

All behaviour is communication

GOLDWYN SCHOOL
Aspire • Empower • Achieve

Understanding the neuroscience behind behaviour

Michelle Maddison
Emma Perry-Macleod

Friendly conversations that make a big difference!

2 UNDERSTANDING THE NEUROSCIENCE BEHIND BEHAVIOUR



- Emotional systems in the brain and body
- The need for opioids
- The impact of prolonged cortisol and stress
- What triggers these chemicals
- How our interactions can induce these chemicals

17 SEPTEMBER
10-11.30AM

Together, we support our young people to thrive.

Emotional systems

Humans have six main emotion systems:

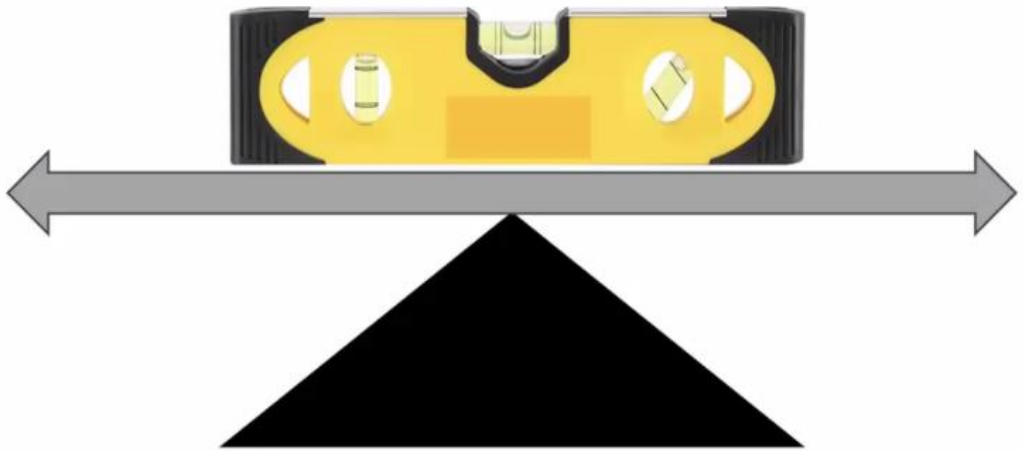
- CARE
- SEEKING
- PLAY
- RAGE
- FEAR
- PANIC / GRIEF

Emotional systems

Offering repeated experiences that activate the brain's pro-social systems supports balance

RAGE
FEAR
PANIC/GRIEF

CARE (attachment)
SEEKING
PLAY



Mental Health as optimal activation of the 6 brain systems
Mental Ill-Health as under-activation or over-activation of the 6 brain systems

Subcortical Emotional System	Optimally activated	Under-activated	Over-activated
RAGE	Able to feel and express appropriate anger e.g. to lay down boundaries, to say No, to bring about positive change	Unaware of own angry feelings and/or unable to express angry feelings	Explosive outbursts Blame Verbal/physical attacks common
FEAR	Able to feel fear appropriate to the situation and take action to alleviate the fear Able to voice fears	Denied/blocked feelings of fear Risk taking Puts self in danger	Anxious/worried a lot of time Panic attacks phobias
PANIC/GRIEF	Able to feel and express grief/cry appropriate to significant loss Missing someone/longing appropriate to the situation	Denied/blocked feelings of loss Unable to cry and grieve about a significant loss Stiff upper lip/bottled up feelings	Depressed, overwhelmed by sadness, hopelessness defeat, despair Separation panic/desperate neediness in significant relationships
CARE	Able to feel warmth, empathy, compassion towards self and others	Unable to feel the suffering of others Could be distress excited (bully) instead of distress averse	Exhausted from caring for others often at the expense of self care (young carers/those worried about parent's mental health problems)
SEEKING	Enerergised engagement in the world Purpose, drive, determination passion	Lethargy Not able to stick at things Can't be bothered bored	Addictions e.g to social media, on line gaming, to the exclusion of SEEKING for lovely relational experiences, new pursuits, adventures, learning
PLAY	Playful, humorous, able to see the funny side of things, lightness in engaging others as appropriate Able to be creative spontaneous	Overserious Unable to play with ideas, be creative or spontaneous	Can't sit still, concentrate unable to be serious Always on the move (when not age appropriate)

