

“YOU & I”

UNDERSTANDING OUR RELATIONAL
BRAIN TO BETTER INFLUENCE THE
COUNSELING PROCESS

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OVERVIEW

- Brain Development
- Attachment and our Brain
- 5 Areas of Integration
- Case Study

THE RELATIONAL BRAIN

Our mind is not simply the brain's activity, it is the product of our interpersonal communication – our connection with others.

“It is the embodied and relational process that regulates the flow of energy and emotion.” Dan Siegel



STILL-FACE

<http://youtu.be/apzXGEbZht0>

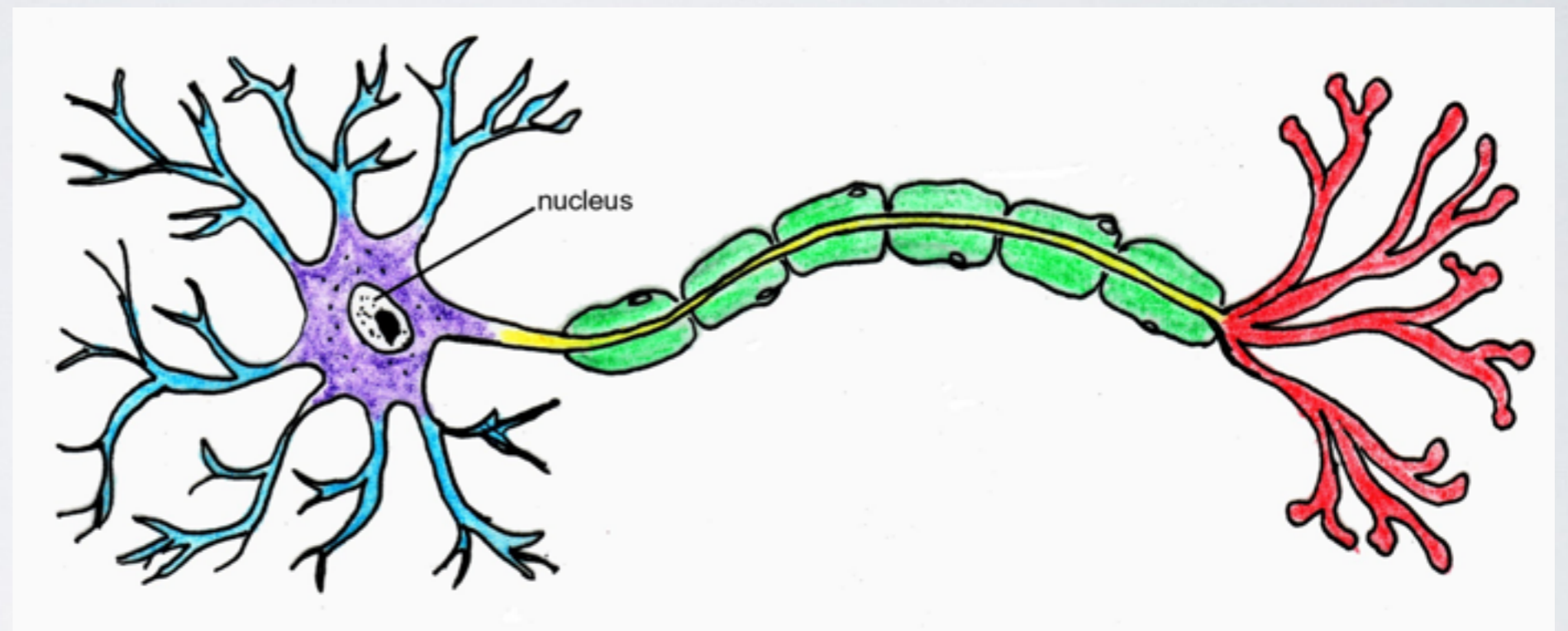
DEVELOPMENT

- Brain Anatomy
- Brain Development
- Attachment



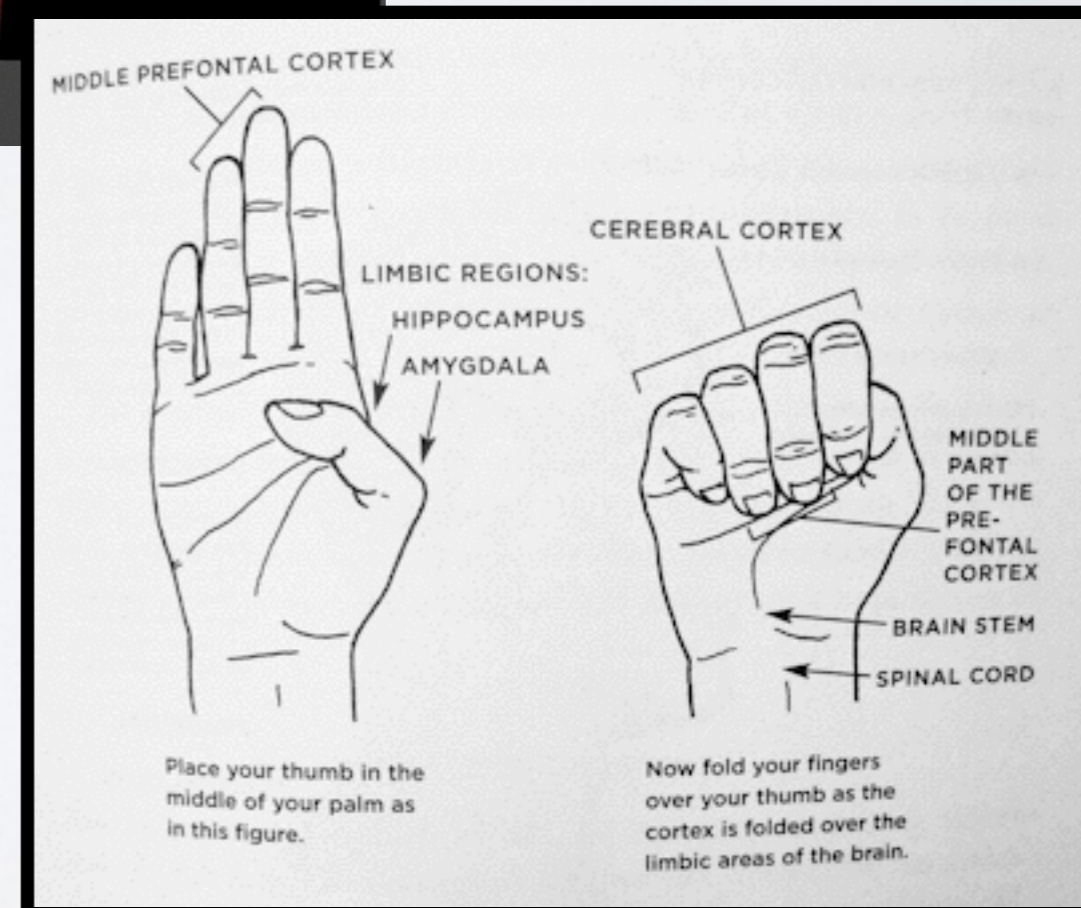
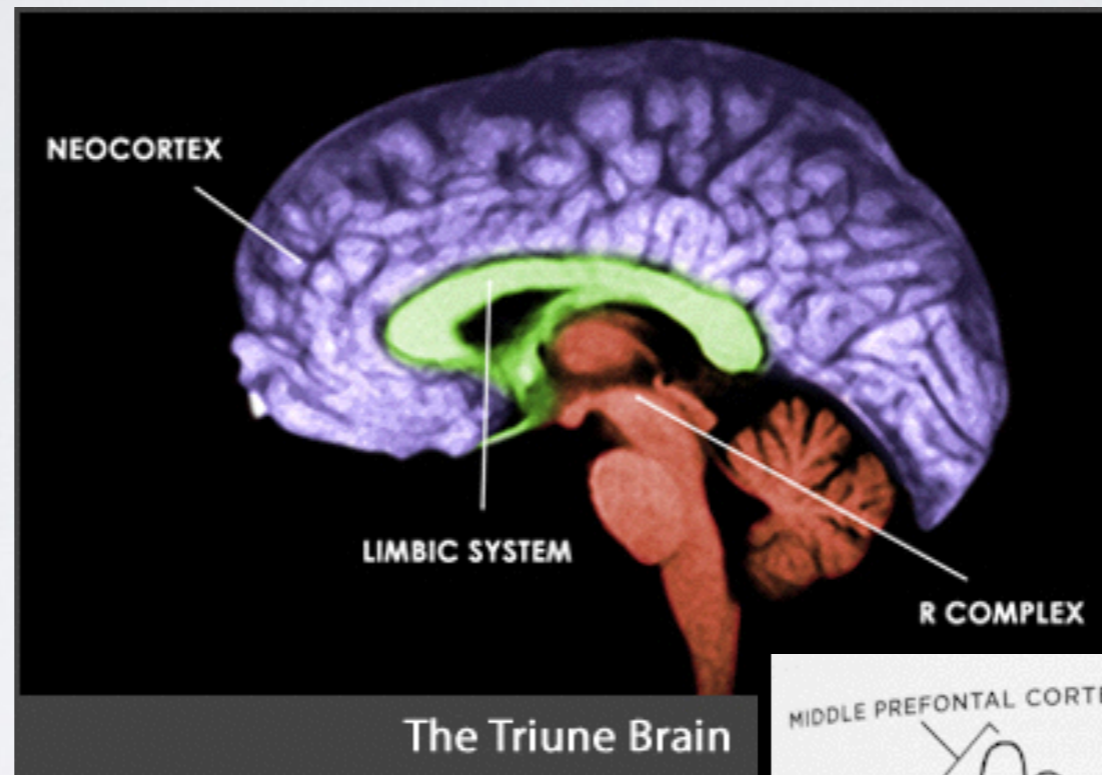
NEURONS

