1 A Call to Action

"In times of change, learners inherit the Earth, while the learned find themselves beautifully equipped to deal with a world that no longer exists."

—Eric Hoffer

Learning is a continuously moving target. When we learn something, it becomes the solid ground of knowledge beneath our feet. We can stand on it enjoying the confident state of knowing, or step beyond it to the edge of uncertainty where opportunity awaits.

This book is about leading students to that edge, continuously, by leading teachers to that edge, continuously. It's about facilitating professional learning to realize the vision that every child can succeed.

To transform student learning, we as educators must transform ourselves, continuously. It isn't a one-shot change, or leap across one gap from novice to expert. It's a leap across many, again and again. The driver fueling this work is our commitment to students and the question, How can we best leverage our actions to reach every child?

Everyone who has ever taught in a classroom knows there is no easy answer to this question. Some lessons flop. Kids respond in unexpected ways. Even when we find a powerful solution for one grade-level in one content area for one group of students, the variables change. What worked in one situation doesn't always work in the next. Instruction that is effective for many students doesn't always reach *every* student. And even when we do master the dynamic process of helping every learner excel *within* school, there is the larger question: Are we preparing students to excel *beyond* school in a continuously changing world?

What drives me is the belief that every child, regardless of family income, ethnicity, or home language, deserves to graduate from high school with choices and opportunity. This vision has led me to ask tough questions and continuously evolve based on the answers I find. A commitment to equity dares me to always look for evidence of my impact on *all* students, whether or not I like what I see.

Learning From Failure

Twenty-six fifth graders in inner city Houston first taught me the complexity of teaching for equity. After graduating with honors from a competitive university, I became a teacher and failed. My first year in the classroom I arrived at sunrise daily, and worked until the janitor locked the school each night. I prepped lessons at home until I fell asleep on my papers. Still I struggled to engage every student, let alone close opportunity gaps. Each failure fueled me with questions: How do students learn? What motivates each individual? What can I do to ensure linguistically and socioeconomically diverse students excel with rigorous content? How can we as educators shift the status quo of inequity to create true pathways to opportunity for every child?

Twenty years later, school leaders and organizations hire me to help them answer these questions, not because I have all the answers, but because I don't stop at simple answers. I ask deeper questions and help others ask questions. We get specific together about what we need to know about our goals, our students, and effective instruction to meet their needs, and then we collaborate to transform how we work to achieve our goals.

This book is about doing exactly this, collaboratively, in classrooms together to reshape instruction so that every individual child who enters our schools will graduate prepared to thrive in a changing world.

This is a how-to book for translating the theory of this vision into action in any school, and especially schools with one or more of the following priorities:

- Effectively prepare all learners to excel in a 21st-century globalized economy
- Elevate the achievement of traditionally underserved students including ELLs, students who qualify for free or reduced lunch, and students of color
- Build teacher capacity, continuously, collaboratively in high-functioning teams

These goals in my work as a consultant across multiple school districts specifically led me to the focus of this book, a professional learning model

I discovered by asking tough questions, learning from well-established models, and then transforming my ways of working, continuously to get results.

The mindset of problem solving that led me to the model is as important as the model itself. It centers on Learning Forward's standard that states "Professional learning that increases educator effectiveness and results for all students integrates theories, research, and models of human learning to achieve its intended outcomes" (Learning Forward, 2011, para. 2). Embedded in this standard is a mindset to design our approach based on the outcomes we seek, and refine our approach until we *achieve* those outcomes. This commitment to achieving outcomes and flexibility to synthesize and refine approaches to realize success is critical.

For this reason, I write this book with two parallel goals:

1. Equip readers with tools to implement observation inquiry (OI), a model for deep professional learning that engages teachers in a continuous cycle of planning, observing, and refining instruction together.
2. Fuel a mindset of continuous inquiry about impact that is essential for this or any professional learning model to make a difference for *all* students.

There is an irony in the combination of these two goals. With the first, I offer a clear path to follow, a means to an end. With the second, I provoke readers to question every means to an end, including the one I detail in this book.

