



The Right To Learn

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Your children are your most precious relationships. How they learn is a key question which you may continually strive to answer. It is never easy to answer that question, for each child has a unique learning process, and the processes change during childhood. It is extremely important for parents, teachers and children to follow their learning process closely. They may cooperate by sharing their experiences and discovering appropriate methods throughout childhood, the teenage years and young adulthood.

No one has the answer in education. It is too encompassing. The demands change with each generation. Ultimately you want to give your child confidence in her learning abilities and enthusiasm for a long journey into the unknown future. Will you take on your part of the responsibility for a child's learning process as a parent, as a friend or a teacher?

Some of you may be tempted to leave the learning process of your child to the wizards of digital education who promise they have machines with software that understand your child and can offer her individual learning processes.

Clayton Christensen, the author of *Seeing What's Next, Using The Theories Of Innovation To Predict Industry Change*, asked in 2004,

"What would a disrupted world look like? Students would still go to school. What would be in the school? Banks of computers with virtual classes. Students would spend the bulk of their time doing virtual work. The school would provide music, drama, and athletics.

Teachers would act as counselors, helping each student develop and adhere to a customized/learning plan. This arrangement would better serve the hardest-to-educate students, but it also would better serve the most motivated students.

Teachers could spend more of their time working hands on with individual students. It would cost taxpayers much less money. Everyone would win.”¹

Four years later in, *Disrupting Class, How Disruptive Innovation Will Change the Way the World Learns*, Christensen offers a view of major disruption in the education industry - customized learning for each student based on computer technology. He acknowledges that people learn in different ways. Some differences are coded into the child from birth, others arise through experiences, especially in early childhood. We see some of the differences in the child’s intelligence. Christensen mentions Harvard psychologist, Howard Gardner who promotes eight intelligences: linguistic, logical-mathematical, spatial, bodily-kinaesthetic, musical, interpersonal, intrapersonal, and naturalistic. Standardized tests in public education are based on logical-mathematical skills and linguistic skills. Each school is evaluated according to the performance of their children within the standardized learning processes that is part of a large commercialized system. He states that the commercialized system is, “the context within which a firm establishes its cost structure and operating processes and works with supplies and channel partners to respond profitably to customer’s common needs. The reason the whole commercial system must be replaced for a disruption to occur is that, in each stage, the actor’s business models, economic incentives, and rhythms of innovation and technological paradigms are consistent and mutually reinforcing. What this means is that the entire system for creating education materials, making decisions about which material to adopt, and delivering the content to students must and will change.”²

Christensen defines three types of business models that relate to the education industry; solution shops, value chains, and facilitated user-networks. *Solution shops* use intuitively trained experts who discover problems and find solutions. He considers special education a solution shop. Most teaching is a *value-chain business* where inputs of materials placed in one end of the business, become transformed by added-value and are delivered as high-value products to the customers at the other end. The value chain model is currently dominating the public education system. The third type of model in the education industry is a *facilitated user-network* in which customers exchange value with each other. The user-network is a supporting structure, much like a bank. Whoever facilitates the network makes the profit.

Christensen envisions major disruption in the education industry based on student-centric learning. Software platforms much like You Tube and Facebook, are being created to facilitate student-centric learning. Billions are being invested in this inevitable disruption. The new software will replace the expensive instructional system. Online learning processes will provide digital tools that enable students and parents to build their own products and help children learn in the classroom differently. User-networks will be the business models of distribution, allowing parents, children and teachers to help each other. The best tools will be shared nationally and globally. User-generated, collaborative learning libraries will appear. Users will evaluate tools and create new and better learning tools, not standardized, but learner centric. The teacher remains in the classroom helping students adopt the content to their specific learning process.

Once the textbooks have been replaced by computer-based, online courses, the next stage of the disruption will appear as user-generated, student–centric learning tools for each type of learner become mainstream. K-12 education will be revolutionized from the outside!

Many businessmen, scientists, and educators aim the digital learning revolution at children before kindergarten. Much as Steve Jobs originally developed the Apple computer as a toy for children, Christensen advises experts to make the school’s job easier by focusing on three elements of preschool learning processes:

1. Creation of intellectual capacity in early childhood.
2. Cultivation of strong, positive self-esteem – a child’s core belief about himself or herself. Building self-esteem is a lifelong process, but its foundation is established in childhood.
3. Stimulation of intellectual curiosity, which will serve as a lifelong motivator
4. for continued learning.³

Because research shows that a significant portion of a person’s intellectual capacity is determined in the first thirty-six months, children before the age of four years are now the target of change.

For example: The New York State Education Department provides curricular modules in prekindergarten English Language Arts and Mathematics that schools and districts can adopt for local purposes.

Businesses and educators not only target children in early childhood, but they have convinced schools to offer computer coding as a subject in elementary schools at the same level as language instruction. In September, Apple launched a simple, new app called Playgrounds which enables school children to learn coding as a game. IBM now has programs in high schools across Europe where the students are teaching their native language to Watson, the name of their cognitive technology. IBM proclaims that Watson analyses unstructured data, understands complex questions and can provide answers and solutions.

What can we do about this?

The state is entitled to do what is best for our children, but what if we disagree? Many parents are more concerned with giving their children healthy experiences from prekindergarten to the twelfth grade, than stimulating children intellectually to create digitally-enabled synapses in their children's brains.

