AUTHENTIC LEARNING
in the Digital Age

Engaging Students Through Inquiry

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Foreword

What happens when reality exceeds the dream you had?

This book is, in many ways, the answer to that question. In 2005, I was hired by the school district of Philadelphia to work on the school that, in September 2006, opened its doors as the Science Leadership Academy (SLA), an inquiry-driven, project-based high school formed in partnership between the school district and The Franklin Institute, Philadelphia's famous science and technology museum.

The founding ideas of Science Leadership Academy—the concept that students can ask powerful questions and create meaningful artifacts of their learning in a caring environment—are simple ones, grounded in the work of many educators who have come before us. We have worked to marry those ideas to the promise of the new technologies of our age, along with systems and structures to make it easy for anyone coming into our community—students, teachers, or parents—to ramp up to the kind of learning we value most at SLA.

That basic framework—a few powerful ideas with clear structures for implementation—paired with the truly inspiring goodwill, intelligence, and passion of the many teachers, students, and parents who took on the challenge of building a school together has created a school that matters. As principal and founder of the school, I am awed on a daily basis by the incredible work that is done by the teachers and students who make up our community. The ideas that fly around our classrooms, the amazing projects that students do, and

the undeniable pride that our students take in their school all exceed the highest expectations I had any right to have back in 2005.

One of the most frequent questions I get is, "What has changed about what you believe since you started SLA?" And, interestingly, there are subtle changes in much about the way we think about all our big ideas since we started, but, if anything, I think we believe more deeply in those ideas now than we did then. Back then, we had a sense we were onto something, but, really, we had no idea how it was going to turn out. Eight years into the experiment, we find ourselves falling back on our best ideas time and time again. The ideas that asking good questions, caring about the people around us, and building structures that make it easier for people to succeed have grounded us in all the conversations we have at SLA, and, more often than not, those core concepts provide the framework that allows us to answer the new questions and challenges we face.

But simple doesn't mean easy. The work and the ideas that you will read in this book are the result of hours of collaboration and discussion and even, sometimes, arguments. The work we do, while we take a lot of pride in it, often still feels like work. There are days, like in any school—or any community really—where we get frustrated or don't feel good about what we are doing or feel like we are failing. But that is where the ethic of care really comes into play. What you will see come out in these pages is a community of learners who truly do care for one another. And when you are asking people to do the hard work of authentic, empowering learning, that care is essential. The work people at SLA do is hard. It is taxing. It is frustrating. And yes, it is exciting and awesome, too, but without a caring community to get you through the hard parts, many of us—including me—would fall short of many of our goals.

And that care doesn't end at the schoolhouse door. One of the many things that amaze me about our community at SLA is how much everyone really does believe that our school has the responsibility to share what we do with the world. Whether it is through their writing, through the work we do as Dell's Center of Excellence, or through the many conferences where SLA teachers and students facilitate meaningful conversations about education, the SLA community has taken

up the mission of trying to make the world of education a better place by sharing their work and their stories. This book is a powerful representation of that task.

And in this book, Larissa Pahomov has the unenviable task of taking the work of 25 teachers and 500 students and distilling the ideas, passions, systems, and structures of the school so that other educators can learn from what we have done. Larissa is perfectly suited to the task, so much so that while working on the project, she referred to it as "the school's book," and the proceeds from its sale are going directly to SLA.

Larissa has taken the voices of our community—students, teachers, partners, and even me—and woven them together with the systems and structures and ideas we have built together to create what I hope you find to be both an immensely readable and powerfully useful book. It is not meant to be read as a proscriptive "This is the way to do school now" text—to do that would be to miss the very point of our school. Read it as a book of vision, of structures, of plans and of voices, and use it to help refine your own vision and voice of what school and learning can be.

The community of learners of SLA has taken a dream I had—that school could be better than it was—and made it greater than I had a right to imagine. Larissa has done an amazing job of wrangling that dream into a text she—and we –can be proud to share. Enjoy.