(for more on the systems and their founder Professor Jaak Panksepp *The Archaeology of Mind: Neuroevolutionary Origins of Human Emotion* Norton and co 2012)

Opioids

Oxytocin and opioids are soothing, feel good chemicals that inhibit aggression and irritability. These are needed to optimise care/seeking/play

Opioids

When optimally activated, they bring about:

- Feelings of love, nurturance and acceptance
- Feelings of connection and social engagement
- The sense of all is well in my world
- Attachment is an opioid addiction

How do we get them?

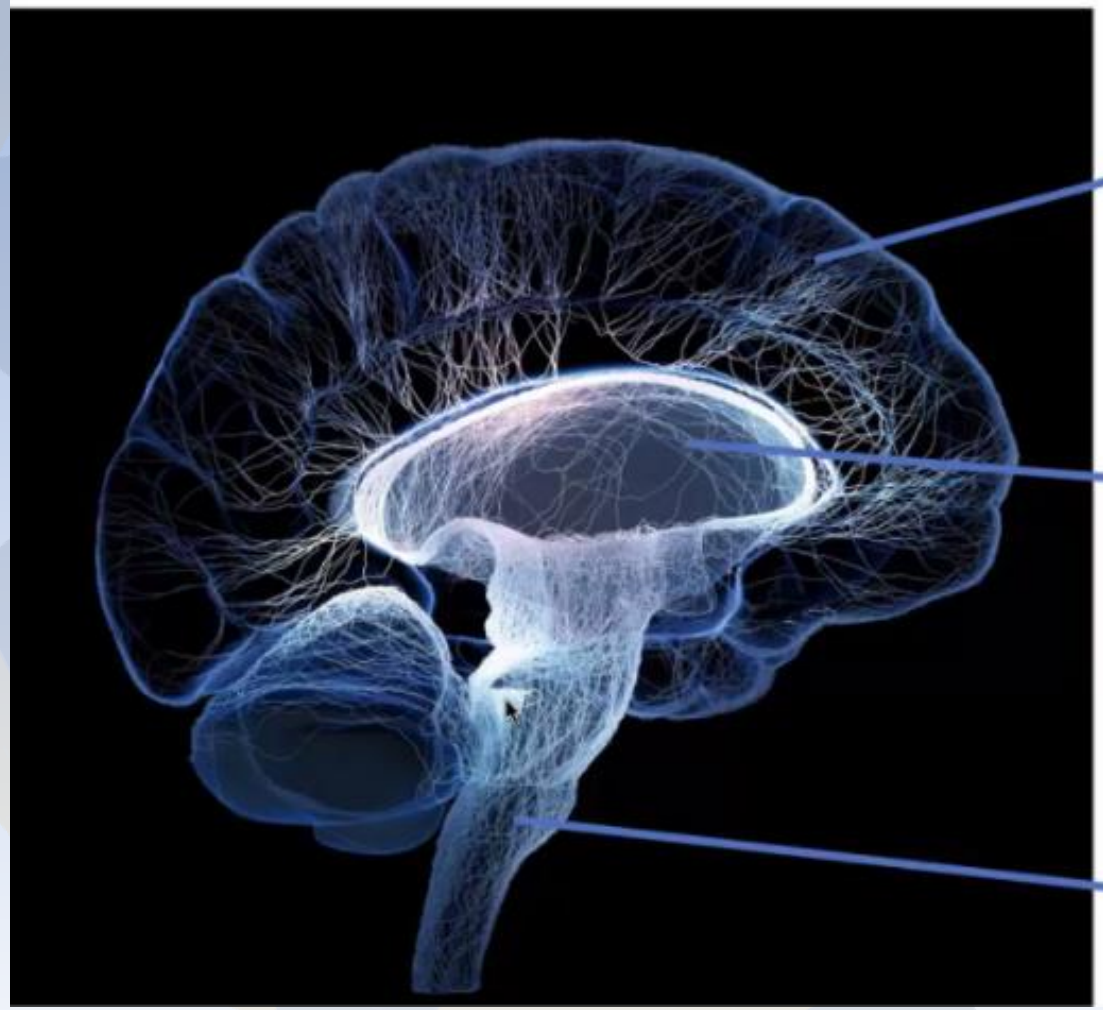
- Sleep
- Listen to music
- Exercise
- Healthy diet
- Positive interactions, being listened to
- Being outside
- Play
- Animals

