

Curiosity Works

Moving your school from improvement to innovation

By Kristin Rouleau



About the Author



Kristin Rouleau is senior director of learning services and innovation at McREL International, working with schools, districts, and state departments of education as they navigate change and implement practices to increase student achievement. Before joining McREL, Kristin was a classroom teacher, curriculum specialist, elementary school principal, and district-level curriculum administrator. Among her accomplishments, she designed and led her district's first centralized literacy coach cadre for K–12 teachers. Kristin earned her administrative credentials from the University of Washington, her master's in curriculum and teaching from Michigan State University, and a bachelor's degree in elementary education from Western Michigan University. As of this writing, she is a doctoral student in leadership for educational equity at the University of Colorado–Denver.

About McREL

McREL International is a nonprofit, nonpartisan organization committed to improving education outcomes for all students through applied research, product development, and professional service to teachers and education leaders. We collaborate with schools and school systems across the country and worldwide to help educators think differently about their challenges, offering research-based solutions and guidance that help students flourish.



© 2018, McREL International. All rights reserved. To use a portion of this document for non-commercial purposes, please cite as follows:

Rouleau, K. (2018) *Curiosity Works: Moving your school from improvement to innovation*. Denver, CO: McREL International.

20180108

Curiosity Works

Moving your school from improvement to innovation

By Kristin Rouleau

What if all our students came to school eager to learn, self-motivated, and passionate about what they were learning. What if they were, in a word, *curious*?

Wouldn't teaching be easier and more joyful?

Student curiosity is a powerful driver of both student success and engagement. It also predicts better relationships, life fulfillment, and job performance (Kashdan & Roberts, 2004; Kashdan & Steger, 2007; Reio & Wiswell, 2000). So, what would it take for us to create learning environments that unleash student curiosity?

We could begin by unleashing *educators'* professional curiosity, encouraging them to ask questions, build on best practices, and develop next practices that create more engaging learning experiences for students. We'd also tap into a yearning most of us feel as professionals: the need to not just survive, but to *thrive* in what we do—continuously improving, learning and growing every day, and sharing those experiences with other educators in small, learning-focused groups.

That's the assumption at the heart of this white paper and McREL's forthcoming book, *Curiosity Works: A Guidebook for Moving Your School from Improvement to Innovation*—that the most powerful changes we can make in our schools must come from the *inside out*, from the natural curiosity and intrinsic motivation that everyone shares to experience the joy of learning, discovery, and improvement.

McREL's Curiosity Works™ approach isn't about pushing back against the “mandates” from your district or legislature. If followed assiduously, mandates often do lead to some improvement. But, what then? Too often, my colleagues and I have met dispirited teachers and school leaders who did everything they were asked to do, got the results they were asked to get . . . and then the progress stalled.

Good, they were then told, is not good enough; we demand better.

What's better than improvement? Innovation. The craving to seize the momentum *within your school* and never let go. The recognition that *they* can't make us experts. Only *we*—a cohesive, school-based team striving for excellence on the basis of shared beliefs and commitments—can do that.

We hope you and your school leadership team (we call it a Research and Innovation Team, or RIT for short) will find this paper a source of motivation and inspiration, and that you'll be curious enough to turn to the book for elaboration and experiment with implementing the tools that were created for the RIT and your entire school community.

Let's get started by becoming familiar with the phases of school innovation in roughly chronological order. As is the case with virtually everything we do at McREL, we offer this guidance not as a “program” to be followed in lock step, but as a blend of observations drawn from research and exercises drawn from experience. Perhaps the most significant way that Curiosity Works differs from top-down mandates is in embracing the reality that the precise path forward is unlikely to be identical for any two schools.

Student curiosity is a powerful driver of both student success and engagement. It also predicts better relationships, life fulfillment, and job performance. So, what would it take for us to create learning environments that unleash student curiosity?

Readiness: Commit to shared values, moral purpose, and vision

Before getting to the hard stuff, you've got to get through some squishy stuff. Values, morals, and vision may seem like things for other people to talk about, but as a member of your school's RIT, this is very much your job. In our research on high-performing schools, McREL has found that school organizational culture is the "secret sauce" of school performance. High-performing schools embrace collegiality, open dialogue, and honest, reflective examination of their data.

Values can be thought of as rules—written, unwritten, or a blend—that guide an organization's behaviors. They can be lofty to the point of wishful thinking, or so down-to-earth that they are easily overlooked. They aren't necessarily positive. You're not likely to see a poster in your school reading "We place adults' wishes above students' needs!" but if your school dishes out staff assignments by seniority instead of merit, that's the expression of a value.

As your school engages in the work of improvement and innovation, it's important to clarify the core values that drive your work. Patrick Lencioni (2002), a CEO, author, and consultant in leadership and management, offers a helpful way to think about four types of values:

- *Core values*—two or three traits that truly define an organization and distinguish it from others.
- *Aspirational values*—traits that *don't yet* define the organization but everyone agrees are necessary (in many schools that might include *innovative* or *collegial*).
- *Accidental values*—unwritten (and often counter-productive) rules that reflect how people act or treat one another.
- *Permission-to-play values*—important behaviors that don't necessarily define an organization (e.g., treating others with dignity and respect).

Ultimately, an organization's list of values ought to answer these critical questions:

- How do we behave, especially when no one is looking?
- What behaviors have we cultivated over time that distinguish us from other schools?
- What do we value so much we're willing to make sacrifices for it?

This last question is an important one because ultimately, your organizational values should attract the right people and repel the wrong ones. For example, if you include "collegiality" and "lifelong learning" in your list of values, you should be willing to tell people who don't reflect those values that they don't fit with your culture and need to change their behavior or seek a position elsewhere.