- Dendrite
- Nucleus
- Axon



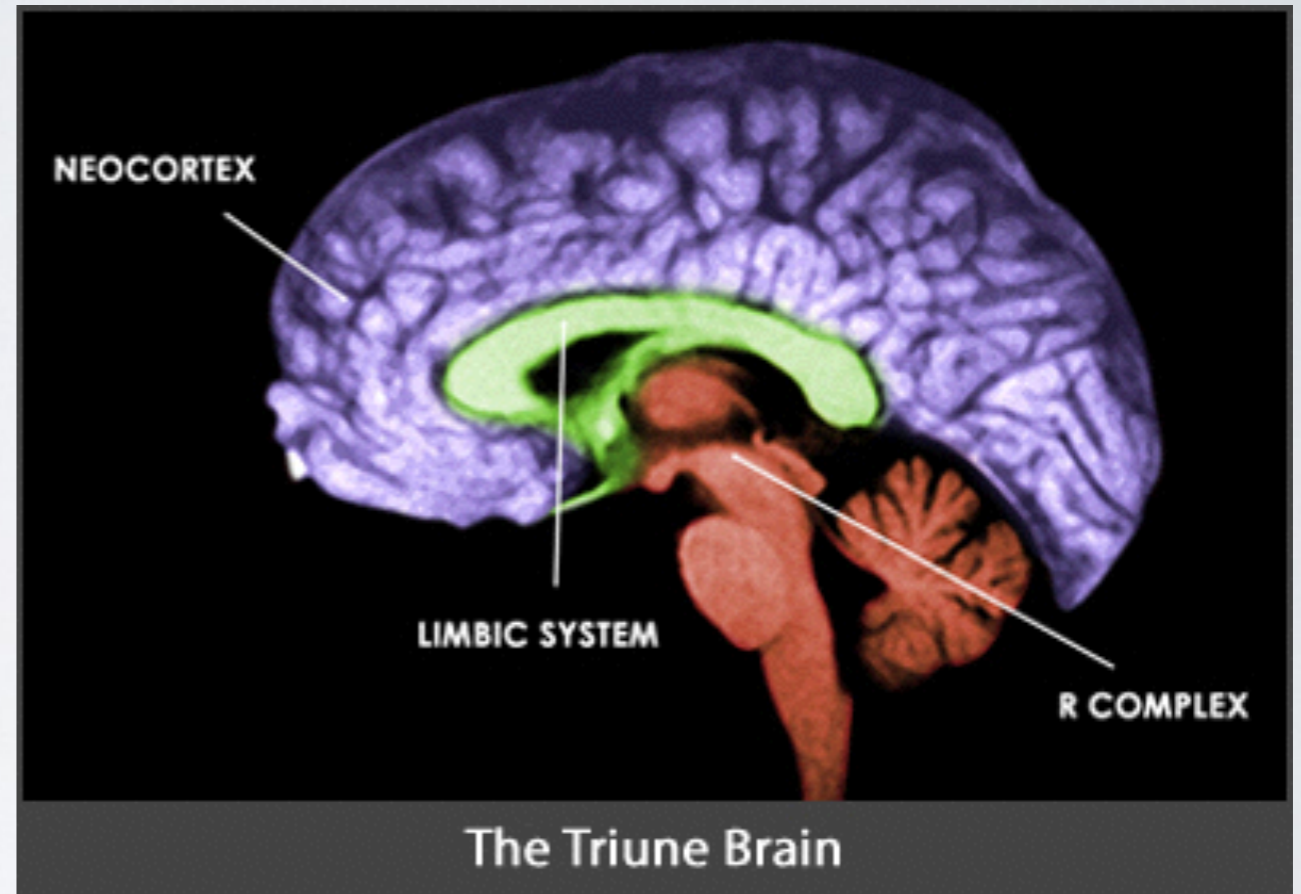
TRIUNE BRAIN

- Brain Stem
- Limbic System
- Cortex



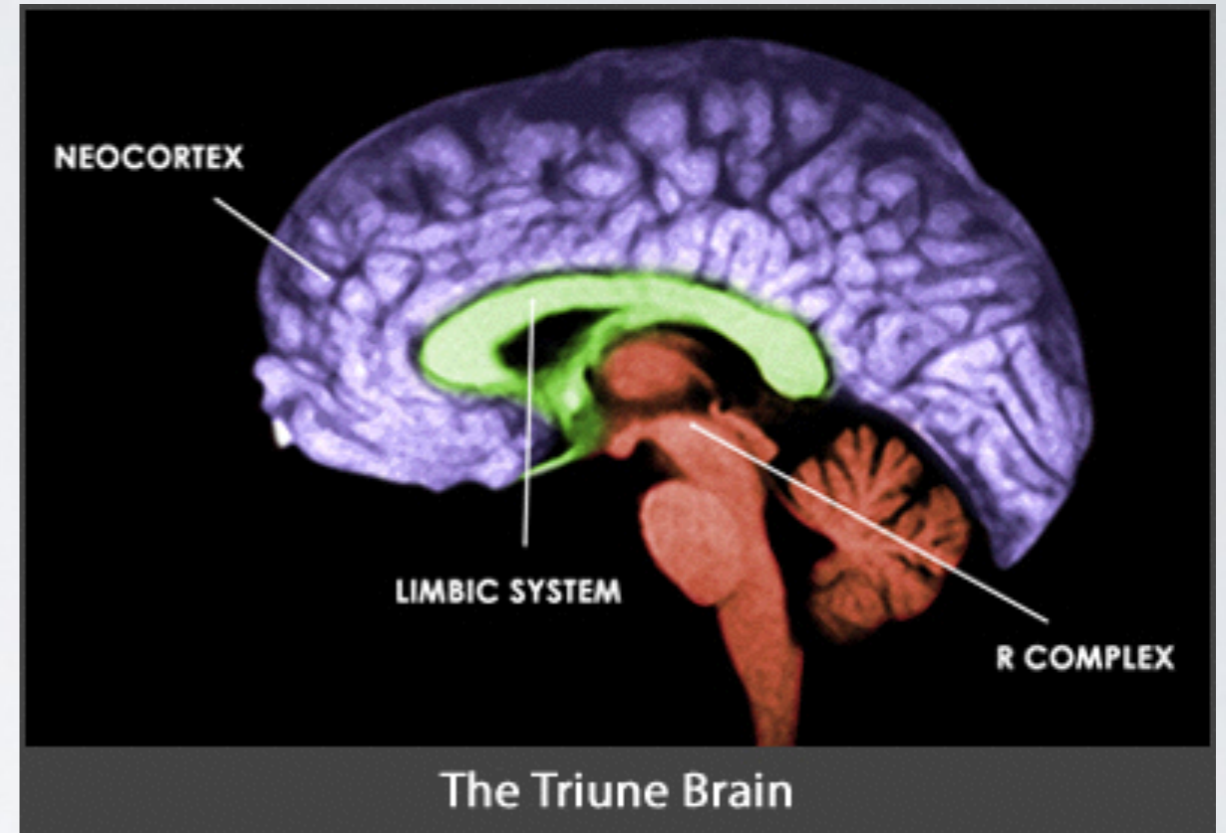
BRAIN STEM

- Lowest part of brain