In my work as a learning leader and entrepreneur, I've come to realize that one of the most important abilities for leading progress is the dual capacity to, on one hand, choose and stick to a path and, on other, to question the very path we are on. It's a difficult and humbling task to question our impact continuously, especially when we are committed to solving complex problems such as equity in 21st-century schools. Sometimes when we ask tough questions, we get answers that challenge us to change.

This book is about building that dual capacity among teachers and leaders who support them. It focuses on a model that brings teachers into classrooms together to observe students and refine instruction based on what they see. Before we get into the specifics of *what* with an overview of the model in Chapter 2, and *how* with protocols, video examples, and facilitation tools in Chapters 3 through 10, let's begin with the most important question: Why?

- Why is observing lessons together important for deep professional learning?

- Why must professional learning be as much about building capacity as facilitating collective innovation?
- Why do anything differently at all?

It begins with a complex challenge.

REACHING EVERY CHILD IN 21ST-CENTURY SCHOOLS

The challenges of teaching in US schools have intensified in recent years with a rise in expectations. Our 21st-century globalized economy calls for schools to prepare students for the workforce in new ways. Such pressures have led to shifts in expectations for students including

- adoption, in many US states, of Common Core State Standards in English Language Arts, Content Literacy, and Mathematics;
- new high-stakes tests with rigorous performance tasks: SBAC and PARCC;
- Next Generation Science Standards; and
- a call for 21st-century competencies including technology, communication, collaboration, creativity, and critical-thinking.

Even educators in states that have not adopted new standards or assessments are experiencing the rise in expectations, as the reality of our high-tech, globalized economy demands it. US companies looking for highly skilled workers often hire from other nations, as there are not enough qualified candidates graduating from our schools and universities. These trends are a wakeup call to the entire pre-K through university school system to rethink and redesign how we educate the next generation. Preparing students for economic opportunity means something entirely different from what it did 20 or 30 years ago, and will mean something different in the future than it does today. Changing expectations is a given, and schools need the collective capacity to adapt.

Complex Needs

Bring equity into the equation and our challenge is more complex. Even before rising expectations, we have been struggling as a system to meet the needs of underserved populations including ELLs, ethnically and culturally diverse learners, and students from low-income households. For some, grouping students into such subgroups is problematic, given the diversity of individuals across each group, yet this practice also has value

for asking tough questions about equity and access to opportunity. Analyzing student achievement data by subgroups, a practice that became mainstream with No Child Left Behind, illuminates what might otherwise be invisible: troubling tragic correlations between demographics and achievement. A 2013 statistical report (Aud et al., 2013) from the US Department of Education highlights, for example, the following:

- Black and Hispanic/Latino gap data
- Socioeconomic gap data
- Gaps between NAEP achievement of ELL and non-ELL
- High dropout rates of black and Latino males

Teacher Expectations

Underperformance is not an indicator that kids in these subgroups are destined to underperform. In a profession where the majority of teachers are like me, white from middle-class backgrounds, underserved learners and the demographic groups they represent can be seen as *other.* All too often, even the most dedicated teachers may perceive data on the underperformance of certain groups as evidence that students within that group will likely underperform. Given the correlation between teacher expectation and student achievement (Hattie, 2012), this is a critical issue to address. "Inside-out" approaches to professional learning such as Cultural Proficiency workshops and Courageous Conversations about Race are effective in helping educators identify personal biases and institutional practices that are barriers to achievement of underserved student populations (Lindsey, Robins, & Terrel, 2009). This book takes a different, albeit complementary, approach in that it strives to meet the need for more specific work connected to the daily teaching of rigorous content. In many schools, teachers are committed to equal opportunity and agree that high-expectations are important. The challenge is how they apply that global belief to specific daily practice: lesson-by-lesson, student-by-student. It often takes seeing students who have previously underperformed excel in a lesson for the "aha" realization that expectations need to be raised. It takes a shift from a fixed mindset that assumes intelligence is static, to a growth mindset that recognizes the potential in every student to grow smarter and more talented through effort (Dweck, 2008).