Moral purpose is the *why* behind *what* you do. Basically, when schools succeed it's for big, important reasons, like serving others, fulfilling a purpose, or making the world a better place. Indeed, when McREL synthesized decades of research on effective school leadership, we found that several behaviors and dispositions (called leadership responsibilities) clustered into helping school communities gel around a common purpose. Thus, we advise leaders to build "purposeful" communities, starting with articulating shared outcomes that matter to everyone. Simply stated, a clear sense of moral purpose is at the heart of every effective school.

Vision, often called a vision statement, is a concise statement that captures your school's aspirations for the future. Don't spend forever wordsmithing, and don't hire a mason to engrave it over the door, because vision statements can and should change over time. But do give it thought. The best vision statements are often simple statements that capture big ideas that seem just a bit beyond your reach, yet flow naturally from your moral purpose. Consider these examples from well-known organizations that you likely have shopped with or donated to:

- *To become the world's most loved, most flown, and most profitable airline.*
- *Making every eligible child's wish come true.*
- *A world in which every child attains the right to survival, protection, development, and participation.*

When creating and sharing visions for school improvement and innovation, the simpler, the better. Ideally, a single compelling idea will drive your vision, which can be captured in a phrase that people can grasp and internalize.

Once you've committed to a set of shared values, purpose, and vision, you're ready for Phase 1.



Phase 1: Create hopeful urgency

What are we doing right . . . and what must we do better?

Effective leaders (as a member of your school's RIT, that's you) inspire people to accept challenges that may seem initially beyond their reach, and challenge the status quo by describing change as an opportunity to move everyone toward a better future. To get there, your RIT needs to look honestly and openly at your school—both your challenges and strengths—and agree on what to maintain and what to discard.

Effective school leaders frequently use unsatisfactory data, changing conditions, or hope for a better future to create *discontent with the current reality* while helping people *picture a more attractive reality*. That is, they use their school's data to portray an accurate picture of their current status, and build optimism by helping everyone believe that a brighter future is possible. This doesn't mean frightening everyone into thinking the sky is falling. Rather, it's creating a sense of urgency and making

the status quo no longer acceptable. By creating a chasm between the current reality and a preferred future, leaders motivate people to move beyond the status quo. These same leaders also point to bright spots in their school's data and practices to illustrate what is possible.

How leaders explain successes and interpret failures has a powerful influence on their schools. Do leaders attribute declining performance to external (or universal) factors over which people have no control, such as the changing demographics of their school population? If so, they'll likely encourage *learned helplessness*, convincing people their actions are futile (Seligman, 1990). If, on the other hand, they look for specific causes for the problem (e.g., not providing adequate early interventions for reading), they can help people develop *academic optimism*.

Leaders can also foster optimism in their schools by employing *asset-based thinking*—viewing what could be seen as a challenge or weakness as a strength or opportunity instead. Indeed, a common feature of high-performing schools is that instead of dwelling on perceived deficits in students, they recognize and build upon the many strengths

students bring to school, such as family aspirations, bilingualism, extended families, and resilience (Yosso, 2005).

In North Melbourne, Australia, educators went on a scavenger hunt for “bright spots”—classrooms where students were highly engaged in rigorous learning. They used instructional rounds, a non-evaluative classroom observation protocol developed by Elizabeth City and Richard Elmore and their colleagues at Harvard (City, Elmore, Fiarman, & Teitel, 2009) to get teams of teachers to visit one another’s classrooms. Afterward, they synthesized what they had observed in the classrooms of highly effective teachers into six key practices that were shared with teachers across the region. Because they were drawn from real-life examples of nearby teachers while also grounded in research, they were able to share these practices with others who found them to be straightforward, intuitive, and easy to use in their own classrooms.

In short, finding and building on “bright spots” can be a powerful way to improve practices because the best practices you discover won’t feel abstract, far-fetched, or mismatched to your students. Moreover, we know from research that so-called

vicarious experiences are important motivators; when we can see someone else doing (and having success with) what’s being asked of us, we’re far more likely to believe that we can be successful and to try it ourselves, especially if we view the other person as like us (Bandura, 1977, 1986, 1997).

Where, then, to focus? That’s a key question for many school leadership teams. Many school improvement plans call upon people to do too many things at once and, as a result, they are often overwhelmed or unsure of where to focus, and end up doing nothing well. Fortunately, McREL’s What Matters Most® framework (which is already familiar to tens of thousands of educators worldwide and is incorporated into our new Curiosity Works approach) identifies the five school functions that, as the name implies, matter most!

So, resist the urge to try and solve all your school’s issues immediately. As an RIT, focus on one of the What Matters Most framework components, as shown in Table 1 below.

With a good working understanding of where you want your school to be, it’s time to start getting there. You’re now ready for phase 2.

Table 1. The What Matters Most framework

What Matters Most Component	Description
Curricular pathways to success	High-performing systems guarantee that every student, in every classroom—no matter what their aspirations—is provided with both challenging and personalized learning experiences that prepare each of them for life success.
Challenging, engaging, and intentional instruction	At the core of effective systems are teachers who challenge students, develop positive relationships with them, and are intentional in their use of a broad repertoire of teaching strategies.
Whole-child student supports	Setting high expectations requires providing students with the scaffolding they need to succeed—a just-in-time, personalized response to students’ cognitive, social-emotional, and academic needs.
Data-driven, high reliability systems	High-performing school systems put data systems and processes in place to ensure high-quality learning experiences for all students, as well as real-time responses to student struggles.
High-performance school cultures	Effective schools ensure high-quality learning experiences in every classroom. At the same time, they develop a culture of high expectations for learning and behavior, which is an even more powerful predictor of student success than socioeconomic status.