Chris Lehmann
Principal, Science Leadership Academy

1 Education for the Information Age

If you are reading this book, you are likely already committed to (or are at least interested in making the shift to) working in an inquiry-based classroom. You believe that students should be constructing knowledge instead of having teachers hand it to them. You avoid delivering lectures and like to give students some kind of choice in their assignments, favoring projects and papers over tests and quizzes. You create opportunities for students to teach and learn from each other. When you were preparing to be a teacher, you read the works of John Dewey, and you agreed with him: "'Knowledge,' in the sense of information, means the working capital, the indispensable resources, of further inquiry; of finding out, or learning, more things" (Dewey, 1916).

Almost 100 years after he published *Democracy and Education*, Dewey's words have never been truer. As the amount of information available to us explodes, as well as our access to it, what matters is not what students know but how they acquire that knowledge and what they can do with it. In terms of employment, mastering a single set of knowledge hardly helps a student. The Bureau of Labor Statistics reports that students who go to college have an average of 11.7 different jobs in a lifetime (see http://www.bls.gov/nls/nlsy79r24jobsbyedu.pdf)—and this data is based on baby boomers, who have benefited from more job security than their children. Cognitive skills such as conducting independent research, assessing information for

credibility, applying concepts to new situations, and self-critiquing one's own abilities are central to our success in today's working world—and, more important, to our lives as learners and human beings. In the words of education theorist Will Richardson (2012), we have begun "crafting a new narrative around learning"—one that he witnessed firsthand when his teenage son leveraged many different information sources in order to figure out how to play the video game *Minecraft*. Richardson describes the joys but also the implied perils of this narrative in his book *Why School?* (2012): "In this new story, real learning happens anywhere, anytime, with anyone we like—not just with a teacher and some same-age peers, in a classroom, from September to June. More important, it happens around things we learners choose to learn, not what someone else tells us to learn."

Unfortunately, contemporary education also harbors forces that run contrary to the tried-and-true practice of inquiry-based education. In the era of No Child Left Behind, standardized tests are the yardstick by which many schools must prove their worth, and student-generated projects are typically not accepted in place of the multiple-choice exams. The Common Core State Standards—rejected by some states for being too restrictive—also threaten to force teachers to deliver large chunks of standardized content, leaving little or no time for students to engage with what interests them personally. Administrators are often sympathetic to classroom teachers in terms of the havoc that standards can wreak on authentic learning but are rarely in a position to run interference. Teachers are left with a quandary: How can they create an authentic learning environment in today's standards-driven atmosphere?

The answer is that many of them already do—and this book will show you how. The following chapters present a detailed framework for implementing a personalized, inquiry-based education in a typical secondary classroom. The framework has five core principles, which are modeled after the scientific method and were pioneered at a real high school called the Science Leadership Academy (SLA) in Philadelphia, Pennsylvania. The word *framework* is intentional here—unlike a script or an instruction set, the examples presented in this book are designed to give educators a solid but open structure that can guide

their own curriculum and classroom design. Moreover, you can use this framework to transition the content and skills you already cover, thereby providing students with a meaningful education while still meeting the educational requirements of your school, district, or state.

This book also provides detailed insight on how to effectively integrate technology into inquiry-based education. Currently, teachers and schools often fall into an embrace/reject dichotomy when it comes to using technology in the classroom. They either hop on the bandwagon with each new shiny tool, or they proclaim technology a "distraction" and ban it from their classrooms entirely. These splits often run across generational lines, and you can probably point to where the division happens in your own school building. You might even recognize such a split in yourself. Both sides of the argument have their point. But this "digital divide" often reflects a misguided focus on the *what* of technology, instead of the *why* and the *how.* The teachers who resist technology integration are, by extension, willfully ignoring ways it could change their classrooms for the better. The teachers who embrace technology sometimes miss this opportunity as well—they are excited to use a new tool, but they focus on the simple presence of that new device instead of thinking about how it could influence their curriculum or teaching. (Unfortunately this approach is reinforced by much of the education technology industry, which focuses on the latest devices and software in the interest of maximizing profit margins.)