Equity Matters

Data about opportunity gaps are not just a call to action for all of us who believe in the promise of public education to provide opportunities for every child, it is also a call to action for all who want to ensure our next

generation is prepared to thrive and lead a strong future economy in a globalized world.

The Organization for Economic Cooperation and Development coordinates an international assessment (PISA) to assess 15-year-old students' application of knowledge in mathematics, science, and reading literacy to real-world problem solving. International comparisons of 2012 PISA data reveal that US students perform on average well below students of other developed countries including Singapore, Japan, Republic of Korea, Finland, and Canada (Kelly et al., 2013).

Educational sociologist Pedro Noguera points out that US students' poor results in comparison to other developed countries in PISA reports is "largely about inequity-inequity in opportunity and background" (Kelly et al., 2013; OECD, 2013; Rebora, 2013b). The socioeconomic, cultural, ethnic, and linguistic diversity of the US student population is unparalleled in other developed countries scoring high on the PISA exams. Raising the achievement of underserved populations including students in poverty, racial, and ethnic monitories, and ELLs is critical for our nation's success. Noguera argues that as a nation we must "achieve excellence through equity." We cannot sideline issues of equity and succeed.

Shifting Demographics

Opportunity gaps are not new information, but they are increasingly important news for professional learning design as demographic shifts lead to increasingly diverse communities and schools. How we build teacher capacity to serve diverse learners including students in poverty, students of color, and ELLs will determine the strength of our national school system and future economy. Evidence of rising needs include the following:

Increase in high-poverty schools. Recent economic trends have widened economic gaps, and also lead to continued shifts in school demographics. One in five public schools was considered high-poverty in 2011, an increase from one in eight in 2000. High-poverty means that 75% of students qualified for free or reduced-price lunch (Aud et al., 2013). Even many schools that don't qualify as high-poverty have an increasing population of students whose families live below the poverty line.

Growing ELL population. ELLs are the fastest growing student population in the United States. There was an 80% increase in the ELL population between 1990 and 2010. As of 2011, there were an estimated 4.7 million ELL students in US schools, or 10% of the total school population. In my

home state of California, more than a quarter of students in public schools are ELLs (Aud et al., 2013). While populations vary school to school and classroom to classroom, there is truth in Pedro Noguera's claim that "Every teacher needs to be a teacher of English Learners" (Noguera, 2013).

ELLs are a diverse group that share two factors: (1) some home experience with a language other than English—as indicated by a parent survey and (2) less-than-fluent English proficiency as measured by a school test. Beyond those basic similarities, ELLs differ in the following:

- Levels of English proficiency in listening, speaking, reading, and writing
- Home language(s)
- Levels of home language proficiency in listening, speaking, reading, and writing
- Academic and literacy skills
- Life and school experiences
- Racial, ethnic, and cultural backgrounds
- Family income levels

Many ELLs across the United States are also students of and living in poverty. Addressing the needs of ELLs in these contexts, including all of the schools highlighted in this book, often involves simultaneously closing opportunity gaps relevant to race/ethnicity, poverty, and English proficiency.

Academic Language Learners

Academic language is essential for equity and access in school and a key factor affecting performance gaps across different subgroups (Wong, 2004; Zwiers, 2008). Academic language, critical thinking, and content learning are intricately connected: We use language to think, to comprehend new concepts and texts, and to communicate. Many students, even native English speakers, come to school without experience using the academic registers of language prioritized in school. As a result, they are unfamiliar with the vocabulary, grammar, and organizational structures of language needed to comprehend and create academic texts and engage in discourse about complex ideas. Throughout this book, I will use the term academic language learners (AELs) to refer to students who have had limited opportunities to learn the academic registers of English that are central to school and career contexts. AELs include the following:

- Many students living in poverty
- ELLs at all proficiency levels

- Students who speak English fluently, yet only in informal contexts
- Standard English Learners (SEL) proficient in an English vernacular that is different from the English used in school such as African American Vernacular English, Chicano English, or Hawaiian Creole English

AELs are a diverse group of students including immigrants and nonimmigrants, students in rural and urban communities, ELLs and fluent English speakers, and white students and students of color. While there is tremendous diversity across AELs, they share in common an educational priority that is critical for access to opportunity: a need for learning academic language in tandem with content.

