

The book's motto:

A major component of intelligence is the ability to predict the future. The ability to model today in order to see tomorrow. A high level of intelligence requires the ability to understand the laws of nature, the laws of human nature, what is the most likely outcome of future events. (...) If aliens are smarter than us, they will see the future better than we do. They will see outcomes that we will not see. They will model scenarios that we won't even dream of. They will be able to outsmart us... every time.

– Michio Kaku

Know the future to survive

Introduction & the author's grand vision

The ability to see the future, the knowledge of what will be, is a source of power. It's a matter of life or death. It's an origin of status and prestige. It is not only a possibility, an ability, but also an prerequisite of having agency. It is an attribute that legitimizes one's domination over those who do not have this foreknowledge. As the American physicist Michio Kaku says:

A major component of intelligence is the ability to predict the future. The ability to model today in order to see tomorrow. A high level of intelligence requires the ability to understand the laws of nature, the laws of human nature, what is the most likely outcome of future events. [...] If aliens are smarter than us, they will see the future better than we do. They will see outcomes that we will not see. They will model scenarios that we won't even dream of. They will be able to outsmart us...every time¹.

1 <https://www.youtube.com/watch?v=Izp7q6OXXS4&t=182s>

One of the key concepts that appear in this book is *homeostat*. A *homeostat* is a system driven by the primary goal of regulating its ability to survive and **procure/secure** resources such as energy (food in case of living organisms). It does not need to develop the ability to understand the world, to reason. It is enough for it to tune into the laws of nature and the rules of the game for survival. In the case of animals and plants, instincts and reaction sequences are developed in the course of evolution.

The concepts of ‘homeostasis’ and ‘homeostat’ originally referred to biological organisms. However, the terms’ scope can – Stanislaw Lem² did it frequently – be extended to other systems that are somehow caught up in the struggle for survival and, to assure further functioning, process information in order to generate decisions how to influence the environment.

In case of *homo sapiens* (智人), biological evolution is extended by cultural evolution. In the later, the behavior of organisms is regulated by, among other things, so-called ‘cultural viruses’. Reason, which humans possess, is a way of replacing instincts, allowing them to stop pre-programmed reaction and replace it with a completely different one (developed in a given culture). This feature of reason means that any human can be programmed by culture into behaviors that might lead not to survival but to doom. In both cases, instinct and reason, natural selection eliminates those individuals and societies (the later being collective carriers of cultural operating systems) that could not tune into their environment.

How a homeostat predicts the future?

For a plant that “wants” to grow, the optimal moment for germination is anticipated with use of special chemical compounds that activate in the spring, when they are exposed to daylight for longer and longer periods of time. When the length of day is long enough, germination is finally initiated.

For a farmer or whole villages of them to know when to sow and proceed with other field work is a matter of abundance or starvation. Of life and death. Various agricultural calendars allow the farmers to attune with their activities to the cycles of nature, such as flooding of rivers and the succession of seasons or the onset of the rainy or dry season. For such homeostats a calendar is a decision-making timetable, whether it is a local community, nation or entire civilization – whether in ancient Egypt or at the Central Plains of ancient China.

For an investor, knowledge of the future is called “information advantage”. It is the ability to build more accurate models of trends and tendencies than those of an opponent. It’s an ability worth a lot, and often priceless. The main component of this ability is an understanding of the parameters of the environment and their interactions: the financial condition of companies, the laws of supply and demand, the decision restraints of competitors.

For a warrior and a soldier, knowing how the opponent will act decides which of them will come home. For a commander driving a powerful army onto the battlefield, to know the enemy’s intentions is a matter of life and death. This is why, in the ancient treatise *The Art of War*, a key ability – in addition to generating the Force (勢) – is the ability to become unreadable or unfathomable, the so-called Formlessness (無形). This concept, defined in far Chinese antiquity, is founded on the principle that the opponent should not have the ability to model today to predict

2 Stanisław Lem (1921-2006) was a famous Polish Sci-Fi writer and philosopher.

tomorrow. It is this timeless logic and truth is what allows us to develop, grasp and use on 21st century's battlefields concepts and procedures such as the "systems of acquiring situational awareness" and the concept of swarming³.

