

What Counts is Not Always Counted. Education in the Post Industrial Era

Yehuda Kahane¹

Introduction: what counts is not always counted: The focus on economic motivation in the industrial era made us start the post-industrial with dramatic exposure to immense environmental and societal risks. The Post-industrial era represents a new paradigm and is led by a more complex and multidimensional metrics, where the economic motivation is escorted by additional targets. In the Paris Agreement (December 2015) The United Nations has proposed a new set of 17 Sustainable Development Goals (SDGs). ALL member countries in committed to reach the goals by the end of 2030.

The major challenges in reaching the SDGs are related to managerial issues. Currently, governments and business leaders are basically motivated by short term goals, and, therefore, they prefer to gain bonuses and recognition by "cutting the ribbon" on projects that will reach maturity during their term, rather than work on reaching goals for the year 2030 which is far beyond the horizon. Moreover, many important benefits of the SDGs are not counted properly by common accounting techniques, since they are considered as "externalities" (and this argument is sometimes used by well-established vested interest groups to preserve their budgets). For example, if an educational project will be able to reduce violence and, thereby, will cause a substantial reduction of internal security costs and of national defense expenditures, it will not cause a cut in the defense budget, and will not be attributed to the education budget. Similarly, if such a project will cause a major improvement of the trust among people and thereby will lead to a flourishing economy, or will improve the general health level of the population, it will not be credited to the educational budget, since such benefits are not measured and not counted in the right way.

The goal of this article is to offer two global educational projects that, with fairly small budgets, are capable to bring immense benefits in the form of substantial reduction in the internal and external defense budgets, a significant economic growth, improvements of the general health level, etc. And above all, these efforts may enable reaching the long term goals of the ambitious 2030 SDGs challenges. Without these steps, reaching the SDGs , and doing it on time, seems to have very little chances.

Clearly, one of the major challenges in the paradigm shift is education, as there is a need to prepare the people to operate in this new, unrecognized, world. **SDG 4 is to "ensure inclusive and equitable quality education and promote lifelong learning opportunities for all"**². We like to suggest at least two important elements that did not get ample attention in SDG 4, and suggest feasible and practical solutions. One relates to a "bottom – up" approach and the second represents "top-down" approach:

¹ Prof. Emeritus, Coller Business and the Porter School of Environmental Studies, Tel Aviv University, Israel. WAAS Fellow. kahane@tau.ac.il

² <https://en.unesco.org/gem-report/sdg-goal-4>

a. Bottom Up Approach: What distinguishes human beings from other creatures is the advanced speaking ability³. The bottom-up educational challenge relates to the growing need to alleviate the level of human discourse. The ability to communicate affects our achievements, and at the same time can be used as an indicator for our ability to make rational choices. There is an impression that the level of human discourse had deteriorated in recent years, which may have major derogatory consequences on our economies. The level of discourse is related to the ability to plan, to consciously analyze consequences, to build complex tools, to co-operate, and thereby to build large scale projects. Alleviating the level of discourse will enable the world population at large to become a more trusting and co-operative society, and research shows that societies as well as business enterprises with higher trust levels tend to be more successful⁴.

The seminal works of Kahneman and Tversky pointed out that human reasoning sometimes leads to what is regarded as "irrational" decisions⁵. This created much interest in research and led to the assumption that it is a result of the operation of two different systems⁶: One is fast, unconscious and automatic system, while the other is slow, conscious and controlled.

Our speaking ability, too, is activated by two distinct mechanisms: One is apparently based on ancient parts of the brain that mainly preserve the survival instincts of the insects, reptiles, birds and animals. These parts are mainly unconscious and react instinctively and rapidly. They are often un-friendly, and invite aggressive responses. The second mechanism is apparently controlled by the frontal lobe of the neo-cortex. Only human beings are equipped with a developed frontal lobe. This part is reacting somewhat slower, as it reflects a conscious decision that considers alternatives. These reactions are usually conscious, friendly and co-operative.