AELs need teachers who understand language, value the diverse linguistic resources students bring to the classroom, and effectively support students in building academic English for school and career success.

Teaching for equity is not a color-blind, culture-blind proposition in which we teach the best we know how and hope it works for all. It is about bringing race, culture, language, and poverty to the table, not as excuses, but as part of how we understand ourselves, our students, and ways to personalize instruction to meet each individual's needs.

Our Complex Challenge

A goal for equity in education used to be about helping all learners thrive in school. As a profession, we've reframed the problem from a broader perspective because success in school doesn't always transfer to success in a 21st-century economy. Creating equal pathways to economic opportunity is about simultaneously helping all learners

- excel with rigorous content standards;
- communicate effectively across diverse contexts and purposes;
- apply critical and creative thinking to solve problems;
- collaborate and communicate effectively;
- use and shape technology in a fast-paced world; and
- have the courage to risk, fail, and try again.

For students who struggle with literacy and academic language, especially AELs, this list of end goals does not change. Our task is to simultaneously build academic language and literacy while raising the bar across content areas and fostering competencies for 21st-century success. How do we leverage our impact to address this complex challenge?

Building Capacity for Change

Learning from schools that realize achievement gains, it is clear a systemic integrated approach of multiple factors is essential. In their report of a seven-year study of school improvement efforts across Chicago, Bryk and colleagues (Bryk, Sebring, Allensworth, Luppescu, & Easton, 2010) illuminated the importance of orchestrating essential supports to realize student-learning gains in reading and math. Five indicators they highlighted as essential from their findings include (1) school leadership, (2) teacher capacity, (3) student-centered learning climate, (4) instructional guidance systems, and (5) parent-family ties. They found that schools with strong measures in each of these indicators "were up to ten times more likely to improve students' reading and mathematics learning than were contexts where three or more of these indicators were weak" (p. 198).

While focusing on all five elements is beyond the scope of this book, beginning with this big-picture view helps frame my focus on building teacher capacity within a dynamic context. Building capacity must be about more than training individuals, and also about building relational trust, "a lubricant for organizational change and a moral resource for sustaining the hard work of local school improvement. Absent of such trust," Bryk and colleagues argue, "it is nearly impossible for schools to develop and sustain strengths in the essential supports" (Bryk et al., p. 207).

Beyond Silver Bullets

Equity in education is not a technical challenge that can be solved via a simple transmission of knowledge and skills from experts and researchers to practitioners in the field. It is an adaptive challenge that relies on changing people's habits and ways of working. An adaptive challenge "requires experiments, discoveries and adjustments from many places in the organization or community" to solve (Heifetz & Linsky, 2002). Closing opportunity gaps is such a challenge, as it requires educators continuously problem solve, study our impact, and shift how we work in response to what students need.

Workshops on strategies to meet the needs of diverse learners are a silver-bullet solution. This is the inconvenient truth the research makes clear: Workshops can work for transferring understanding and knowledge, but only shift daily instructional practice for a minority of teachers (Joyce & Showers, 1980; 1981; Wei, Darling-Hammond, Andree, Richardson, & Orphanos, 2009). Workshops are convenient, in high-demand, and great for business—but when it comes to impact, they are at best a shot of inspiration and introduction of new ideas into a system (Knight, 2011). They

can be part of the solution to building capacity, but never should be mistaken as *the* solution.

I had my first "aha" moment about the limitation of workshops when I first began consulting a decade ago. When I sat down with a grade-level team to help them apply what I'd taught them in a workshop to their instructional planning, one teacher complained, "We can do this on our own, why don't you give us more strategies like you gave us in the workshop?"