For a leader and a ruler of an empire, knowledge of their decisions' constraints, the decision parameters and the power parameters of the participants in geopolitical games is a question of the future of thousands and millions of lives. It's also a question of prestige, historical responsibility, legitimacy and retaining the political power.

Finally, for a Holy Sage (聖人), i.e. one who has grasped the Dao, or laws of all things, the future is an open book. A Holy Sage tunes into the rhythm of events in the Universe. He moves out of their way when necessary. He makes a sparing move when needed. He notices the patterns and regularities we call the Laws of Nature.

Life is about making decisions. Survival is decision-making. At any scale, decision-making and survival rely on the ability to model and predict future states of the world. An ancient Chinese treatise *Questions and Answers between Tang Taizong and Li Weigong* (唐太宗李衛公問對) says:

All living beings in whose blood flows,
will struggle to the end of their lives for survival.

The same eternal law of life is discovered and put into slightly different words by Robert A. Heinlein in his novel *Time Enough for Love*:

In order to achieve something, or even just survive a little longer, a person has to guess. And guess correctly, over and over again, without enough data for a logical answer.

The future and destiny in culture

We understand the world through stories. And a significant number of book and movie plots have as their main (leading) theme that someone has gained the power or ability to see the future. Such someone suddenly gains an electrifying advantage over everybody else. The information advantage he obtains is supreme power. It is, as the author of *The Art of War* writes, the ability to become the Lord of Fate (司命) for others.

Predictions, prophecies, soothsayers of the end of the world. These are the stories of greatest importance for the survival of both individual people and groups bound by cooperation. To know the future and understand the sequence of events leading toward it is to psychologically dominate and subjugate individual people and groups of them. "Truly I say to you, behold, the age of the sword and the axe is coming, the age of the wolf blizzard (...) It will be so! Look out for the signs!" we read in the pages of Andrew Sapkowski's novel *Blood of the Elves*. "The year 1647 was a strange year, in which various signs in heaven and earth heralded some calamities and extraordinary events," Henryk Sienkiewicz begins his epic novel *With Fire and Sword*⁴.

3 Paralyze the enemy's defense system by attacking on a scale that exceeds its ability to respond.

4 Pol. Ogniem i mieczem. NTT (A note to translator): you can use examples from your own culture here. Example: opening words of the novel 三國演義 about a black serpent found on the emperor's throne.

Our Sienkiewicz makes an identical move to the author of the epic novel *The History of the Three Kingdoms*, which resonates in the hearts and minds of Chinese readers. A black serpent descends on the imperial throne out of nowhere and lays into a cone, making the ruler faint with horror. A gale breaks over the palace, the capital is hit by an earthquake. In a word, all the omens foretell the imminent end of the orderly world of the Han Dynasty. They testify to the wrath of Heaven. And this wrath is the inevitable and imminent realization of the eternal law of history, which opens the work:

Such are the ways of history:
that which is divided must be united;
that which is united must be divided into parts.⁵

Who dares to disagree with the verdict of destiny? In the film *Lawrence of Arabia*, the main character (a British officer T.E. Lawrence) leads a night march through the most murderous area of the desert, where no one dares to travel. This is an inspired military maneuver that will elevate him to the rank of an almost demigod. Whoever falls asleep during the march and falls off his camel will die. By Bedouin⁶ custom, no one is allowed to turn back for such a wretch, as death is written for him by divine decree. But Lawrence turns back. He single-handedly finds the unlucky man and brings him to the camp. There he is! A leader who defies the will of God. Someone who can change the sentences of destiny! We shall follow him!

But the next day one of the warriors commits a theft. The Bedouin tribal custom to stop the breakup of the ephemeral alliance is death for the offender (the thief). Lawrence offers to carry out the execution. As a stranger, not belonging to either tribe, he will perform an act of justice without triggering the law of revenge. And that's when the Heaven's will prevails. The condemned turns out to be the same man Lawrence saved the previous night.

