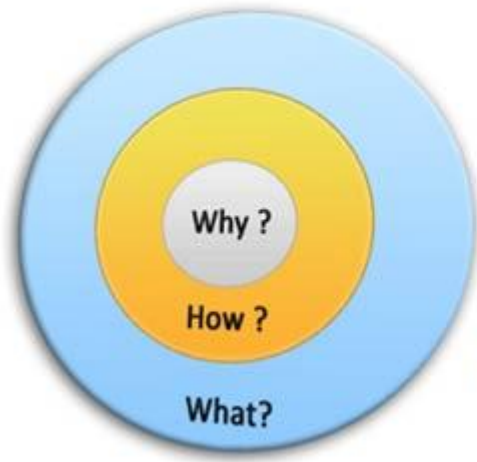


The Highest Functions of Nervous System

Psychological and Social Aspects of Brain Activity

II

Limbic system and neocortex



Why = The Purpose

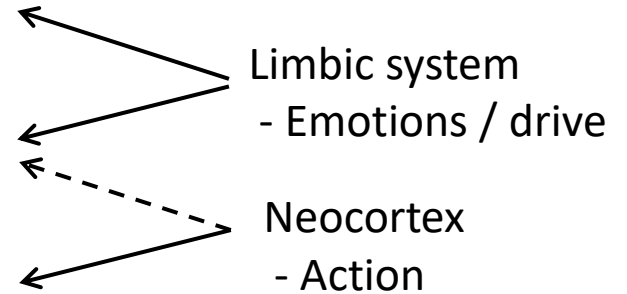
What is your cause? What do you believe?

How = The Process

Specific actions taken to realize the Why.

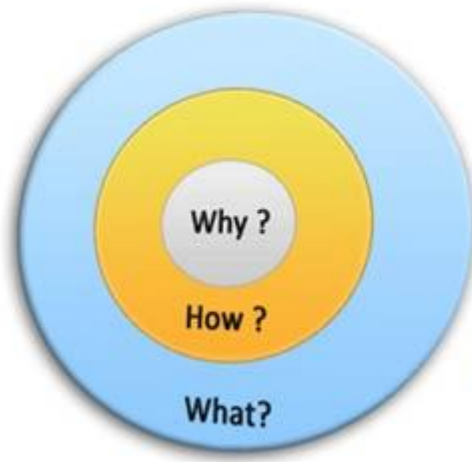
What = The Result

What do you do? The result of Why. Proof.



<https://s-media-cache-ak0.pinimg.com/originals/84/34/b1/8434b124c9fc92003051c56b088906a5.jpg>

Limbic system and neocortex



Why = The Purpose

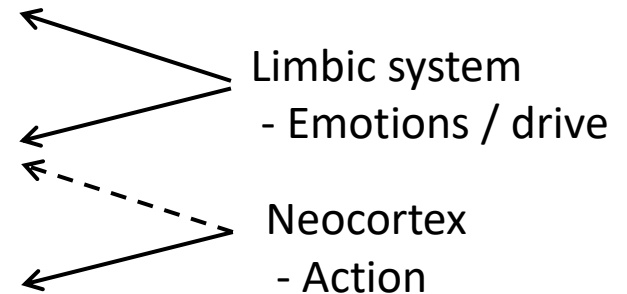
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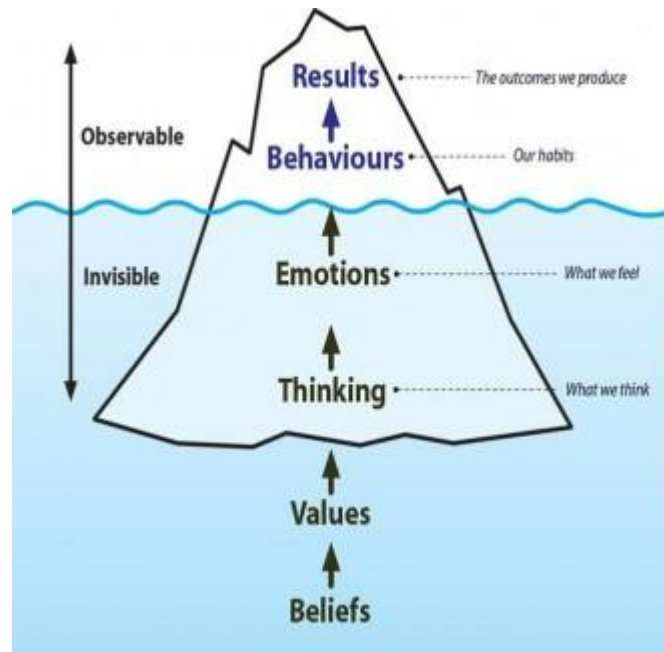
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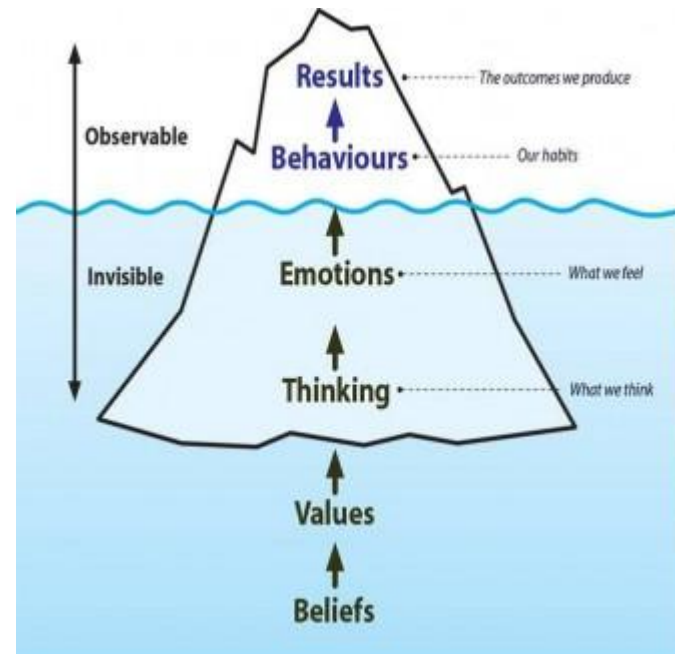


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Limbic system and neocortex

Instinctive behavior

- Limbic system
- ✓ I see a nice thing, so why not steal it?



