Dr. Wolfgang Kramer
Haberlandstr. 6
10779 Berlin
Tel.: 0049 – (0)30 – 211 99 34
E-mail: dr.wolfgangkramer@alice-dsl.net
Home: www.wolfgang-kramer.net

Dr. Wolfgang Kramer, Lecturer of Philosophy, Free University of Berlin, Germany
(Scientific Advisor on Philosophy to MWIT)

Monday, 02.02.2009

Lecture at Mahidol Wittayanusorn School, Salaya, on 2nd February 2009

# Technological Development and Globalization – a philosophical perspective

My lecture essentially deals with a philosophical discussion of the influence of technology and globalisation on our living environment. Globalisation is taken as an appearance, a symptom of application of technology.

**The essential cause behind globalisation – that is my basic assumption – is the digital revolution, especially with regard to communication and transportation technologies.**

In order to explain the conclusions of my lecture, I would like to explain and define three terms, which will reappear throughout my lecture: Technocracy – de-materialization (loss of matter) – globalisation.

The term ´technocracy` does not mean the rule of technocrats, but rather that the current world has been set up through technology, and has grown together to a middle-universe. ´Technocracy` is taken as the rule of an absolute technology, which has itself become subject, towards which man has been degraded to become an object. “The subjects of freedom and

servitude have been exchanged: Free are the things, under servitude is man."[1]

Thus, technology is not a sub-system or a set of means in order to reach autonomous means, but rather, the technological re-arrangement of the world is so fundamental that it is only a vast underestimation to say that technology is changing the world. It would be more appropriate to say that technology has mutated into the world: the place where the world formerly stood is now filled by technology.[2]

In the framework of the two most actual and relevant analysis of the present time (e.g. the end of the 20th century), the technological reality has been termed ´promethean discrepancy´ (Günter Anders) and ´simulation´ (Jean Baudrillard).[3] What that means in detail I will elaborate further on.

The term ´de-materialization` stands for the fact that experiences nowadays are gained explicitly through technical means and therefore are being changed both in content and meaning for man. The complete universal application of media in society bears the consequences that a differentiated potential of perception and experience towards a multifarious world of things is lost.
**´De-materialization´ thus is identical with loss of experience in a technically determined world.**

The term ´globalization´ means the process of an increasing international interdependence in all fields (economy, politics, culture, environment, communication etc.). This intensification of global relations is being effected at the level of individuals,

---

[1] Günther Anders, Die Antiquiertheit des Menschen, Bd. 1, München 1983, page 33

[2] See Vgl. Jean Baudrillard, Die Fatalität der Moderne. Ein Interview, in: Gerd Bergfleth et al., Zur Kritik der palavernden Aufklärung, München 1984, p. 133–144, here: p. 135

[3] The name for the condition of reality was termed ´Promethean discrepancy´ by G. Anders, indicating a rift within the human subject.

societies, institutions and states. The term ´Globalisation´ was created within the social sciences. In 1961 the term ´Globalisation´ first appears in an English dictionary.

The term ´Globalisation´ in a framework of economic policy was brought up in 1983 by Theodore Levitt, a German émigré and former professor at the Harvard Business School, in a paper entitled ´The Globalisation of Markets´ which appeared in the Harvard Business Revue. Within the German-speaking region this term was used from 1993 onwards in the public debate.
Another, less frequently used term is ´Mondialisation´ (after the French term Le Monde which means the world). Some authors don't call the process Globalisation, but instead call it De-nationalisation, in order to describe the loss of power and importance of the nation states.
Globalisation was discussed even a long time before this term actually was created. Karl Jaspers (1883-1969) in his critical paper ´The spiritual situation of the time´ (1932) used the term ´planetary´. ´Being of a technical or economical nature, all problems seem to be planetary.´ Through the standardization of the planet a process of levelling has started, "which one can only observe with horror".

Jaspers recognizes a feature which renders the globalisation of his time differently from other times. The earth did not only become an interconnection with regard to economic connections, but the (1$^{st}$) World War was the first war in which the whole mankind was involved. According to him, various cultures now were spreading over the world, but the first ´euphoria of the enlarged space´ was turning towards a ´feeling of narrowness´ of the world.

This is being said to clarify the three crucial terms of this talk.

At this point I would like to come back to Günter Anders and Jean Baudrillard and to explain the importance of the two time diagnosis of the ´promethean discrepancy` and the ´simulation`.