The skirmishes of charismatic individuals with the forces of history, with Destiny, with the Will of God, are the theme of the stories we program our minds with from our earliest age. They define the way each of us, raised by countless cultures and ideologies, perceives and understands our place in the world.

Historical systems of gaining situational awareness

Divination, prophecies, predictions. And the entire scientific method understood as a set of tools to describe and influence the world. Power over minds. These concepts are homing slogans to understand what any ideology is. An ideology is a vision of the future and the ability to infect an audience with it. It's a system of claims that legitimize the use of coercion and brute force against other human beings. It's also power over a vision of the world, a motivational system that harnesses the collective efforts of a community to build a collective identity. Part of any identity is the ability and willpower to defend against aggressors and to attack/subjugate other groups.

5 話說天下大勢，分久必合，合久必分

6 NTT: <https://zh.wikipedia.org/wiki/貝都因人>. Please add explanation of cross-cultural references at your own discretion.

In historical times, fortune tellers occupied a prominent role in the courts of rulers. Their job was to recognize and report omens, signs from supernatural forces that signaled their favor or disfavor toward the ruler's decisions.

A separate and fascinating issue is the perception of cause-and-effect relationships and patterns, regularities that mankind laboriously perceived in an incomprehensible world ruled by supernatural forces. In the 15th century, territories occupied by the Aztecs⁷ were haunted by droughts, priests tried to influence the future by trying to propitiate the gods with human sacrifices. The so-called floral wars (Spanish: *guerras floridas*) were agreed upon, through which captives were obtained for ritual mass murder.

In ancient Hellad, at Delphi, the “navel of the world,” resided the priestess Pythia, who foretells, not for free, the future. In the cradle areas of Chinese civilization, the prehistoric Xia and Shang dynasties, the origins of writing were fortune-telling inscriptions on bones and turtle shells. According to the indications of these oracles, according to readings of omens in the form of natural phenomena, the shape of animal guts, the stalks of yarrow, the fall of ritual objects tossed onto the ground, armies numbering tens and hundreds of thousands of soldiers were sent. Not just in ancient China, everywhere else too.

And then Sun Zi came. His treatise is a proto-scientific system for identifying and weighing the various parameters of an opponent's strength: demographics, weapons production capacity, social cohesion, commander's talent. This way of predicting the outcome of wars was a rival proposal to the decision-making system based on divination and superstition. Sun Zi himself wrote about his method of counting advantages:

On the basis of this comparison I know who will win and who will lose. (Sun Zi I.11)

凡此五者，將莫不聞，知之者勝，不知者不勝。

故校之以計，而索其情。

Science and the scientific method, is a package of instruments to help acquire data from the natural world and build models of its future states. It is a set of instruments for building conceptual and informational superiority. After all, we say that a theory has or does not have a “predictive capacity”⁸, and therefore is or is not useful. This ability to model variant events is the Orientation phase of the OODA cycle (see p. 306).

By far the most powerful tool for acquiring predictive ability is science and the scientific method. The method includes the tool for testing the truth of claims about the world, namely experiment. The power of the mathematical apparatus that science has produced is perfectly illustrated by the extremely appealing to the imagination by the idea of implementing the twin Voyager space mission. The project's story shows also how amazing results come from the synergy of passion, knowledge, personal experience and drawing on the accumulated achievements of the living and the dead creators of human civilization.

Gary Flandro has had a fascination with space exploration since childhood. This passion led him to become an employee of the US JPL (Jet Propulsion Laboratory). He took it upon himself to look for a configuration that could make it possible to fly around the outer planets of the solar system.

⁷ <https://zh.wikipedia.org/wiki/阿茲特克>

⁸ NTT: An explanation in footnote is recommended here.