<http://www.coaching.net.nz/wp-content/uploads/2013/06/Iceberg-for-blog-from-J-e1371521135440.jpg>

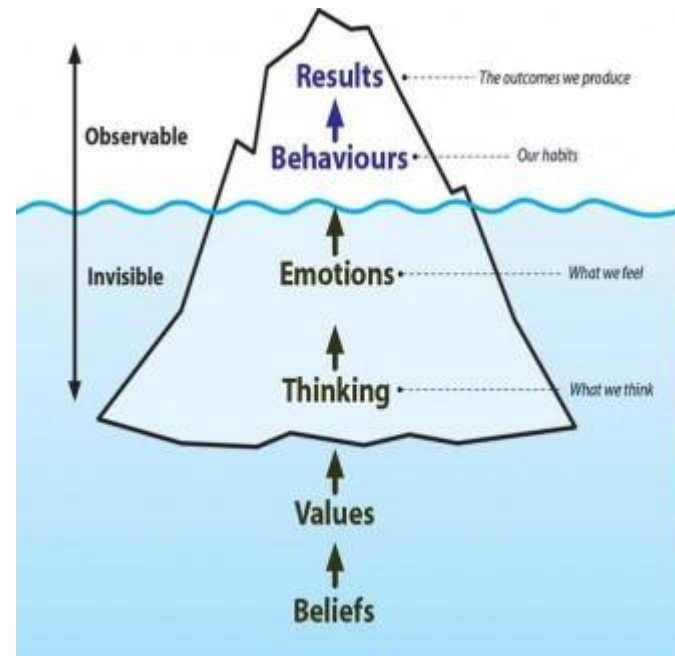
Limbic system and neocortex

Instinctive behavior

- Limbic system
- ✓ I see a nice thing, so why not steal it?

Socially enforced behavior

- Legal behavior
- Neocortex – limbic system
- ✓ Theft is a crime, and punishment may come



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Limbic system and neocortex

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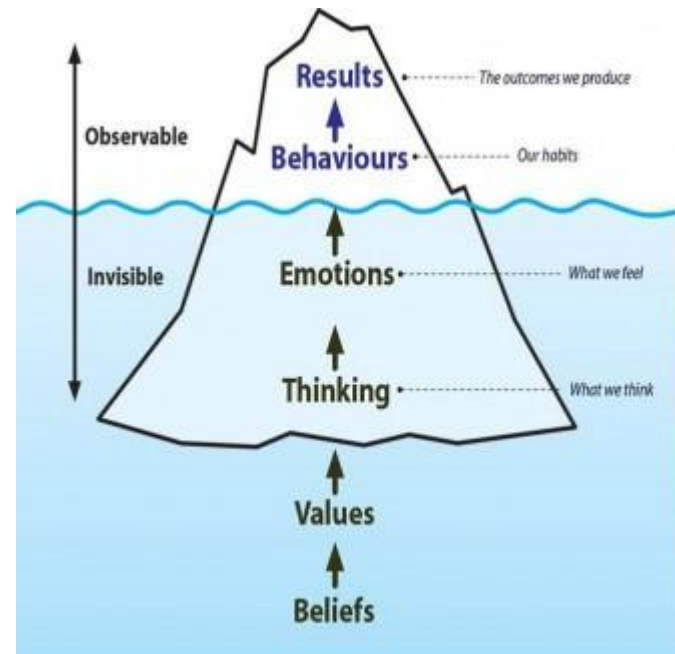
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Moral behavior

- Legitimate behavior
- Limbic system
- ✓ Stealing is a bad thing



<http://www.coaching.net.nz/wp-content/uploads/2013/06/Iceberg-for-blog-from-J-e1371521135440.jpg>

Limbic system and neocortex

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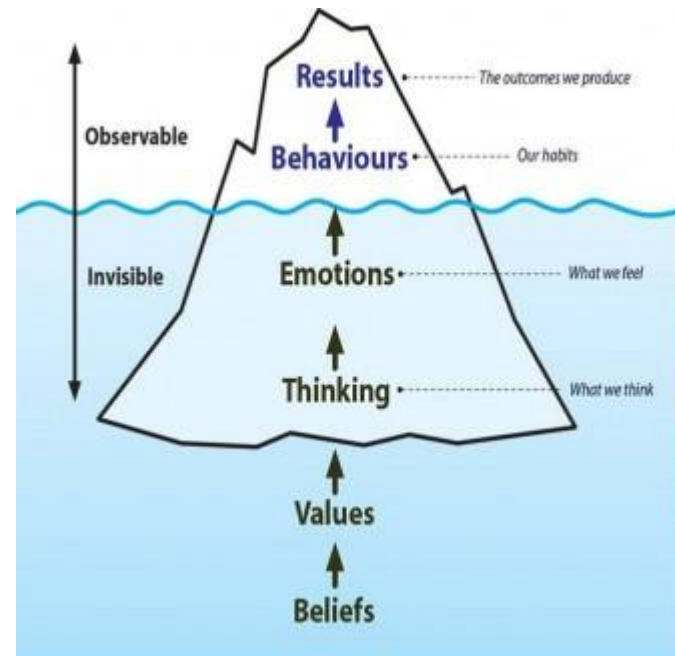
- Legal behavior
- Moral behavior system
- ✓ Punishment, and punishment may come