The term being used by Günter Anders for the technological determination of reality is the ´promethean discrepancy`, which outlines a split within the human subject: the mental and technical competencies of knowledge and production emancipated themselves towards the capability of imagination, feeling and responsibility, so that its previously existing integral connection has been torn apart. Human beings have created an artificial world whose complexity and greatness is going beyond their power of understanding.

The ´promethean discrepancy` is viewed by Günter Anders as his most important concept indeed and in a way summarizes his philosophy [4] . It consists primarily in the ever-increasing discrepancy of the human production capabilities and the far backward capability to imagine the vastness of the produced world.
Anders uses the term promethean because it is to express that man as an imagining and feeling being is not up to his ´promethean´ achievements, that means he is no match for the ´Prometheus within himself`. Therefore, he is ´smaller than himself`.

Anders has put the ´promethean discrepancy` into the centre of his theory: Feeling and Making, Imagining and Producing, knowledge and conscience, soul and spirit, which in the technological age are increasingly drifting apart. This rift is also getting deeper and deeper because time as a means of mediating is being minimized: there is no time any more to being able to imagine the produced world.

The promethean rift has the consequence that human beings aren't any more in a position to understand what is happening, and that they don't know any more what they are doing.

---

[4] see Elke Schubert (ed.), Günter Anders antwortet, Interviews und Erklärungen, Berlin 1987, p.43 and p. 104 ff.

> ´The destruction of a large city we can today plan without difficulty… and carry out that plan. But to imagine this effect, to understand it, we can only quite deficiently.`
> ´We can murder thousands; maybe we can imagine ten dead people; to weep about or to regret about we can maximally one person.`[5]

The term ´promethean discrepancy` expresses the paradox situation that an increase in knowledge and power is accompanied by an increase in ignorance and loss of power: mankind is all-powerful with regard to its knowledge and production capabilities, at the same time, though, powerless with regard to its imagination and feeling.

Just as the "promethean discrepancy" stands in the centre of Anders` philosophy, the simulation theory is the core part of Jean Baudrillard's thinking. "Simulation" is the expression of a general reproduction principle, a total possibility of reproduction of "reality". The term ´simulation` describes the impossibility to discern between "reality" and its reproduction through technical media: an artificial world without origin, without reference, without difference. ´Simulation` is the form of a social pathological status, which in the techno-capitalist age has become the dominant experience of reality.
Concretely, this means that reality cannot be discerned any more from its medial reproduction and that all primary experience has become impossible.

The most characteristic feature of the simulation processes is the indeterminable, the annihilation of the difference.

The simulated reality is an undifferentiated, ´one-dimensional` world without references, where previously-held contradictions between subject-object, cause-effect, means-end, real-imaginary, essence-appearance, surface-depth, original-copy, immanence-transcendence, media-message are dissolved and

[5] Günter Anders, Die Antiquiertheit des Menschen, vol. 1, p. 267

collapse. ´Simulation` by no means remains within the bounds of closed spheres, but Baudrillard moreover diagnoses a universal simulation connection.

The basic assumption of my lecture is that it is not any more (and not even primarily) politics which is changing the world, but rather it is science and technology which drive major changes of the world. This means that very fundamental areas of the shaping of life and the future aren't any more decided in parliaments [or other political bodies], but in laboratories and drawing offices.

The thesis formulated here can be summed up briefly as follows: Through science and technology we increasingly live in a fictitious, abstract, de-sensorial and over-coded world, which is becoming more and more strange to us. This theory I shall develop further: at all levels of society we can observe that technology strongly determines the daily life of mankind (everywhere machinery: photography, films, TV, Video, mobile, Computer, the car; at the workplace assembly lines, factory halls which often need barely people inside, withdrawing money at the ATM machines, Internet-Banking and buying all kinds of tickets through the Internet). As a tendency, the public sphere is breaking away, the public sphere finds less and less space and is more frequently to be encountered on a monitor. In this way the relationship of man to the world has been changed fundamentally. This change is happening in the way that more and more things and equipment push themselves in between man and the world, so that the reality is completely mediated.
Immediate reality as a mediation of materiality, matter and resistance is less and less experienced.

The fact that experiences increasingly are conveyed technically has the consequence that they are being changed in their content and meaning for human beings. In this way a differentiated potential of perception and experience towards a diverse, concrete world of things is lost.