To understand what she was looking for, I referenced an effective strategy that was highly popular in the workshop and asked, "Do you mean a strategy like this?"

"Yes!" she and other teachers smiled.

I then asked, optimistically, "Have you used that strategy with your students?"

Gazes dropped. Awkward silence.

Not one teacher had yet tried the strategy they had told me they loved in the workshop, and they were hungry for more. This team is not unique. There is a hunger for strategies, especially in field of closing opportunity gaps. Yet even as strategies accumulate in workshop binders on classroom shelves, the belief persists that if teachers just acquire more strategies, they will ensure all learners succeed.

Collecting strategies via workshops and books is the easy first step. Learning how to use them nimbly to ensure that every student learns is the challenge. Building capacity to address this challenge requires engaging teachers in continuous, collaborative problem solving around formative data to meet students' needs.

Collaborative, Continuous Learning

> *"Professional learning that increase educator effectiveness occurs within learning communities committed to continuous improvement, collective responsibility, and goal alignment."*
>
> —Learning Forward, Standards for Professional Learning (2011)

There is a growing consensus among researchers and educators in the power of engaging in continuous, collaborative inquiry to improve practice (Wei et al., 2009). Countries whose students perform well above the international average on PISA exams, including Japan and Finland, build structures of continuous teacher inquiry into educators' workdays. In the United States, schools that realize significant achievement among traditionally underserved populations have in the core of their approach a culture of collaborative professional inquiry focused on ensuring

students learn (Chenoweth, 2009; Gleason & Gerzon, 2013; Hollins, McIntyre, DeBose, Hollins, & Towner, 2004; Little, 2006; Saunders, Goldenberg, & Gallimore, 2009).

The challenge (as with the implementation of strategies) is translating this dynamic vision into action in schools. The growing popularity of professional learning communities across US schools in the past decade, for example, highlights some of the challenges of implementation. In many contexts, there was a shift in the name of collaborative teams, but not in approach. Richard DuFour (2004) pointed out, "The term [PLC] has been used so ubiquitously that is in danger of losing all meaning" (p. 6). He emphasized three big ideas that must be at the forefront of PLC work:

1. Ensuring that students learn
2. A culture of collaboration
3. A focus on results

These are no easy tasks in schools where opportunity gaps are prevalent, and current approaches are not meeting the needs of all learners in a school. Using data to determine intervention and enrichment needs, a core practice in some PLC models, is valuable and, in and of itself, does not begin to address the need for changes to core instruction. A teacher in such a context, for example, could work diligently to determine students' intervention needs without reflecting on changing how to teach. The difficult and essential work is to collectively use data to challenge our assumptions and drive continuous shifts in our teaching.

In their analysis of PLC work across 40 self-selected districts, Ermeling and Gallimore found a wide range of PLC practices and a troubling consistency: "an absence of talk about teaching and its improvement during learning community time" (Ermeling & Gallimore, 2013, p.42). Even teams working hard to implement workshop-inspired practices analyzed data to determine needs without leveraging that data in a reflective cycle of inquiry to change instruction.

These examples point to the challenges of implementation rather than a problem with the vision itself. Schools that function as strong professional learning communities illustrate positive impacts on student learning, teacher retention, and the working climate of schools. While a comprehensive review of the research is beyond the scope of this book, key sources include the following: Chenoweth, 2009; DuFour, DuFour, & Eaker, 2008; Gleason & Gerzon, 2013; Hord, 2004; Vescio, Ross, & Adams, 2006; and Wei et al., 2009.

As with many reforms, what matters even more than the name of what we do is how we do it. It's the ideas that matter, not what we call them,

and our mindset of inquiry we engage in to continuously, collectively learn and evolve until we realize our goals for student success.

Courageous Inquiry

Everything I've learned about teaching, I've learned by asking questions and listening honestly to the answers, especially when they challenge me to change. Four essential questions that are central to inquiry throughout this book are

1. What are our goals for student learning?
2. What can students now understand and do in relation to those goals?
3. What learning opportunities do we need to provide to help students build from current abilities to realize the goals?
4. What do I need to learn or change about my practice to provide those opportunities?