Fear of punishment

Moral behavior

- Legitimate behavior
- ✓ Moral behavior is a bad thing

Moral stance



<http://www.coaching.net.nz/wp-content/uploads/2013/06/Iceberg-for-blog-from-J-e1371521135440.jpg>

Limbic system and neocortex

Information

NEOCORTEX

VS

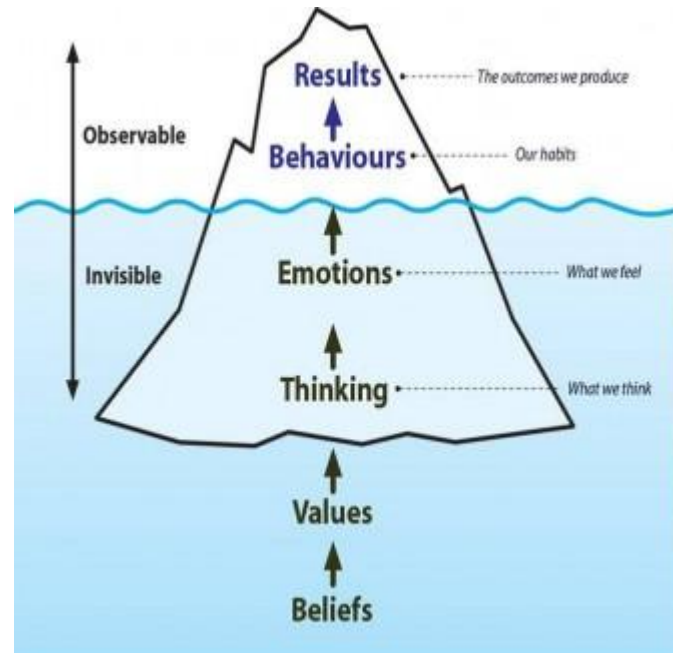
Complex information

NEOCORTEX/limbic system

VS

Values/Philosophy/Faith

Neocortex/LIMBIC SYSTEM



<http://www.coaching.net.nz/wp-content/uploads/2013/06/Iceberg-for-blog-from-J-e1371521135440.jpg>

Limbic system and neocortex

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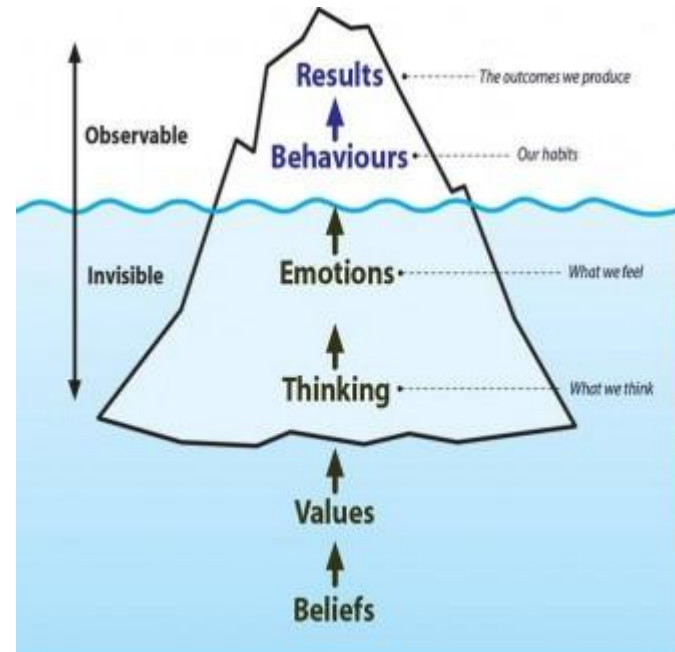
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„ The whole is greater than the sum of its parts“

Aristoteles

Limbic system and neocortex

Information

NEOCORTEX

VS

Complex

Brain activity
✓ Highly individual
✓ Very subjective

the outcomes we produce

Our habits

What we feel

we think

<http://www.coaching.net.nz/wp-content/uploads/2013/06/Iceberg-for-blog-from-J-e1371521135440.jpg>

“... is more than the sum of its parts“

Aristoteles

Limbic system and neocortex

Information

NEOCORTEX

VS

Complex

Brain activity

- ✓ Highly individual
- ✓ Very subjective
- ✓ Values/philosophy/faith enable coexistence within the larger group/society

“... is more than the sum of its parts”

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<http://www.coaching.net.nz/wp-content/uploads/2013/06/Iceberg-for-blog-from-J-e1371521135440.jpg>