This loss of experience has reached new dimensions with the computer, as with the computer it became possible to link up single media (photography, movies, TV, Video, gene technology) to a universal and multi-functional system of interconnected media. In view of this background the process of de-materialisation has reached a totally new dimension, as now there is no ´beyond the border` of the media. It is the totality of the universal application of media, which does away with the moment of conveying through an appearance of immediacy. Therefore, the current society is characterised through an immense loss of experience and reality.

The traditional understanding of reality has been determined in front of the background of an anthropological, natural space-time-connection of immediate world experience. Through the different data processing and reproduction technologies a great production of pictures has been initiated. In the place of the perception of an immediate, primarily given world, now the perception of a secondary and tertiary reality consisting of signs, pictures and codes is taking place, which more and more loses its referential connection to an initial reality which lies beyond. In this sense we can say that the referential reality more and more disappears in view of a reference-less media reality which produces an image-world without any real models.

**With the help of the system of digital connection of media it has been possible to abolish the place connection and to render the space superfluous. In this way participation without being present is possible, an immediate being present of all things happening.**

During both their work and leisure time human beings in future will be surrounded almost exclusively by images and monitors. As the whole life process to a large extent does not take place within the world-constituting realities space and time, the public sphere and with it the outer and real world will collapse. As a tendency, space and time will be replaced by omni-presence of man and simultaneous happening of events. The technocratic

society in its advanced stage realises a “planetary instant presence” (Virilio), thereby reducing man to the status of a passive spectator.

Everything which previously was considered as ´reality´: the nature and her appearances, the world of real things and their sensual experience, as a tendency will be completely absorbed and de-materialised. Today it can be seen that basically nothing is there which could evade technical reproduction of reality (which was, at the end of the 19th century, initiated by photography and then over movies, the TV and Video up to the computer and gene technology has experienced a progressing intensification). The highlight, at present, seems to be the technology of cloning, which does not even abhor from producing living copies of human beings.

The philosopher Odo Marquard equalises such a technology-induced loss of reality as loss of world for man.
Odo Marquard in this context talks about a ´speed-generated world strangeness of man` which comes into being through the high speed of innovations rendering experiences made previously outdated and valueless:

> ´Experience is the – probably only – remedy against world strangeness: but now it is not effective any more. Because today the well-known gets outdated ever faster and the future world will be increasingly different from the previously-experienced world, the world will become – for us, modern man- strange, and we will become unworldly… Never at the same time – and this is because of the victory of the empirical sciences – there were so many new experiences as today. But we don’t make them ourselves, but others make them for us`.[6]

[6] Odo Marquard, Zeitalter der Weltfremdheit? Beitrag zur Analyse der Gegenwart, in: Hans-Ludwig Ollig (Hrsg.), Philosophie als Zeitdiagnose. Ansätze der deutschen Gegenwartsphilosophie, Darmstadt 1991, p. 81–95, here: p. 86. see also: Odo Marquard, Apologie des Zufälligen, Stuttgart 1986, p. 76–97.

This loss of experience indicated by Marquard, the withdrawal of experienced, felt reality enhances the widely-encountered feeling of separation between human beings, the proverbial ´loneliness in the cities`, the lack of contacts and widely-diagnosed incapability of man to get social contacts which are required for their well-being. With TV and Computer real potentials for perception, for actions and experiences in dealing with human beings and matter are being replaced by processes of de-materialised perception.

- Our whole society is in the process of sustained acceleration. The speed of changes has increased tremendously.
- The innovation cycles of technical inventions are ever becoming shorter.
- Human knowledge is doubled every two years.
- 95% of scientists which ever lived are still alive, e.g. they are living in our time.
- There is an increasing de-synchronisation between our culture, in which everything should and must go faster, and old people, with whom everything is going more slowly.

Apart from that, what else is getting lost in our technocratic reality of the 21st century:

- The scripture.
- The language in favour of communication with images.
- The Over-information renders the information content of messages neutral: the information itself disappears.

The extreme acceleration of life processes expresses itself also in the field of human relationships: multitude and speed of human interactions do not allow any more for stability and duration. The multitude of impressions through information, images, goods, people, feelings cannot be worked out mentally and emotionally. A consequence of this flooding of impressions (or stimuli) is not affection, but rather indifference and arbitrariness.

Additionally, the flood of information in society creates an ever-increasing lack of time. The mass media destroy leisure through distraction and create the status of consumers. Leisure as an inner activity, an active capability of reception, as a process of choice and concentration, as in-depth view and involvement with things and people which were conceived as important, is getting lost.

A paradox of our present time: ´The more time we save (through machinery), the less time we have available`.

