Just say NO to Baby Einstein

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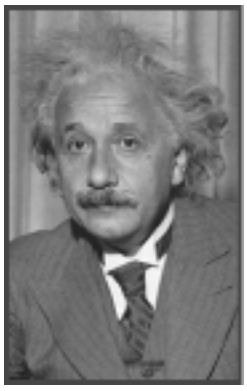

Einstein didn't watch videos as a baby. His genius did not come from knowing lots of information. In fact, baby Einstein spoke very little before the age of four. So much for early reading programs and preschool examinations. Einstein's genius was not based on what he knew. His genius grew from his capacity to wonder and imagine.

Every baby is a genius waiting to unfold. But that blossoming doesn't happen all by itself. Genius needs nurturing - direct, intimate, playful interaction with caring human beings and the natural world. Infants need to touch, taste, roll around in, on and over safe three-dimensional objects, preferably the warm, soft, round bodies of mothers, fathers, grandparents, children, kittens and puppies. Babies need to see and feel the world responding to their movements. Each new and repeated encounter builds a corresponding neural pattern in the developing brain. The more sensual, playful, dynamic, and varied the encounters, the more complex the brain becomes.

Back in the 1960s, about a decade after television was first introduced, Marshall McLuhan coined the phrase "the medium is the message," or more simply, "form is content." The medium is the device that delivers the programming buzzing inside the television or computer. In terms of brain development it is the nature and quality of our interaction with the medium, the box, that shapes development, far more than its content which we experience as the programming.

The mistake most people make is believing that the program is the message. In terms of brain development, before approximately seven years of age, programming has very little impact developmentally. Why? Because of the brain's efficiency.

The brain creates new neural patterns in response to its first few encounters with any new object. Television and computer screens are no exception. Once this basic pattern is established the same neural pathways are used for each subsequent contact. It doesn't matter that the image on the screen keeps changing. Our relationship to the medium (the box) remains the same. In terms of neural development, *the medium is the message*. Developmentally the 6,000 hours of television (and computers) most children view before age five, including Baby Einstein, might as well be the same program.

How much are we really watching? By age seventy-five most of us will have spent more than twelve-and-a half-years of twenty-four hour days watching television. The average six-year-old has already watched nearly one full year of television. Most children have more eye contact with television characters than with their own parents.[1]

Television and computer programs for infants and young children, including Baby Einstein, are like junk food for the developing brain. Junk food is harmful for two reasons. It displaces nourishing whole food and, at the same time, fills the body with sugar, refined carbohydrates, fats, chemicals, artificial coloring, flavoring and preservatives.

For a baby's developing brain television, DVDs and computer programs act in the same way. Two academics at Harvard Medical School observed, "Television viewing is exactly the opposite of what toddlers need for their development... young children's television viewing should be postponed as long as possible." [2]

Interaction with the box represents prolonged sensory deprivation during the most sensitive period of brain growth and development. It displaces full spectrum, three-dimensional, moving, intimate playtime with loving human beings and with nature.

No matter how big the screen or fancy the speakers the sensory experience of sitting stationary in a semi darkened room, staring at a flat screen, is sensory deprivation. And every minute of screen time deprives your baby's brain of the full spectrum sensory and emotional nourishment it needs to build the neural patterns he or she will use for the rest of its life. The harm done by this one-two punch cannot be over stated.

Quoting from Jerry Mander's classic *The Four Arguments for the Elimination of Television*, the medium (today's television and computer imagery) impacts perception in a number of disturbing ways. Direct full-spectrum experience is replaced by a two-dimensional predigested facsimile. Everyone watches the same programs so everyone experiences the same homogenized reality and implicit values. Depth of character is replaced by superficial style. The pulsing screen produces a mild form of hypnotic trance. In Japan, for example, 400 children were hospitalized with epileptic seizures after watching a Saturday morning cartoon.

Radiant screens put the mind to sleep rather than awaken and develop the capacity for wonder and imagination. Television bypasses the critical and creative thinking centers and floods the brain with evocative emotional, sexual, or violent images. The counterfeit is so real, and getting better all the time, that we tend to believe what we see on screen even when our rational mind shrugs off the images as being make-believe. The sensory and emotional centers of the brain accept every thing they register as equally real.

Harvard researchers discovered that watching television slows metabolism. We and our children burn fewer calories watching television that if we sat and did nothing at all. [3] Stanford concluded that "television viewing is a cause of increased body fatness." [4] Governments quote a wide range of studies citing "copy-cat violence" caused by watching violent programs. A long term international study published by the *Journal of the American Medical Association* found that "if, hypothetically, television technology had never been developed violent crime would be half of what it is." [5,6] Watching television is implicated in the global increase of depression, now at the highest rates for children and adults, ever, and still climbing. The World Health Organization describes clinical depression as a deepening global epidemic. Today more and more people understand that too much screen time is not healthy, and yet they still do it. Researchers in Japan, the USA and the UK have identified a middle class guilt arising from watching too much television instead of doing something more productive. [7]

Millions of dollars of public funds were poured into Sesame Street as a national preschool early reading program. After twenty years, to the best of my knowledge, not

one study demonstrated Sesame Street's effectiveness in improving reading scores. In some cases the children who spent the greatest number of hours watching Sesame Street had the lowest reading scores. All of this makes perfect sense when we realize that the "medium is the message."

In August of 1999, the American Academy of Pediatrics issued guidelines recommending that children under the age of two watch no television or ANY screen entertainment, and that children of all ages should never have a television in their bedrooms because watching screen entertainment can "negatively affect early brain development."

What kind of brain development? About seven percent of our children suffer from attention deficits and hyperactivity (ADHD), and the rates seem to be increasing. In the United States ADHD is the most common behavioral disorder in children. [8] New brain imaging research at London's Institute of Psychiatry shows that with ADHD parts of the brain that control impulses are underdeveloped.