Limbic system and neocortex

Information

NEOCORTEX

VS

Complex

Brain activity

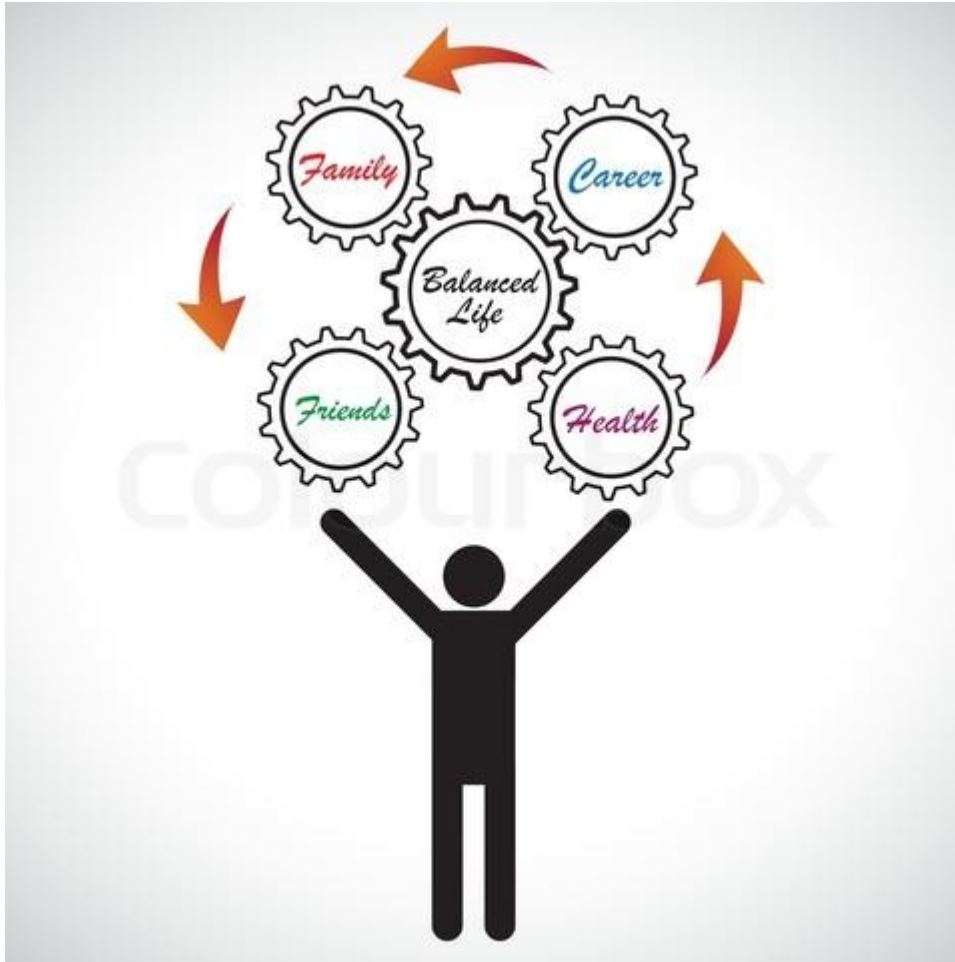
- ✓ Highly individual
- ✓ Very subjective
- ✓ Values/philosophy/faith enable coexistence within the larger group/society
- ✓ These systems represent **RULES**

“... is the sum of its parts“

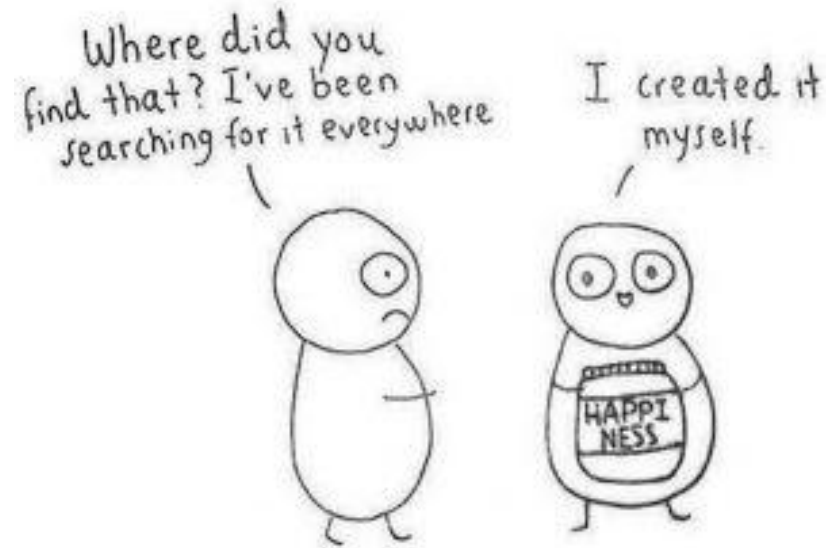
Aristoteles

<http://www.coaching.net.nz/wp-content/uploads/2013/06/Iceberg-for-blog-from-J-e1371521135440.jpg>

The conflict between the limbic system and the neocortex



<http://www.terryherring2013.com/wp-content/uploads/2014/03/life-balance.jpg>



<http://thedailypositive.com/wp-content/uploads/2016/06/image1-4-300x300.jpg>

The conflict between the limbic system and the neocortex

- Predominance of the limbic system (neuromodulation)

The conflict between the limbic system and the neocortex

- Predominance of the limbic system (neuromodulation)
- Neocortical activity
 - top of neural activity
 - low influence upon lower part in case of conflict

The conflict between the limbic system and the neocortex

- Predominance of the limbic system (neuromodulation)
- Neocortical activity
 - top of neural activity
 - low influence upon lower part in case of conflict
- Reflex activity (both autonomous and somatic)
 - involuntary (with rare exceptions)
- Limbic system activity
 - almost involuntary