On paper these questions seem simple enough, but in practice they are profound. Each is layered with nuances that matter in how we ask them and how we gather information to find answers. Goals, for example, can be as simple as standards in a lesson plan or an end assessment task we know students will face. Goals also reflect teacher expectations, a variable that shifts by teacher, can be tragically lowered by biases about student subgroups, and has a strong correlation to student performance (Hattie, 2012).

When we as educators ask these questions together with colleagues, and then take collective responsibility for applying what we learn to how we work, students win. Answers to these questions have the power to push all of us out of our comfort zone, especially when we ask them in collaboration with colleagues with a shared commitment to meet the needs of students now underperforming. When there is a gap to close between current student abilities and our goals, the easy approach is to attribute that gap to factors beyond our control, such as parents or poverty, and keep doing business as usual. The easy approach is to stop at Question 2, or change the pronoun "we" in Question 3 to the name of an intervention teacher, resource specialist, ELL specialist, or other we determine is responsible for helping our struggling students achieve.

Reflective practice begins when we ask Questions 3 and 4 with the courage to believe our primary job as educators is to impact student learning. In asking, "What can we do?" and "What can I do?" each of us

acknowledges the cause-and-effect relationship between our actions and how our students learn. With this mindset, troubling data are our greatest teacher—an opportunity to transform how we teach and how kids learn.

> "To be guardians of equity we must ask tough questions and challenge patterns that aren't working."
>
> —*Pedro Noguera, Learning Forward Keynote 2013*

A RATIONALE FOR OBSERVING TOGETHER

Collaboration can be shallow or deep, a way to maintain business as usual, or a driver for collective change. To go deep together with the collective trust and courage essential for asking and acting on tough questions, we need to get specific with shared experiences and shared data. Otherwise, our conversations about goals, where students are in relation to the goals, and effective instruction hinges on our diverse biases and perspectives. We share ideas. We hear what we know. We miss a valuable opportunity to help one another expand our thinking and practice.

A Need for Shared Data

In many professional learning communities, collaboration only happens outside of the classroom. As a result, shared data are limited to that which can be removed from the teaching context: assessment results, written responses, or other pencil-to-paper tasks. Teams *talk* about teaching without experiencing it together. They talk about observations of student learning or challenges, without seeing the same thing. This is a critical point given the role of observation in understanding and addressing difficult-to-measure goals that are a priority for closing opportunity gaps in the 21st-century economy. Data for many of our priority goals live in dynamic moments of student learning and interaction. Consider, for example, what you would look for as evidence of student learning toward any of the following goals:

- Initiative and risk taking
- Problem solving
- Oral academic language development
- Academic discourse skills
- Collaboration
- Effective use of technology to research, create, and communicate

Written assessments alone do not provide the formative data we need to help students deepen expertise in these areas. To address such dynamic

learning priorities with a collaborative, data-driven focus, teacher teams need to step into classrooms together to observe closely what students say and do, and then reflect deeply on the shared observational data to drive their collaborative work. Video is also an option for gathering shared observational data, but has limitations in terms of frame of reference, logistics, and trust, which I'll detail in Chapter 6.

PROFESSIONAL LEARNING FOR EQUITY

In the majority of schools featured in this book, building professional capacity centers on the goal of elevating the academic achievement of linguistically and culturally diverse learners and children from low-income households. Some schools are Title I with high concentrations of students who are AELs including ELLs, students of color, and students living in poverty. Other schools have great socioeconomic diversity and a small, growing population of AELs. Each of these schools has made it a priority to help mainstream teachers elevate achievement for students who are underperforming, specifically AELs. Shared goals for professional learning include building teacher commitment and capacity to

- raise expectations for achievement of all students;
- elevate students' active engagement across all lessons;
- teach language in tandem with content and critical thinking;
- elevate students' oral academic language use and collaborative conversation skills; and
- deepen expertise in using formative data to refine instruction to meet the needs of all learners.

