The 2014 Claude Bernard Distinguished Lecture: the social contract of learning

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Submitted 15 October 2014; accepted in final form 1 December 2014

Carroll RG. The 2014 Claude Bernard Distinguished Lecture: the social contract of learning. Adv Physiol Educ 39: 1–4, 2015; doi:10.1152/advan.00135.2014.—The shift to competency-based education expands the role of the teacher from that of a provider of information and into a shaper of knowledge, skills, and attitudes. These roles are facilitated by establishing a social contract between the instructor and learner, a contract that clearly defines the rights and duties of each. Adopting greater responsibility for the development of competencies in our learners allows faculty members to truly have an impact by shaping the behaviors of learners.

Claude Bernard; Bloom’s taxonomy; competencies; medical education

I was delighted to be selected to present the 2014 Claude Bernard Distinguished Lecture of the Teaching Section of the American Physiological Society. I have found the past Claude Bernard lectures to be challenging insightful and useful. Consequently, shortly after my delight, my second thought was “Now I’m in trouble!” The audience will be full of individuals who have helped shape my teaching. So the pressure is on to do something useful...insightful may be setting the bar too high.

When trying to develop a thesis, a little research never hurts. I was able to borrow a book, Claude Bernard and the Experimental Method in Medicine, by James Olmsted and E. Harris Olmsted (8). This biography places Bernard’s notable and numerous achievements in context, reflecting both the era in which he lived and the numerous trials and tribulations of his life. We tend to think of historical figures as having a clear and smooth path to success. This was not the case for Bernard, who was treated with indifference if not scorn by his medical colleagues. This historical context only underscores the significance of his insights and findings. While a very enjoyable read, the book did not propel me any further in the development of a thesis for my talk. The pressure continued to build.

As another way to avoid working on the talk, I turned to my current academic duties. I’ve been a course director for the medical physiology course at The Brody School of Medicine, East Carolina University, for 18 yr. I’m very lucky: our physiology department has many gifted instructors. Some instructors, however, are works in progress. Reflection on the different approaches and successes of the instructors provided the basic thesis of my talk: observations of the “social dynamic” of instruction.

My examination of the Social Contract of Learning is explored in three slightly related components. It begins with an early experience that only in retrospect can I identify as my participation in a social contract. The second component shifts the perspective to the back of the lecture hall, observing the interactions of different faculty members with classes of students, couched in terms of a series of inflammatory questions. The third act moves to the front of the room, using one of our instructors as an example of how to develop a social contract in a team-taught lecture course.

This talk and even the title was shaped by past Bernard lectures. In his 2012 talk, Bill Galey cautioned that the use of colons in a title was a sure indication of an upcoming boring lecture. Consequently, I avoided a colon in the title by using a subtitle. Bill’s recent passing means I lost a chance to see if that particular “dodge” would be acceptable to him, and I miss the opportunity for that conversation. Penny Hansen spoke of the hidden curriculum (6), a topic that has now evolved into “the power of stories.” I am going to need help from the audience in this presentation: in about 10 min, I will need some of you to share your story about a significant teacher in your life. I then hope to use our collective story to illustrate the power of that social contract.

I do believe that most of teaching is allowing the student to understand what they already know. Accordingly, the purpose of this talk is not to tell you something new; rather, it is to have you understand what you already know in a slightly different way.

Part 1: Social Contracts Can Shape Behavior

Let us turn to my story. As I have often told my children, life is full of learning opportunities. Some are learned immediately. As a nine year old, I learned one of those lessons: children should not play in rock quarries. As an adult, that lesson seems obvious...as a child, it took me 1 wk in the hospital and another 2 mo recovering at home to fully embrace that lesson. It was 5 yr before I returned to that quarry. Yes...life is full of learning opportunities.

Some of life’s lessons are learned only in retrospect. We are all products of the era in which we live. Those of you who know me can probably guess that I was something of a problem child. Really. Not quite a poster child for juvenile delinquency...more focused on misguided mischief. Our high school had a government day, where after elections students assume the roles of Mayor, City Council, Justice of the Peace, and other civic roles for one working day. Our student leaders appointed me the Chief of Police. It seemed reasonable. I already knew where the front and side doors were to the police department, and some of the officers were already familiar with me.

In the spring of my junior year of high school, I decided to let the air out of the tires of my social studies teacher’s car. Not just one tire, because that would involve just changing a tire. I had given it some thought. All of the tires. In the school parking lot. In the daytime. OK–maybe this particular plan
Why do we all have jobs?

Structured interactions

Teacher

Learner

Content

Fig. 1. Interactions among teachers, learners, and content.

needed a little more thought. This adventure earned me some additional quality time with Mr. Hubert Connor, the school guidance counselor. Mr. Connor was a very effective writing instructor, using what I now recognize as formative feedback. Most of what I know about the disciplined scientific style writing I first mastered under his tutelage. In creative writing, I was and remain hopeless. Mr. Connor was well respected and a strong student advocate. Largely because of his advocacy, I was not expelled for my act. I did, however, set a new record for detention: 100 hours, which was a personal best and I believe still may stand as the school record.