The conflict between the limbic system and the neocortex

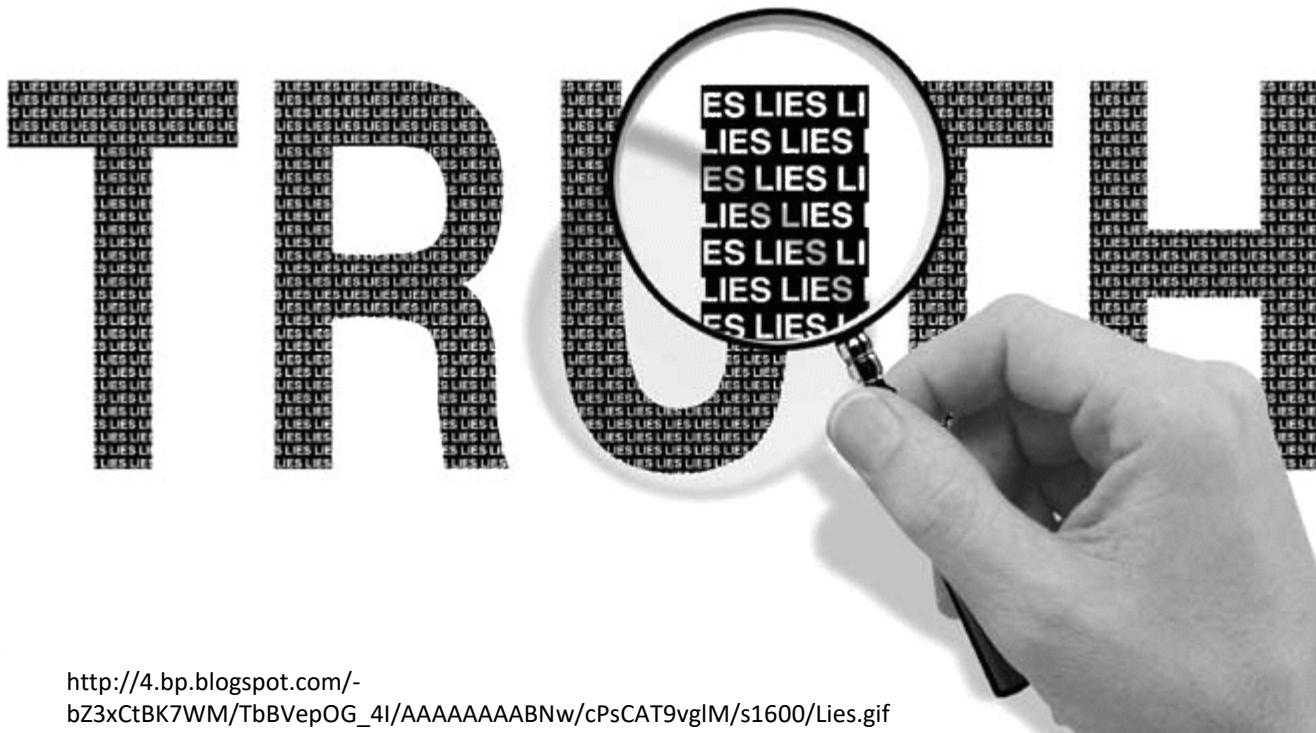
- Predominance of the limbic system (neuromodulation)
- Neocortical activity
 - top of neural hierarchy
 - involved in conscious thought
- Reflexive activity (e.g., emotions)
 - involuntary
- Limbic system activity
 - almost involuntary

**Solution of this conflict is rationalization.
Human brain is very good at finding
rational explanations of irrational
behavior....**

Rationalization

✓The problem with effective control of the neocortex

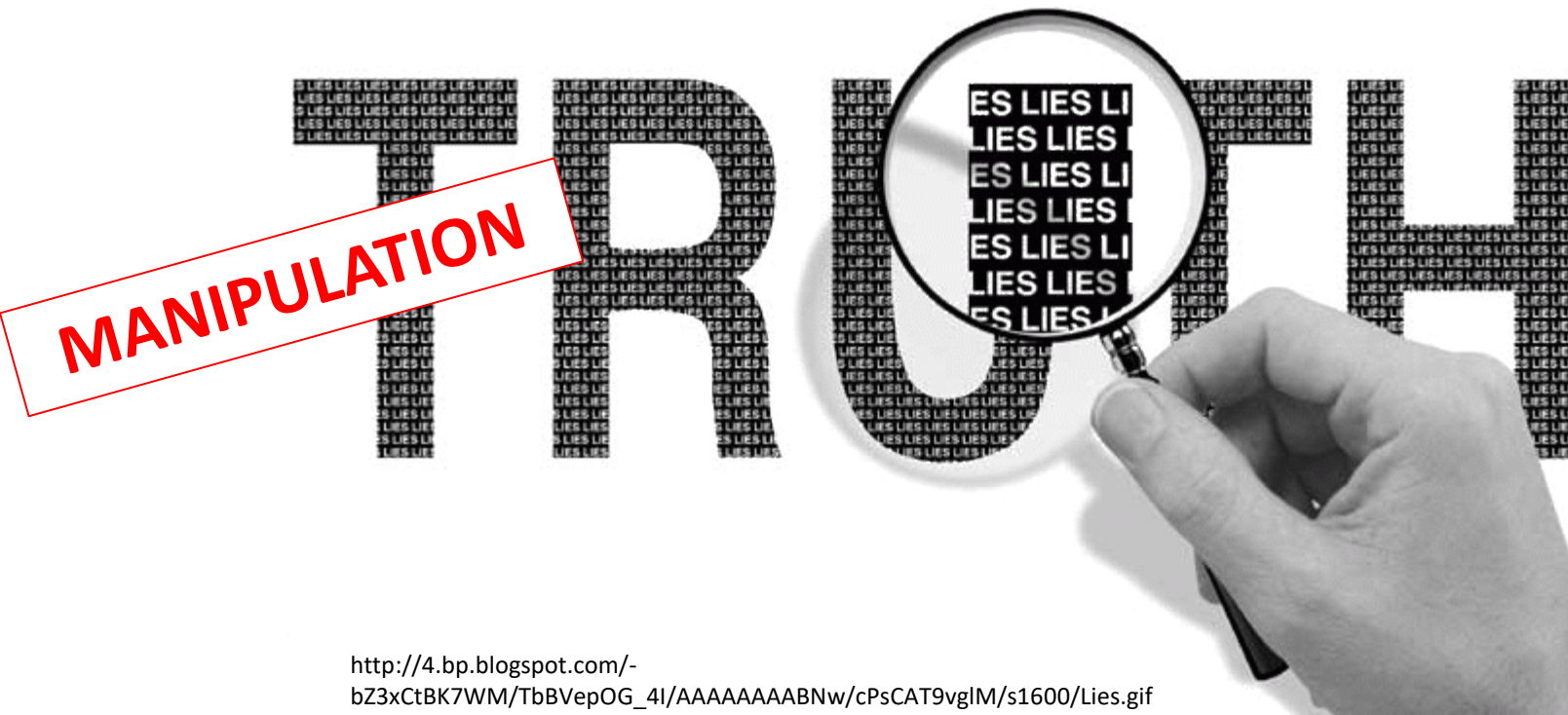
- defense mechanism in which controversial behaviors or feelings are justified and explained in a seemingly rational or logical manner to avoid the true explanation, and are made consciously tolerable—or even admirable and superior—by plausible means (wikipedia)