He found one, occurring once every 176 years. Manual and then computer-calculated simulations (computers at the time filled entire rooms) allowed him to proceed with a mission that ended in spectacular success. Both Voyager probes left the Solar System in 2012 and 2018, respectively.⁹

The ability to read the laws of nature and thus the ability to model future states of affairs is very often kept secret. More, secrecy is a prerequisite for its effectiveness: defeating an opponent on the battlefield, maintaining power, gaining a competitive advantage, imposing one's will, and in this, driving opponents into a state of so-called perceptual helplessness conducive to submission. The priests of ancient Egypt, having the ability to predict solar eclipses, were able to use their knowledge to legitimize their power and obtain the obedience of superstitious subjects. Oh yes, knowledge of the future is power. And survival.

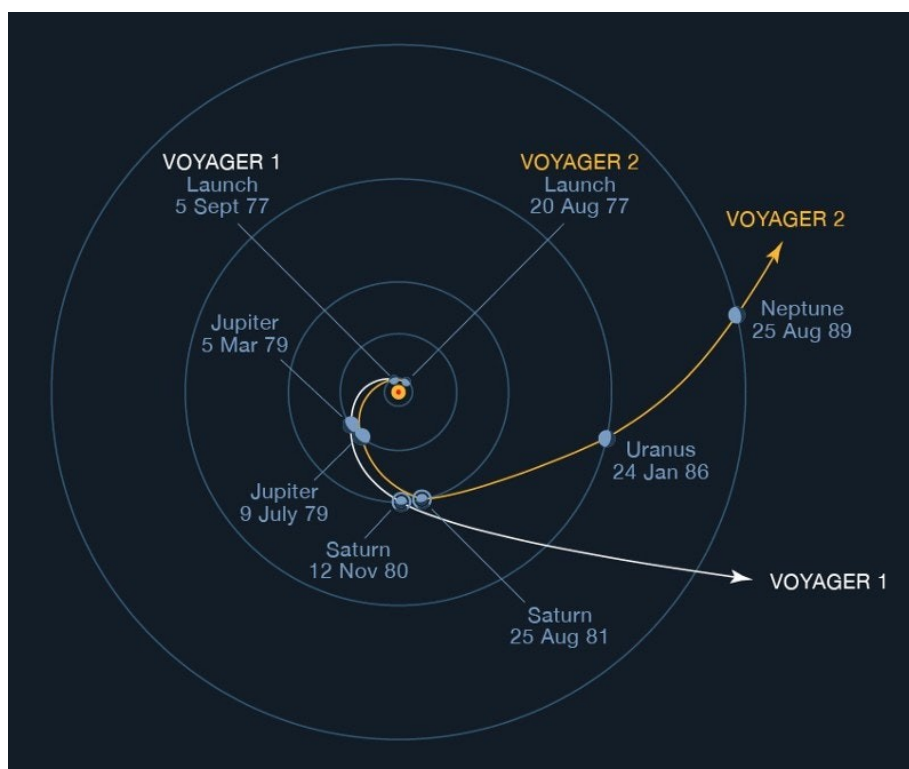


Figure 1: Trajectory plan of the Voyager mission. Source: NASA.

Prophets and soothsayers in social life

“Watch therefore, for you do not know on what day your Lord will come,”
所以，你們要警醒，因為不知道你們的主是哪一天來到

We read in St. Matthew's gospel (Mt. 24:42).

What is about to happen electrifies us. We are most receptive to knowledge of the future.

9 NTT: <https://zh.wikipedia.org/wiki/航海家計畫>

The one who, by demonstrating his predictive abilities, manages to impose his dominance (vision of the world) on us, has the power to dictate how we should behave. He formats our morality and social behavior. Moreover, we submit to his will and his narrative. We willingly entrust ourselves over into the person's care.

This is why the simple phrase “the future influences the present” became the inspiration, and the title, of one of the essays in another book of mine (*Sun Zi and his Art of War*). It refers to the field of cybernetics, the control of systems, and in this case, the control of social organisms.

Whoever is able to impress us with his superior understanding of the future, we allow ourselves to be charmed by him. We succumb to his vision, become carriers of ideas and followers of their preacher. This is why we hear from the mouths of public figures such statements as “I've been saying this for a year already”, “I predicted it long ago”. It is in this sphere, the sphere of predicting the future, that a large part of the domination games for status take place.