Phase 2: Focus on teaching and learning

How will we help people transform professional practice?

A natural place to start is with a model for instruction, which is different from the more-familiar framework. Frameworks attempt to put in one place everything that great teachers do. That's certainly helpful, but most frameworks fail to provide a clear process that teachers can follow and emulate in their classrooms to support better student learning. That's where a model comes in.

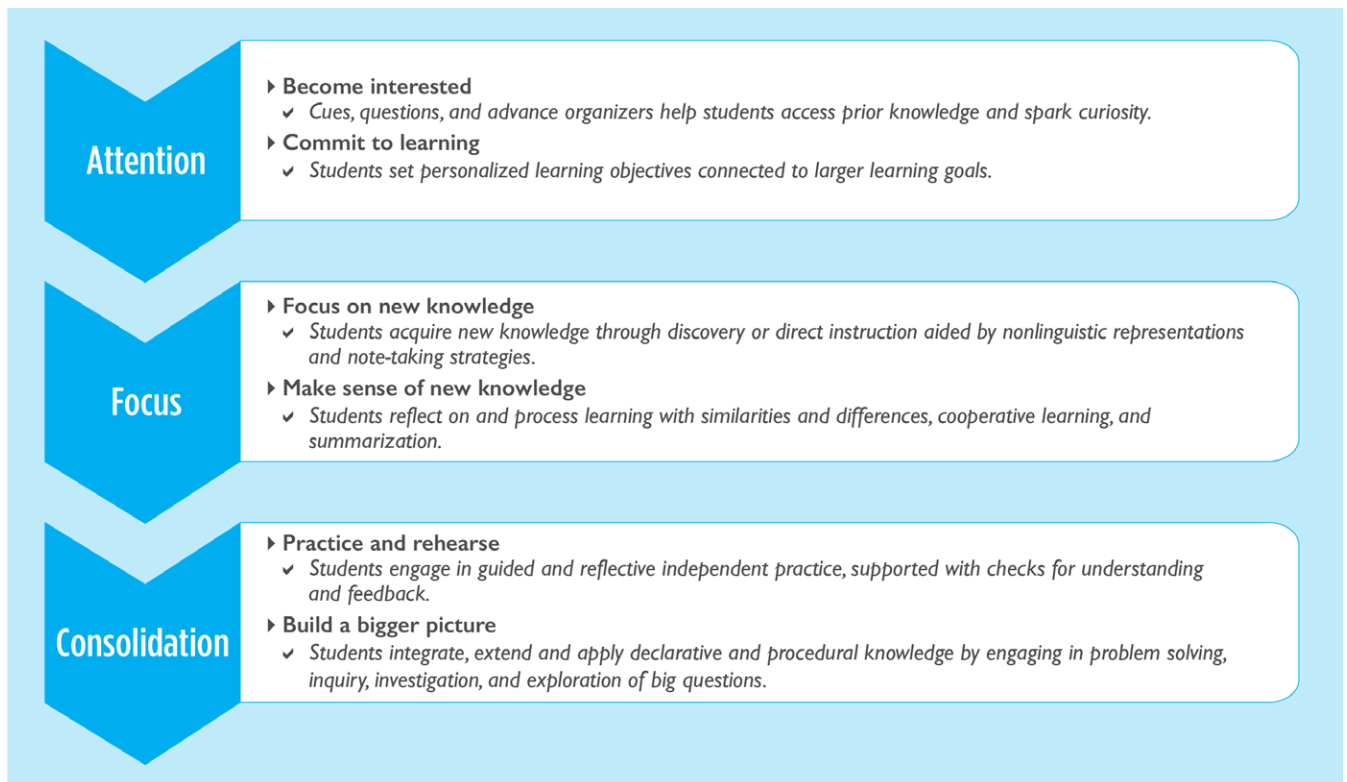
We offer our own version of such a model in Figure 1, which integrates cognitive science on how people's brains develop deep knowledge and skills with McREL's research on effective classroom instruction strategies, as reported in *Classroom Instruction that Works*, 2nd Edition (Dean, Hubbell, Pitler, & Stone, 2012). You'll notice that we've framed each stage of the process in terms of student learning—what happens in students' brains as they

learn. This is quite intentional as it's where the action really occurs in a classroom. Also it's easier for teachers to make the shift to more personalized learning strategies when they focus on learning instead of just instruction.

Mastering a learning model is one of the most powerful techniques educators can use to improve student achievement (Goodwin, 2013). However, it's often at this point—feeling competent and comfortable with what we're doing—that many people stop improving. That's because going beyond this point requires what psychologist Anders Ericsson calls “conscious incompetence”—effortful concentration and, often, falling flat on our faces.

Engaging in deliberate practice is how experts expand their repertoire and develop multiple schema that allow them to size up problems and conjure up solutions (Newell & Simon, 1972). Experts have in their mental toolbox a large collection of if-then statements: if X happens, then I do Y. This is the skill that allows a veteran quarterback to size up the defense and instantly call a better play.

Figure 1. A model for learning (and teaching)



The educators we worked with in North Melbourne observed all of this when they toured the classrooms of expert teachers with highly engaged and curious students. From these observations came the following “teacher theories of action,” or ways that expert teachers build on the foundational elements of the learning model without departing from it:

- **Creating challenging learning tasks**—dialing in at the proper level of challenge for each student while offering them meaningful choices and cognitive challenge, and ensuring they master subject-specific vocabulary while exploring big ideas.
- **Helping students commit to mastery**—helping students set and chart their own progress toward learning goals while keeping lessons lively and fast-paced with a clear sense of forward momentum linked together into a larger unit narrative.
- **Framing higher-order questions**—mastering the ability to ask questions that prompt students to apply, analyze, evaluate, and synthesize information, while bundling it with other techniques, including “wait time.”
- **Providing motivating feedback**—effectively dissecting data about student progress to provide students with timely, non-evaluative feedback that encourages a growth mindset, reflective learning, positive self-talk, and ownership of learning.
- **Committing to assessment for learning**—mastering frequent checks for understanding

and using data from informal and formal assessments to guide changes to instruction.