Rationalization

✓The problem with effective control of the neocortex

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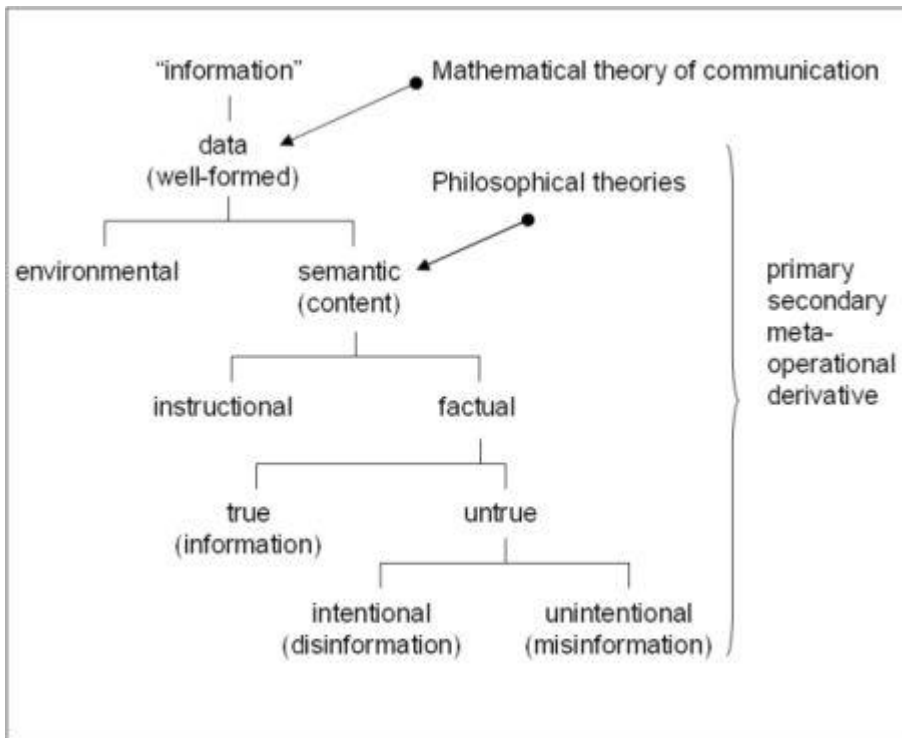
Manipulation

✓The problem with effective control of the neocortex

- Intentional vs unintentional

„ Why do you look at the speck of sawdust in your brother's eye and pay no attention to the plank in your own eye? „

Matthew 7:4



Manipulation

✓The problem with effective control of the neocortex

- Intentional vs unintentional
- Selfmanipulation
 - Mostly unintentional
 - Defensive mechanism
- Manipulation of others
 - Mostly intentional
 - Offensive mechanism
 - ✓ To defense myself
 - ✓ To obtain some advantage

„ Why do you look at the speck of sawdust in your brother's eye and pay no attention to the plank in your own eye? „

Matthew 7:4



Manipulation

BURGER KING WHOPPER

ADVERTISEMENTS



ACTUAL BURGER

- MOST ATTRACTIVE ANGLE
- WITH CHEESE
- SLIGHTLY FLUFFED UP



ALPHAILA.COM

TACO BELL CRUNCHY TACO

ADVERTISEMENTS



ACTUAL TACO

- MOST ATTRACTIVE ANGLE



Manipulation



Manipulation

Weight Loss @ Home Food

Hi i Loss 30Kg Weight & 4 Inches Still maintain
You can Also Join Diet4india Weight Loss Prgm
No Cruch Diet,Exercise, Eat & Lose , Call Now
09225225161, 9890222689 *



Before



After

<http://www.diet4india.com/images/image4.gif>

Playing on emotions /
feelings of unhappiness
- the limbic system

NEW WEIGHT LOSS SOLUTION



DR. OZ

"This miracle pill can
Burn Fat FAST!"

