

# Scripted Learning Needs Teachers Who Follow the Script

Claudio de Moura Castro

*Modern distance education programs rely on highly structured materials designed to replace the absence of regular teachers present at all times. Structured or scripted learning critics claim that this methodology takes initiative and creativity away from the teachers, thereby limiting their autonomy and freedom to a certain degree. Nevertheless, in Latin America, programs and initiatives such as Escuela Nueva, SENAI, Telesecundaria, Telecurso 2000 and Acelera Brasil, all of which encourage teachers to follow detailed, step-by-step instructions on how to deliver their courses, are obtaining positive results on student learning achievements. This seems to suggest that structured learning is effective, especially in conditions where teachers are underprepared and overworked.*

## **Structured Learning Seems to Be a Good Method**

Teachers who follow detailed instructions on how to use the assigned videotapes and books obtain better results than those who know chemistry but don't follow the instructions. This is the conclusion arrived to by Professor Heiko from the University of São Paulo (Brazil) and author of the televised high-school chemistry program used in the successful Telecurso 2000.<sup>1</sup>

This statement put us on the cusp of a very controversial topic: structured or scripted learning. Teachers do not have to reinvent content or teaching methods on their own. One way or another, someone would have taught them some of both, by the time they became teachers. The issue is how much support and guidance they get in preparing and conducting their classes.

## **What Is Considered Structured Learning Changes with Time**

In the past, teachers had notes from the teachers who taught them. Books progressively became standard sources, both for content and for how to teach. Subsequently, students got their own books, relieving the teachers from much effort in class preparation. Then came workbooks for students.

Increasingly, materials prepared by someone else replace the effort and initiative of teachers. The rationale is clear enough. Some people are chosen to prepare teaching materials due to their superlative skills in that task, as well as for having more time available, more support and more resources than the individual teachers in the classrooms.

None of this is new or particularly controversial. It is a universal tendency that is hard to disagree with. However, at any given time, there is a limit to what is perceived as support and undue interference with the space of the teacher. Beyond a certain limit, structuring is claimed to take away the initiative and creativity of teachers to "do their own things." It makes them too dependent on what others have created and a few teachers resent this perceived loss of autonomy and freedom. They find it demeaning and impoverishing.

Scripted or structured learning refers to the use of materials that detail classroom procedures more than what is presently considered standard practice. It presents contents and the conduct of the classroom in ways that are more spelled out than is usual. Notice that this is a very relative and time-dependent con-

---

<sup>1</sup> This is a secondary school equivalency program created by the Brazilian Globo Network. The television program is broadcast nationally, watched by over five million people and used as videotapes in classrooms sponsored by enterprises.

cept. When students did not have textbooks, their introduction was a great leap in structuring learning, feared by some. But other than radical constructivists, most teachers today accept textbooks.

### **Does Structured Learning Lead to More Learning?**

The issue today is when structuring goes beyond the standard and accepted. That is to say, the class is further scripted, giving a more precise sequence of procedures, readings, drills, tests, etc. What do we gain and what do we lose by taking these further steps in scripting a course? This is the crux of the matter. More importantly, what do students gain? The goal of teaching is not to please teachers but improve learning.

The initial statement by Professor Heiko aims straight at this issue. Five years of observation and experimentation with television classes have convinced her that the high level of structure of Telecurso gives better results, even when the teachers know a lot less chemistry. In fact, she observes that knowing more content makes teachers less willing to follow the script, resulting in a worse performance of students. In other words, she hypothesizes that bad teachers with highly scripted materials do better than somewhat better prepared teachers who go on their own.

R. Slavin's *Teaching For Success* is an American program targeted at American schools riddled with problems of low achievement. The program is being used by many schools, particularly in inner cities, and is claimed to increase dramatically the performance of the students. Independent evaluations seem to confirm the claim.

However, there is much reaction and resentment against the program and its claims. In fact, there is a website entirely dedicated to criticizing and debunking Slavin's program, <http://www.alt-sfa.com/index.shtml>. The tone of the complaints is bitter and emotional, suggesting that structured learning lives a stormy life.

Constructivists have become the core opposition to structured learning. Notice that constructivism is an eminently reasonable and plausible branch of epistemology and learning theory. It seems to be perfectly compatible with the development of structured strategies on how to help students "construct" their learning. Nevertheless, radicals in the ranks of constructivists have been fighting any efforts to structure learning, going as far as denying the use of standard textbooks. Folklore has it that some angrier zealots preach the burning of textbooks.

It would be presumptuous to resolve such bitter disagreement in this short essay. At stake is whether teachers can do better on their own. However, the arguments for structuring become more persuasive in conditions where teachers are under-prepared and overworked. This is less the case of the United States where more than half of the teachers has master's degrees. But in poorer countries, many teachers are barely literate. Therefore, the issue of giving them more structured materials is of great consequence. Does it improve the student's chances of success?