From this point of view, one can make the observation that Dr. Jacek Bartosiak's success in the public space was founded on a double pillar¹⁰: 1) Tutoring Polish audiences with a geopolitical vision of the world that allows them to better understand the course of things in today's world; 2) which he combined with ascending into the role of a “prophet preaching a vision of the end of the world as we know it.”¹¹ This is a perfect example of the masterful establishment of a narrative source that, while revealing to us our own future, so effectively activates our cognitive curiosity.

Falsifying the laws of the universe

The protagonist of the Sci-Fi novel *Paradisia* by Janusz A. Zajdel is surprised:

This is probably the first case in the history of mankind (...) There are known facts of falsifying of history for the purpose of stupefying society. But to falsify physics?!¹²

Oh, naive! The laws of nature are the most commonly falsified thing! These laws of nature, according to ancient Chinese thinkers, include both the laws of human nature and the principles of state governance. They are the laws of economics, the laws of demography, the art of waging wars.

10 Jacek Bartosiak is a popular expert and commentator on geopolitics in Poland.

11 The main theme of Bartosiak's public opinions is stating that the current world order (*Pax Americana*) is about to collapse and we face unknown and uncertain future. This is what all prophets do.

12 SPOILER ALERT. In this Sci-Fi work written in 1985 the protagonist is visiting an artificial space station, supposedly orbiting a planet declared as uninhabitable. The plot revolves on the visitor's discovery, that the inhabitants are in fact slaves. The novel's plot was all about preventing the hardworking people from discovering, that they are not in orbit, but on the surface of the planet. The guardians of the secret (the owners of the enslaved) made it difficult to find out the truth with a variety of tricks, including seemingly innocent. One was teaching in school falsified laws of physics. The protagonist confirmed his conjecture in an indirect way. The ban on owning wristwatches could be seen as an oddity. But it was also accompanied by a hard-to-notice but clearly suspicious random lengthening or shortening of length of minutes on public clocks. The name of the place is a play on the paradise (天堂?) and refers to Poland's situation under Soviet control during the Cold War.

To use these laws is nothing more than to enact agency, exercising political power. The access to such knowledge was, is and will always be restricted¹³.

Agency is the ability to impose one's will on others. One of the most obvious methods of acquiring agency is to build instruments of military influence ("power projection"). **A less obvious method is to falsify the laws and principles that govern the course of events and human nature.** (Managing the motivations of individuals and groups of people is the central idea of the Art of War, by the way.) It is by this act of falsification that the ones who strive for power over others decide their fate. The power is obtained "by coercion or deception," which is recognized in Polish civil law.

The art of properly pushing the lever in controlling the fate of human societies is identified by one of the residents of Paradisia: "Freedom [...] is the awareness of the limitations to which a person is subjected," says the writer from Earth who is visiting the enslaved world. "Freedom (literally: conviction that one is free) is obtained by realizing the lack of alternatives to the state of events that takes place within our world..." retorts the enslaved resident.

The accuracy of these novel insights each of us can apply to ourselves and to the content of various ideologies and visions of the world imposed on us by media outlets and politicians. Sometimes they are considered ridiculous, toxic and affecting the course of geopolitical games between powers. These include the movements against so-called climate change; the fight against scary germs (COVID -19), peak oil. Predictions of the imminent doom of the human race are such an effective instrument for shaping public perception that it is simply scary to write about them¹⁴.

In such a vision of conflict, an effective attack can be called the contagion of a world vision whose consequences and ethical directives, like a Trojan horse, lead to self-destructive actions.¹⁵ An example is the Buddhism propagated by the Chinese Tang Dynasty among the warring peoples of Tibet and Central Asia. It's also the anti-war activism of leftist circles in the US during the war against North Vietnam. It's pro-environment ideologies and predictions of imminent climate doom used as weapons/tools to control the energy security and financial flows in the European Union.

