

CHANGING *schools*

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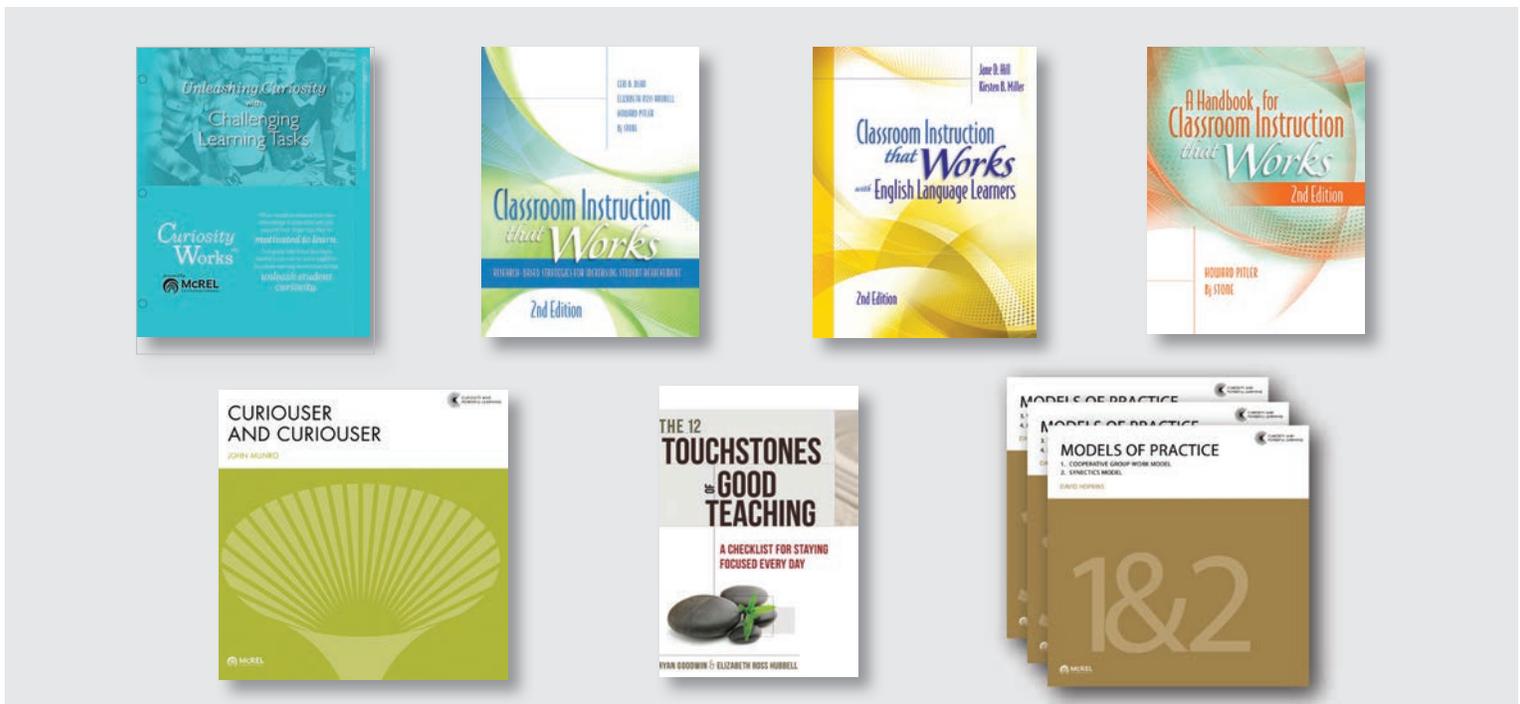
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In this issue

The power of curiosity

Curiosity works. It engages students in the classroom, prompting questions about why and how things are, and if they can be changed. Teachers who can spark curiosity with intriguing lesson hooks can then fan that flame of learning, guiding students to explore possibilities, find answers, and make valuable connections that deepen and extend their newfound knowledge.

Curiosity also works with adults. It engages teachers and leaders in their own professional practices, prompting self- and team-reflection on why, how, and when certain strategies work with different students. When encouraged by school culture and practices, curiosity can drive us to find out how a colleague down the hall (or across the country) delivers lessons and connects with students and families. It can also prime us for being open to new ideas—discussing them, testing them, analyzing results, and trying again—helping us develop our professional expertise.

McREL is curious about curiosity. We think it has potential to reframe conversations about teaching, leading, and school improvement and innovation initiatives. Our curiosity has driven us to talk to educators in the U.S., Australia, and England about how they nurture students' innate curiosity, connect it to learning objectives, and keep their own professional curiosity thriving as well. We're looking at the research on the relationship between curiosity and learning, and to longer-term outcomes that reach far beyond the classroom.

One thing we've learned thus far: Curiosity isn't a program. It's not something you can acquire through a single product or a workshop or a curriculum with a step-by-step set of protocols and measures. Rather, it's a goal we can all pursue by making subtle yet thoughtfully crafted changes to the way we're delivering instruction, collaborating with colleagues, and leading our school communities. As one of our colleagues puts it, it's about *precision*, not *prescription*.

In this issue of *Changing Schools* we're sharing some of what we've learned so far. And as you read this, we're developing additional resources to help educators tap into the power of curiosity to forge powerful learning. Under the "Curiosity Works" brand, we'll publish books and guides in the coming months to help you spark and fan curiosity in your school community. Look for these resources in our online bookstore: store.mcrel.org.

We hope you enjoy the issue.



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Curiosity in the classroom: Using inquiry-based learning to harness student curiosity and impact outcomes

By Kirsten Miller



As we watch toddlers or preschoolers exploring the world, it's easy to see that curiosity is innate. Children, particularly young children, are *busy*—learning about themselves and their environments, and constructing meaning and understanding from what they discover. Of course, as parents and educators, it's necessary for us to place some limits on them—for example, to keep them from burning their hands on a hot stove, or to help them maintain order and stay on task within an elementary school classroom.