- Receives sensory data (except smell)
- Regulation of sleep cycle
- Reflexes: fight, flight, freeze, or faint



LIMBIC SYSTEM

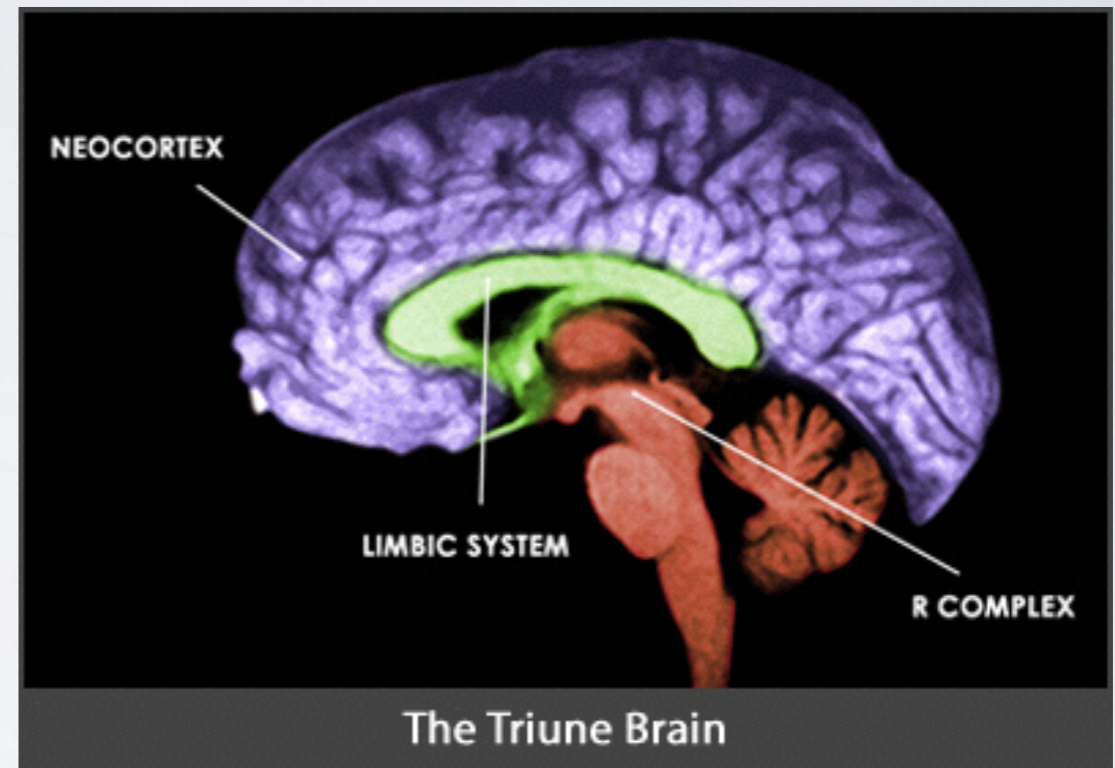
- Mediate emotions
- Influence processes throughout brain