- **Encouraging dynamic cooperation**—creating cooperative learning environments and experiences that require students to employ sophisticated levels of thinking and positive interdependence to solve big problems together.

At the core of each theory of action is the assumption that learning grows more powerful (and students grow more curious) when classrooms are no longer teacher-directed and student-experienced, but rather, student-owned and teacher-guided.

Phase 3: Support professional learning and collaboration

How do we change together?

As a Research and Innovation Team, your next task is to determine how to engage teachers in professional learning to achieve your desired outcomes. What supports will your teachers need to adopt new routines with consistency, develop expertise, or create new innovations?

The Curiosity Works approach favors a peer coaching model of professional learning, in which teachers work collaboratively to identify and address problems of practice in their own classrooms or focus on a collaboratively identified schoolwide problem of practice. Hopkins (2016) has defined six principles for peer coaching, as seen in Figure 2.

Figure 2. Principles for peer coaching

PRINCIPLE 1	Peer coaching builds communities of teachers who continuously engage in the study of their craft.
PRINCIPLE 2	Peer coaching partners increase their ability to teach students how to learn and to analyze transactions between teacher and student.
PRINCIPLE 3	Peer coaching provides a safe environment in which to learn and perfect new teaching models, experiment with variations of strategies, teach students new skills, and examine results. <i>(Peer coaching eliminates hierarchical power structures.)</i>
PRINCIPLE 4	In peer coaching, teachers learn from one another as they plan teaching (instruction), develop support materials, watch one another work with students, and think about how their behavior influences students’ learning.
PRINCIPLE 5	The primary function of peer coaching partners is to learn by observing and helping colleagues by providing information about student response. <i>(The purpose of peer coaching is not to give expert advice.)</i>
PRINCIPLE 6	Peer coaching teams are committed to collecting data—they plan: <ul style="list-style-type: none"> • How they will monitor the implementation of new teaching and learning strategies. • How they will determine the impact of each strategy on their students.

Research has found mixed results for teacher coaching, which may lead you to wonder why we advocate for peer coaching as a foundation for professional learning. It's true, not all forms of teacher coaching are effective; thus, it's important to design peer-coaching approaches that follow this advice from research (Goodwin, Cameron, & Hein, 2015):

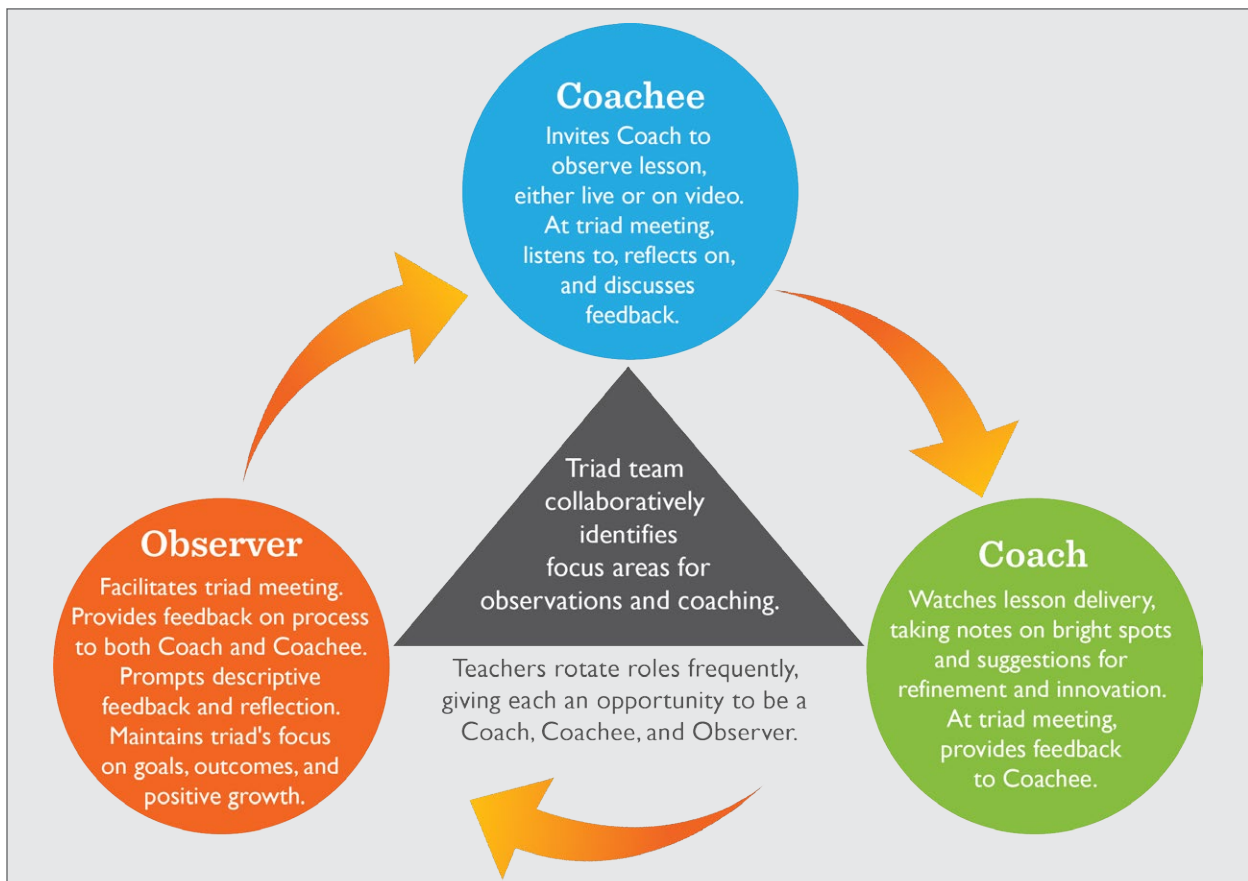
- Coaching should support an agreed-upon, research-based *model* of teaching and learning. Without one, coaching feedback can become idiosyncratic or based on personal preference, and do little to advance consistency or quality in teaching. Moreover, while many schools have *frameworks* for evaluating teachers, such frameworks often fail to illustrate what good teaching actually looks like in a classroom.
- Teachers tend to be “too nice” when giving feedback to one another. Thus, coaching and feedback protocols are needed to encourage teachers to feel safe inviting critical feedback from their peers and for teachers to deliver feedback to their colleagues.

