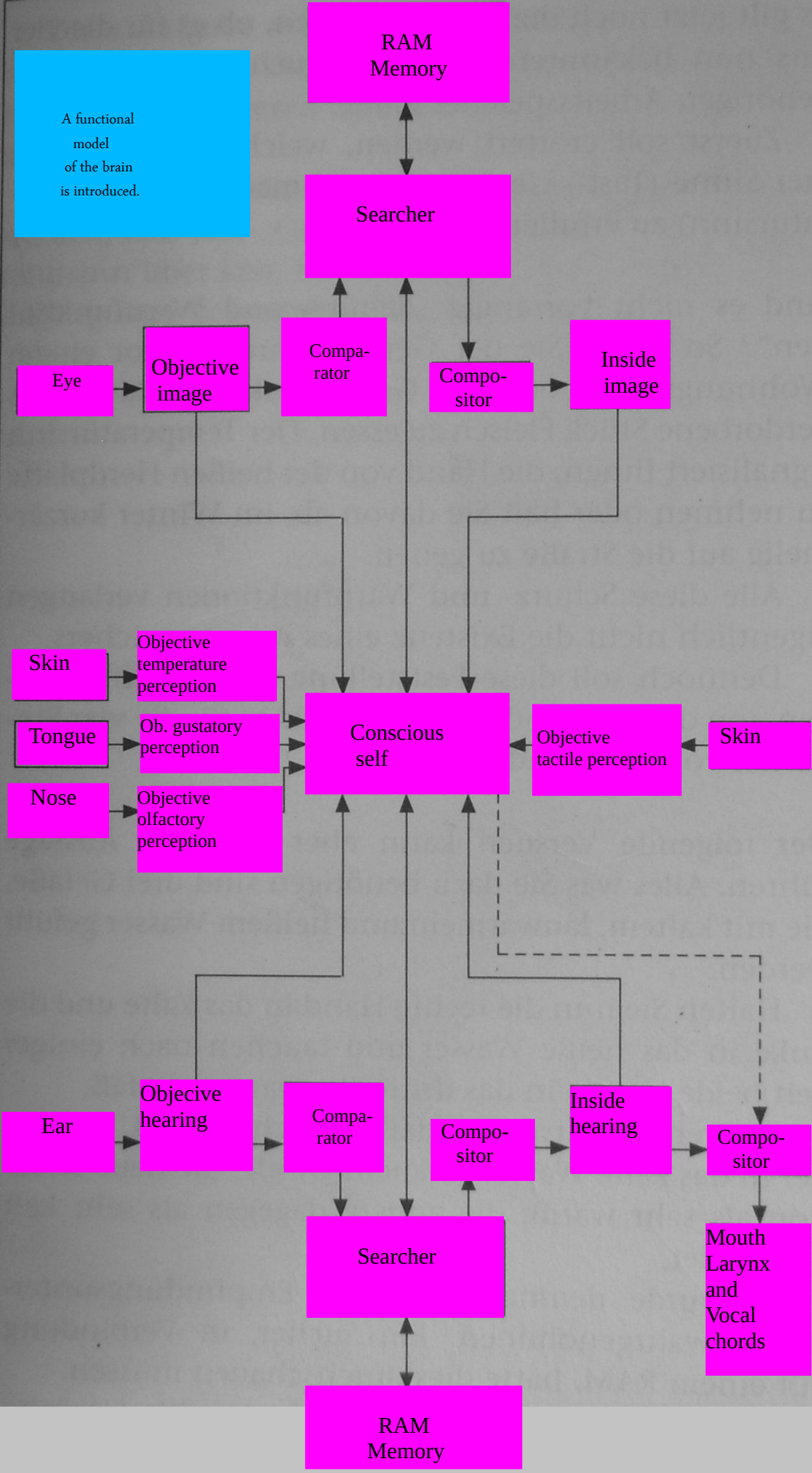


A functional model of the brain is introduced.



The fourth chapter.

Translated from German: Version 3-NT

Artificial intelligence

The model introduced here should on no account go so far as to say it considers the human brain a better computer.

It seems rather that the opinion of the "dualism" and teamwork of a "conscious self" are independent and material modules. **Source 4**

However, the materialist thinks, that modules of the brain are connected so perfectly with each other that consciousness arises from it.

Are computers "intelligent"?

Computers can finish set tasks a lot of faster and above all perfectly. Are they "more intelligent," at least in relation to these duties, than the human beings?

To find an answer on this question, one must first consider the definition of "intelligence" thought.

Definition:

"Intelligence is the ability, to bear in mind, to combine, to recognize connections." **Source 1**

If we uses technical terms from computer terminology, the same definition could be:

"Intelligence is the ability to save digital or analogous data and to combine (to associate) these."

This rewording has the advantage, that is very easily to transferred into the language of mathematics.

Thus, we could say that the intelligence quotient (IQ) consists of the product of the amount of all stored data and the association ability of the concerning person.

If we use for the amount of all stored data the short sign "C" (for capacity) and call the association ability with small "a", the following formula arises from it:

$$IQ = C * a$$

Now this mathematical definition is able to be transferred with an example to a computers.

Example:

The capacity (C) of every computer and the programs is given in byte.

Because 1 byte is a very small unit, which permits only the store of one letter like "Y" or "K", we speaks of kilo, Mega Giga and terabyte.

If this assumption is correct and we deal with a computer its memory has a capacity (C) of 5 gigabytes (5000 megabytes).

Thus, the formula arises:

$$IQ = 5 \text{ gigabytes} * a$$

The association ability (a) of every computer is zero.
It explains only this what the programmer inputs. Nothing new occurs to him.
Thus, is the complete formula:

$$IQ = 5 \text{ gigabytes} * 0$$

From it follows: $IQ = 0$

All the same how much storage capacity is available, the IQ of every computer remains a zero, because is multiplied by the factor (a) which is, in any case, a zero.