Narrative wars are unceasing sequences of acts of imposition of one's own vision of the world. It translates into imposing one's own will upon others (enemy or own population). It equals to imposing a vision of laws that individuals or groups of people are to obey. This is what domination is all about. This is how to explain the often-carrying thousands and millions of victims' efforts of political regimes to monopolize narratives, to remove the influence of foreign, hostile or conflicting narratives (that's what is done in totalitarian countries). Building narratives is falsifying the understanding of how the world and the laws of nature work. Falsifying worldviews is an act of control over groups of people, at any scale. Such activity is a key instrument of power.

A simplified mathematical model, Newton's law of universal gravity can make a space mission possible despite being only an approximation of the laws of nature. But in Zajdel's novel, the narrative installed in the minds of the inhabitants of Paradisia, hiding the true state of affairs, makes

13 As it was the case with *The Art of War* and *36 Stratagems*. The Sun Zi's book teachings were recognized as secret by scrolls' owners. Similarly, the *36 Stratagems* propagation was restricted by Mao Zedong himself.

14 NTT: This is untranslatable pun in Polish language. Can be omitted.

15 NTT Simple English: Someone can manipulate us into accepting an ideology or a world-view. It is done without telling us about destructive consequences or side-effects. Such person knows the laws of nature better than us. Also, the person makes sure we won't be able to discover the true state of things and counteract.

no one think of revolt. **The inhabitants of the title planet didn't even know that there was an elite keeping them enslaved.**

The world vision determines (limits) the ability to act. By moral prohibitions and orders. By neutralizing the will to resist, as so vividly depicted by George Orwell in his novel *1984*. It can foster or hinder the ability of a homeostat to defend its own existence.

“There is nothing stronger than an idea, whose time has come”¹⁶

The concept absolutely central to the treatise *The Art of War* is the Force 勢. It is the potential that makes people's motivations and actions, but also the course of events, move in one direction or another. According to the ancient strategist, for a Master of War to wield the Force is to make people and events behave according to the geography of their operating environment, like round stones and logs let loose down a steep slope.

In the essay on Masters of War (I.2), I will provide a full vision and a bundle of examples. Here, two suffice. Sun Zi himself recommends that a commander, rather than “by issuing orders,” should bring soldiers to the apogee of their prowess by putting them in a no-win situation. In the face of death, it will not be necessary to motivate them with speeches in general tune of “fight to the last drop of blood,” “give your lives for the glory of the fatherland.” The survival instinct will work, it will arouse the battle rage. The geography of human nature will work. The Force will work.

The Force that someone wants to call into being and harness to action must appear at the right time and place. Favorable circumstances multiply its ability to influence the course of things, and sometimes even allow it to be brought to life.

Until they saw how many they
They felt the power and time;
And with a song that the dawn is near
They walked through the streets of cities¹⁷.

This is how Jacek Kaczmarski sang, and he hit the heart of the phenomenon with these words. The famous saying used as the title of this section, living and resonating in our thoughts in endless variations, is an eternal regularity. Especially when expressed more generally, speaking not of ideas, but of every thing.

To perceive the power of an idea is to perceive the potential of the forces of psychohistory to influence the course of events. It is to perceive the tensions of structural forces that, like earthquakes, the longer they accumulate their potential, the more destructive force they will unleash.

This is what the Force is. It is a potential and an element ridden by the shadowy Masters of Warfare, practitioners of the philosophy of *wuwei* (無為, tuning of one's actions to the rhythms of the Universe).

¹⁶ A famous saying wrongly attributed to Victor Hugo. 沒有什麼比一個想法更強大的了，它的時代已經到來。

¹⁷ NTT: [https://en.wikipedia.org/wiki/Mury_\(song\)](https://en.wikipedia.org/wiki/Mury_(song))

Many names for the same thing

It's time to finally explain what the 'forces of psychohistory' are. In the opening words of the aforementioned novel *The History of the Three Kingdoms*, the phrase 'Such are the paths of history' appears. In the original, the phrase 'paths of history' is literally 'Great Trends Under Heaven.' The last character of the phrase, *shi 勢*, is the Force we know from the treatise *The Art of War*. Dictionaries translate the entire phrase as 'the trends of history' or 'the forces of historical inertia' (the momentum of history or trends of things). These are precisely our 'forces of psychohistory'.