Cortisol

When stress inducing chemicals are in the body it can bring about feelings of:

- Stress, anxiety
- Decreased appetite
- Disruption of sleep
- Fear
- Freeze, flight, fight response

The Brain



Cortex

Executive functions: interpersonal skills, thinking skills, problem solving, cause and effect, empathy, conceptualisation, sequencing and ordering

Limbic System

The emotional brain: emotions, memories, sensory perception, stress response system

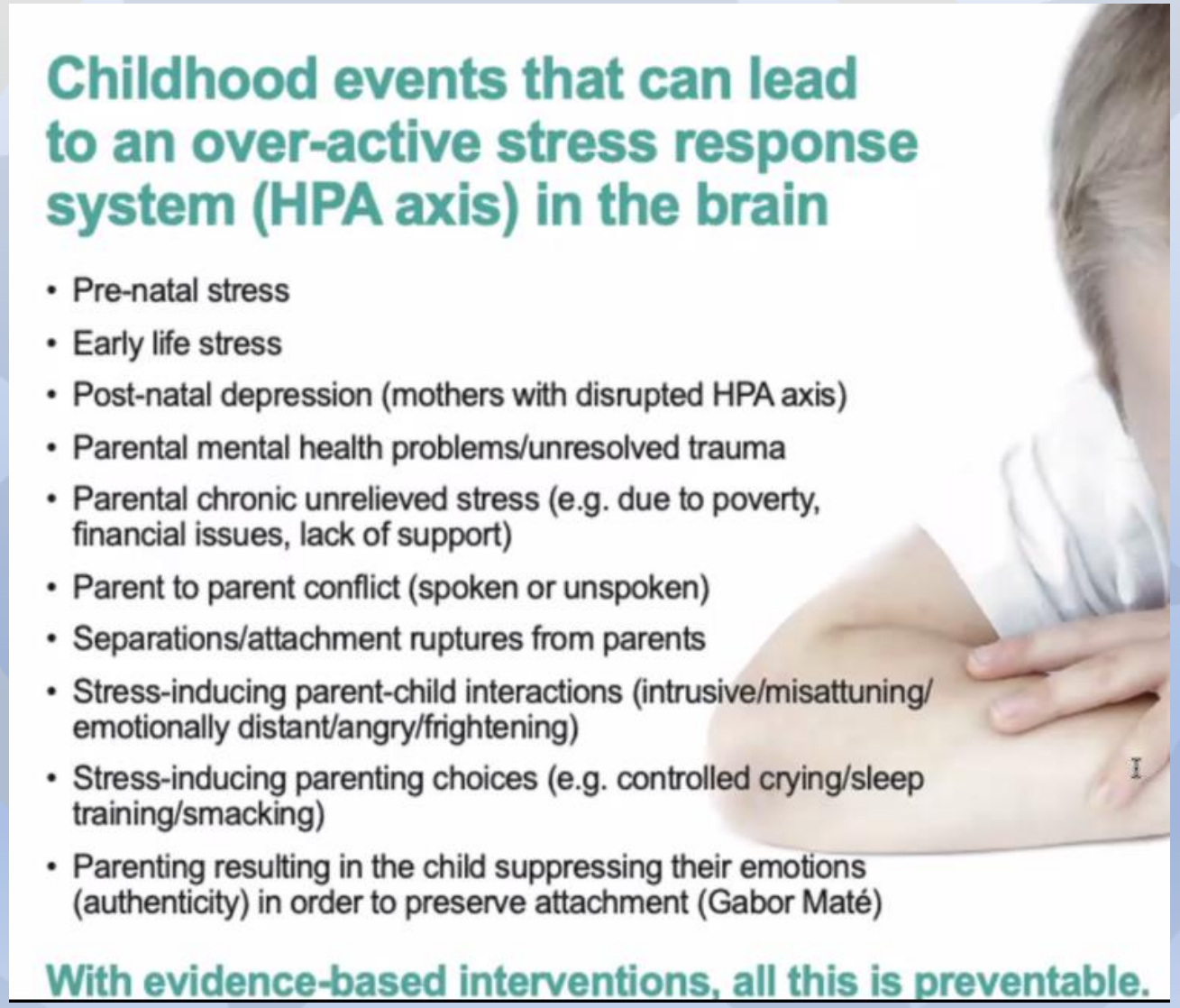
Brain Stem

Primitive, (fight/flight/ freeze responses) unconscious survival responses, regulation of heart rate, breathing, sleeping, and eating

Toxic Stress

Daniel Siegel Hand Model

Our interactions matter



Positive social interactions release brain opioids, providing positive social feelings.

Ian Wright's teacher gave him direction and purpose during his turbulent upbringing - BBC

Our interactions matter

Stress inducing parenting

- Frequent criticism or harsh judgment
- Unrealistically high expectations
- Inconsistent rules and consequences