In his book *Education Nation,* Milton Chen (2010) characterizes this kind of split as "resulting in a waste of precious time, resources, and policies, and, most of all, little impact on student learning" (p. 23). Instead of falling into an either/or debate, he urges educators to reconcile apparent opposites with a "smarter synthesis" that looks at the bigger picture of learning.

In this book, this adjustment means shifting away from looking at technology as an end in itself and toward using technology as a medium for all kinds of learning. To make that shift, schools and teachers need to be asking the following question: *How can technology transform education?*

Students can help answer this question for schools, because they are already exploring and benefiting from the transformative properties of technology as they use it outside of the classroom. As a result, students are often ahead of the game when it comes to personalizing their own learning. According to the Pew Research Center, teens have unprecedented access to tech tools. In 2012, 93 percent had a computer at home and 37 percent had their own smart phone (Madden, Lenhart, Duggan, Cortesi, & Gasser, 2013). The next section describes several of the positive effects of technology on learning, along with examples of how teens (and many adults) are already making this shift on their own time.

The Transformative Effects of Technology

In many ways, access to—and effective use of—technology involves turning the traditional methods of education on their head. The transformation extends to many aspects of teaching and learning, including what is emphasized; how students interact with teachers, other students, and people outside the classroom; and classroom management.

Shifting the emphasis from content to skills

When an education is content-based, the primary skill being practiced is memorization: you learn it, you repeat it, and you've shown mastery of the information. This process is an essential part of human learning, and being able to do it well has certain benefits. However, it only works when the memorized content will be applied on a regular basis—the Pythagorean theorem in geometry, or the lyrics of your favorite pop song that you like to sing in the shower. When we ask students to memorize content that they are never going to apply to a task, they quickly forget it. Why base education on such a rudimentary skill?

Technology shines a light on this weakness in education because it makes that basic content incredibly easy to access. Information that resided in a heavy textbook or a distant corner of the school library can now be pulled up instantly, anywhere, which undercuts the argument

that "you have to memorize this now so that you know it later." When students are liberated from the monotony of memorization, they have time to learn the deeper frameworks and contexts that give facts and figures meaning. Then they can apply these understandings to *any* content they encounter in the future. The skills that they learn become the enduring understandings of their education.

Allowing for constant engagement

Along with being easy to use, technology also provides constant access to both the information and the tools needed for authentic learning. Students often have round-the-clock access to a computer, sometimes provided by their school. Where this is not the case, cell phones are becoming increasingly powerful proxies for traditional machines.

Because students so readily embrace tech tools, they are already benefiting from the power of access—doing rapid-fire research via an Internet search, mastering the skills needed to do well at an online game, or creating unique multimedia content and sharing it with the world. Consider the difficulty that teens once had in procuring the knowledge that would help them grow as learners. In the documentary *The Beatles Anthology*, Paul McCartney tells a story about the early days of playing guitar, when he and his friends were still learning basic chords. When they hear about a "bloke across town" who knows how to play a B7, they spend the day taking several buses across Liverpool just so they can learn it. The story is charming, but completely antiquated by today's standards. Musicians now can pick up all of the basic instruction they need online; a search for "B7 chord" on YouTube results in approximately 19,100 videos, the most popular of which has been viewed over 278,000 times. Constant access to resources and communities means more time to actually practice and create instead of slowly tracking down basic information.

Educators sometimes look down on these independent activities as something that distracts students from their academic pursuits. But this kind of access can also enhance education when the curriculum capitalizes on it. The research, problem-solving, and content-creation

skills that students are developing on their own time can reap big rewards in the classroom, provided that time and space are allotted for such activities.