Dietmar Kamper

Concluding, we can state that the technical media have in common that they enable us to participate without attendance, thus do away with the connection to a given location, render the space superfluous and further minimise the time. In the future, everywhere man will be surrounded by images and monitors, which draws the consequence that the public sphere falls apart and with it the outer and real world.

"There is no ´there´ any more, everything is ´here´ – and if everything is here, there is no space any more".[7]

"As we would be independent of ways, because everything were `here´, there would be no distances: thus we would be space-less. As we would not be dependent of doing, making or waiting, because everything would happen ´in a moment´, there would be no delay: thus we would be timeless."[8]

Another fundamental diagnosis of our time:

Through science and technology mankind has achieved a status of **´supreme power´,** which formerly was only held by a

[7] Günter Anders, Der Blick vom Mond. Reflexionen über Weltraumflüge, München 1994 (1970), p. 131

[8] Günter Anders, Die Antiquiertheit des Menschen, Bd. 2. Über die Zerstörung des Leben im Zeitalter der III. industriellen Revolution, München 1981, p. 335

god: the capability ex nihilo (out of nothing) to create new life or to amend existing life through application of genetic technology. This may have the consequence that we are about to transform man, as we currently know him: ´trans-human expansion´.

Anthropology (the science of man) always believed to claim what man is in his true essence. Will it be able to say that in the future, with a view towards construction of human beings through application of gene technology?

Already with the dropping of the first atomic bomb on 6th August 1945 mankind has achieved the status of a ´negative supreme power´, namely to destroy all life on earth, a capability which is unprecedented.
Why are we continuing to introduce technology ever further? Why do new gadgets attract us so much?

- In a superficial sense: in order to make our life easier. Technology is renders the burden of our life easier.
- But the deeper reason is the fact that we don't want to die any more. We want to achieve immortality, although we can't achieve that. Nevertheless, with genetic technology we have tools at our disposal, which may allow us to approach this aim with small steps.

> The French philosopher and architect Paul Virilio in his analysis is documenting the destruction of the natural space-time-connection under the influence of an uncontrolled acceleration. Virilio describes the transformation of a geographically ordered, substantial land use planning order towards a technologically determined time-order, and thereby determines the loss of world as soil/land, distance and matter. The ever-increasing speed results in a de-territorialisation, in which mankind is not confronted essentially with matter and materials, but increasingly with the virtual and the immaterial.[9]

[9] See Paul Virilio, Rasender Stillstand, München 1992, p. 131f.

The geographic space is characterised by Virilio as being substantial and material. It possesses volume and extension, gravitation and weight. It is opaque and not transparent. It does not connect, it separates, it fosters delineation and isolation. The interruptions divide the space into clearly-defined locations with a special here and now. They create heterogeneity and multitude, but also distance and isolation.[10]

With the geographical space a certain form of time corresponds: the historical or extensive time, which is depicted by Virilio as the depending variable of space. The historical time is time which lasts, which is divided and organised, which unfolds and in this way also functions a ´limit of movement´ and as a guarantor of continuity and durance.[11]
Virilio now describes the geographical space and with it the historical time through the revolutionising in transport and communication systems disappears more and more in favour of a new configuration: the speed space, in which the distances are shrinking and everything becomes equally near. The globe transforms itself into a continuum, in which there are no borders, no distances and no differences. The technological speed not only requires the absence of obstacles, but the absence of matter generally. The advanced technologies aim at complete transparency, at the cancellation of gravity and weight.[12]

An immediate consequence of the loss of space and time is the phenomenon of globalisation.

To be global is the special feature of the new technologies, which, regarding their claim and functioning, cannot be limited

---

[10] See Paul Virilio and Silvere Lotringer, Der reine Krieg, Berlin 1984, p. 117

[11] Same as above p. 73 and p. 100.

[12] See Paul Virilio, Fahren, fahren, fahren ... Berlin 1978, p. 44f., and same author, Geschwindigkeit und Politik, Berlin 1980, p. 177ff.

in space, and which now transform the world into a ´global village´ (McLuhan).

The application of technology in our world implicates a need for globalisation of production, of the economy, of communication. Repercussions of this development aren't very clear at the moment: changed international economic conditions, a deep change of national work and social relations, enhanced world-wide competition, a galloping plurality in all areas, a rampant multiplication of information, images, exchange.
We live in a time in which speed in all areas of life is ever increasing. More and more people view the global reality as threatening and impossible to understand.
An immediate manifestation of new technologies in the area of production and communication is globalisation or trans-nationalisation of the world economy, which has strong repercussions in the single national economies. For some years it has been observed that big corporations of the Western industrialised countries invest in foreign countries, in order to move production facilities to ´developing or Eastern European countries´ where the labour cost are only a faction of the national level.[13]

Concretely, this means that investment, production capacities and staff employed by large corporations in their home countries are stagnant or falling.