### **What Is the Experience with Structured Learning in Latin America?**

One way of looking at the issue is to make a quick survey of mass programs supporting underprivileged populations. But first let us remember that all modern distance education programs are based on highly structured materials. The absence of regular teachers present all the time, necessarily leads to their replacement by materials that take over some of their roles. Starting with the Open University in the United Kingdom and reaching the mushrooming programs offered today, structured learning seems the only way to go. Not all programs aim at underprivileged clientele, but the Open University took its name from the open enrollment policy contained in its design.

Looking at the experience of Latin America, it seems that structured programs have a very good track record. Below is a quick overview of some better known programs.

#### *SENAI/Brazil. Fifty years of “séries metódicas”*

SENAI is a large training system, owned by Brazilian federations of industries and funded from a 1-percent levy on their payroll. Last year, it graduated over two million students in different forms of manufacturing trades. It caters to blue-collar clientele, otherwise very poorly served by regular schools. There is ample evidence of being by far the most successful training system in the developing world.

Most of its training uses the so-called “methodical series” derived from European roots but acquiring a highly scripted version in Brazil. The courses are based on a series of practical projects, in increasing order of difficulty and integrating conceptual and practical learning around the same piece that is to be manufactured. The entire course is scripted; hardly any variation is left to the discretion of teachers. A number of studies have demonstrated the efficacy of the institution and its methods. But in particular, tracer studies of the São Paulo SENAI graduates demonstrated not only good job performance but also the surprising finding that up to 40 percent of them eventually returned to regular school and moved up to higher education.

#### *Telesecundária in Mexico and Telecurso in Brazil*

Both are massive programs, with close to one million students in Mexico and half a million in Brazil. Both use television and books as a means to deliver content. Both cater to the lower end of society. The Mexican program is beamed to rural schools and the Brazilian to young adults who have dropped out of school. Continuing evaluations of *Telesecundaria* and initial evaluations of *Telecurso* suggest that they are both vastly successful in bringing serious education to clientele that either could not get any education at all or would get something much worse in the regular schools.

To a very significant degree, both are highly scripted. The TV image brings the topics, contextualizes them and develops the general lines of the argument. The book picks up then, with further explanations, drills and questions. Their merit is that they can be operated with a less than an ideal teacher, or even an untrained teacher, who can work with the students, discussing, helping in whatever way possible, and keeping order and control of the environment, just like in a classroom. But there is no formal lecturing by the teacher aid.

#### *Acelera Brasil, to Accelerate Students Who are Repeaters*

Repeating is a chronic disease in most Latin American schools. Students get too old for the grade they are attending, because they fail end-of-year examinations and have to repeat. In the last several years, special programs have been created to accelerate their progress in school. One of them, *Acelera Brasil* is better organized and has been subjected to independent evaluations. The results are nothing short of extraordinary. In one year, students advance the equivalent of two, attending a program that costs 50 percent more than regular schools. The program is highly structured. Regular teachers are trained to use materials that are quite detailed and step by step.

#### *Escuela Nueva in Colombia and the Success of Rural Education*

Everywhere in Latin America, rural schools perform way below their urban counterparts. However, in Colombia, achievement tests with students have shown that rural students perform better. The most likely reason is the highly respected Escuela Nueva method, initially adopted in the province of Cali but subsequently spread to most of the country—although not with the same standards of quality. Escuela Nueva is essentially a method to deal with schools that only have one teacher for students of all available grades. But the materials used are highly detailed and structured.

A truly rigorous argument in favor of structured learning would have required us to demonstrate that all successful programs dealing with disadvantaged clienteles use this method. At the same time, nonstructured programs dealing with the same clienteles would be a failure. Of course, this survey has not been done and an attempt to do it would hit some analytical snags. This is because there are hundreds of small programs that might be successful and are not structured—in fact, structuring a program is expensive and needs relatively high scales to be justified.

A more reasonable argument would be that all successful mass programs, reaching thousands of students, are structured. But unfortunately, the survey that led to the examples above is neither systematic nor exhaustive. But it is suggestive, nevertheless.

### **Structured Learning Usually Does Not Thrive in Regular Schools**

However, there is something different about the programs mentioned above: none of them are based in regular schools. All of them have been managed by an institution that is different and separated from mainstream schools, in order not to be rejected by the school *ethos*. *Acelera Brasil* uses the same teachers—after special training—but creates a separate track with different funding and administration. *Telesecundaria*, in Mexico, belongs to the Secretaría de Educación but is a completely independent organization and hires higher education graduates, many of whom are not trained teachers. *Telecurso* is private and most classes are in factories, as is the case of Brazilian *SENAI*.

This last observation brings us back to our original identification of a conflict. In fact, some teachers dislike structured learning and, in the protected environment of schools, do not allow its systematic utilization. As a result, most successful experiments, one way or another, had to escape the school environment (by the same token that the Open University had to create its own campus because no British university wanted to house it).

It has been said that the older teachers tend more often to be against structured learning and young teachers, less sure of their skills, are more willing to embrace it. Teacher organizations and some very vocal teachers have also resisted in several cases. If it is indeed true that structured learning is effective and even more critical in poorer societies, then we have to face this problem squarely.