sheila Buechler, co-lead the track, Dancing With Complexity in which we will dive deeply into how we equip ourselves to be more resilient, complexity friendly and keep growing our capacity to navigate and lead effectively in our ever changing world.*