As a consequence, this results in an enhanced unemployment and a financial crisis of the state, as shortened work hours, a fall in national production and higher numbers of unemployed people mean a reduced tax income and higher public expenditure.

[13] See Claus Offe: Vollbeschäftigung? Zur Kritik einer falsch gestellten Frage, p. 798f.

There are three main conditions why these movements of production capacity are taking place:

**First**, in the low-income countries there is a huge potential of available and cheap labour.

**Secondly,** the fragmentation of the production process is far advanced, thus most fragmented partial works can be handled by lowly-qualified labour.

**Thirdly,** there are transport and communication technologies which facilitate the full or partial production at any production places in the world.[14]

Concluding, we can say that the universal application of technology in our world, especially with regard to communication and transportation technology, are the pre-condition of the modern globalization. Mainly TV and the internet must be regarded as symbols of this globalisation.

Further can be stated that the modern globalisation has not fulfilled the hopes which one had put into it. It is to be criticised that, as a matter of fact, globalisation did focus on markets and business relationships, whereas globalisation of human rights, workers rights, ecological standards or democracy do not receive any attention. The citizens in various countries, compared with lobby groups of business interests, wield an ever-diminishing influence.
However, there are surely globalisation winners. Amongst them certainly are China, India, and the five Asian ´tiger states` South-Korea, Thailand, Malaysia, Singapore and Indonesia, whereas especially the African countries and Latin America must be counted as big losers.

---

[14] See Thomas Gil: Sozialphilosophie der Arbeit, Stuttgart 1997, p. 70.

Overall speaking, it can be proven through long-term studies that the world-wide inequality of incomes has increased tremendously within the last four decades.
According to those studies, in the year 1960 the lower 20% strata gained 2,3% of incomes, while the upper 20% strata gained 70,2% of incomes.
In the year 1989 the lower 20% strata achieved an income percentage of 1,4%, the upper 20% strata got a percentage of 82,7%.
In the year 1997 the lower 20% strata earned only 1,2% of incomes, whereas the upper 20% strata reached a percentage of 89% (see Karoly Heinrich, Globale Einkommensparitäten und –polaritäten 2004, in: http://opus.zbw-Kiel.de/volltexte/2005/2673/pdf/Papier6004.pdf).

**Bibliography:**

**(please note: originals in GERMAN, as indicated! Translation of titles of the publications cited are given by myself in [ ])**

Anders, Günter: Die Antiquiertheit des Menschen, Band 1 und 2, München (1981 und 1983)
[The outdatedness of man]

Same author: Der Blick vom Mond. Reflexionen über Weltraumflüge, München 1994 (1970)
[The view from the moon. Reflexions about space flights]

Baudrillard, Jean: Der symbolische Tausch und der Tod, München 1982
(The exchange symbolic and the death)

Same author: Die Fatalität der Moderne. Ein Interview, in: Gerd Bergfleth et al., Zur Kritik der palavernden Aufklärung, München 1984

[The fatality of modern times. An interview]

Gil, Thomas: Sozialphilosophie der Arbeit, Stuttgart 1997
[Social Philosophy of Labour]

Marquard, Odo: Zeitalter der Weltfremdheit? Beitrag zur Analyse der Gegenwart, in: Hans-Ludwig Ollig (Hrsg.), Philosophie als Zeitdiagnose. Ansätze der deutschen Gegenwartsphilosophie, Darmstadt 1991
[Age of world strangeness]

Same author: Apologie des Zufälligen, Stuttgart 1986
[Apology of the accidental]

Offe, Claus: Vollbeschäftigung? Zur Kritik einer falsch gestellten Frage, in: Gewerkschaftliche Monatshefte, Heft 12, Dezember 1995
[Full employment? A critique of a wrongly-formulated question]

Virilio, Paul: Rasender Stillstand, München 1992
[Raging stagnation]

Same author.: Geschwindigkeit und Politik, Berlin 1980
[Speed and politics]

Same author: Fahren, fahren, fahren ... Berlin 1978
[driving, driving, driving …]

Virilio, Paul und Lotringer, Silvère: Der reine Krieg, Berlin 1984
[The pure war]