There is much more to the human being than the intellect. Feelings, memory, imitation, play, sensory experiences and self-produced imagination are all extremely important. They are also sources of a healthy development of the brain. Not to mention the soul and spirit of the child.

Parents who want to take responsibility for their children's learning process must act to retain that basic human right. All of our children have the right to learn. Parents have the right to choose schools that provide the creativity, moral development or religious conviction they deem necessary.

In the *International Covenant on Economic, Social and Cultural Rights* adopted by the General Assembly of the United Nations on December 16, 1966, Part Two, Article 13, no. 1, the countries acknowledged that everyone has the right to education.

They agreed that, "education shall be directed to the full development of the human personality and the sense of its dignity, and shall strengthen the respect for human rights and fundamental freedom." ⁴

Article 13, no. 3 secures the human right of parents to choose a school other than those run by the state authorities to provide the religious and moral education of the child in conformity with the parent's convictions. Article 13, no. 4 secured the parent's right to establish and direct their own schools that conform to minimum standards.

Furthermore in Article 15, no 3 of the covenant, it is the duty of the state to respect the freedom that is indispensable for scientific research and creative activity. Just how well we implement scientific research and creative activity in the coming years is the key, with or without digitalized classrooms.

Who can do something?

If businessmen and foundations take over the digital content and digital methods in our schools, who will support your child's learning process from year to year? Parents, educators and children can work together to provide healthy learning processes. They can follow three difficult steps to retain ownership over the learning of their children.

Step one is to identify how the child learns. Here we can use Gardner's multiple intelligences, Eccles concepts of the Self and Brain as they relate to the inner and outer senses, and the six perceptual learning styles. This will open new categories of learning in our minds.

Howard Gardner defines intelligence as the ability to solve problems, the ability to generate new problems and to make something or offer a service that is valued in your culture. His research shows that people excel in using two or three of their multiple intelligences. Within each intelligence we can discover different learning styles.

In addition to multiple intelligences children have their own human being, their Self that learns with the help of the brain.

Brain researcher, Sir John Eccles suggests the self-conscious mind:

“can select from the ensemble of performances in the liaison brain, searching now this now that and blending together the results of readouts of many different areas in the liaison brain. In that way the self-conscious mind achieves a unity of experience. You can see this hypothesis as a prime role to the action of the self-conscious mind, an action of choice and searching and discovering and integrating. The neural machinery is there as the medium that is ever changing and multi-complex in space and time. It is there for all operations of the self-conscious mind.”⁵

Eccles proposes that the self-conscious mind plays a superior interpretive and controlling role by modifying the dynamic spatiotemporal patterns of the neural events. When children or teens search their memory for a word, they constantly receive, judge and evaluate the contents with the conscious Self. This active interplay is a superior function, for the Self can accept or reject the content. It can use the content, modify it and store it. According to Eccles the self-conscious mind relates to seven inner senses: thought, feeling, memory, dreaming, imagining, intention and attention. The Self and the brain also interact with eight outer senses: light, colour, sound, smell, taste, pain, touch and perception.

We may broaden our categories of learning by adding the seven perceptible learning styles defined on learningstyles.org: *print* which refers to written words, *aural* which refers to listening, *haptic* which refers to sense of touch, *interactive* which refers to verbalization, *kinaesthetic* which refers to body movement, *olfactory* which refers to sense of smell and taste, and *visualization* which refers to pictures and graphs. This is not an exact science, but it can help us look deeper.

Some areas of learning not yet mentioned are seeing ideas, rational thinking, cause and effect thinking all play a role in childhood. The pace of learning and repetition are also important to explore with your child.

Now we have many new categories of cognition the computers can not provide. The artificial intelligence of the computer can copy real life, but never replace it. It can calculate a child's performance, but not the quality of its true cognition.

Step two is to identify the strengths and challenges the child has in learning.

This becomes clear when you observe how your child learns, month by month, year by year. We always build on the child's strengths. This gives her confidence. When parents, teachers and children identify the strengths and challenges of a child, they can work together!

For *step three* entails the creation of new methods that meet the learning needs of the child. These methods evolve from new ideas that we put into practice. They may be based on child psychology, educational principles and age-appropriate learning. The new methods depend on how well the teachers learn from their pupils, how much they can see in steps one and two. Methods from all educational directions are critically important to share and test out. Schools can develop weekly exercises that give the children confidence to grasp their learning individually.

Each day we spend billions of dollars on systems that do not support our children well enough. The education industry is filled with dogmas and huge business opportunities. Fortunately, no one has the final answer in education.

Sources

1. Clayton M. Christensen, *Seeing What's Next, Using The Theories Of Innovation To Predict Industry Change*, in the chapter, *Disruptive Diplomas*, page 123,
2. Harvard Business School Press, Boston, Massachusetts, 2004.
3. Clayton M. Christensen, *Disrupting Class, How Disruptive Innovation Will Change the Way the World Learns*, page 124, McGraw Hill, New York, New York, 2008.
4. IBID, page 148.
5. The General Assembly of the United Nations, *International Covenant on Economic, Social and Cultural Rights*, 1496th Plenary Meeting, December 16, 1966, Part Two, Articles 13 and 14.
6. Karl R. Popper and John C. Eccles, *The Self and its Brain*, Springer International, Berlin 1981 p. 434.

For prekindergarten mathematics and English see: engageny.org

For learning styles see: www.learningstyles.org