



# BOYS STIR US

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Working **WITH** the  
Hidden Nature  
of Boys

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# Introduction: It ain't easy being male!



*All boys are human, even when there is reason to suspect the contrary. I mean that they are a fair sampling of humanity, with the right proportion of cheats, liars, dolts, heroes, and geniuses. A teacher finds it important to remember this fact ...*

*- Jacques Barzun<sup>1</sup>*

Boys are in trouble, literally and figuratively; society, parents, the media and education say so! It would seem that in most western countries, wherever we look, we are experiencing great difficulties in raising boys and providing learning and social experiences that meet the needs of 21st century young men. Consider the following quotes from individuals across many fields who have delved into the social and educational world of boys:

*Boys are, for instance, far more likely to harm themselves or to be involved in accidental death than are girls.*

*- Gilbert and Gilbert*

*Boys will top the class in accidents and assaults and they will be the bottom of the class in literacy and learning.*

*- Loane*

*... I believe most of our schools are failing our boys.*

*- Pollack*

*... as a group, boys are in trouble. Not every boy, not in the same kind of trouble and not all of the time – but enough of them across all ethnic and socio-economic groups to know there is a pattern.*

*- Browne and Fletcher*

*What is not in dispute is that boys need help ...*

*- Hawkes<sup>2</sup>*

*What is it that must be changed in order to help the boys in our lives accomplish more socially, enjoy and achieve more academically and live each day happier?*

Not exactly a collection of pretty pictures. Based on this fairly pessimistic view of boyhood, a central question for this book is one founded on change. What is it that must be changed in order to help the boys in our lives accomplish more socially, enjoy and achieve more academically and live each day happier?

For sociologists the answers to those questions lie within identifying and describing how the interplay of masculinity and social structures shape boys and our understanding of boys. Psychologists would suggest that a key to helping boys may be found through unlocking processes of the mind and development of the psyche. The list of 'boy' specialists and authorities spreads across a number of professional fields and eras and as Jacques Barzun suggests in the opening quote, dealing with boys and the trouble with boys is not something new to the current generation. History provides a long list of quotations, anecdotes, sermons and research discussing a dilemma known best as 'boyhood'. From Jacques Barzun to Dr Tim Hawkes (1868 Taunton Schools Inquiry Commission in the U.K.) to Australia's 2002 Federal Inquiry into the Education of Boys, it would seem that boys have always been problematic.<sup>3</sup> Perhaps then, we need to take a better look at what a boy might actually be, or more importantly what a boy might be made of. While many might like to describe boys as the combination of 'snakes and snails and puppy dog tails', new advances in science and medical research offer a more contemporary perspective. To be specific, the field of neuroscience has opened a whole new world of understanding the intricacies of being human and, indeed, being male.

In the last decade we have learned more about the brain than we have ever known. Now, more than any other time since the dawn of humankind we can actually witness, in action, the physiology and neurobiology of males and females alike. Moreover, these advances in medical research and neuroscience offer very telling data; that the brains of boys maintain certain gender characteristics that may impact on their emotions, learning styles, sense of identity and overall sense of well-being. An abundance of research also exists that identifies different neurological intricacies between boys and girls that

are explained by looking at the unique structural and chemical differences found within the brain of each gender.<sup>4</sup>

Adopting some sense of what the neurological research noted above tells us about the brain and more specifically about the male brain allows us to develop a new perspective in working with, and attending to, the needs of boys. In a sense then, what must change is our perspective of boyhood and boy behaviour. We need to have a greater understanding of the very biological and neurological factors influencing the young men around us so that we can act with greater understanding and compassion. In knowing more about boys minds and bodies we are also afforded an opportunity to better understand our own mechanisms for doing the things we do and acting the way we do. To that end, we may even save our brains some time from the seemingly tiresome task of trying to figure out why boys do the things they do. If we can empathise with boys and their brains, then we can concentrate greater energies towards accommodating them in a proactive, pro-social and positive manner; they are 'all human' after all.

Prior to delving into aspects of brain difference, it is also important to note a number of pertinent points. Firstly, it would be erroneous to suggest that in examining brain difference a dichotomy between male and female brains is enough in attempting to map out strategies for working with boys. While structural and physiological differences exist between each gender, they also exist within each specific gender. The point here is that in looking at brain difference it is important to note that not all male brains are exactly the same. There are, however, tendencies manifested in the general make-up of the brain within each gender that suggest that if we truly want to help boys succeed throughout society, we need to develop a better understanding of, and a way of accommodating for, these differences.

By embracing such a perspective it is also important to set a contextual framework by looking at how boys operate and exist on a daily basis, for brain research also recognises the important links between the brain and the social and environmental contexts that influence behaviour and decision making.<sup>5</sup> An approach for working WITH boys that recognises differences in the male and female brain, should not omit the equally important and significant work done by other

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scholars and researchers. Nor should an exploration into brain difference negate the important contributions provided by social theorists focusing on how socio-cultural and historical constructs produce various masculinities and femininities. As noted above, new research also points to the significance of the environment in relation to brain plasticity and development.<sup>6</sup> John Richardson, a researcher

in cognition and memory provides a compelling case for acknowledging the relationship between life experiences and cognitive ability.<sup>7</sup> There are equally compelling arguments articulated across many of the fields surrounding gender that recognise the interplay between biology, life experiences and cognition.<sup>8</sup> Indeed, we must take into account how nurture influences nature and how nature can impact on the nurturing process. With all of this in mind, we can look at the male brain and the question of how we can better engage with boys using the following sections of this book.

