## Academia: an ivory tower or a lighthouse?



Ehud Keinan Schulich Faculty of Chemistry, Technion - Israel Institute of Technology Email: keinan@technion.ac.il

Much has happened in the last few months since the dramatic decision of Haifa Mayor Yona Yahav to expose the "Professors' Report" (also known as the "Keinan Report") that recommended emptying the ammonia tank in Haifa Bay (for an executive summary of the report, see page 42). Since the press conference of January 31st, 2017, over 400 newspaper articles, daily interviews and commentaries in all TV and radio channels have covered the ammonia affair (http://www.ehudkeinan. com/contact), in addition to public debates and rallies of angry citizens and students. Three levels of the Israel court system, including the Haifa Magistrate Court, the Haifa District Court and the Supreme Court, have addressed the issue. Many organizations became involved, including the Histadrut, the Manufacturers' Association of Israel (MAI), the Association of Engineers, Architects and Graduates in Technological Sciences in Israel (AEAI), twenty-two municipalities in the northern part of Israel, non-profit organizations, political parties and even the Student-and-Youth-Council, which represents all Israeli high-school students. At least eight government offices became directly involved, including the Prime Minister's Office and the Ministries of Finance, Economy, Environmental Protection, Health, Defense, Public Security and Transport. The story even featured in a satirical TV show, chanting, "Jerusalem of Gold and Haifa of Ammonia".

The magnitude of the entire affair and its public consequences caught the political system and the establishment totally by surprise. This story could be added to the list of examples mentioned by Nassim Nicholas Taleb in his bestseller, "The Black Swan: The Impact of the Highly Improbable". Thus, it is not too surprising that at least three academic programs of Public Policy and Law in the higher education system have already included the ammonia affair in their curricula.

## Conclusions and take-home messages

Although the story is still far from over on all fronts, including legal, economical, public and political, the incredible impact on all levels of the government, the general public, the judicial system and the media has implications for many other open issues on the public agenda. This affair also poses fundamental questions for every student and faculty member in our academic system: Do members of the academia bear any responsibility for what is going on in this country? Are they exempt from being involved in state affairs? Is it their duty to intervene in state affairs? Do they have any power to influence state affairs?

The usual answers to these questions should be reconsidered in view of the demonstration that a small group of university professors, who possess neither significant resources nor political power, can make a difference. To understand the origin of this phenomenon, one should try to define the specific characteristics of the academic world that differentiate it from the political establishment and administration. My proposed list, which is by no means complete, includes eight characteristics and I prefer to use the words of others to illuminate their meaning, rather than explicate the obvious.

<u>Independence</u>. George Bernard Shaw: "The reasonable man adapts himself to the world; the unreasonable one persists in trying to adapt the world to himself. Therefore all progress depends on the unreasonable."

*Curiosity*. Albert Einstein: "It is a miracle that curiosity survives formal education. I have no special talent, I am only passionately curious."

*Long-term memory*. Alphonse Karr: "We can invent only with memory." Pierre Bonnard: "Imagination is merely the exploitation of our memory."

*Imagination*. Albert Einstein: "Logic will get you from A to B; imagination will take you everywhere. The true sign of intelligence is not knowledge but imagination."

<u>Perseverance</u>. Brian Tracy: "You cannot control what happens to you, but you can control your attitude toward what happens to you." Edmund Vance Cooke: "It's nothing against you to fall down flat, But to lie there, that's disgrace."

<u>Critical thinking</u>. José Ortega y Gasset: "Whenever you teach, teach your hearers to doubt whatever you teach."

<u>Quantitative thinking</u>. Carl Sagan: "We live in a society exquisitely dependent on science and technology, in which hardly anyone knows anything about science and technology."

*Logical thinking*. Bertrand Russell: "Men are born ignorant, not stupid; they are made stupid by education."

In my view, th never ending e conflict between the academic and political worlds represents a clash of civilizations on multiple levels: independence vs. pandering to interest groups, curiosity vs. conformism and indifference, long-term vs. shortterm memory, imagination vs. ticking the boxes, perseverance vs. frenzy and capriciousness, critical thinking vs. obedience to authority, quantitative thinking vs. qualitative thinking, logical thinking vs. emotional reasoning. And the judges in all the courts indeed understood and appreciated the differences and so did major parts of the public and media.

It is important to emphasize that our struggle to release one million citizens from the ammonia threat does not reflect any antagonism to the chemical industry. On the contrary, we all recognize the indispensable contribution of this industry to the national economy. We know that the State of Israel could not exist without the chemical industry. Our key message is that industry should behave in a responsible way, and most of the Israeli chemical companies are very responsible towards the surrounding population and the environment. Every year the Israel Chemical Society recognizes an outstanding company in this respect through the ICS Green Chemical Industry Prize.

It has been a long, asymmetrical war against very powerful entities, and the partial success we've experienced so far would not have been possible without the efficient cooperation of different entities, including university professors, the Haifa Municipality, the courts, the non-profit organizations, the general public and the media. Every one of these partners has provided a critical element that complemented the efforts of all the others.

There is also a significant personal component in this story, which began three years ago. We've lost more than two years since the initial understanding of the magnitude of the threat, frustrated by our inability to convey our findings to the media and to the general public. Only in June 2016, when we joined forces with the Haifa Municipality, was an opportunity created to effectively address the various courts, the public and the media (Figure 1). Obviously, the intense history of the past twelve months cannot be summarized in one article. Recognizing the importance of properly documenting the sequence of events, I have started compiling the material into a book, in the hope that it will be completed and published in the near future.



זמנה ש

**Figure 1.** Left: Demonstration of Haifa citizens against the ammonia activity in Haifa Bay. Photos (credit to Haifa Municipality) were taken on February 26, 2017, the day of the District Court session. Right: Dan Shechtman, Mayor Yona Yahav and Ehud Keinan at the Court Hall.