Initially, when teachers only collaborated to address these goals via meetings, their conversations about observation data specific to these goals remained general, or worse tipped toward low-expectation descriptions about what "my students can't do." Without seeing the same students or lessons, colleagues lacked the data to drive a deeper discussion. Conversations thus centered on individual interpretations of what each teacher saw alone. In a staff room conversation, for example, teachers might say,

"I tried pair-share and it didn't work."

or

"When I tried to structure a deep conversation about the reading, my ELL students were quiet."

Listening to such statements in a conversation, each of us imagines something different based on our experience of what pair-share looks like, or

the reasons a student might not participate in a classroom conversation. We could brainstorm ideas together for addressing these challenges, and it might be somewhat helpful, but without shared data our conversation isn't precise enough about the problem or the specifics of the solution to likely change how any of us work. The deep collaboration begins when we plan together how to address a challenge, and test and refine it via a cycle of planning, observing, and reflecting on what we see. In those instances, we have shared data about the context of instruction and what students say and do throughout the learning experience. Such specificity helps us move away from biased statements such as, "my students can't do that" toward precise insights about what students can do and need to learn. Specificity also helps us see the impact of our instructional moves and change our approach in nuanced ways as needed to realize our vision for student success.

Language, Literacy, Content

> *"A focus on language is crucial, no matter what subject is being taught . . . Teachers must know enough about language to discuss it and support its development with students."*
>
> Fillmore & Snow (2000)

Ensuring AELs access rigorous academic learning requires teachers teach language in tandem with content (Gibbons, 2009; Goldenberg & Coleman, 2010; Santos, Darling-Hammond, & Cheuk, 2012; Zwiers, O'Hara, & Pritchard, 2014). This requires understanding of the language demands of curriculum, student language use, and effective pedagogy for supporting language development in the context of rigorous academic tasks. Building these understandings in collaboration is no easy task, as language is complex to understand and define. A recent TESOL report illustrates this challenge, "When educators—including ESL teachers—talk about language, it is not always clear that they agree on the ways that they conceptualize language or what it means to provide language instruction" (Valdés, Kibler, & Walqui, 2014, p. 20).

Shared understandings and shared data are essential for collaboration to impact teaching and learning. To get specific about goals, student language use, and effective pedagogy for building academic language in tandem with content, educators must step into classrooms together and learn from the specifics of dynamic classroom interactions. See Figure 1.1 for examples of essential questions about the goal, students, and instruction we can only answer in tandem with observing students in action.

Teaching language in tandem with content requires continuous inquiry about what language students know and what they need to

Figure 1.1 Sources of Formative Data on Academic Language and Discourse

	Out of the Classroom	In the Classroom
1. What is our goal for student learning?	What are the language demands of our content learning goal, task(s), and reading(s)? What discourse skills do students need to excel in related collaboration tasks?	What does a proficient academic response specific to this context sound like? What does proficient academic discourse specific to this context sound like?
2. What can students understand and do in relation to the goal? (Formative data)	What does students' academic writing tell us about their strengths and instructional needs with language, literacy, and content learning?	What do students say in specific academic contexts? How do they use language? What discourse moves do they use in academic conversations? Do students take turns answering the same question, or build up ideas together?
3. What opportunities do we need to provide to help students close the gap? (Instruction)	What approaches do researchers and experts in the field recommend? What is working in other schools?	What instructional approaches elevate student's understanding and use of academic language in our classrooms? What approaches are most effective for engaging all students in academic discussions? How do shifts in scaffolds, modeling, or task structure impact students' academic language use, content understanding, critical thinking, or participation?

know to excel with the academic content we teach (Santos et al., 2012). Language demands are dynamic and change across different contexts and purposes. As a result, even when teachers know what academic language students know and need to know in one context, the rules will change in a different lesson with different tasks. Add to this the complexity of diverse language proficiencies among students in every classroom, and it becomes clear why there is no "silver bullet" approach to teaching language and content together. Effective teachers of AELs are data-gatherers and problem solvers—always shifting the level of scaffolds they provide to balance support with rigor, foster independence, and engage every learner every time.