- Excessive control or overprotection
- Yelling, threats, or punitive discipline
- Emotional unavailability or neglect
- Comparing children to others
- Perfectionistic attitudes

Our interactions matter

Effects of stress inducing parenting

- Increased anxiety and stress
- Lower self-esteem
- Fear of failure
- Difficulty regulating emotions
- Greater risk of depression
- Reduced independence and confidence
- Problems with relationships and trust

Our interactions matter

Stress reducing parenting

- Warmth and emotional responsiveness
- Consistent boundaries and expectations
- Active listening
- Encouragement rather than criticism
- Age-appropriate autonomy
- Calm, respectful discipline
- Validating emotions
- Modeling healthy stress management

Our interactions matter

Effects of stress reducing parenting

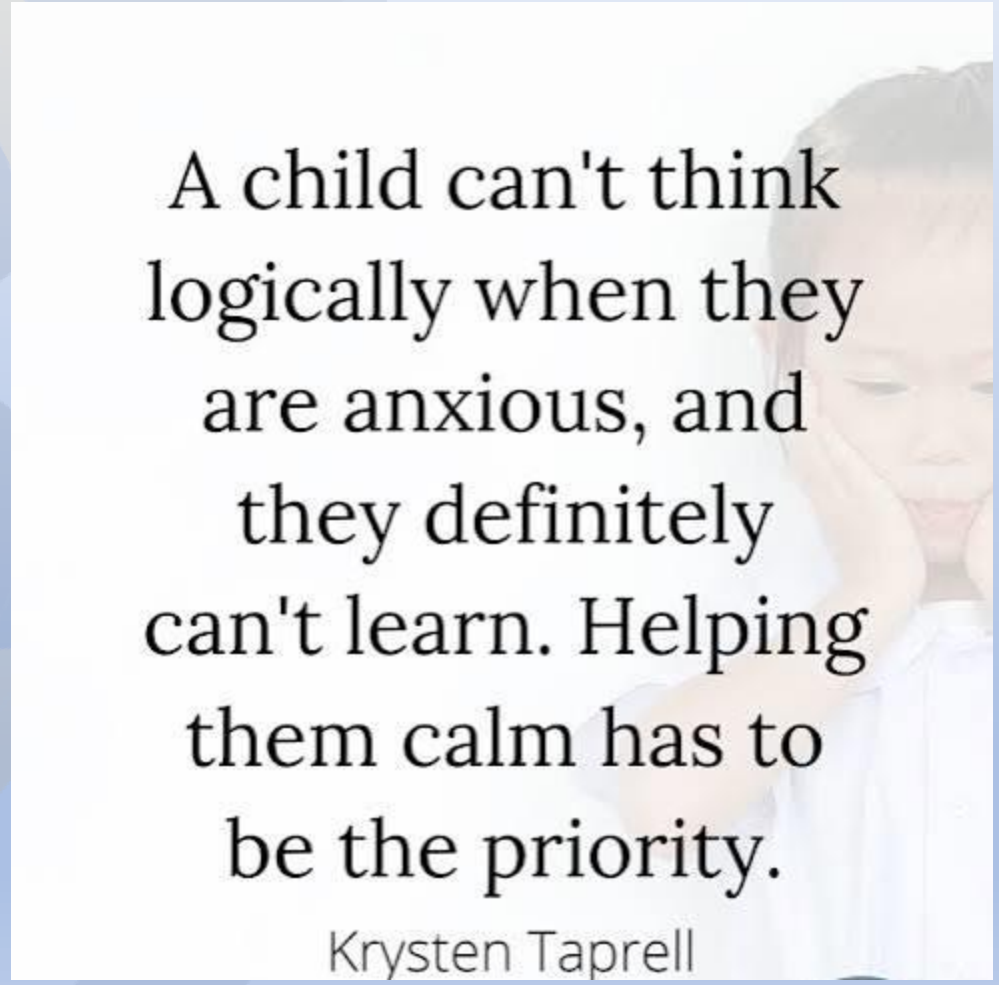
- Greater emotional resilience
- Higher self-confidence
- Better coping skills
- Stronger parent-child attachment
- Improved emotional regulation
- Better academic and social outcomes
- Increased independence