One specific aspect of this engagement is the level of connection that is suddenly possible for teachers and their students. Everyone is a part of the same online world, whether watching the same videos or being members of the same social media network. This is something of a brave new world for educators, figuring out how to navigate an online realm where they can constantly be in touch with their students and have access to each other's lives in ways that never happened when contact ended with the school day. Unfortunately, many school administrations respond to this new dynamic by attempting to restrict or ban online contact between teachers and students, when it would be more useful and instructive to model appropriate behavior and etiquette before students become adults (more on this topic in Chapter 7, "Embracing the Culture").

Democratizing learning

Technology can bring increased democracy in a variety of ways. The first, and perhaps more obvious, is curriculum-based. Because technology—and, in particular, access to the Internet—allows learning to become personalized, it allows for infinite possibilities for learning inside a single classroom. In a traditional "gatekeeper" classroom model, the teacher must impart all relevant knowledge to students personally because the teacher is the "expert" in that subject. In a classroom with integrated technology, however, access to the Internet gives students the flexibility to pursue their own personal interests. The teacher no longer has to serve as the sole source of knowledge.

Of course, this doesn't mean that the teacher has no purpose. Instead of primarily lecturing students on content, the teacher must now aid and assist students in their own quest for knowledge. This shift in focus does not happen automatically; there are plenty of classrooms where students could be exploring their own interests within a given topic but instead are still subjected to a one-size-fits-all curriculum. The shift must be intentional.

Integrated technology can also support an intentional shift toward a more democratized classroom structure. In a typical classroom setting, only one person speaks at a time, and this person is most frequently the teacher, followed by a handful of the most confident students. The same goes for written interaction; students produce papers that only the teacher reads and comments on, or they give presentations to the class but receive feedback from only the teacher. Some classrooms include small-group work, but even then, the loud voices dominate the conversation.

This one-person-at-a-time approach can be useful, but it seems outdated compared with the many different ways that students communicate with each other online. Typically they are having text-message discussions with multiple people at once, and they hop in and out of group chats or hangouts. An individual might start a conversation thread online, and then anybody who wants to comment may do so—and that conversation could go on for days, depending on how popular it becomes.

It's when students are trying to engage with all of these conversation mediums at once that teachers worry that they are multitasking themselves to distraction. However, each individual method of online communication has its value in the classroom. Student interaction can be both highly synchronous, with everybody commenting at once, or highly asynchronous, with student work being archived for later observation or use. It is important to note that the teacher's voice, when filtered through technology, does not automatically have more weight; suddenly the teacher is just another commenter on the discussion thread, or another face in the video chat. This reality certainly requires a shift in thinking on the part of educators, but the increase in student voice makes the transition worthwhile.

Connecting to "the real world"

The previous sections of this chapter have discussed the benefits of students having access to contemporary, relevant materials. Many teachers already make space for this in their classroom by bringing in the latest bestselling novel or a news article relevant to the current

unit. Technology makes it easier to bring in the outside world, but doing so is not impossible without it.

Where technology does provide a tremendous shift, however, is in making it simple for students to reach out to that larger world. Instead of just observing what takes place beyond the school walls, students can now contribute to current movements, debates, and initiatives. On a basic level, this access makes it much easier for students to participate in some of the more traditional ways of "speaking up" in society. For example, students can submit letters to the editor electronically or approach politicians via social media. These methods can provide an increased sense of confidence and legitimacy that speaking up in person cannot (on the Internet, nobody knows you're a teenager).

Of course, this kind of traditional communication is only a small piece of what can be accomplished via technology in the classroom. The assignment that gets handed in to the teacher and is never seen by anybody else may not feel like real work, whereas the project that has to be polished for public consumption via an online portfolio is as real as it gets. By leveraging the Internet as a showcase space, especially by plugging into existing venues for written and multimedia work, students experience the pride of being "professional" and get the benefit of outside feedback.