Using Formative Data to Drive Teaching

How teachers interpret and respond to what students say and do in the moment of learning determines their impact. How teachers interpret students' use of language and adjust instruction according to needs is central to their effectiveness as teachers of AELs. In most classrooms, teachers are alone to refine this art. Professional learning designs must shift this trend, especially in linguistically diverse schools, as teachers need opportunities to deepen expertise analyzing and acting on observational data. "Teachers' skills in drawing inferences from students' responses are crucial to the effectiveness of formative assessment" asserts formative assessment expert Margaret Heritage. "In essence, teachers need to infer what 'just the right gap' is between current learning and desired goals, identifying students' emerging understanding or skills so they can build on these by modifying instruction to facilitate growth" (Heritage, 2007, p. 144). Collaborating in inquiry in cycles of planning, observation, and reflection builds the collective capacity of teacher teams to use formative data strategically to refine instruction according to students' diverse and evolving needs.

A Need for Collaborative Innovation

Formal educational research does not keep pace with the continuously evolving challenge for educators to solve. While there is a strong research base for many practices in the teaching of reading, for example, research specific to the long-term achievement of AELs is limited. Even when we narrow the scope from AELs to ELLs, there is a significant lack in conclusive findings to drive practice. In their 2010 book *Promoting Academic Achievement Among English Learners: A Guide to the Research*, Goldenberg and Coleman point out there is virtually no research to conclude the following:

- How classroom instruction might best promote oral language development (Genesee, Lindholm-Leary, Saunders, & Christian, 2006)
- The superiority of any approach to English Language Development
- How to ensure ELLs gain increasing access to grade-level curriculum

Most practices in these areas are based on theories, assumptions, and/or recommendations from experts. The same is true for practices for ensuring students excel with 21st-century competencies including critical thinking and innovation, and for practices integrating new technology into classrooms. At the cutting edge, research does not pave the forward path. This dearth of proven practices presents a challenge for educators and an opportunity for every teacher team across the nation to be at the forefront

of innovation: testing and refining recommended approaches or discovering more powerful solutions.

To create equity in 21st-century schools, it is imperative that teachers collaborate together as problem solvers leveraging their respective experience and expertise to help all learners excel with the intersection of content, language, critical thinking, and innovation.

BEYOND THE ELEPHANT

With so many benefits of bringing teachers into classrooms together to test, observe, and refine instruction, why don't all schools engage in this process? I anticipate readers know the elephant that is in the room anytime we mention the word "observation" in schools, or worse the concept of "peer observation." With the exception of schools that have experience with powerful models like Japanese lesson study, or strong collaborative observation models, in most schools the word "observation" invokes a sense of fear. Observation equals judgment and is what administrators do as part of formal evaluation.

Each time I speak to a room full of teachers I want to inspire to open their doors to new forms of collaboration, I know that most of what I say after "observing together" will sound like the adults talking in a Charlie Brown cartoon, a "Wah wah woh wah wah" drowned behind the more palpable rise in heart rate and internal questions: "Observe together? What? Colleagues are going to watch me teach?"

How to address this fear specifically is the focus of Chapter 3, and absolutely essential for getting started. This deep work is possible in any context. Any reader now thinking, "that can't happen at my school" works in schools like most in North America where a culture of privacy about teaching keeps collaboration to staffrooms and working with kids behind closed doors (Barth, 2006; Wei et al., 2009). The schools in this book were no different before we began this professional learning process four years ago. In fact, the superintendent of Mark West, the district where I first began the practice of bringing teams into classrooms together told me initially her teachers would never go for it, as a previous coaching model had left many averse to having peers in their room. I treated this challenge as an opportunity, rather than a roadblock, and found ways to lead a shift from fear to trust to make collaborating in classrooms together not only possible but desirable for teachers. When we build the right conditions, teachers rise to the opportunity and soon become the biggest advocates for continuing deep, collaborative professional learning.

How, specifically, do we make this happen? Read on.