
Stress and the mind of young people

Are you feeling stressed? Are you aware that the World Health Organisation estimates that by 2020, stress related deaths will be second only to cardio-vascular disease? It is also important to remember also that cardio-vascular problems have been linked to stress. You may also be interested in knowing that the impact of stress can be far more damaging to young minds than to those of adults and we would do well to ensure that young people are provided emotionally healthy environments... here is why:

Collectively speaking, stress is a very difficult concept to define given the broad array of individual factors contributing to what one might refer to as stress. From a neurobiological perspective stress is an adaptive response from some environmental stimuli triggering the emotional centre of the brain into some measure of action. The emotional and physical responses an individual has to stress are set in motion by a series of chemical releases and reactions. Therein lies a significant problem, too much stress, or more worryingly a chronic overreaction to stress, overloads the brain with powerful hormones that evolution designed for short-term duty in emergency situations only. The cumulative effects of these hormones have been shown to damage parts of the brain and kill certain brain cells. Moreover, the day-to-day realities of life can evolve into stressors resulting in the brain activating the very stress response designed to protect itself and these stressors do not discriminate on the basis of age.

All people deal with various stressors throughout their lives and developing coping mechanisms for dealing with stress is part of growing and maturation. Arguably, most adults believe that they suffer the effects of stress to a greater degree than the young people around them. After all, what does a young person without any adult-like responsibilities have to be stressed about? The reality, however, is that a young mind is probably more vulnerable to the debilitating effects of stress than that of the adults around them. This paradox lies primarily with popular definitions of stress which do not take into account the scientific literature on how the mind and body determine a stressful event and how stress impacts on young brains.

Stress is a highly individual experience that depends of specific psychological determinants to ignite a stress response in the brain and throughout the body. A stress response is triggered when individuals face situations that are threatening, and/or novel, and/or unpredictable, and/or where an individual feels like they do not have control over the situation. Therefore, while the 'downsizing' of a company engages a stress reaction in an adult, the same stress reaction can happen to a child on their first day of school. In fact, because the brain continues to mature throughout childhood and adolescence, young people may be more vulnerable to the impact of stress than a mature adult brain.

Young minds and stress!

In order to understand how stress can be very detrimental to the mind of a young person it is important to have some understanding of what happens to the body when the brain triggers a stress response. It is equally important to bear in mind that full maturation of the brain does not happen until the third decade of life and as such the developing brain is far more sensitive to the chemical processes involved while mediating a stressful event.

When a situation is interpreted as stressful, it triggers a system in the brain that tells the hypothalamus to release a series of chemical reactions. These reactions, in turn, signal the fight or flight mechanisms of the brain which results in an increased flow of oxygen to the muscles requiring the heart and respiratory system to work harder. Furthermore, during the fight or flight response, blood vessels in the skin may constrict to diminish any bleeding in case of injury, stored carbohydrates in the body are liquidated to provide sufficient fuel for any measure of response and the immune system may become enhanced in preparation for whatever part of the body is injured. Given the reactive nature of the brain to stress it should be apparent that a prolonged or continuous stress response to the relative stressors around us means trouble over the long term. Now consider the impact of stress on those whose brain is still developing and maturing.

There is a large body of research that tells us that young people who live in chronically stressful environments develop a variety of disorders as they get older. There is also a growing body of neuro-scientific research telling us that the powerful chemicals designed for our survival in stressful situations can actually impact on the normal growth and development of very important regions of the brain, especially during the early stages of life and through adolescence. It is also important to remember that children live in a less stable, more stressful environment than decades ago with higher divorce rates, variations in family structures, instant access to information, increased family mobility, pressure from society to perform and look good, access to globalisation and increasingly easier access to drugs and alcohol. In other words, the stressors of childhood and adolescence may be of greater frequency and more pronounced than any other time in history. That's the bad news...the good news is that there are things we can do to help children and adults alike manage the stress around them and this will be covered in a future newsletter. In the meantime why not talk to the young people around you about what they think stress is and what stresses them...you may be surprised by the answers you get.

Michael C Nagel PhD

Helping your children deal with stress

1. Understand The Power Of Thinking.

Teaching children to understand the difference between helpful and unhelpful thinking (e.g. "I can do this", "It will be okay") helps children to feel calm and brave and gives them the confidence to 'have a go'.

Many children have unhelpful thoughts (e.g. "I'm going to fail", "I can't do this", "It's too hard".) These thoughts trigger negative emotions that contribute further to the challenges and reduce resiliency. It is important that children learn to reframe *unhelpful thinking* into *helpful thinking*.

- Help them to see the difference between helpful and unhelpful thoughts
- Encourage them to reframe their thinking
- Display helpful thoughts and have them regularly repeat these out loud and to themselves.

2. Learn How To Calm Their Bodies.

When children experience stressful emotions, their bodies release hormones that create a fight or flight response. These physiological responses lead to racing heart rates, sick feelings, headaches, etc. Teaching children to calm their bodies down reduces the impact of unpleasant body responses.

- Teach children to take slow breaths
- Relax their muscles by tensing and relaxing from the shoulders down
- Have a drink of water to settle their stomach

3. Help Them To Understand Good Sleep Hygiene.

When stressed many children struggle with sleep which contributes further to the problem. Encouraging them to have good sleep routines helps them develop habits that set them up for a greater chance of success. These habits might include:

- A regular bed time
- No technology in the bedroom, or for an hour before bed
- Having a warm bath or shower before bed

4. Connect Positively With Those Around Them.

Encourage time spent with friends and family that affirm and believe in them.

- Provide opportunities to do fun activities with friends
- Practice conflict resolution skills
- Provide positive feedback

5. Identify What Areas Children Are Most Challenged With Academically.

Lack of confidence in literacy and numeracy can create further test stress. Support children academically by:

- Teaching little tricks to remember rules or skills
- Providing extra coaching or support from another person
- Playing games to teach challenging skills

6. It's OK To Make Mistakes.

Some children become particularly anxious of not excelling or failing tests. These children benefit from learning that sometimes the greatest lessons in life come through our mistakes.

- When children make mistakes reassure them it's okay
- Ask them what they have learnt and what they would do differently in future
- Be aware of how *you* react when others make mistakes in front of you (e.g. in the car)

7. Reassure Them Their Worth Is Not Measured By Their Test Results

Children's sense of worth is very fragile. Their self-confidence and identity is still growing. As parents and teachers it is important that children know we value them not because of what they achieve but who they are.

8. How Do We Avoid Children Being Stressed By The Test? Approach the test not just from an academic viewpoint but from a social and emotional perspective too. Then, we not only see improved academic results, but we also see empowered students for life!

9. Strengths Based Parenting Style: A new Australian study suggests a parenting style that identifies and cultivates the strengths of a child can teach children how to be resilient and deal with stress. Children can draw on their personal strengths to cope with the demands that lead to stress.