LEARN MORE

<http://blogs-images.forbes.com/jeffbercovici/files/2012/08/dr.-oz-weight-loss-pills.jpg>

Pseudorational
(it is believable) –
neocortex



<http://mannmedia.pbworks.com/f/weasel%20wrods.jpg>



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Manipulation and propaganda



Propaganda

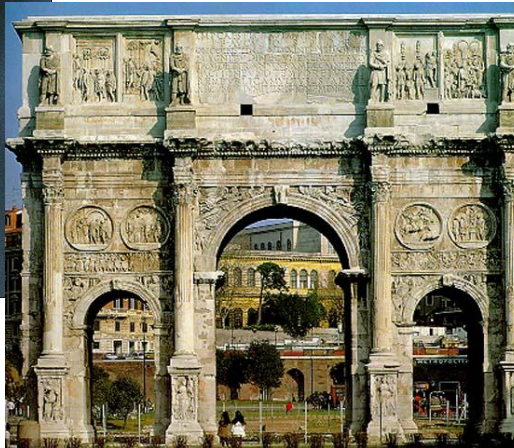
- Manipulation / propaganda is as old as mankind itself, and sometimes it may seem absurd



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Propaganda

- Historical resources have propagandistic character
- History is written by winners
- Subjective / engaged view vs. pure propaganda



<http://soren.faculty.arizona.edu/sites/soren.faculty.arizona.edu/files/newpag10.jpg>

<http://www.colorado.edu/Classics/clas4091/Graphics/Constarch.jpg>

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<http://www.encyclopediaofukraine.com/pic/5CR%5CA%5CRadziwill%20Chronicle%20for%20for%20year%201176.jpg>

Propaganda



US **VS** **THEM**

THE ESSENCE OF PROPAGANDA

Stereotypes are at the heart of all propaganda efforts.
Their purpose is to create the perception that our actions are always ethical and honorable, while those of our opponents are always unethical and dishonorable.

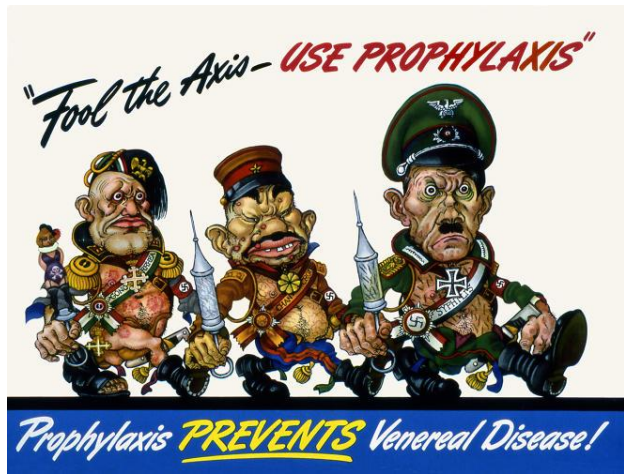
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Propaganda



Propaganda tries to provoke intolerance

Propaganda and propaganda



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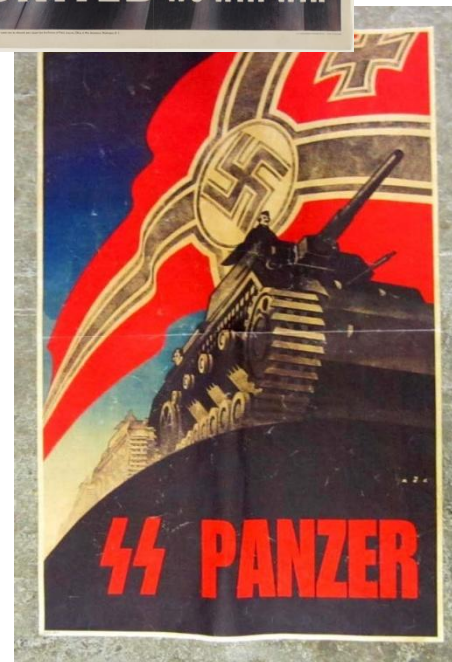
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Propaganda and propaganda

"Fool the Axis - USE PROPHYLAXIS"



NORDMENN



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Prophylaxis PREVENTS Venereal Dis

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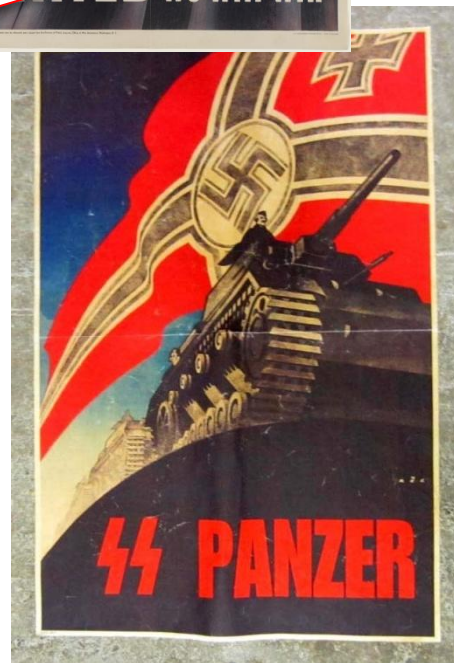
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Glorification