- Coaching can take two forms—*vertical* coaching (an expert giving feedback to a novice) and *lateral* coaching (peers providing feedback to one another). Schools can use both approaches simultaneously—for example, vertical with novice or struggling teachers and lateral with the others. If the overall skills and knowledge of teachers is low, lateral coaching may be less effective initially.

While peer coaching can occur with two or more teachers, we advocate a triad model in which three teachers rotate among three roles: coach, coachee, and observer. Key to the relationship is that all three teachers are involved in determining the focus for coaching and feedback (see Figure 3).

With a clear focus and a theory of action for improvement, teams—ideally, triad peer coaching teams—can own their own learning. At this point, teachers in your school are ready to take responsibility for the work of school improvement.

Figure 3. Teacher peer coaching in a triad model



Phase 4: Develop consistent, deep practice

How can we help others with the difficulties of change?

In 1997, business researchers Ron Heifetz and Donald Laurie identified two key types of change in the life of any organization: technical problems and adaptive challenges. A technical problem is one that can be solved with existing know-how and solutions: people know what to do and just need to do it. For leaders, solving technical problems is basically a management issue: set expectations, provide timelines, give marching orders.

An adaptive challenge, on the other hand, requires solutions that lie outside of current know-how and modes of operating. Thus, addressing an adaptive challenge requires collaboration, creativity, experimentation, and a very different style of leadership.

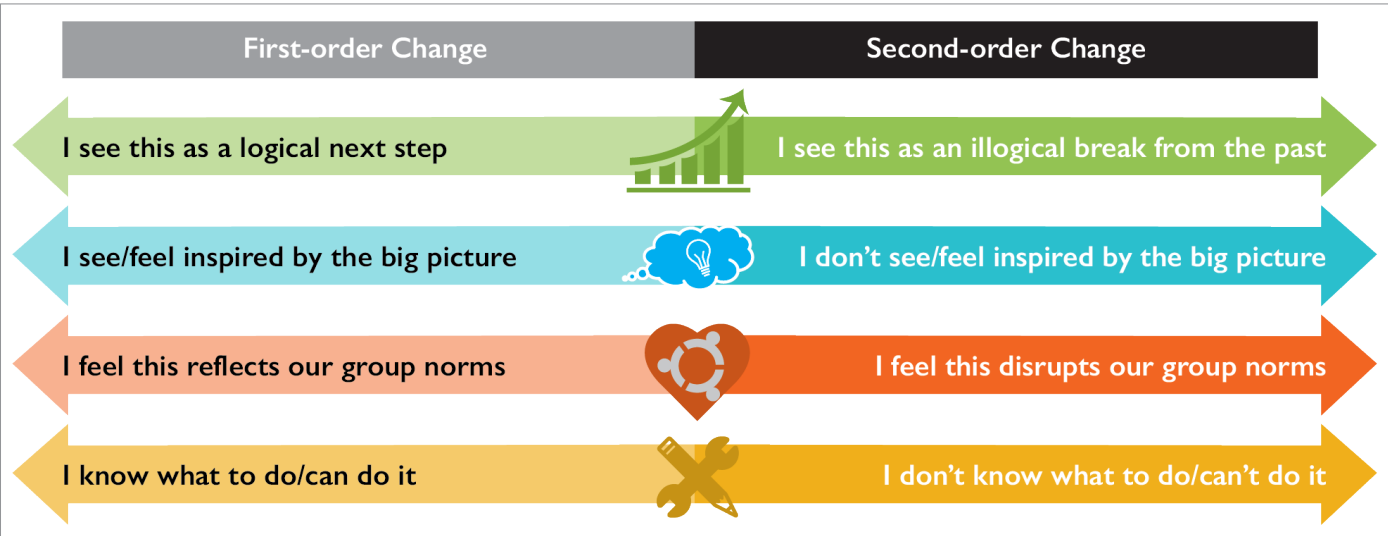
As schools improve and innovate, they encounter both kinds of change, often needing to pivot between them. Early on, schools can make significant gains by addressing technical problems like enacting a curriculum in every classroom, establishing and enforcing behavior expectations, and using a teaching model consistently. Eventually, though, the way forward will become more ambiguous. Many who have studied systems reform efforts worldwide (Fullan, 2001; Hopkins & Craig, 2011; Barber &

Mourshed, 2007) have observed this phenomenon at a large scale: When school systems rely only on technical solutions such as standards, high-stakes testing, and teacher qualifications for improvement, they get early gains which eventually plateau. At this point, many schools and school systems get stuck; they keep trying to apply the technical solutions that worked in the past to what have become adaptive challenges.