But within the confines of the classroom, have we somehow lost the power of curiosity? And, if so, how can we deliberately foster student curiosity to impact student motivation, learning, and ultimately, outcomes?

What the research says

Curiosity can be fairly simply defined as “an intrinsic desire to acquire new knowledge” (Eren & Coskun, 2016, p. 575), but knowing how to encourage it gets a little more complicated, particularly since curiosity is not always—or even often—explicitly prioritized in schools. As Engel (2015) discovered in her research on curiosity, while teachers may recognize its importance, they don't always “have curiosity on the brain” (p. 103). In a survey of 114 teachers, Engel asked teachers to list five skills or characteristics they hoped to develop in their students during the upcoming school year—first, by coming up with their own, and later in the survey, by circling their top five priorities on a list of 10 provided attributes. Only 23 of the 114 teachers *listed* “curiosity” as a priority when asked to provide

their own answers, but a full 77 percent *circled* “curiosity” as one of their top five priorities when it was provided as an option on a list. Engel suggests that, while teachers are at least peripherally aware that curiosity is important and warrants attention in the classroom, there are impediments to fostering it—primarily, the “scripts” and structures that guide each day, along with the need to accomplish a specific series of tasks (Engel, 2015).

Although the research on student curiosity and its impact on student performance continues to emerge, existing literature does suggest a positive relationship between student curiosity, cognitive ability, and achievement. In a study of 103 third- and fifth-grade students from four schools in Connecticut, for example, Alberti and Witryol (2001) found a positive correlation between curiosity, as measured through a short-term novelty preference task, and the Stanford Achievement Test (for third graders) and the Comprehensive Test of Basic Skills (for fifth graders). Similarly, a study of students'

levels of boredom, boredom coping strategies, curiosity, and performance found that higher levels of curiosity mitigated boredom and contributed to graded performance (Eren & Coskun, 2016). Additionally, student curiosity is intrinsically linked to student engagement, as Skinner and Belmont (1993) note:

“[Students] who are engaged . . . select tasks at the border of their competencies, initiate action when given the opportunity, and exert intense effort and concentration in the implementation of learning tasks; they show generally positive emotions during ongoing action, including enthusiasm, optimism, curiosity, and interest.” (p. 572)

But how can teachers explicitly encourage student curiosity while still attending to the myriad responsibilities they face each day? The research suggests that inquiry-based learning, which can be incorporated into existing curricula without much disruption to classroom policies and structures, may be one way to spark student curiosity.

Although the research on student curiosity and its impact on student performance continues to emerge, existing literature does suggest a positive relationship between student curiosity, cognitive ability, and achievement.

How inquiry-based learning taps into student curiosity

If you’ve ever seen a student nod off during algebra class but come alive when discussing current events or music or art, you know that often, it’s not that students aren’t curious; it’s that they’re not necessarily curious about the subject matter—or at least, we haven’t yet tapped into what exactly about the subject matter might interest them. Curiosity changes as we age and as the world becomes more familiar—in other words, once students understand the big picture, they become more curious about the details that make up the big picture (Engel, 2015).

At its core, inquiry-based instruction turns students into investigators, rather than passive recipients of information. Often—even usually—this work is conducted collaboratively. Harvey and Daniels, for example, developed a four-stage Small-Group Inquiry Model:

1. Immerse: Invite curiosity, build background, find topics, and wonder.
2. Investigate: Develop questions, search for information, and discover answers.

3. Coalesce: Intensify research, synthesize information, and build knowledge.
4. Go public: Share learning, demonstrate understanding, and take action. (Harvey & Daniels, 2015, pp. 81–82)

The inquiry approach differs from a traditional “coverage” approach in some fundamental ways, “[building] teaching around kids’ genuine curiosity, connecting official curricular topics to their search for answers” (Harvey & Daniels, 2015, p. 69). For example, the inquiry approach is question-driven rather than curriculum-driven; the teacher acts as a model and coach rather than an expert and presenter; students are knowledge creators, rather than information receivers; and students collaborate with others and think strategically, rather than working alone and memorizing content (Harvey & Daniels, 2015). This work takes place in *inquiry circles*, which focus on authentic topics that are directly linked to students’ curiosity (Harvey & Daniels, p. 16). Harvey and Daniels recommend four types of inquiry circle: mini-inquiries, in which students quickly address a pressing question; curricular inquiries, which are linked directly to the curriculum; literature circle inquiries, which are research projects aligned to the books that students are reading; and open inquiries, where students investigate their own interests (which teachers can then backmap to the curriculum). These inquiry circles are student- and peer-led, use multiple sources and research strategies to address the issue at hand, and are focused on using the knowledge gained, rather than simply passively receiving it (Harvey & Daniels, 2015).

Longo (2016) recommends using multiple modes of instruction in inquiry-based learning, including guided inquiry, where teachers facilitate and students lead conversations and develop conclusions; flipping lessons, which has the potential to foster curiosity and engagement by encouraging critical thinking; and online inquiry, which encourages the development of research skills and can also include online collaboration.

At its core, inquiry-based instruction turns students into investigators, rather than passive recipients of information.