Just as they navigate student-teacher relationships online, schools are also tasked with the challenge of dealing with how their students present both the best and worst versions of themselves on the Internet. Students may be savvy in the methods of online communication, but they can also be blissfully ignorant as to who has access to whatever they share. Again, teachers do students a disservice when they seek to limit or ignore their connection to the online world. It will happen no matter what, and it will be messier without involvement and guidance from adults.

Simplifying the back-end work

Many schools still print and sell paper agenda books, but the most organized students (and teachers!) have eschewed these planners in

favor of online calendars and to-do lists, with reminders and organizers built in.

Teachers can benefit from this transition not only for their own lives, but also for the management of their classrooms. When materials can be distributed via an online hub, there's no more making copies and taking time to hand them out in class (as well as no chance that the students can lose the paper). When grades can be updated electronically and accessed directly by students, they can review progress reports at their own pace and on their own schedule, as well as benefit from programs that help them analyze their strengths and weaknesses within their own performance. Technology can even greatly alleviate the stress of providing feedback; most teachers can type faster than they can handwrite, and when they finish their commentary, they can send it right back to students instead of letting it languish in a folder.

These all may seem like technical points, but it's important for teachers to recognize the transformative value of technology for their own practice, not just for their students. Curiously, this is often the last area where teachers make a change, even though it provides them with the most immediate benefit. The first year I worked at SLA, I made my students print out their essays so that I could comment on them by hand. The second year, I did the same thing. The third year, I finally realized there were a dozen ways I could facilitate that process online, and I haven't looked back.

A New Framework for Learning

When technology is meaningfully integrated into an inquiry-based classroom, the classroom benefits from the positive transformations just described. Unfortunately, these transformations do not happen automatically when a classroom gets a set of laptops. If teachers or schools want to, they can use technology to prop up the same old curriculum and policies. (A multiple-choice exam given on a laptop is still just a multiple-choice exam.) Usually this lack of transformation is due to a lack of enthusiasm for innovation on the part of the educators. Sometimes, however, technology can enable the worst qualities of our

educational system. The possibilities for surveillance of students via their devices, for example, is downright frightening and has already led to a lawsuit in Pennsylvania (Kravets, 2010).

If the meaningful use of technology democratizes a classroom, then the guide to making that shift cannot be authoritarian or prescriptive. Instead of a rigid set of rules for implementation, classrooms need a framework that is solid in its approach toward teaching and learning but leaves room for educators to adapt technology to their subject area and teaching style. This kind of framework both maximizes the transformative properties of technology and minimizes its potential misuse.

The founding teachers of SLA set out to create this kind of framework before their school opened its doors in the fall of 2006. They spent the summer considering the environment they wished to create, and what conditions would need to be established. This effort included figuring out how to successfully maximize the use of technology, since the school would have a one-to-one laptop program for all students. Although the teachers knew that they would be working with some very new classroom protocols, their inspiration for the framework of the school came from an older, more established source: the scientific method. This choice led to the school's development of its core values.

The five core values

Five core values serve as the anchor for teaching and learning at SLA, and serve as the outline for this book

- **Inquiry**—Authentic learning can happen only when there is a legitimate desire to gain knowledge or skills. Students need to be able to ask their own questions (with varying degrees of guidance) in order to engage with their education.
- **Research**—In a world where our access to information is becoming limitless, what matters is no longer how much you already know, but how well you can find what you need to know. Students need to learn how to both collect and interpret their own data, as well as identify and assess outside sources for quality and credibility.

- **Collaboration**—Whether in person or electronically, collaboration has become a cornerstone of the work life of adults, yet students are typically expected to produce and prove their knowledge in isolation. Working together not only supports students in their pursuit of personal achievement; it also helps them develop interpersonal skills that are essential for their future professional lives.
- **Presentation**—This skill is often pigeonholed as the "front of the room" presentation that students loathe. Presentation is actually a skill that students use constantly, both in the classroom and, increasingly, online. Bad presentation skills can be damaging to both their professional and personal reputations, so knowing how to present themselves and their work appropriately and effectively is essential.
- **Reflection**—How do we improve ourselves? Curriculum is often written as a race to the finish line, without any time or space for students to consider what they could do differently, or better. Reflection provides a necessary pause between presenting a finished work and beginning a new line of inquiry, and helps ensure that students (and teachers) improve with each cycle of learning.