We have many equivalents of this phrase in Western cultural codes. It is 'the forces of history' (it appears in the title of Joseph Kossecki's book *The Games of Forces and Interests in History*), the forces of historical necessity. In contexts other than history, it's 'market forces', 'operational momentum of an army'. In general, it is the inertia of events, something that determines the course of things, and which individuals with their minuscule influence are unable to oppose.

Father Kordecki, a character from the pages of Henryk Sienkiewicz's *The Deluge*, says while conferring with his fellow soldiers:

Well, the conjunctures are such that God and His Blessed Mother would intentionally send blindness on this enemy, so that he would overstep (NTT go too far) in his iniquities (atrocities)¹⁸.

Reading about the novel's defense of Czestochowa, we come across such phrases as precisely "political conjunctures," "the power of superstition" and "these shots will be heard throughout the country," when the Poles and Swedes, respectively, comment on the significance of the "forces of psychohistory" that set in motion by the siege of the holy place. One of the characters present in Sienkiewicz's story repeats the keynote of *The Art of War* almost verbatim. The words of the Duke of Hesse spoken to Miller (on the Swedish side), who commanded the siege, resonate with us:

Sometimes, too, circumstances know
how to command [people and the course of events] no worse than kings and
marshals [do].

A great metaphor for these powerful forces is the wind. Powerful high and low pressure areas accumulate in the vast atmosphere. The temperature and pressure gradients bring into being... the winds of history: unstoppable hurricanes (holy winds, 神風) which overthrow emperors and elevate "bandits" to power.¹⁹ Such a view harmonizes perfectly with the vision of Sun Zi, who in his metaphor spoke of the unstoppable potential of masses of water in surging rivers or achieved by the difference in altitude in a rushing mountain stream.

Dr. Jacek Bartosiak said in an interview that crises and wars come not from poverty or ideology, but from structural tensions, changes in the balance of power between large states. When such

18 NTT: It means that the invading forces of the Kingdom of Sweden were acting more and more harshly against the populace. In result they caused both peasants and gentry to unite and repel the invasion forces. The crucial event in this process was a siege to holy monastery of Jasna Góra (<https://zh.wikipedia.org/wiki/光明山修道院>) Basically, the events are almost 1 to 1 mirror of the famous siege of Ju and the defense efforts by general Tian Dan 田單.

19 NTT: a reference to the famous phrase 成則為王, 敗則為賊.

tectonic tensions arise, as if from under the ground, individuals, ideologies and other factors appear and try to correct trajectories undesirable to themselves in a complex dance of forces and counterforces.

From this point of view, “politicians are messengers of structural forces.” And here we come to the eternal question of historians: **Who shapes the course of history?** Is it the will of individual people or impersonal forces? In the novel *Forms of Chaos* by Colin Kapp, we learn the name for the lone daredevils. They were the Chaos Catalysts. They had the fear-inspiring power to stop entropy, to change the direction of things or disrupt chains of cause and effect. In the novel *Soldier, Ask Not!* Gordon R. Dickson introduces *ontogenetics*, a discipline of science developed by a race of philosophers for the purpose of predicting the future:

“It’s a name for one of our Exotic calculative techniques,” (...) “Briefly, there’s a continually evolving pattern of events in which all living human beings are caught up. In mass, the strivings and desires of these individuals determine the direction of growth of the pattern into the future. But, again as individuals only, nearly all people are more acted upon, than act effectively upon the pattern.

“Only now and then, in the case of some rare individual,” he continued, “do we find a particular combination of factors—of character and the individual’s position within the pattern—that combined make him inconceivably more effective than his fellows. When this happens, as in your case, we have an Isolate, a pivotal character, one who has great freedom to act upon the pattern, while being acted upon only to a relatively small degree, himself.”

“Ontogenetics,” said Padma, “is the study of the effect of evolution upon the interacting forces of human society.”

In *Forces of Psychohistory*, however, we will focus not on answering this question of causality, but on describing the various parameters of the forces of history.