Change is always personal. That’s why the same change can be easy for one person yet difficult for another. For example, a straightforward technical solution, like adopting a new technology platform for reporting grades, may cause personal angst for teachers who don’t understand the rationale for the change. Yet those same teachers might find an adaptive challenge, such as adopting inquiry-based learning, exhilarating and professionally rewarding—something they’ve been waiting their whole careers to do. Thus, we must consider both the organizational context of change (technical problem vs. adaptive challenge) and the personal implications for those carrying out the change. Will they embrace it as a straightforward next step (a “first-order” change) or find it poses a significant challenge in their lives (a “second-order” change)?

Because change is personal, some will view a change as first-order and others will see exactly the same change as second-order (Goodwin, Cameron, & Hein, 2015), as illustrated in Figure 4. Resistance can be expected from the second-order camp.

Figure 4. First order and second order change





In our research on school leadership (Goodwin et al., 2015), we also found that when we experience change as second order, we're more likely to view our leaders as being less effective in these four key areas:

- **Input** (supporting shared decision making)
- **Communication** (fostering open dialogue and accessibility to staff)
- **Culture** (promoting group cohesion and personal well-being)
- **Order** (providing and reinforcing clear routines and procedures)

Not surprisingly, these four areas map closely onto the reasons people may resist change:

- When we view change as an *illogical break from the past*, we want to offer **input** into the logic of decision making.
- When we believe a change *conflicts with our ideals*, we seek two-way **communication** and dialogue with our leaders to ensure we share their vision (and they share ours).
- If we feel change *conflicts with group norms*, we sense something amiss with **culture** and desire to restore well-being and group cohesion.
- If we fear we lack the *skills or knowledge* to do what's asked of us, we crave the clarity of re-established routines and **order**.

Pause a moment to reflect on your own experiences with change. Common to all our responses to change, at least initially, is that they are almost always more emotional than intellectual. We must feel that we're competent, we belong in the group, we're involved in decision-making, and we whole-heartedly embrace what we're doing. That's not surprising. As Chip and Dan Heath (2010) note, our logical, conscious thoughts are really just tiny riders atop elephants of unconscious emotion. Our conscious brain likes to think it controls the elephant, and sometimes it does. But mostly, the elephant pretty much goes where it wants to go.

As a result, messages aimed at our "riders" often fail to move our "elephants." To wit: When cardiac bypass patients who are told by surgeons they must change their lifestyle or else they'll wind up back on the operating table (or worse, six feet under), only one in 10 are actually able to do so (Deutschman, 2006).

So we might ask ourselves, if *fear of death* doesn't motivate people to change their behavior, why would fear of being mediocre at work? In addition to the emotional side of change that we all tend to undergo when our status quo is disrupted, the change process requires us to engage in and develop new behaviors that can, at least initially, feel uncomfortable and

awkward. As is often the case with our efforts toward personal change—such as sticking to a diet, getting daily exercise, or quitting smoking—this is where our efforts to improve and innovate are likely to get derailed. It’s much easier to stop doing something than it is to persevere and sustain effort in spite of discomfort and challenge. That’s why it’s important to not only monitor implementation, but also to provide support and encouragement, especially early in the change process.

In *Top Dog: The Science of Winning and Losing* (2013), Bronson and Merryman synthesize numerous studies that show our brains and bodies react quite differently when we experience *threat* conditions. If we fear we’re being judged or watched, our brains slow down our decision making and ability to take action. On high alert to avoid mistakes, we actually make *more* of them. For example, when professional soccer players are kicking to win—that is, giving their team a lead in a shootout—they make 92 percent of their goals, but when kicking not to lose—when they know a missed goal will cost their team the game—they succeed only 62 percent of the time (Jordet & Hartman, 2008).

In contrast, when we have a “challenge orientation,” our brains relax, allowing us to focus less on what might go wrong and more on the task at hand. In sports, athletes play looser and better when playing to win instead of playing not to lose. In academics, anxious C-students become confident A-students. And in organizations, viewing problems as challenges rather than threats can turn risk aversion and anxiety into openness to new ideas, experimentation, and ingenuity.

In many ways, the kind of stress many educators face right now seems to be tantamount to threat conditions, which prevent the kind of creativity and collaboration needed to move beyond reliance on simple solutions and toward the deeper analysis and inventive thinking required to tackle adaptive challenges. Thus, a key takeaway for leaders is to frame any effort not as a threat (“Implement this program or else”) but as a challenge (“Let’s see how many students we can get back on grade level”)—and to provide support that will help teachers successfully implement the change. To do that, it helps to have a purposeful community—one with collective efficacy.

Phase 5: Build a purposeful community

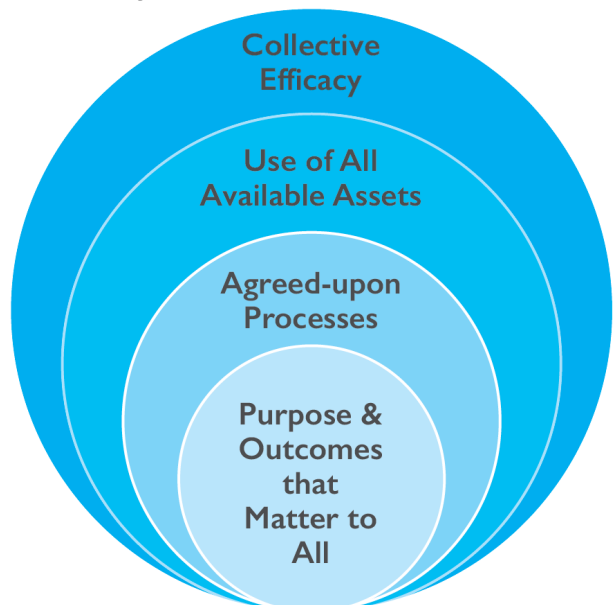
How is our culture of inquiry developing?