- Hippocampus - creates association linkages
- Amygdala - important for processing a number of emotions

CORTEX

- most evolved brain functions
- abstract thinking, reflection, and awareness
- directly shaped by the neural processes of the limbic region and brain stem



PREFRONTAL CORTEX

- frontal lobe - the front part of the cortex
- prefrontal cortex - the forward most part of the frontal lobe
- one synapse away from all three major regions of the brain
- neural integration of the 3 main areas of the brain



PREFRONTAL CORTEX

- integrates information received from the body
- integrates information from others, social cognition
- gateway to interpersonal connection



BRAIN DEVELOPMENT

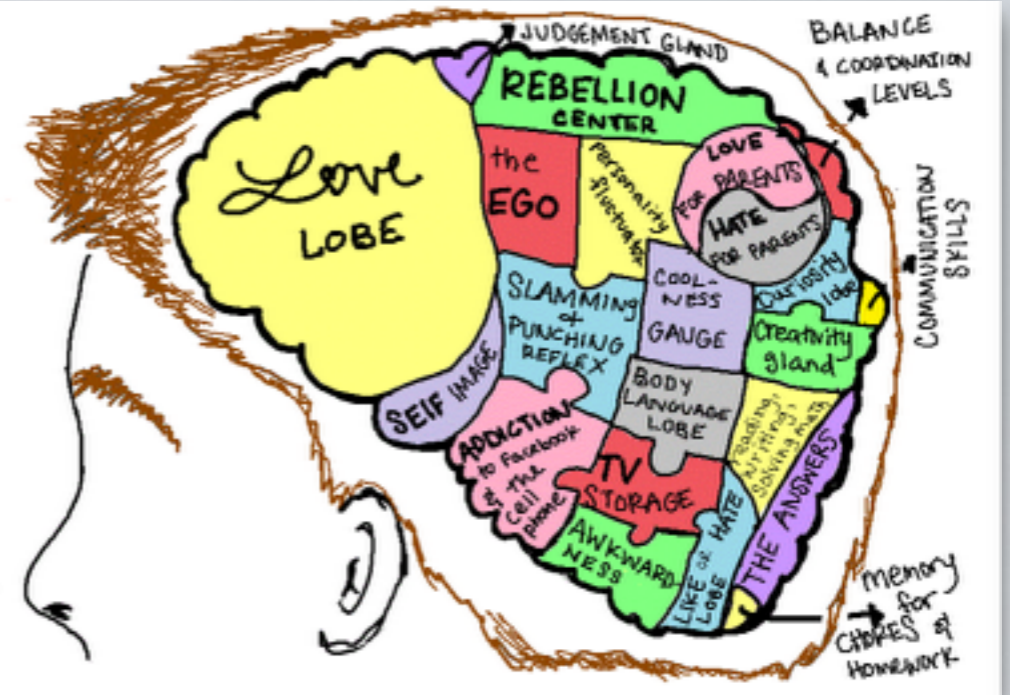
- Gestation - neurons grow, move to their proper location in the skull, and begin interconnections of brain circuitry.
- Birth - creation of circuits responsible for generation of emotions, behavioral responses, perceptions, and possibly encoding of bodily sensations are established.



- Around 3 years - explicit memory begins to develop.
- Preschool age - immature connection between the left and right hemispheres, causes difficulty articulating emotions.
- Elementary age - narrative memory develops around 5 years, school emphasis on left-hemisphere processing, importance of right brain often overlooked.



THE AVERAGE TEENAGE BRAIN



- Adolescents - pruning based on experience and genetics, significant alterations, stress can intensify, resulting in wide fluctuations in behavior.
- Adults - prefrontal cortex completes development around 25 years, and reminiscence develops around 30.