Success of the model

The SLA was founded at a time when students and families in Philadelphia were looking for learning environments that improved upon the traditional high school model, and the school has proven itself a place that can produce conventional success through progressive methods. The school's project-based model has also proven no barrier to achievement on standardized tests. In 2012, more than 80 percent of students scored proficient or higher on state exams in both reading and math, with a less than 5 percent gap between white and black students. And after nine years, the school has seen five classes to graduation with a 99 percent graduation rate; 98 percent of those students go on to college—with close to $4 million in scholarship money awarded to graduates in 2013.

What matters more, of course, is how students benefit from their education after they've graduated. We actually warn students that they are likely to be surprised (and possibly uninspired) by their freshman lecture-hall courses in college; but graduates quickly discover that their writing, reading, and research skills are more advanced than those of most of their new peers. "You taught me how to think" is a common refrain when students come back to visit the school—as they frequently do, during holiday breaks or on a random day when they're not in class. The level of connection that graduates still feel to their high school is remarkable. The school was, simply put, somewhere they wanted to be. Just as adults enjoy a work environment that engages and challenges them, students will respond to a school that values their individual contribution to their learning.

How This Book Is Organized

Each of the next five chapters describes a core value in detail, with the following features:

- **Introduction**—A detailed breakdown of how this concept can transform your classroom practice, with a discussion of "the digital connection" for each of these qualities.
- **A Framework for the Classroom**—A point-by-point list of directives for implementing this core value in your teaching, with specific examples from real teachers and their curriculum. At the end of each section, there's also a "Making the Shift" feature that presents the first two steps you can take to bring this practice into your classroom.
- **Student Perspectives**—Brief, insightful anecdotes from SLA graduates about their experiences mastering the core values and how a value has helped them after high school.
- **Roadblocks and Work-arounds**—Advice based on the experience of teachers who have implemented these values and already know the most common challenges. This section provides solutions in advance, helping you avoid these roadblocks before they appear.

- **Schoolwide Practices**—Tips and tricks for expanding the use of this value beyond an individual classroom.

At the end of the book, a chapter titled "Embracing the Culture" describes some of the larger policies and protocols in place that can help facilitate authentic learning schoolwide.

How to Use This Book and How It Can Help You

Like any comprehensive education text, this book can be both read cover-to-cover and also returned to as a reference. Hopefully the text will provide you with so many useful suggestions and examples that you will do some extensive highlighting and note-taking! This framework can be adopted by an individual teacher, a group of cooperating teachers, an entire school or a whole district; it can be used to overhaul a curriculum during the summer or used for instruction ideas in the middle of the school year. At SLA, the framework is universal, but its design allows individual teachers at the school to bring their personal touch to the curriculum they design while staying true to the five core values. The next chapters provide multiple examples of their application of the framework, and additional resources appear in the appendices.

Most important is the fact that although the framework was developed at a school that has a one-to-one student laptop program, *you do not need this level of access to technology in order to adopt the core values described in this book.* The framework does not rely on any particular brand of device, software, or app, and although the examples include plenty of references to students using electronic devices, much of what the students do can be emulated offline.

As discussed earlier in this chapter, educators are often stuck in a false dichotomy of being either for or against the use of technology. This book can help you circumvent that debate by providing you with a model of how to use technology *meaningfully*, to support a personalized-inquiry curriculum. This process will likely affirm some of the pedagogical methods you already believe in. It will also probably sneak in some new ideas you hadn't considered before—and you'll be pleasantly surprised at the results with your students.

That is not to say that this transformation is easy or without its challenges. As with any framework, there are a few common pitfalls that educators are likely to run up against. Smaller ones are addressed in the "roadblocks" section of each chapter, but here are a few overarching pieces of advice.