While a structured approach, such as Harvey and Daniels’ model, or multiple modes of instruction, as Longo recommends, are some ways to foster student curiosity in the classroom, the shift to inquiry-based instruction doesn’t have to happen all at once. There are other, smaller steps that teachers can integrate into existing curricula to foster student curiosity, all revolving around the core notion that curiosity is the gateway to student learning. For example, teachers might encourage

students to explore related questions across disciplines, and rather than answering a direct question—let’s say, “Why do birds fly south for the winter?” or “Why don’t *all* birds fly south for the winter?”—with an equally direct answer, a teacher might respond, “Let’s find out.” In this case, there are a number of explanations—including the position of the sun and corresponding weather patterns, the type of food particular birds eat, and so on. And when students embark on a journey to find the answers, more questions are likely to arise, which both affirms and feeds the cycle. In that sense, encouraging curiosity may just come down to encouraging questioning—and to finding the answers together. ●



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Peer coaching that works

The power of reflection and feedback in teacher triad teams

By Robin Jarvis, Kathleen Dempsey, Grace Gutierrez, Dale Lewis, Kris Rouleau, and Bj Stone



New White Paper

Peer Coaching That Works:
*The power of reflection and feedback
in teacher triad teams*

Teachers are surrounded by the greatest professional development resource ever created: other teachers. So, doesn’t it make sense to team up for mutual support and growth? In our new white paper, we describe the research that supports peer coaching and we lay out the components of an effective coaching triad—with participants taking turns coaching, being coached, and observing. While school leadership can promote an environment that values and encourages trusting working relationships, the authors propose that the real work of coaching needs to be planned and executed by teachers themselves.

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Curiosity: An essential ingredient for teachers

By Bryan Goodwin

What if I told you the key to success in the classroom came down to a single word? The word is *curiosity* (for those of you thinking *skepticism*, hear me out). Lately, we here at McREL have come to view curiosity as a useful way to tie together everything teachers and students need to succeed.

The power of curiosity as an organizing principle is that it implies movement, excitement, growth, striving—a classroom and a community where inquiry and improvement never cease. It's the opposite of what causes teachers and students to fail: boredom, discouragement, lack of purpose. It's true that a certain amount of information can be transmitted without curiosity, but in that model, stagnation seems inevitable. With curiosity as your teaching companion, by contrast, *everything* is possible.

It's probably easy enough to see how curiosity benefits students, and the other lead article in this issue, by my colleague Kirsten Miller, explores how to harness curiosity to inspire students to take charge of their own learning journey.

But curiosity for teachers? What good will that do? After all, the prevailing wisdom seems to be (supposedly based on research) that within a few years of entering classrooms, teachers are as good as they'll ever be—so what good is it for teachers to ask

a bunch of questions? Some might fear that will just lead to a lot of unproductive navel gazing, hands-on-hip questioning, or even outright resistance along the lines of: *All you really need to be a good teacher is to be smart and hardworking.*

Good riddance to a myth

First, let's start by debunking the widespread misperception that teachers rapidly lose interest in getting better.

We've probably all heard that according to research, teachers hit a performance plateau 3–5 years after entering the profession and then pretty much stay at the same level until retirement (e.g., Rivkin, Hanushek, & Kain, 2005; Boyd et al., 2007). Well, as it turns out, newer, more sophisticated studies are now showing that the assumption of a rapid peak after 3–5 years was based on crude, point-in-time assessments. Absent from these studies were such factors as ineffective teachers washing out, effective ones getting promoted to leadership

positions, or more-advantaged students getting placed with more-experienced teachers to begin with (Clotfelter, Ladd, & Vigdor, 2006). We are now learning that teachers do, *on average*, continue to improve the longer they stay in the classroom. The gains may not happen at the same clip as when they first entered the profession, but they do continue to happen (Harris & Sass, 2011; Papay & Kraft, 2015). Sure, some teachers run in place most of their careers—teaching one year, 30 times over, as the wisecracking adage goes. And many flee the profession early on. Yet for those who stay, most keep improving. The question then becomes, what do teachers who keep getting better do that others don't?

In other words, how do they move from being novices . . . to experts?

Researchers have for years tracked people as they move toward expertise in a variety of endeavors. They've identified some consistent patterns, or phases, of talent development. It's likely you've experienced these phases in one form or another yourself.

Curiosity and expertise

Consider a hobby or activity you do particularly well. What steps did you take to get there? Benjamin Bloom (1985) asked that question of 120 individuals who had grown their talents to become concert pianists, sculptors, Olympic swimmers, world-class tennis players, research mathematicians, and research neurologists. He found that their stories were remarkably consistent and thus offered a sort of cartography for talent development.

Bloom's experts often described the early years as a time of play, exploration, and fun as they learned the fundamentals. Building on the earlier work of Alfred North Whitehead (1929), Bloom labelled this the "romance" phase. During this phase, the experts recalled having positive experiences with warm, nurturing teachers and coaches, who instilled passion and helped them fall in love with their field.

As teachers, we are no different. Early on, we need plenty of positive experiences to develop a passion for teaching: perhaps a dynamic teacher becomes a role model, we fall in love with a content area, or we become captivated by sparking students' "aha" moments. If we are to continue to grow in our expertise, this early exuberance must yield to a more disciplined and difficult period of training, during which we move beyond the fundamentals. In many fields, this phase requires a good deal of mimicry (Coyle, 2009)—copying the Dutch masters, watching slo-mo videos of Serena Williams, or trying to channel Walter Gieseking playing "Clair de Lune." This phase isn't so much fun, but those who have "bought in" to the field don't begrudge the hours of practice. Rather, they intrinsically want to get better and invite candid feedback.

It's also precisely at this point, notes K. Anders Ericsson (2007), who has spent decades researching how people develop

expertise, that many people stop improving. They get stuck. Further honing our skills requires continued mental effort, or what Nobel-winning cognitive scientist Daniel Kahneman (2011) calls *effortful thinking*, which itself causes "cognitive strain." As Kahneman explains it, our brains essentially have two operating systems: a *fast-thinking* brain, which operates quickly and automatically with little thought (allowing you to read the words in this sentence) and a *slow-thinking* brain, which requires sustained attention (allowing you to *comprehend* this sentence). Our slow-thinking brain is generally in charge, but it's lazy—most comfortable in "low-effort mode." Therein lies the challenge with developing expertise. It requires continual reflection and *effortful thinking* to hone our skills—to resist our slow-thinking brain's urge to revert to low-effort mode.