During our time together, Mr. Connor was able to redirect my “enthusiasm” using the three major characteristics of the social contract: a reciprocal relationship, establishment of mutual obligation, and an exchange of value. This relationship had been established during my sophomore year while a student in his class. The strength of that relationship allowed him to shift my behavior rather than just impart knowledge. That is the power of a social contract.

Reflect on the truly significant instructors in your past. Hopefully, they imparted knowledge. But more than knowledge, their true significance was that they induced behavior changes. Too often as instructors, we focus on knowledge, unaware of the opportunity to shape the future of our students. We need to seize the opportunity that we already have to better serve our students.

Part 2: Inflammatory Questions Can Provide Insights

Now let’s shift our focus to the back of the room. As course director, I attend all of the medical physiology lectures. Most are good, reflecting the significant effort and diligent preparation of the instructors. Some lectures are boring. Really boring. Deadly boring. During parts of those lectures my mind wandered, and I turn to questions that I find intriguing.

Why do we all have jobs? Most faculty members earn greater than $1,000 per week. What have you done in the last week to have someone to reach into your pocket and pay someone else $1,000 to do for you? As I reflect on that question, I don’t really have a good answer. I’m cheap. I really value money. Yet the State of North Carolina has made that same bargain for detention: 100 hours, which was a personal best and I believe still may stand as the school record.

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Why is the focus on knowledge? Abundant knowledge already exists. There are 120,096 libraries in the United States, housing some of the 130 million books that have been published (1). One hundred hours of video are uploaded to YouTube every minute (12). Yet we still focus our instructional decisions on knowledge.

In the 1950s, Bloom and colleagues developed a taxonomy or classification scheme of educational objectives (Table 1) (5). Most educators are familiar with Bloom’s taxonomy in the cognitive domain, progressing from knowledge through evaluation. Less familiar to most instructors are the taxonomies in the affective domain, moving from receiving to characterizing, and the psychomotor domain, moving from perception to origination. Bloom and colleagues developed these taxonomies to shift education away from knowledge and into higher cognitive activities, behaviors, and actions. In surely one of the greatest ironies of education in the late 20th century, Bloom’s taxonomy has been used to completely ground instruction in the cognitive domain. One of the current educational paradigms impacting medical education is the shift to competencies (10). Competencies address the learner’s knowledge, attitudes, and skills and more closely align instruction with the practice of medicine. We are only returning back to the original concept of Bloom’s taxonomies: knowledge addressing the cognitive domain, attitudes addressing the affective domain, and skills addressing the psychomotor domain. This is not really a new insight; we just understand it in a different way. It has only taken us 60 yr to move beyond the early paragraphs of the introduction of the work by Bloom and colleagues.

As instructors, we have to appreciate that the teacher’s significant impact is beyond just knowledge. Analogies that emphasize this aspect of teaching talk about the teacher as a guide.

What moron designed the American medical education system? There are 141 allopathic medical schools. All of them have an identical entry gateway, consisting of the Medical College Admission Test and a unified application process (American Medical College Application Service and Texas
suitable for the classroom. Key components of a contract are
enhance a learning activity.

Part 3: How to Establish a Social Contract in the
Classroom

So, let us adapt the definition of a social contract into one
suitable for the classroom. Key components of a contract are
that it is a legally enforceable bargain, entered into voluntarily,
with mutual obligations, and exchange of “consideration.”
Extending this, the social contract is an agreement between a
community and its ruler that defines and limits the rights and
duties of each. When I saw that definition, I really liked the
term “ruler.” I guess my graduate classes in adult learning
theory have not completely changed my attitude.

To be effective, an instructor has to establish the basis of the
contract, making clear what is in it for the participants as well
as what is it for the instructor. A contract is between individ-
uals, so the instructor has to make an effort to establish
personal relationships with the students. This involves letting
students appreciate the instructor as an individual, and the
instructor as much as possible dealing with the students as
individuals. The social contract has to clearly identify the
rights and duties of both parties, making clear what the instruc-
tor is willing to provide as well as clarify the expectations for
the student efforts. Finally, the social contract has to have an
exchange of value, showing respect for the time and effort of
the students and clarifying the benefits of their participation.

To create the social contract of learning in a lecture hall
class, each of these components has to be achieved. Unfortu-
nately, time often constrains the development of such con-
tracts. In a multiyear program, this contract can develop grad-
ually, such as occurred in my high school experience. In a
semester-long single-instructor course, developing the contract
is still manageable. For an instructor whose exposure is limited
to a block of lectures, it becomes challenging but still feasible.
The premise for this lecture came from watching one of my
colleagues, David Brown, masterfully developing such a con-
tract over the first 10 min of his 2-wk block of lectures and
reinforcing that contract throughout his lecture series. For
a single lecture, it is particularly challenging, but as an instruc-
tor, I am convinced of the power of role modeling. In devel-
oping the 2014 Claude Bernard Distinguished Lecture, I’ve
attempted to model the social contract with the audience,
developing a sense of reciprocity, mutual obligation, and
exchange of value.

In conclusion, I have tried to shape this talk to extend
beyond the typical cognitive content and delve into the affect-
ive domain. Causing a change in behavior is a tough task.
However, if this talk does not stimulate reflection and induce a
desire to change, it will just be sound wave vibrations in the air,
gradually becoming extinct. We all can identify significant
teachers in our past; the challenge is to become that significant
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