Make time and space for the practice

At SLA, the challenge of making time and space for inquiry-based, personalized teaching and learning is often framed with the question "where does it live?" Over the course of your own education and career, you have likely encountered great new ideas or methods, resolved to try them out, and then watched the entire school year zip by without finding a sliver of time to implement what you know would really be a good thing for your students. Even when you do manage to set aside a time for the new approach, the results often aren't as effective as you had hoped.

Adopting a model of personalized inquiry can do wonders in your classroom, but as with any new approach, students need set-up and modeling for it to stick. If adopting this framework means a change in how you run your classroom, let students know that they are in for something different, and make sure you provide ample and explicit instruction as you go through new modes of instruction and assessment. (If the powers that be won't allow for an entire year of this style of curriculum, make the shift for the last part of the year instead of the first. It will be hard to get kids to go back to a more traditional classroom setting after they've enjoyed the empowerment and autonomy of personalized inquiry.)

Make room for student inquiry

Once the time and space have been made, the next step is making sure that students' authentic impulses as learners are honored. In a traditional curriculum, inquiry is frequently labeled as being

off-topic—if all of the content to be learned is already set, then anything else that students bring up can only be tangential. This kind of narrow track needs to be traded for personalized courses of study that students (mostly) pilot themselves. This approach can certainly involve some instruction that is more traditional, but that instruction is always presented with the intention of preparing students to learn on their own instead of preparing for a factual exam.

Don't forget to provide support

The inverse of the previous problem is that instead of stifling student inquiry, teachers give students so much room that the class loses focus. Although this model is very much student-driven, it is still meant to be school. This is part of why this book is not called *Individualized Learning*; in the education technology industry, the term *individualized* often connotes an entirely automated learning program, with no teacher present. In the model presented in this book, students are not meant to be left completely to their own devices (literally and figuratively). They may develop their own line of inquiry, but they will need your feedback in refining their questions. They may collect their own data sources, but they will need your guidance with interpreting statistics and determining credibility. You will be learning along with the students, and your status as a learning expert will provide them with the support they need so that their work is the best it can be.

I hope that you find these next chapters both challenging and helpful—that they help your thinking in terms of your teaching practice but also provide you with ample support and examples to make that challenge a reality. As teachers, we must set the tone for our students by engaging ourselves in the "further inquiry" that Dewey described all those years ago. This book is a roadmap for that process.

STUDENT PERSPECTIVE: LIFE AFTER SLA

Jenn Wright, Class of 2013

Before I came to SLA, I thrived at a traditional Catholic middle school. I was the bookworm in my class, that annoying peer who struggled to stay in her seat as she raised her hand for each and every question. I liked school because it came naturally to me—simple as that. I also cared deeply about the difference between a 97 percent and a 98 percent, and, to be honest, I equated a lot of my self-worth to the gap between those two numbers.

Learning through projects at SLA was a huge transition for me, and that was challenging at the beginning because it was the first time I was partially responsible for another person's grade and someone else for mine. I learned the importance of investing into the questions being posed. I figured out how knowing your own strengths and weaknesses helps to understand those of others to more effectively work together. I learned to take ownership of the quality of my work because it was being judged by my peers through in-class presentations and the general public via the Internet.

Fast-forward to college, where my peers once again care quite deeply about the disparity between an *A-* and an *A*. I'm relearning how my grade depends upon just four assessments, two papers, and two exams, and most of the people around me only care to know that they are above the class average and curve.

I manage to distance myself from a grade-obsessed mindset because I now understand how to put learning into context. Learning in a project-based curriculum showed me how the knowledge in a particular field builds and is not meant to stop once the last chapter of the textbook comes and goes. I put stock into the connections I am able to make on my own between the material in the classes I take and the world around me, as well as the relationships I develop with my professors—the people who are actually observing the trends and developing the material I am learning.

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