In other words, developing expertise requires maintaining professional curiosity—constantly asking ourselves questions about what's working, what's not, and what we can do to improve.

Therein lies the challenge with developing expertise. It requires continual reflection and *effortful thinking* to hone our skills—to resist our slow-thinking brain's urge to revert to low-effort mode.

Curiosity, creativity, and collaboration

As teachers, we start with many tasks to master that initially feel mechanical and absorb most of our mental bandwidth, leaving little space for creativity. For those first couple years of teaching, it's all we can do to plan lessons, manage classroom behavior without losing our cool, keep a gradebook, respond to administration requests, and figure out how to eat lunch in 12 minutes. But after a year or two, we begin to internalize the natural flow of our lessons. We can "feel" when it's time to pause direct instruction and let students process what they're learning. We become adept at checking for our students' understanding. We start to find our classroom persona. And we learn the actions to take to guide disruptive students toward more productive behaviors. As everything gets easier, our brains beg us to take it easy, to enjoy the fruits of our cognitive labor and slide into low-effort mode.

Resist! Moving beyond mimicry and mastery of routines requires a whole new phase of learning. Ericsson notes that what experts do that others do not is engage in *deliberate practice* (Ericsson, Prietula, & Cokely, 2007). Instead of enjoying the fruits of their mental labors, they keep stretching themselves to engage in ever more learning and re-learning. Just as we start feeling competent, we must start over, burdening ourselves with the cognitive load of mastering new techniques all over again. Trying to do so without curiosity

would be a non-starter. Keeping our slow-thinking brains amped up to high-effort mode and teaching ourselves new tricks—keeping our curiosity engaged—is difficult, yet it’s what separates average from expert.

Creativity often boils down to knowing the rules so well that we see when and how to break them effectively. Great teachers operate in this zone; they develop new and innovative ways to help students learn. Some flip what’s normally done in class with independent learning for students. Others set aside the textbook and instead help students consult primary sources to write their own accounts of historical events or engage in rigorous, natural studies of local biomes. This degree of personalized learning is curiosity in action, and it’s the pinnacle of teaching—when we realize that our job as teachers isn’t necessarily to *teach* students, but to make learning happen for them.

Curiosity shouldn’t be a solo pursuit, though. If it is, it can lead to unproductive navel gazing: *I think I’m a better teacher, therefore I am*. Rather, to motivate real professional growth, curiosity should be a shared pursuit, with teachers asking one another how, together, they can approach tasks and challenges, share expertise with one another, remain open-minded to learning new strategies, seek feedback. What that adds up to is shared *professional curiosity*.

Creativity often boils down to knowing the rules so well that we see when and how to break them effectively. Great teachers operate in this zone; they develop new and innovative ways to help students learn.

With all this in mind, it’s perhaps not surprising that studies have found that curious people also have better on-the-job performance (Reio & Wiswell, 2000). Perhaps more importantly, curious people also experience greater life satisfaction and well-being (Kashdan & Steger, 2007), so much so that Todd Kashdan, who has devoted his career to studying curiosity and happiness, has concluded that the key to being happy isn’t to seek *happiness* but rather curiosity (Malcom, 2013). People who fixate on being happy, experience less of it; meanwhile, people who embrace uncertainty with curiosity (and a bit of confidence that they can find answers to their questions), experience greater happiness and life satisfaction. It seems that as human beings, we’re hard-wired to wonder about the world around us and seek what’s over the next horizon.

So, with that in mind, let me pique *your* curiosity. What’s your most burning professional question right now? If you’re a teacher, perhaps it’s students who are struggling or whom

you cannot reach. Or if you’re a school leader, perhaps it’s teachers who seem stuck or *incurious*. You could choose to begrudge these challenges as a thorn in your side. Or you could choose to be *curious* about them, seeing them as riddles to unravel and opportunities to improve your professional practice. As it turns out, that simple shift in perspective is the key to professional curiosity—and a more fulfilling way to approach our jobs and lives.

Enjoy it. ●



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Does your school have a guaranteed and viable curriculum? How would you know?

By Kathleen Dempsey

A few months ago, we began working with a new principal who was in the process of getting to know her school. She knew that students came to school ready to learn, teachers were prepared to teach, and families were supportive of their school.

The school was a welcoming place that served as a focus for community activities. But despite these positive supports, she explained, students were not meeting learning expectations. Academic progress in both English language arts and mathematics was below the state average, and she was concerned that families might soon lose confidence in the school's ability to prepare students for the next level of learning.

During our consultation with this principal, we asked her if she knew whether the school has a guaranteed and viable curriculum (GVC). She wasn't sure how to answer, so she responded with a question: "How would I know if the school has a guaranteed and viable curriculum?"

To determine whether a school has a GVC, we must first describe it. A "guaranteed" curriculum is often defined as a mechanism through which all students have an equal opportunity (time and access) to learn rigorous content. This requires a school-wide (or district-wide) agreement and common understanding of the essential content that all students need to know, understand, and be able to do. The word "all" needs emphasis; a guaranteed curriculum promotes equity, giving all children equal opportunity to learn essential content, and to provide this opportunity, curricular materials and instructional approaches must be grounded in research, implemented with fidelity, and must include vertical as well as horizontal alignment. Curriculum development is often regarded as a district function. However, schools (through teachers) implement the curriculum, and, if implementation varies significantly from teacher to teacher, then student outcomes will also likely vary significantly from classroom to classroom. These days, teachers have access to a variety of curriculum resources, such as open educational resources, playlists, digital textbooks, and teacher-developed curriculum. Having access to options is a good thing, but having many choices does not ensure all choices are well aligned to the school's GVC.