ATTACHMENT DEVELOPMENT

- Attachment Styles
- ABC's of Attachment
- Results of Secure Attachment



ATTACHMENT STYLES

Attachment type	Caregiver Behaviours	Child Behaviours
Secure	<ul style="list-style-type: none">• React quickly and positively to child's needs• Responsive to child's needs	<ul style="list-style-type: none">• Distressed when caregiver leaves• Happy when caregiver returns• Seek comfort from caregiver when scared or sad
Insecure – avoidant	<ul style="list-style-type: none">• Unresponsive, uncaring• Dismissive	<ul style="list-style-type: none">• No distress when caregiver leaves• Does not acknowledge return of caregiver• Does not seek or make contact with caregiver
Insecure – ambivalent	<ul style="list-style-type: none">• Responds to child inconsistently	<ul style="list-style-type: none">• Distress when caregiver leaves• Not comforted by return of caregiver
Insecure - disorganized	<ul style="list-style-type: none">• Abusive or neglectful• Responds in frightening, or frightened ways	<ul style="list-style-type: none">• No attaching behaviours• Often appear dazed, confused or apprehensive in presence of caregiver

ATTACHMENT RESEARCH



ABC'S OF SECURE ATTACHMENT

- Attunement
- Balance
- Coherence



ATTUNEMENT

- Accomplished through the aligning of internal states, nonverbal signals, eye contact, expression, tone, gestures.
- Establishes nonverbal resonance, the connecting process of right hemispheres between individuals.



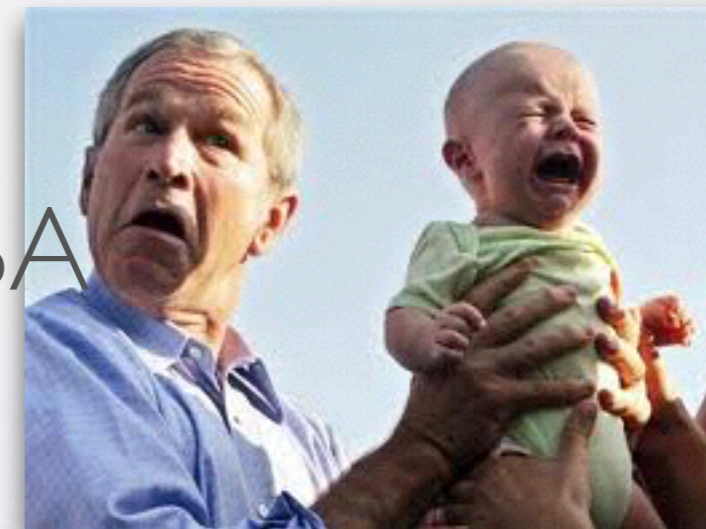
BALANCE

- The regulation that presence and attuned/integrative communication provides to the growing brain.
- Responsible for internal states of balance, regulation of sleep cycles, stress, heart rate, digestion, and respiration.



COHERENCE

- The result of parent-mediated balance in which the brain becomes adaptive, stable, and flexible.
- Secure attachments promote a coherent mind.
- Lack of Coherence (seen in child abuse and neglect) results in a smaller brain, decreased growth in corpus callosum (connection between left and right hemisphere), impaired growth of GABA fibers, and a far less flexible mind.