The first section of this book explores 'The Role of Nature' in developing the male brain. Specifically, we look at how the brain develops from conception to adolescence and what this means for parents, educators and all those who work with boys. From this discussion we are then able to identify specific male neurological characteristics and the ramifications of these when boys engage with their peers, their family and the adults around them.

After learning how the male brain develops, we then explore 'The Implications of Nurturing'; how society and the environment impact on the brain and our understanding of masculinity. Beyond discovering how the environment and social context interplay with neurology, we then look at how we can 'Nurture the Natural' in such a way that boys are not disadvantaged for being male. There are a number of things that we can, and should, do to help raise the boys around us into fine young men with a positive sense of self and future.

Before we start this amazing journey, there are a couple of points to be made for the reader's benefit in understanding the foundations of this book. Firstly, I would like to acknowledge up front that I am not a neuroscientist.

Whenever I speak, do workshops and seminars or any form of professional development I highlight this important fact. My interest in neuroscience was born out of my own doctoral research that focused on the educational lives of adolescents in Australia and Canada, my twenty or so years as an educator on three continents and at watching my own two beautiful children grow up. That being said, I do not believe that it is beyond me, or any teacher for that matter, to look at the research that is available and translate that into other levels of discussion and practical use. The number of publications being printed daily demonstrates that educators do have a place in scientific interpretation ... science, technology and their links to research are not exclusive clubs when it comes to interpretation and pragmatics.

Secondly, I am very realistic in knowing that this volume of ideas and its philosophical foundation will be critiqued and subject to scrutiny. Any discussion focusing on improving the lives of children should be open to analysis, ongoing discussion and debate and I welcome this. Failure to acknowledge a need for critique and evaluation is antithetical to sound educational practice and as neurological research continues to grow so too should the discussion on how best to meet the needs of all children.

And finally, in writing this book, I intended to put together a volume of work that both teachers and parents would be able to look at with a great deal of clarity. To that end I have attempted to simplify the neurological and scientific jargon often found in research articles and provide a user-friendly piece offering the right balance of theory, practical insight and useful suggestions. I hope that this book gives the reader insights into working WITH boys that are unambiguous, relevant and easily implemented while simultaneously providing a new lens for understanding what happens when an X and Y chromosome combine. After all, the book's primary message is that in order to accept boys as human even if we suspect the contrary, we must first adjust our perceptions of what a boy truly is and how we can best work WITH him.

# 1

## Understanding the brain?

*Teachers are entrusted with a noble profession – educating minds. It is ironic, therefore, that teachers are given no professional preparation about the brain. The mind is the brain at work.*

*- Beringer and Richards<sup>1</sup>*

As you may have noticed, the title of this chapter is followed by a question mark. There is a twofold purpose in this approach. Firstly, while most people would agree that the business of teaching and learning must focus on the inner workings of the brain, many would also agree that teachers and education undergraduates know very little about the neurological foundation of their practice. Secondly, an educator's limited understanding of the brain is exacerbated by the notion that neurologists, psychologists, and all others with an interest in the brain will tell you that its level of complexity is matched only by our limited understanding of how it functions and develops. Joseph LeDoux (1996) describes the brain as both the most sophisticated machine imaginable yet also that which is unimaginable.<sup>2</sup> How this part of our anatomy functions and develops has long been a mystery and it is not unrealistic to state that each and every day scientists and researchers learn something new about the human brain. That being said, there is a great deal that we do know.

Firstly, with advances in technology researchers have been able to theorise how the brain works and evolves into the marvel that it is and while scientists are only beginning to understand the brain's complexity in design and function, educators are being offered an opportunity to better understand what is arguably at the core of their business. In addition, there is enough evidence to suggest that the neurological

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make-up of boys and girls maintains some interesting differences and educators would do well to familiarise themselves with this for the benefit of both genders. Furthermore, a better understanding of the brain also offers those individuals who work with boys greater insights into why boys may act and behave as they do and why so many things can go wrong for boys operating within some of the structures and practices that exist within the environment we call school. Before looking at specific differences, however, it is important to become familiar with some of the structures that make up the unimaginable machine between our ears.

From the beginning it is important to remember that much of what we are and do, from moving to snoring, perceptions to predictions, and thinking to feeling are dependent on the health and status of a gelatinous mass of grey material weighing approximately three pounds. This mass of material is in turn comprised of a number of interrelated structures that provide perhaps the greatest example of interdependence in the known universe. Given our most recent understandings of the brain it has become increasingly apparent that while the brain has a number of areas and structures specialising in certain functions, each of these is intimately connected and often relies on other areas of the brain to achieve their purpose. If there is a problem in one part of the brain then there will likely be other neurological or anatomical difficulties. At the foundation of all of this lie the building blocks that make the brain what it is; the cells of the central nervous system.

Most people are aware that the human body is comprised of cells. It would also be fairly safe to assume that many realise that compared to various cells in the body, those that make up the central nervous system are unique in their purpose and importance. The two cells that warrant the most discussion here are glial cells and neurons.

Glial cells are the most common cells in the brain, numbering about a trillion. They actually outnumber neurons by about 10 to 1 and their primary responsibility is to surround neurons in order to provide support, protection and nourishment.<sup>3</sup>