For a curriculum to be "viable," there must be adequate time for teachers to teach the content and for students to learn the content. A viable curriculum eliminates the supplementary

or "nice to know" content. Does this mean that a GVC is a scripted, rigid curriculum? No! Does this mean that students and teachers are confined to a lockstep process of teaching and learning? Absolutely not! Teachers must have the flexibility to meet student needs through different methods of content delivery, helping students dive deeper into their passions. At its essence, a GVC represents the core non-negotiables of student learning. It's what schools and teachers commit to providing for all students.

To help school leaders and leadership teams self-assess the "guaranteed and viable" status of their curriculum, my colleagues and I developed the following questions that can be used by any school:

1. Does our school have an agreement and common understanding of the essential content that all of our students need to know, understand, and be able to do?
2. Are performance criteria established and communicated to all of our stakeholders?
3. Does our school have a process for monitoring implementation of the GVC?
4. Does our school have structures that provide ongoing support to our teachers and school leaders for implementing the curriculum with fidelity?

Establishing and maintaining a GVC is a collegial process that requires established protocols and routines to keep the GVC agreement alive and meaningful to all stakeholders. It requires open dialogue about learning activities, performance criteria, and student progress as well as the willingness of all stakeholders to reflect on their contributions to the process. ●



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A GVC requires a collegial process to keep it alive and meaningful to stakeholders.
Consider these questions to assess the status of your GVC:



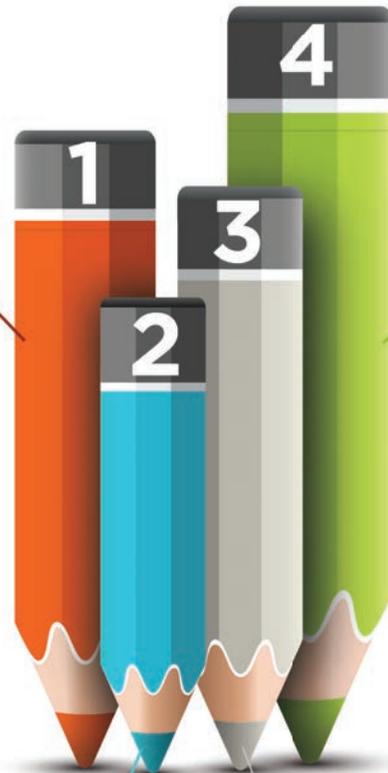
Does our school have an *agreement* and *common understanding* of the essential content all students must know, understand, and be able to do?

- Collegial teams analyze essential content to ensure consistent interpretation among teachers.
- Common written resources (e.g., scope & sequence charts, clear learning targets, aligned assessments) guide instruction.
- Lesson activities are aligned with the content and cognitive demand of learning targets and support the needs of diverse learners.



Does our school have structures that provide *ongoing support* to our teachers and school leaders for implementing the GVC?

- Regular time for collaborative planning is scheduled.
- Tools such as innovation configuration maps clarify implementation levels.
- Flexible schedules offer opportunities for reinforcement and extension.



Are *performance criteria* established and communicated to all stakeholders?

- Teachers agree on performance criteria and apply them with consistency.
- Tools (e.g., learning guides, rubrics) clearly communicate performance expectations.
- Students track their own progress toward learning targets using established criteria.



Does our school have a *process for monitoring implementation* of the GVC?

- Collegial review of student progress informs next-step planning.
- Teachers provide input on strengths/challenges of the GVC.
- Teacher input is used to improve the quality/usability of the GVC.



Why develop a GVC?

A GVC represents the core non-negotiables of student learning.
It's what schools and teachers commit to providing for every student.



Why teacher curiosity is essential to whole-school improvement

By Tonia Gibson

Countless times throughout my career as a teacher and school leader, I've paused to reflect and ask myself a question related to the work at hand. *Why did I plan this lesson? Why aren't some students making any progress? What is that team doing that's leading to such great results?*

Most educators are accustomed to pausing and reflecting on what they're doing. Similarly, our youngest students ask many more questions over the course of a day than do their high school counterparts. At times, the questions might seem endless. *Why does the sun hurt my eyes? Why do we learn math? What will happen if I put these wooden blocks in water?* You've probably noticed, however, that this innate curiosity often tapers off as children grow older.

Curiosity is contagious. If I want others to be curious, I must, myself, demonstrate curiosity. I read widely and often engage in conversations with people from diverse backgrounds to gain insight into their beliefs about our world. Since my recent move from Australia to the U.S., I've connected with people—both inside and outside of education—to learn more about a concept, policy, or even the purpose of an activity or task that was foreign to me.

These conversations have been incredibly enlightening, but they've also further highlighted for me how important being curious is to learning and improvement, no matter where you are on your path of lifelong learning. Our roles as educators and school leaders require us to continually nurture student curiosity, and also to revive teacher curiosity about their own everyday work.

As a classroom teacher, I encouraged students to ask questions related to our topic, using their musings as a springboard for

our learning. Student curiosity was a catalyst for learning engagement. When I became an assistant principal, I continued this practice and encouraged teachers to ask questions and search for answers. *Why were we using a certain program or textbook? What does this data actually tell us? What is that team doing that produces such great classroom engagement?* After a short time, our teachers began to ask deeper questions, specifically about student learning and growth. Their initial curiosity led them to more closely examine the academic performance of students in grade levels, cohorts, and as individuals, and they wanted to know what teaching practices led to the best outcomes for students.