Your RIT’s goal in Phase 5 is to measure your progress in building a culture of collaborative inquiry that results in greater outcomes for all students.

Perhaps you’ve heard the maxim, “Culture eats strategy for breakfast”—possibly coined by management guru Peter Drucker, but uttered more famously by former Ford Motors CEO Mark Fields—used to emphasize the central role that an organization’s culture plays in the success of any effort to improve or innovate. Although well-developed strategic plans provide a roadmap for improvement, it is the culture of a system that either moves innovation forward or hinders its progress. Building and sustaining a high-performance culture is one of the chief responsibilities of leaders and leadership teams.

Through the preceding phases, you have provided your school’s teachers with the support and encouragement needed to alleviate individual concerns and strengthen professional practice, helping to build a common sense of hope and belief that you can make a difference for students. In short, you have begun to grow a purposeful community, “one with the collective efficacy and capability to

Figure 5. Characteristics of a purposeful community



develop and use assets to accomplish goals that matter to all community members through agreed-upon processes” (Marzano, Waters, & McNulty, 2005, p. 99).

Starting with the core of the graphic in Figure 5, you should have a good sense of how the purpose, values, and vision you clarified earlier have resonated and captured the hearts of your staff. Are you hearing them talk about their work with reinvigorated interest and energy? Have you walked into the teachers’ lounge to hear staff asking questions about their work and sharing their experiences with others?

Moving out one ring to “agreed-upon processes,” how are you doing with implementing peer coaching? Are teachers becoming more comfortable in opening their classrooms to peer observers? Are they consistently applying rapid cycles of improvement and innovation to the study of their professional practice?

To explore how well you’ve been using all available assets, you might return to your school’s bright spots. The conditions, or assets, that support these bright spots can often be leveraged to strengthen and move implementation forward. Thinking about your area of focus, which of these assets are key to its success? What other assets—both tangible and intangible—are supporting your teacher teams in deepening their professional inquiry?

The fourth component of a purposeful community, collective efficacy, has the potential to be a game changer. Research has found collective efficacy—the belief that we, as a whole, can behave in ways needed to have a positive impact on student outcomes—to be a strong predictor of student achievement (Bandura, 1993; Goddard et al., 2000, 2004, 2007), even when accounting for differences in student background and prior achievement. That is, a faculty of teachers with a strong sense of collective efficacy is more likely to produce positive student outcomes than a faculty without these shared beliefs (Goddard et al., 2015).

Finally, it’s important to note that while you and your RIT must work on building a positive school

culture and climate, this is not done in isolation from the real work of improvement: improving teaching and learning, and supporting student success. In other words, a great school culture will get you nowhere if no one knows where you’re going or what role each member of the school community plays to get there.

Enjoy your journey—and send us a postcard!

We hope these ideas serve as starting points and mileposts for your journey. Change is often a messy process, and it can feel at times like you’re taking two steps forward and one step back. The important thing is that you keep moving.

Leadership is a journey, too. We encourage you to work with other leaders in your school or a network of leaders from outside your school who will challenge your thinking, inspire you with new ideas, and help you hold yourself accountable for becoming the best leader you can be.

Finally, as members of a profession, we remind you to share with others beyond your own school and system. Share your journey of improvement and innovation by presenting at conferences, writing articles for journals, and networking with schools in other districts in your region. We’d also love to know how you’re doing. Tell us where you’ve experienced challenges and successes, and what you’ve learned along the way. We’ll be energized to hear your story, so please keep in touch by sending us some “postcards” of your journey. ●

Reach the author, other experts at
McREL, and fellow educators around
the world who are exploring the power
of curiosity just like you are:

info@mcrel.org

800.858.6830

Twitter: @McREL

mcrel.org/curiosityworks

References

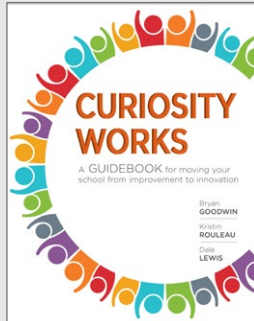
- Bandura, A. (1977). Self-efficacy: Toward a unifying theory of behavioral change. *Psychological Review*, 84, 191–215.
- Bandura, A. (1986). *Social foundations of thought and action: A social cognitive theory*. Englewood Cliffs, NJ: Prentice Hall.
- Bandura, A. (1993). Perceived Self-Efficacy in Cognitive Development and Functioning.” *Educational Psychologist*, 28, 117–48.
- Bandura, A. (1997). *Self-efficacy: The exercise of control*. New York: Freeman.
- Barber, M., & Mourshed, M. (2007). *How the world’s best-performing school systems come out on top*. London: McKinsey and Company.
- Bronson, P., & Merryman, A. (2013). *Top dog: The science of winning and losing*. New York: Twelve.
- City, E. A., Elmore, R. F., Fiarman, S. E., & Teitel, L. (2009). *Instructional rounds in education: A network approach to improving teaching and learning*. Cambridge, MA: Harvard Education Press.
- Dean, C. B., Hubbell, E. R., Pitler, H., & Stone, B. (2012). *Classroom instruction that works* (2d ed.). Denver, CO: McREL.
- Deutschman, A. (2006). *Change or die: Three keys to change at work and in life*. New York: HarperBusiness.
- Fullan, M. (2001). *Leading in a culture of change*. San Francisco: Jossey-Bass.
- Goddard, R. D., Goddard, Y. L., Kim, E. S., & Miller, R. (2015). A theoretical and empirical analysis of the roles of instructional leadership, teacher collaboration, and collective efficacy beliefs in support of student learning. *American Journal of Education*, 121(4), 501–530.
- Goddard, R. D., Hoy, W. K., & Hoy, A. W. (2000). Collective teacher efficacy: Its meaning, measure, and effect on student achievement. *American Education Research Journal*, 37(2), 479–507.
- Goddard, R. D., LoGerfo, L., & Hoy, W. K. (2004). High school accountability: The role of collective efficacy. *Educational Policy*, 18(3), 403–25.
- Goddard, Y. L., Goddard, R. D., & Tschannen-Moran, M. (2007). A theoretical and empirical investigation of teacher collaboration for school improvement and student achievement in public elementary schools. *Teachers College Record*, 109(4), 877–96.
- Goodwin, B. (2013). *Simply Better*. Denver, CO: McREL.
- Goodwin, B., Cameron, G., & Hein, H. (2015). *Balanced leadership for powerful learning: Tools for achieving success in your school*. Alexandria, VA: ASCD
- Heath, C., & Heath, D. (2010). *Switch: How to change things when change is hard*. New York: Crown Business.
- Heifetz, R. A., & Laurie, D. L. (1997). The work of leadership. *Harvard Business Review*, 75(1), 124–134.
- Hopkins, D. (2016). *Models of practice*. Denver, CO: McREL International.
- Hopkins, D. & Craig, W. (2011). Going deeper: From the inside out. In D. Hopkins, J. Munro, & W. Craig (Eds.), *Powerful learning: A strategy for systemic educational improvement*, 153–172. Camberwell, Australia: Australian Council for Educational Research Press.
- Jordet, G., & Hartman, E. (2008). Avoidance motivation and choking under pressure in soccer penalty shootouts. *Journal of Sport & Exercise Psychology*, 30(4), 450–457.
- Kashdan, T., & Roberts, J. (2004). Trait and state curiosity in the genesis of intimacy: Differentiation from related constructs. *Journal of Social and Clinical Psychology* 23(6):792-816.
- Kashdan, T., & Steger, M. (2007). *Curiosity and pathways to well-being and meaning in life: Traits, states, and everyday behaviors*. *Motivation and Emotion* 31(3), 159–173.
- Lencioni, P. (2002, July). Make your values mean something. *Harvard Business Review*. Retrieved from <https://hbr.org/2002/07/make-your-values-mean-something>
- Marzano, R. J., Waters, T., & McNulty, B. (2005). *School leadership that works: From research to results*. Alexandria, VA: Association for Supervision and Curriculum Development.
- Newell, A. & Simon, H. A. (1972). *Human Problem Solving*. Englewood Cliffs, NJ: Prentice-Hall.
- Reio, T. G., & Wiswell, A. (2000). Field investigation of the relationship among adult curiosity, workplace learning, and job performance. *Human Resource Development Quarterly*, 11(1) 5–30.
- Seligman, M. (1990). *Learned optimism: How to change your mind and your life*. New York: Vintage Books.
- Yosso, T. J. (2005). Whose culture has capital? A critical race theory discussion of community cultural wealth. *Race, Ethnicity and Education*, 8(1), 69–91.

Curiosity Works™ —powered by McREL

With the advent of our Curiosity Works approach to school improvement and innovation, now is the perfect time to learn how curiosity leads students, teachers, and entire schools to push past what they thought were their performance plateaus. Curiosity Works incorporates everything McREL has learned in decades of school improvement work—including our widely used What Matters Most framework—and adds exciting new practical guidance to bring curiosity alive in classrooms and leadership initiatives.

Suggested reading from McREL

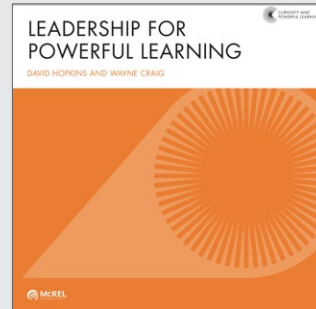
Available at store.mcrel.org



Curiosity Works: A Guidebook for Moving Your School from Improvement to Innovation

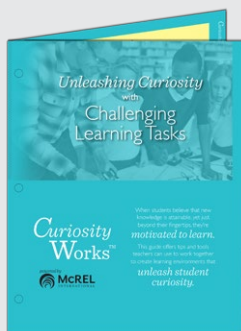
Our forthcoming guidebook expands on the themes in this white paper, adding more than a dozen tools to help teachers and school leaders harness the power of curiosity right away.

Available soon!



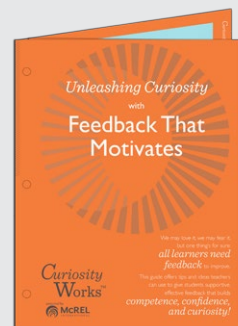
Leadership for Powerful Learning

Guided by the moral purpose of creating and maintaining excellent schools that support student learning, this manual describes specific strategies necessary to make lasting changes that boost curiosity and lead to excellence in the classroom.



Unleashing Curiosity with Challenging Learning Tasks

When students believe that new knowledge is attainable, yet just beyond their reach, they're motivated to learn. This guide offers tips and tools teachers can use to create learning environments that unleash student curiosity.



Unleashing Curiosity with Motivating Feedback

We may love it, we may fear it, but one thing's for sure: We all need feedback to improve. Here's a guide to help you, your colleagues, and your students embrace supportive feedback that builds competence, confidence, and curiosity!

For more information about our consulting services, PD and training options, and customized solutions for systemic planning and leadership development, contact us today at 800.858.6830 or info@mcrel.org, or visit mcrel.org/contact.



4601 DTC Blvd., Suite 500, Denver, CO 80237-2596
Phone: 800.858.6830 • Fax: 303.337.3005 • www.mcrel.org