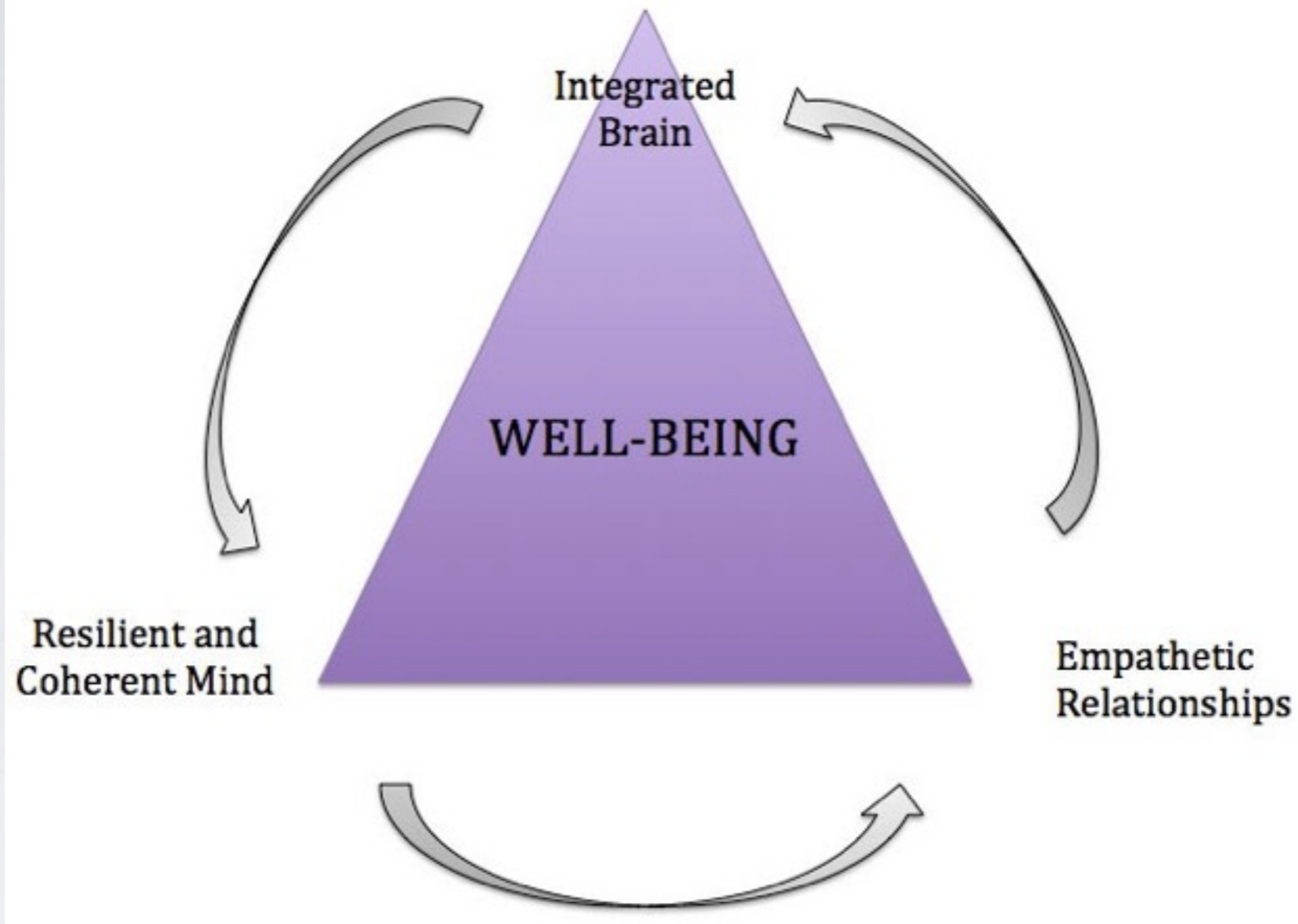


BENEFITS OF SECURE ATTACHMENT

- When ABC's are met and people engage in attuned/integrative communication, brain growth is integrative, neural integration occurs.
- Neural integration leads to healthy regulation of attention, emotion, and behavior.
- Integration of two brains to each other, leads to an interpersonal emotional connection.
- Integration creates a vitalizing sense of connection, the experience of "feeling felt", when "me" becomes "we".



The Psychological Triangle of Well-Being



Any effective change will involve all three elements of the triangle: Mind, Brain, Relationships

INTEGRATION



Integration is at the heart of interpersonal neurobiology. Parts are differentiated and linked promoting a flexible, adaptive way of being.

“Therapeutic experiences that move a person toward well-being promote integration.

Deviations from this integrated flow are revealed as rigidity, chaos, or both,”