Together, we reviewed our existing professional learning community structure to establish three professional learning teams, each with its own focus. These teams met 8–10 times per school year to discuss and analyze a range of data collected from across the school, using the teachers' questions to focus on student achievement in literacy and numeracy and to investigate the effectiveness of our school-based supports for student well-being and engagement. Membership on the teams was strategically engineered by our teachers to ensure that each grade level was represented and that each team included at least one specialist teacher.

Reflecting on our data, the teams highlighted practices that they believed led to positive results. With guidance, they read

and compared research on the practices that showed evidence of improving student outcomes. At the end of the school year, the teams referred to their research and findings to recommend future teacher practices and whole-school goals for the next school year, engaging teachers in a process of continuous improvement to affect student learning.

Our schoolwide peer observation program also sprang from teacher curiosity. It began with ongoing classroom walkthroughs and observations conducted by our school principal, our two lead teachers, and me. Periodically, at our whole staff briefing, we shared our observations, highlighting bright spots that illustrated how high-quality teacher practices demonstrably influenced student achievement. Our teachers became increasingly curious about what their fellow teachers were doing that resulted in growth for their students. Most of our staff asked if they, too, could participate in classroom observations to learn from their colleagues. We prioritized funding to develop a whole-school program for peer observations, focusing on building the capacities of every teacher using a research-based method for observation and feedback. Over time, we observed high-quality practices becoming shared practices, reducing variability and increasing student achievement levels across the school.

The ability to stimulate curiosity so that it creates more curiosity, in a virtuous circle, also played a central role in a major teacher development project while I was an assistant principal. My principal and I were enthusiastic about a regional initiative to introduce the Curiosity and Powerful Learning framework, but fearful that teachers would reject it as an annoying mandate from downtown before giving it a chance. So, using techniques that we had learned from the framework itself, we designed our own, year-long confidence-building campaign that effectively transferred decision-making power from the suits to the staff. That led us all to precisely where we wanted to be: a foundation of collegiality and collaboration among district leaders, school leaders, and teachers.

By embracing our teachers' professional curiosity about effective practice, we created sustainable structures and processes that allowed teachers to work more collaboratively. By providing opportunities for teachers to increase their individual and collective efficacy through an extended course of collaboration, observation, and feedback, we fed their innate drive to learn and improve. Each activity served our shared purpose to ensure every child experienced success, and reinforced our shared belief that every child, with the right support, could learn.

Every educator, too! ●



Tonia Gibson is a former Australian teacher and school leader, whose school focused on *Curiosity and Powerful Learning* and implementing an inside-out approach to development for sustainable and continuous improvement. Contact her on Twitter @Teachertjg.

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- Learn how coaching supports professional growth
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- Develop consistent routines and collegial expertise
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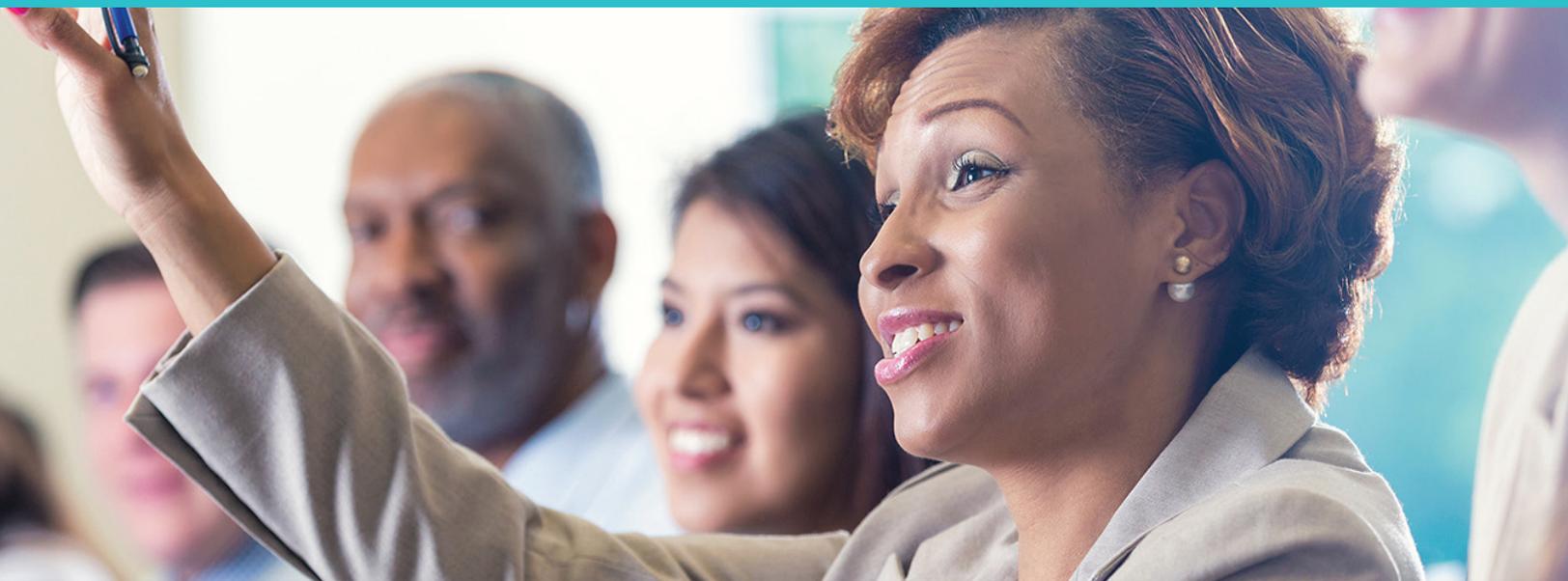
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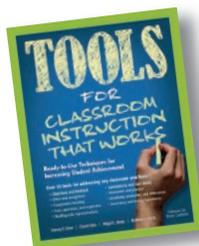
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Teachers in triad teams: Three is not a crowd

By Bj Stone

Intense focus on accountability and teacher effectiveness in recent years has expanded the thinking around instructional coaching. While instructional coaching occurs at nearly every school, the purpose of coaching and the formats used vary widely among schools.