Our interactions matter

Stress-Inducing	Stress-Reducing
Criticism	Constructive feedback
Control	Guidance and support
Punishment-focused	Teaching-focused
Inconsistent rules	Consistent boundaries
Dismisses emotions	Validates emotions
Perfectionism	Growth mindset
Fear-based motivation	Encouragement-based motivation

Our interactions matter

Reduce the stress!



PARENTS' TEA & CHAT

CONNECT • LEARN • SHARE • SUPPORT

Join Michelle Maddison, Nurture Lead Teacher, and Emma Perry-MacLeod, Specialist Engagement Officer, for a series of friendly, informative Tea & Chat sessions designed to help parents better understand young people, strengthen relationships, and build confidence in supporting emotional wellbeing.

Held at Goldwyn Nurture Hub, School Road, Hothfield TN26 1HA

Friendly conversations that make a big difference!



Together we support our young people to thrive.

1 MEET & GREET

Meet and greet Michelle & Emma

- Who I am and my experiences
- Reassuring data and statistics
- Overview of future Tea & Chat sessions
- Opportunity to suggest additional topics

10 SEPTEMBER 10-11.30AM

2 UNDERSTANDING THE NEUROSCIENCE BEHIND BEHAVIOUR

- Emotional systems in the brain and body
- The need for opioids
- The impact of prolonged cortisol and stress
- What triggers these chemicals
- How our interactions can induce these chemicals

17 SEPTEMBER 10-11.30AM

3 CREATING POSITIVE INTERACTIONS

- Introduction to P.A.C.E.
- Maslow's Hierarchy of Needs
- The importance of play
- Attachment games
- What teenagers say they need from adults

24 SEPTEMBER 10-11.30AM

4 YOUR CHILD'S AND YOUR KEY RELATIONAL NEEDS

- Attunement
- Empathy
- Containment
- Soothing validation
- What is unconditional positive regard
- Relationship needs
- Reducing toxic stress
- Links to previous sessions

1 OCTOBER 10-11.30AM

5 MENTALISING

- Reflecting with your child, what it means, first you've got to be able to do it!
- When you can see the benefits then you can use PACE, WINE to help your child.
- Importance of restorative conversations (owning your part and active listening).
- Allowing your child to borrow your calm.

8 OCTOBER 10-11.30AM

6 CELEBRATIONS & SUPPORT

- Sharing successes
- Reflecting on learning
- Supporting one another
- Building a stronger parent community

15 OCTOBER 10-11.30AM

TOGETHER WE BUILD A STRONGER SCHOOL COMMUNITY

Everyone is welcome. | *Tea, coffee and friendly conversation provided.* | *We'd love to see you there!*