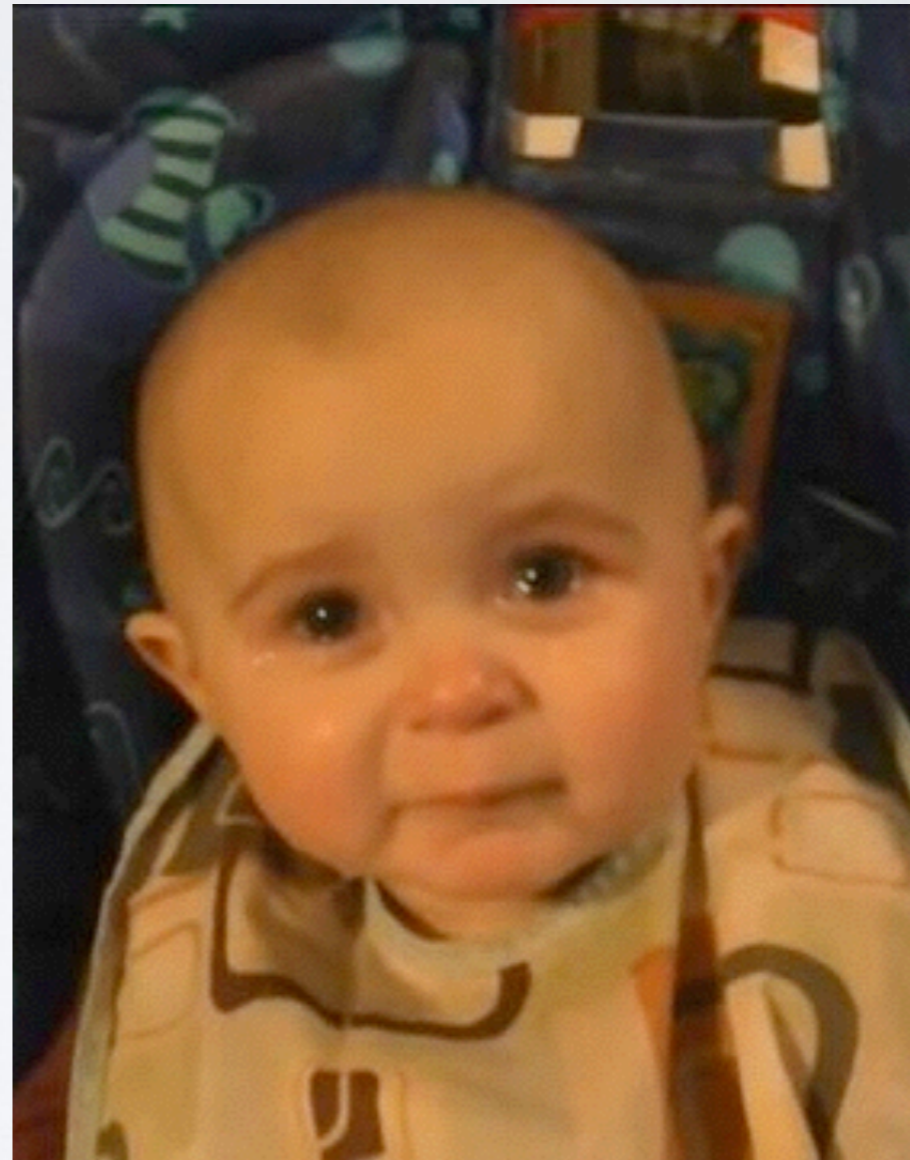
Dan Siegel



1. Vertical Integration
2. Bilateral Integration
3. Narrative Integration

THE MIND IS SHAPED BY RELATIONSHIPS

- **Presence**
- **Resonance**
- **Attunement**



VERTICAL INTEGRATION

Brain Stem:

fight, flight, freeze

Prefrontal Cortex:

1. body regulation
2. attuned communication
3. emotional balance
4. response flexibility
5. empathy
6. Insight
7. fear extinction
8. intuition
9. morality



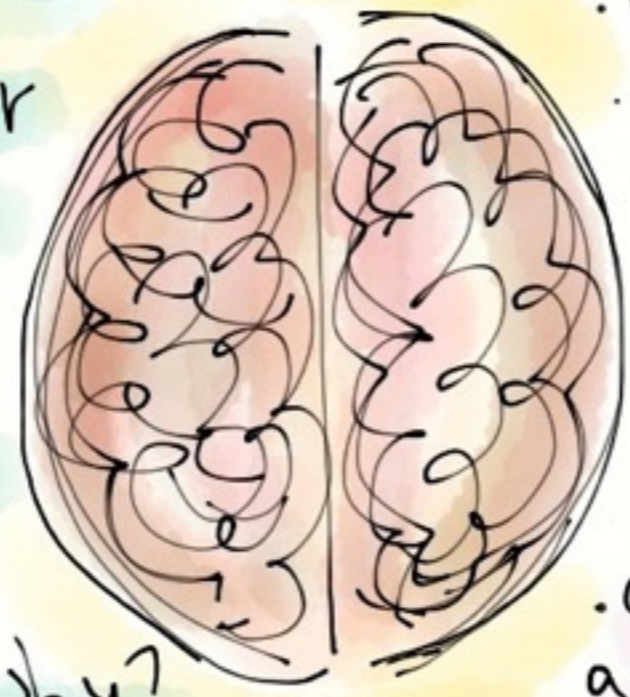


- Allowing our inner world to enter our awareness without rigid restrictions.
- Opening window of tolerance.
- Focusing awareness on bodily sensations, affective states.
- Opening emotional communication: adding color to life.
- PRESENCE: the interpersonal resonance between therapist and client can help widen the window of tolerance for clients to feel their own feelings.

LEFT

- later to develop
- logical • linguistic
- literal • linear
- concerned with outside world
- likes to analyze
- likes lists
- wants to know why?
- connects with outer experiences

THE BRAIN



RIGHT

- quicker to develop
- holistic • gut feelings
- nonverbal
- autobiographical
- concerned with inner world
- cares about big picture
- cares about feelings and emotions
- soothes self
- heart sends signals to right
- concerned with whole

Dan Siegel
Feb 2013

Paper53 Image
by P. Becker

LEFT - RIGHT INTEGRATION

- Right brain to right brain: eye contact, facial expression, tone of voice, posture, gesture, timing and intensity of response.
- Openness to the experience, not just what happened but to the vulnerability & emotional experience of it.
- Left says “or.” Right says “and.” Create space for both.

Narrative Integration

Detection and creation of thematic elements of our lives.



Coherence of autobiographical narratives help us become more adaptive and flexible.

NARRATIVE INTEGRATION

- Reactivating implicit memory within the safety of the therapeutic environment creates flexibility to move in and out of the past with less pain
- Explore connections between past and present
- Notice emerging themes
- Provide safety in therapeutic relationship, loosening the grip of areas of rigidity & chaos

"FACES" OF INTEGRATION.

- Flexible
- Adaptive
- Coherent
- Energetic
- Stable





IMPAIRED INTEGRATION

at its interpersonal worst...



INTEGRATION IS HEALING

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