It's not surprising that such variety exists given that, while research suggests coaching supports the success of improvement initiatives (Hubbard, Mehan, & Stein, 2006; Stein & D'Amico, 2002), little evidence exists that explains *how* it happens.

What we do know, from researchers like Bruce Joyce and Beverly Showers (2002), is that the most effective professional learning for teachers includes a combination of different types of learning opportunities: introduction of research and theory; demonstration of new practices; opportunities to apply new knowledge through deliberate practice; and instructional coaching that includes ongoing, descriptive feedback. Of these, Joyce and Showers found coaching was the one learning opportunity that *had* to be present for teachers to translate new knowledge and skills into their practice.

To support and improve the practices of all teachers in a continuous, systemic way, teachers must not only be coached but also become coaches—in other words, coaching happens from the *inside out* within an organization. An inside-out approach to instructional coaching is grounded in the belief that teacher-led teams are best prepared to respond to the instructional needs of students, and that using this approach better supports and motivates teachers in strengthening their instructional practice. With or without guidance from an instructional coach, teachers work collaboratively to identify and address problems of practice. This inside-out approach leverages existing “bright spots” within a school, using them as stepping stones for all teachers—from novice to experienced—to reach higher levels of performance.

Peer-to-peer coaching allows *all* teachers to investigate more closely issues that matter to them, resulting in deeper content knowledge, more proficient skill sets, and the transferring of knowledge and skills into practice. The inside-out approach is based on the idea that peer-to-peer coaching positively changes the trajectory for systematic, lasting improvements in teacher practice and student learning. The research on peer-coaching configurations strengthens the case for the use of triad teams to expand teacher discourse and learning (Hopkins, Munro, & Craig, 2011).

Peer-to-peer coaching allows *all* teachers to investigate more closely issues that matter to them, resulting in deeper content knowledge, more proficient skill sets, and the transferring of knowledge and skills into practice.

In *Leadership for Powerful Learning* (2015), authors David Hopkins and Wayne Craig describe the power of teachers working in triads. The opportunity for individual teachers to engage in collegial work with two other peers broadens the experiences of the team members, expands their professional conversations, and allows for multiple perspectives about topics and solutions. Teachers work in assigned or self-selected groups of three, taking turns participating in three distinct roles: coach, coachee, and observer. The critical role of observer adds an outside perspective that might be lost if teachers worked only in pairs, allowing teachers an opportunity to effectively provide descriptive feedback and ask skillful questions that encourage more reflective processing. This format requires active, rather than passive, involvement and gives all participants experience in giving and receiving feedback, and observing others' teaching practices.

Benefits of working in triads

The primary function of triad peer coaching is to learn through observing and help colleagues by providing information about how students respond—**not** to give expert advice.

While working in triad peer-coaching teams, teachers learn from each other as they plan instruction, develop materials, observe each other working with students, and reflect on how their own behavior influences student learning.

Peer-coaching triads commit to collecting and using data—to determine how to monitor implementation of new teaching/learning strategies, and how they will then determine the impact of the strategies on students and student learning.

Peer-to-peer coaching configurations need not be confined to grade-level or specific content-area teams; teacher teams are equally effective when built on common goals or needs. Once teams are in place, participants are responsible for building expertise among team members and reinforcing the elements of the inside-out approach.

Any number of actions can help improve working conditions and provide better support for teachers—from creating a respectful, trusting culture and establishing mentoring programs, to decreasing workload and helping with classroom management. But an inside-out approach to instructional coaching offers something no other action can: ongoing opportunities for *all* staff to receive the professional guidance they need and contribute to the growth of self and others. ●



Bj Stone is a co-author of the second editions of *McREL's Classroom Instruction that Works* (2012) and a *Handbook for Classroom Instruction that Works* (2012). Dr. Stone trains and consults with K–12 educators and district leaders.

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Twitter as PD? Get curious and give it a try!

By Lisa Maxfield

The first few million times I heard about Twitter, I wasn't at all curious about it. I thought the social media platform was for entertainment and politics, and had nothing to do with me or my work in K–12 education. Frankly, I thought it sounded like a waste of time.

But over the last couple of years, I've seen how my friend and McREL colleague Cheryl Abla (@CherylAbla) is using Twitter to have great conversations about teaching and leading with educators from all over the U.S. and around the world. Through online conversation and sharing ideas and resources, her professional learning network has expanded immensely.

I decided to jump in.

It didn't take long to get hooked, and, in fact, over the last year I've come to consider Twitter one of the most powerful PD tools ever created. The sheer number of educators willing to share their successes and struggles is astonishing. Daily, you can find pictures of students learning and exploring, teachers sharing student work, and discussion topics to get you thinking. My professional learning network now includes colleagues on five continents, from whom I have learned about educational software, classroom management, engagement strategies, school climate, and more. I get great ideas and inspiration, and recommendations on books and other resources.

If, like me, you've been hesitant to jump into the world of social media for professional growth, I encourage you to give it a try.

To start, give me a follow; I'm @LeeMaxfield29. Here are some colleagues and organizations that I recommend following on Twitter:

- @BryanRGoodwin
- @CherylAbla
- @PrincipalHarris
- @RobinGJarvis
- @KrisRouleau
- @McREL
- @ASCD
- @EducationWeek

Live chats that I recommend:

- #Nt2t (New Teachers to Twitter): Saturdays at 9 a.m. ET
- #whatisschool: Thursdays at 7 p.m. ET
- #satchat (Saturday Chat for Ed Leaders): 7:30 a.m. ET
- #sunchat (Sunday EduChat): 9 a.m. ET

Curious? Start connecting! 