Nevertheless, there is still another possibility:

The calculation with the association ability of the programmer.

One advantage of the computer is, that one can bring in a part of the operator's knowledge and association ability in this device.

If we accept: The program has a capacity (C) from 100 megabytes and the association ability (a) which the programmer brings in, amounts hypothetically to 0. 2.

Thus the formula arises:

$$IQ = 100 \text{ megabytes} * 0. 2$$

Result: 20

Though the number itself is without bigger value, it points clearly, that a computer program can be considered intelligent, if one counts on the association ability which the programmer has brought to it.

Einstein said: "My pencil is cleverer than me. " **Source 4**

He has probably believed that the pencil helps him to dissolve formulas (or to let dissolve) which he could not master alone in his head, to make notes to himself on a paper, without the fear to forget them again.

He already looked at the pencil as strong tool, without it he could only restrictedly work.

A computer is a much stronger tool. In source 4 also highly praised pencils called.

Example: Today many chess programs reach Grand Master's level.

A programmer is able to write a program which can hit a Grand Master during the match.

The programmer himself would have to directly play against the Grand Master, however, he would have no chance of winning.

The extreme speed at which the computer processes the job allows to the programmer to apply algorithms which a person alone due to various reasons, such as time and concentration, cannot perform.

(to search, e. g. , 80'000 names on a sign string.)

The computer is still not intelligent, because he processes strictly the program written by the programmer with the given associations. The computer knows no divergences of it.

The intelligence of the programmer is "stored" in the machine and runs off extremely fast. A considerable increase of the power (work / time) thereby arises.

Nevertheless, there are programs (e. g. checkers and chess) which are really adaptive. The checkers' program is a very bad player at the beginning. However, it learns from its mistakes. With the time it develops alone and advances to become a good player. This program learns and also associates. It is "intelligent" in modest measure according to the above definition.

However, the association ability is to be considered as low and restricted only to the checkers game. The association ability which the programmer has brought in is still higher around a multiple than those whom the program itself develops.

In the USA IBM has introduced a mainframe which can take part with 200 million sides data material and 16 terabytes of main memory even in a quiz show.

Besides, IBM programmed a very good association ability for the questions which Watson, according to the name of the giant, as a text file gets digitally presented.

By the fact that "C" becomes so big a relatively high IQ also the result. Besides, Watson needs only 3 seconds to search all data. In the broadcasting it is also about quickness.

Watson became the first during the show and IBM donated the profit to a good purpose. Whether Watson could be glad about it, is still up for debate.
Source (The second German television canal in the year 2011)

Supplemental 2010

With a baby born anew his knowledge (C) is close zero, because he could not learn a lot of things in the womb.

If there is $IQ=C*a$, this means that also the IQ of the child is close to zero too. However, it already has the ability to learn and to associate.

Example:

$C=0,03$ and $a=10$: From it follows: $IQ=0,03*10$: From it follows: $IQ=0,3$

There is no pain Centre. FROM Priv.-Doz. Dr. Dr. Thomas R. Tölle Internet 2010

„These insights have already changed the basic images of the neurobiology scientists as the brain processes pain. Obviously no central pain centre generates the "overall impression of pain", according to Toelle, but "presumably a network of different functional systems": Besides, it concerns associations around nerve cells (neurons) in the partly far apart recumbent brain areas which receive pain signals from different nerve tracts and process in various manner in parallel or one after the other switched.“
Find in the Internet in the year 2010.

Another clue for the existence of a “conscious self” is pain. See Sir Karl Popper, in Source 4 and in Chapter 1 of my book.
It is, in the end, a receiver and weighting of pain.
Some advocates of the materialist perception say, there will never be a clarification of the phenomenon pain maybe.
In a dualistic model it can be already cleared.

Chapter 2010

Newer knowledge from the brain research proves that there is in the brain no place in which the processed sensory perception is brought together.
Source 11

Many processes tramp decentralized, which is parallel and function independently of each other.
If we look at the block model, this on no account is first a contradiction. Since optical and acoustic data are processed completely in parallel and decentralized. Only there is no collective point because there is just no unique center how in Source 11 are to be read.
These results of the research are also not put to question by the dualistic group.

There was always the image, the “conscious self” as a field.
The new results about the anatomy strengthen the field theory; but do not weaken the most various arguments of the dualism, which are mostly independent of circuit.
In Source in 2010 this field is called “CMF” ----> Conscious mental field.
The field can communicate with the material brain and access interfaces at different locations.
This also explains the partly far apart lying brain areas with the pain sensation.
With a field accesses, exclusively on only one place, would even be out of character.

However, it cannot concern an electromagnetic field, because this can be generated in every intensity and wavelength, and sometime would cause disturbances which the person who is nearby could perceive.

Or differently expressed.

If human consciousness was an electromagnetic field, it can be influenced by other fields from the nature. A person would perceive the field from the nature by a change in own consciousness sometime. Nevertheless, this is not the case.

“We do not believe in a field, which the physic does not know. We find nothing, so there is nothing”, are arguments of the opposition.

However, we should also think, that the gates remained close until now, to a uniform field theory.

The field is there, because everything else seems not consistent .

Sir Eccles states, “How the self-steers his brain”, indicated ways, which are not proved in practice up to now.

Source 12

Now here ends the implementation, dear reader.

The author of this article believes in a field, which the state of art does not know and cannot measure. Thus, the questions stay open.

However, to be able to recreate the brain, is not worth a Dualist's time.

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P.S: You will find the whole article in German and my contact address at:

www.brain.de.to

Translated 2019 by the author Marc Stimm and my friend Kate from Boston USA.