Ten years after diagnosis, boys with ADHD are four times more likely to develop mental illness. [9] Researchers believe that "...early exposure to television during critical periods of synaptic [brain cell] development would be associated with subsequent attentional problems." They found that 'early television exposure is associated with attentional problems at age seven' which 'are consistent with diagnosis of ADHD.' Children who watch entertainment screens at ages one and three have a significantly increased risk of developing attentional problems at age seven. For every hour of screen time a young child watches per day, there is a nine percent increase in attentional damage. Researchers believe these findings may actually understate the risks involved and that banning all screen time during the formative years of brain development 'may reduce children's subsequent risk of developing ADHD.'[10]

There are, of course, links between ADHD and consumerism. We are sensation - seeking organisms and our consumer based culture is increasingly saturated with external stimulation provocatively displayed on electronic screens. Competition for our attention is fierce. Damaged attention demands that multi-media producers turn up the juice. Faster cuts, louder music, more sex, more violence. Increased stimulation damages the attention system even more by requiring producers to crank up the volume.

Everything we do is compromised when our attention system is compromised. The quality of our life is "attention dependent." Attention is THE most important natural resource we have. Regaining our attention skills and preventing damage to this system during formative years is a mater of life.

For more on this please see *Fool's Gold: A Critical Look at Children,* by the Alliance for Childhood, and *Corporate Exploitation of Children*, part one and two, Touch the Future publications.
(http://www.allianceforchildhood.net/projects/computers/computers_reports_fools_gold_download.htm)
(http://www.ttfuture.org/services/newsletters/pdf/97fall.PDF)
(http://www.ttfuture.org/services/newsletters/pdf/97winter.PDF)

The point is simply this: the more time a baby spends watching Baby Einstein the less like Einstein that child is likely to become. The company positions its products quite differently, however. Implicit in the brand is the message that watching Baby Einstein will help your baby be like Einstein. But the real baby Einstein did not grow up watching videos. He imagined and played with the real world. He did not sit passively staring and listening to a two dimensional screen for 6,000 hours by age five. The real world has depth, weigh, texture, tastes, sensations, is moving and responsive.

Interacting with a three-dimensional full-spectrum world builds the capacity to imagine, think and move in three dimensions. The more two-dimensional passive screen time a child has, the less developed will be their three-dimensional moving, imagining and thinking skills.

The company's home page begins with:

> *"Trusted by Parents… There's a big fun-filled world out there for babies to discover. Baby Einstein helps by using music, language, nature and art in playful ways to entertain and engage little ones from birth and up. Explore our entire line of playful and interactive DVDs, videos, books, music CDs, and toys today. You'll see how Baby Einstein can help you and your little one discover the world together."*

Trusted by parents means: come on, join the crowd, be like everyone else. You don't want your child to be really different, do you? The neighbor's baby may be smarter than yours! The next two lines are interesting.

> *"There is a big world out there to discover and we can help by encouraging your baby to watch our video rather than interacting with that real world. Our full line of products are specially designed to captivate* (keep your baby captive, stationary, immobile), gazing at flat images of brightly colored toys, engaging gentle motion and loving puppet shows. (I didn't know electronically generated images can love!) *Our videos and DVDs create a multi-sensory learning resource for parents, babies and toddlers."*

I thought crawling on the floor, nursing, playing peek-a-boo, and snuggling with mom or dad, squishing peas into mashed potatoes were multi-sensory learning experiences. The company goes on to say: "Our multiple award-winning video includes delightful images that feature bold patterns, colorful toys, and real world objects."

If you were a baby, which would you prefer, interacting with real world objects or two dimensional images of these same objects projected on a flat screen you can't touch?

We human beings are a strange bunch. We grind up grains that appeal to a dog's extremely sensitive sense of taste and press these into shapes resembling cartoon bones. Then we package these cartoon bones in colorful boxes that appeal to human adults because dogs would never do such a thing. The same is true of babies. Babies would never buy Baby Einstein videos. They are too busy playing and learning from the real world. The real consumers of Baby Einstein products are not babies. The real target is parents and grandparents who want their little darlings to be the next Einstein. I'm quite sure that Baby Einstein products are well produced, colorful and captivating. But the *medium* is the *message*, not the program flashing on the screen. I prefer to squish peas in my mashed potatoes, thank you.

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[1] Audience Research Board, 12 January 2004

[2] Poussaint, Linn, "Say No to Teletubbies", www.familyeducation.com

[3] Klesges, R.C. et al. "Effects of television on metabolic rate: potential implications for childhood obesity", *Pediatrics*, 1993 (2) 281-6

[4] Robinson, T.N. "Television viewing and childhood obesity," *Pediatric Clin. North Am*., August 2001; (48) 1017-25

[5] Centerwall, B.S. "Exposure to television as a risk factor for violence", *America Journal of Epidemiology*, 1989; 129, 642-52

[6] Centerwall, B.S. "Television and Violence", *Journal of the America Medical Association*, 1992; 267 (22) 3059-63

[7] Kubey, R., Csikszentimihalyi, M. "Television Addiction is No Mere Metaphor", *Scientific America Special Edition*, 2004; 14 (1) 48-55

[8] American Academy of Pediatric Committee in Public Education. 'Media Education', *Pediatrics*, 1999; 104, 341-3

[9] Taylor, E. 'ADHD: Does the evidence answer the controversies?' Delivered at the British Association Festival of Science Symposium, 8 September, 2004

[10] Christakis, D.A. et al. 'Early Television Exposure and Subsequent Attentional Problems in Children', *Pediatrics*, 2004; 113 (4) 708-13