Lisa Maxfield is a program manager at McREL International. She coordinates and implements program and product development, and co-moderates #McRELchat. Contact her at lmaxfield@mcrel.org or on Twitter @LeeMaxfield29.

Twitter Tips

- Start by following a small number of teachers, leaders, and education organizations (see suggestions above), and, as you get comfortable, branch out by following the people they follow.
- You don't have to read every post in your feed. Skim through your feed, and if a post, video, or infographic catches your eye, pause and read/watch it. Skip over the ones that don't. Don't be overwhelmed by the volume of posts being shared. The point isn't to try to read everything that everyone posts. It's more like being in a bookstore or a library.
- Participate in a "live chat" (suggestions above). The Education Chats website (<https://sites.google.com/site/twittereducationchats/education-chat-calendar>) lists the hashtag (an identifier that starts with a #), day and time, and a short description of the chat. You can find a chat for your state, content area, grade level, etc.
- Participate in a "slow chat" like **#McRELchat**. A slow chat offers one question per week and can be answered at your convenience. Answer the questions and read others' responses.
- As you become more active, you will notice certain people's tweets that resonate with you. Create a list and add the people whose daily tweets you would like to quickly and easily check.
- Have fun and get involved! You'll soon be jumping into great conversations with tweeting, retweeting, quoting tweets, and liking tweets.



SYSTEM IMPROVEMENT | SUCCESS STORY

photo courtesy of District #197

Strengthening leadership and instruction in Minnesota district leads to academic gains

School District #197 Suburban Minneapolis-St. Paul



Students: ~5,000

White: 55% Hispanic: 27%

African-American: 8%

Asian: 5% Multi-racial: 5%

Native American/Pacific Islander: 1%



Eligible for free or reduced-price meals: 41%

Partnered with McREL to:

- ✓ Develop and enhance school leaders' skills and efficacy
- ✓ Implement effective staff evaluation frameworks and processes
- ✓ Use high-quality instructional practices more consistently
- ✓ Create a common framework and vocabulary for school improvement efforts
- ✓ Establish a culture of change and continuous improvement efforts

Result: Districtwide increases in student achievement

3.6% increase

Science

4.5% increase

Reading

7.6% increase

Math

“Since we started working with McREL, we have achieved organizational improvements across multiple indicators. Implementing a common framework around school improvement has made a big difference—and schools that do so with fidelity and follow-through have seen consistent gains.”

- Dr. Nancy Allen-Mastro, Superintendent (retired)

Developing a common language and framework for improvement helps leaders and teachers flourish



The Challenge

In 2011, the Minnesota Legislature began requiring districts in the state to establish formal principal evaluation systems, designed to enhance the ability of principals to improve their schools' professional environment and performance, including student achievement and teacher effectiveness. These systems are required to include multiple criteria—for example, they must align to a principal's job description and district goals, include on-the-job-observations, and incorporate longitudinal data on student academic growth—in order to provide a full picture of performance.

And that's when School District 197, which serves 5,000 students on the south side of Minneapolis-St. Paul, discovered McREL's Balanced Leadership® research-based principal evaluation system and leadership development program, and began to work with McREL to incorporate both into a comprehensive approach to improvement.

Strategic Solution

In 2013, District 197 began training staff on Balanced Leadership, which brings together decades of research on effective leadership to pinpoint practices that are linked to improved student achievement. That work, says then-Superintendent Dr. Nancy Allen-Mastro, "gave us a common vocabulary, and we embraced it as our leadership framework and philosophy." Now, principals, associate principals, curriculum and special program staff, and other district leaders are all trained in the Balanced Leadership model, providing a common point of reference around the leadership skills and practices that the district values. This shared framework is also linked to the district's continuous improvement model: When buildings develop their improvement plans, at least one goal must be articulated through the Balanced Leadership lens.

At the classroom level, District 197 worked with McREL to provide its teachers with high-quality professional learning on effective, research-based instructional strategies and practices, using McREL's Classroom Instruction That Works. McREL also helped the district create robust internal capacity to sustain their initiative over the long-term by developing a cadre of expert district staff who could provide teachers with additional professional learning and coaching opportunities throughout the school year.

Results

Implementing a common framework around school improvement has made a big difference, according to Dr. Allen-Mastro, because "our leaders instantly know what it means, for example, to create demand around an initiative or identify agreed-upon outcomes—and why it's important." Using the Balanced Leadership framework, she notes, has made improvement planning more robust and more intentional, from preliminary goal setting through evaluation, the common framework supports continual dialogue and follow-through.

Dr. Allen-Mastro says that schools with high-fidelity implementation and follow-through have seen the most consistent gains from year to year in student achievement, sometimes in the double digits. "The better the plan, and the truer the leader stays to the plan, the better the outcome," she said. "Seriousness around planning and follow-through has been a game-changer."

Over the past four years, districtwide science achievement has risen by 3.6%, reading by 4.5%, and math by 7.6%. Dr. Allen-Mastro notes that these gains are part of a larger effort, which includes their consultation and training with McREL.

Next Steps

The district plans to continue training new teachers on McREL's instructional strategies, and anticipates that all staff will be trained on all strategies by the fall of 2018, receiving 12–18 total hours of professional learning, including how to use technology with the strategies. The district is also beginning to monitor use of the strategies and practices with McREL's Power Walkthrough classroom observation tool. In addition, the district is continuing to train its new administrators in the common language of McREL's Balanced Leadership framework to help them plan high-impact strategies and engage their leaders and collaborative teacher teams around the work going forward.

Taken together, these initiatives support the district's strong focus on creating a culture of change and continuous improvement. ●

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