What is psychohistory?

Psychohistory is a fictional science conceived by Isaac Asimov for the sake of his cult novel *Foundation*. The science’s mathematical apparatus gave the ability to predict the fate of large societies. The author of the novel, was inspired by Edward Gibbon’s monumental work *The Twilight of the Roman Empire*²⁰. The creator of the science, Hari Seldon, declared its ability not only to predict the inevitable collapse of the galactic empire he was a citizen of. But such knowledge is not just a tool for predicting. It was a tool for changing the future fate of humanity, too. This is the central point of the entire story. Understanding the laws of nature is not just knowledge of the future. It is the power to steer the course of things, and therefore the most dangerous ability a person

20 NTT <https://zh.wikipedia.org/wiki/罗马帝国衰亡史>

or group of persons can possess. Seldon undertook the work of defying the seemingly unstoppable forces of historical necessity. Accused of treason, he answers the Prosecutor's question this way:

The psychohistoric trend of a planet-full of people contains a huge inertia. To be changed it must be met with something possessing a similar inertia. Either as many people must be concerned, or if the number of people be relatively small, enormous time for change must be allowed. (...) The huge, onrushing mass of events must be deflected just a little.

The fate of the eponymous Foundation (a colony world on a distant planet) is a series of stories about individuals struggling again and again with the dilemma: whether or not their individual decisions are or are not in conflict with the Seldon's Grand Plan, in the vision of which the ultimate goal of the Foundation's activities was the establishment of a Second Empire.

And here we are back to the concept of homeostat. For an entity as powerful as a galactic empire is also a living system striving for survival.

Conclusion. The forces of psychohistory

Everything that is "alive" is driven by the need to predict the future. Religions, systems of divination, the art of deception... and even the scientific method itself have at their core one and the same goal – to predict and control the future. They are supposed to answer the question of how to model the effects of our own actions and the actions of the people around us in order to optimally realize our own causality, our ability to decide what happens and how it happens.

A person who is able to derive from the current state of affairs what is yet to happen, able to attune himself to the principles governing the Universe and the environment of his life, comprehending the nature of Dao, was called a Holy Man (*shengren* 聖人) in ancient China. Such person could see the beginning and comprehend the end (見微知著). "Reject emptiness, delusion, to see the fullness, the real world," Buddhist teachings proclaim. We must reject our beliefs, superstitions, often unreliable knowledge. We need to build a completely new predictive system from scratch; to look at a problem in a fresh way, enabling us to solve it, often brilliantly. On the other hand,

**for our opponent it should be made
as difficult as possible to build his predictive capabilities.**

The idea behind using stratagems is just the task as it is phrased above. Your task is to falsify/disrupt his predictions. Convince him that the forces of psychohistory and the laws of human nature work differently than they actually do. Make him to act upon wrong assumptions which bring about his downfall. Let him turn back the Vistula with a stick²¹.

21 NTT. Please find Chinese proverb to match the meaning. Vistula is the main river in Poland. The above proverb means literally "to reverse a river's current with a stick" which means to act foolishly against the reason or exerting effort to act without any attempt to understand consequences of to find an optimal solution.

It is difficult to compose a book on predicting the future and, in the process, encapsulate it in a form other than a guidebook (self-help book). My original intention to write a study of understanding cause-and-effect relationships has turned into a *vademecum* of practical knowledge and insights. My hope is that the end result will enhance in the reader-user ability to achieve and maintain optimal parameters of their homeostasis.

I also hope, my dear Reader, that after absorbing all the below the insights, visions and regularities of the nature of the world and human nature, you will acquire the power to look at the world in a completely different way than before. And with the power to see the regularities will come the power to steer your own fate and the fate of others.

And when asked if you know how to take on the seemingly inevitable and how to see what is hidden by the darkness of the uncharted future and the plans spun by the shadowy Masters of War, you will answer, I hope, with the words of the protagonist of Isaac Asimov's visionary tale... taken from the masterful, culminating(?) scene of the entire plot:

By the Stars of the Galaxy—now, I know!

Taipei, July-December 2020