There is a natural built in "switch" in the brain that transfers control between the ancient parts and the neo-cortex. Since the firsts are instinctive and rapid, the switch remains most of the time attuned to these primitive and unfriendly parts. Mechanic and automatic speech is egoistic and indifferent to others and to the environment in general. Whereas conscious and intuitive speech is emphatic and, therefore, closely adjusted to sociopolitical and environmental dynamics. For the last 10-15 years, the development of addictive smartphones and IT is accelerating our reactions. It is assumed that this leaves the switch in the undesired position most of the time. This has caused a rapid deterioration in level of human discourse, as reflected in the political arenas as well as in daily behavior of many people.

My partners, Dr. Weinbach, had worked for more than two decades on the development of what she calls "Switch My Speech" (SMS) technology. This method is based on mentor-group interaction that train people to deal with stressed and frustrating daily situations. It had been tested with great success on many peoples (Speaking different

³ Human beings are referred to in the Kabala as "The Speaking" ("Medaber")

⁴ Stephen Knack "**trust, Associational Life and Economic Performance**"

<http://www.oecd.org/innovation/research/1825662.pdf>

⁵ Daniel Kahnema, **Thinking Fast and Slow**, Macmillan, 2011

⁶ Jonathan Evans & Keith Frankish (eds.): **In Two Minds: Dual Processes and Beyond**, Oxford University Press, 2009

languages, at all age groups from age 4 and up, and a variety of professions: judges, arbitrators and mediators, teachers, students, prisoners, family issues, etc.). By controlling the speech, people practically learn to gain better control on the hidden switch, which means that they consciously control their unconscious behavior!

In order to quickly reach masses of people (a large part of the world population at all ages) and to teach them how to gain control on the inner switch, there was a need to adopt the method to individual study without a human mentor. Dr. Weinbach, Dr. Korenman and I are developing such a bio feedback technology. A crucial step was the development of a technology to measure objectively their achievements. We shall present results at other sessions in the conference, and show how this can be done quickly with reasonable budgets.

We hope to be able to affect quickly the ability of people to co-operate on the huge challenges we face. As a matter of fact, it seems that just being aware of the existence of the switch already makes a remarkable change in the speech and thereby affects the well-being of the person. In other words, the indicator of the state of the speech, turns into an activator of the level of other parameters of the personal well being! This is expected to lead to a more secure and trusting society. This is essential for handling all other SDGs. A desired side effect could be an improvement of the general health level, as an active neo cortex helps in maintaining our health.

b. As part of the "top-down" approach there is a need to prepare top management to deal with the immense challenges that come with the need to reach the SDGs by the end of 2030. The SDG's require huge global annual investments of \$ Trillions, to build the necessary infrastructure. These huge amounts are by far larger than the amounts that political leaders and large organizations are used to deal with. A trillion is a 1000 times larger than a billion. In other words, we have to deal with a much larger number of much larger projects. During the second Future Education conference in Rome we showed where these amounts can come from⁷. But it has to be escorted by the yet missing managerial tools and skills to handle such missions.

In order to have such projects operational by the end of 2030, a large number of preliminary missions have to be accomplished (budgets, preliminary design, decisions about locations, licenses, locating the right staff, etc.). All this must be done soon, say, by the end of 2020. That is the reason why we coined several years ago the slogan "From \$B to \$T by 2020". This slogan, especially its first part, had been adopted by many key people in politics and business. The second part is hard to swallow... as we have only about 800 days left to the end of 2020! Not reaching this interim goal on time, will mean that we have a high chance of missing the 2030 deadline!

It seems that the most efficient way to reach the goal is by first training the leading consulting firms and the large accounting firms, with the help of the elder business mentors who know how to make a transformation happen quickly, and then to join forces in preparing the leaders and executives. We initiated such moves and created

⁷ Yehuda Kahane, "Education: An Essential Tool for Reaching the UN SDGs by 2030" Proceedings – Future Education, Rome, November 2017 pp. 147-149 <http://worldacademy.org/conferences/rome-2017>

collaboratively with elders of the mentoring and transformation agents a skeleton of what we call TFN (Trans-Form-Nation) laboratories. This requires a well-coordinated global educational effort that includes also a thorough understanding of the role of national and international regulation on the capital markets, retirement systems, etc.