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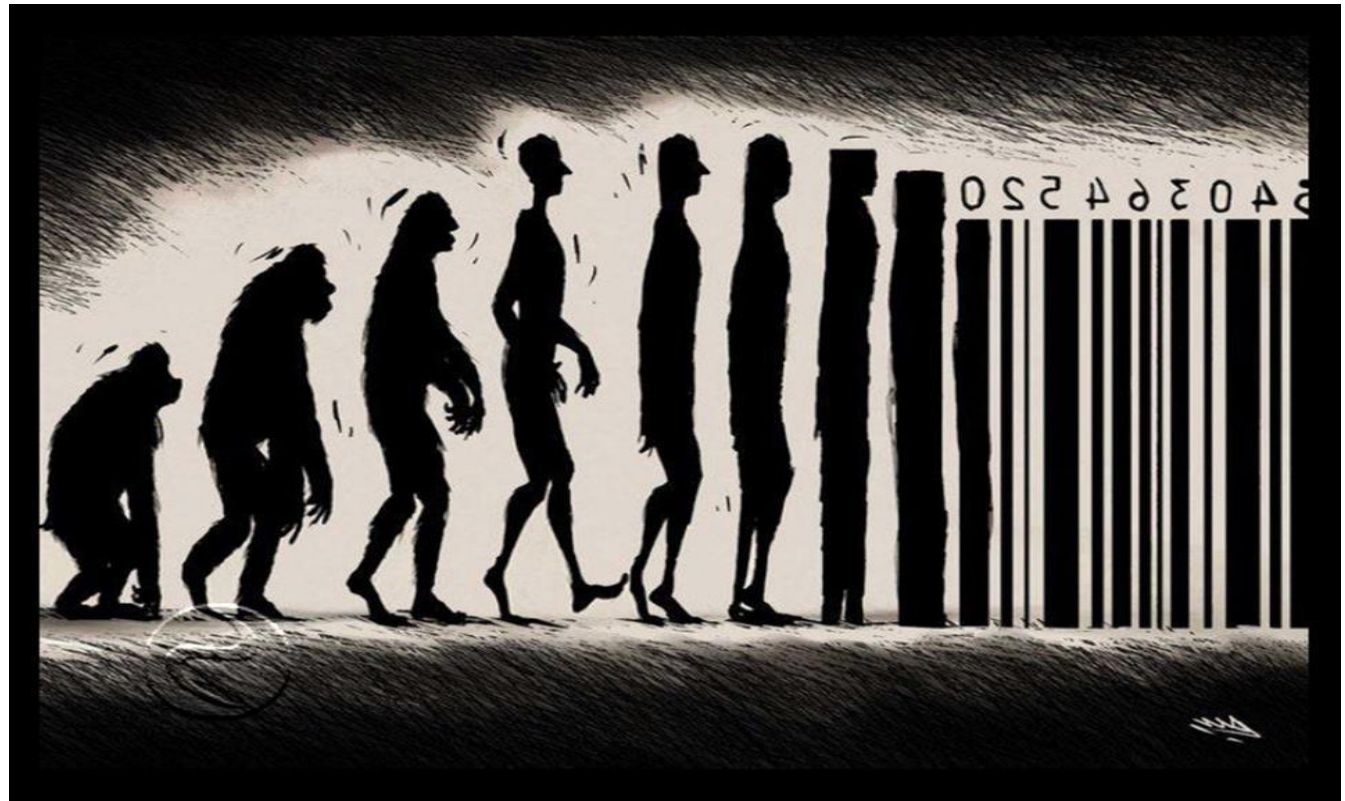


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EAShiMGI&iact=mr&uact=8#h=407&imgrc=29m5HiOvOat5wM:&ve
t=1&w=640

Dehumanization

- debasement the others' individuality as either an "individual" species or an "individual" object
- Animalistic
- Mechanistic



Society



Culture
– the sum of knowledge
✓ Material
✓ Spiritual

<https://cdn.nexternal.com/tjb/images/FC-11.jpg>

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<http://previews.123rf.com/images/dja65/dja651107/dja65110700341/10025966-Stone-age-axe-Stock-Photo-tools-ancient-stone.jpg>

[http://www.thebushcraftstore.co.uk/ekmps/shops/bduimportsltd/images/condor-greenland-pattern-axe-\[2\]-12105-p.jpg](http://www.thebushcraftstore.co.uk/ekmps/shops/bduimportsltd/images/condor-greenland-pattern-axe-[2]-12105-p.jpg)

Medical doctor

- Treatment strategy
 - Evidence based
 - Rational
 - Reproducibility
 - Knowledge transfer possible

Healer

- Treatment strategy
 - Personal ability based
 - Pseudorational/irrational
 - Reproducibility is problematic
 - Knowledge transfer impossible

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It is possible that people with supernatural abilities exist, but they are in minority and the majority of healers intentionally or unintentionally manipulate their patients

➤ Every phenomenon which cannot be explained rationally is similar to miracle/supernatural phenomenon



<http://pop.h-cdn.co/assets/15/45/2048x1152/hd-aspect-1446671691-ufo3000.jpg>



<https://space.desktopnexus.com/wallpaper/598423/>



<https://s-media-cache-ak0.pinning.com/originals/c3/53/40/c353406ec16aa486bdf806581839dcb7.jpg>

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- Approach to patient
 - More rational - explanatory

- Approach to patient
 - More emotional - calming

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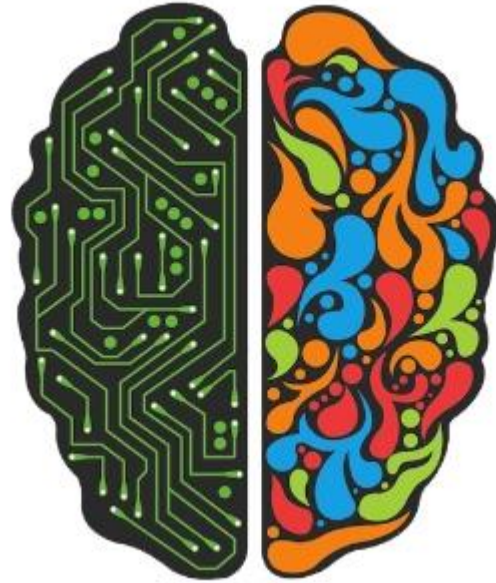
Placebo has an effect in approximately 30% of cases and this is associated with anticipation functions of the brain

Every illness is a stressor negatively affecting patient's psyche

Good approach to patients may improve treatment results by combining placebo effect with the effect of medicaments

Empathy

Rationality



Emotionality

