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Editorial

Developmental-behavioural paediatrics in the 21st century

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What does general paediatric practice look like in the 21st century? It is likely that more than half your outpatient referrals will relate to concerns regarding development and behaviour ^{1,2}, rather than traditional medical presentations. Along with this change in the focus of new referrals, a large proportion of your review consultation work will be the management of children whose problems continue beyond the paediatric years and into adult life ².

This kind of work is neither easy nor straightforward ³. Despite more than four decades of the 'new morbidity' ⁴⁻⁶, our paediatric teaching and training programs have not responded adequately to this changing epidemiology of ambulatory child health ⁷⁻⁹. As a result, competence at this work continues to develop beyond training programmes. This may take the form of discussion with senior colleagues, through postgraduate education, on-the-job learning and self-education.

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Our professional systems are responding. Within the Royal Australasian College of Physicians, the Chapter of Community Child Health has run an education and advocacy agenda for many years. Community Child Health, encompassing developmental-behavioural paediatrics, child protection and population health, is now an area of identified paediatric specialisation. The Neurodevelopmental and Behavioural Paediatric Society of Australasia (NBPSA) began in 2012, and rapid growth in membership numbers reflects strong interest in this area of work. A central agenda for the NBPSA is member support, particularly through the provision of relevant education and facilitation of clinical communication.

This special issue of the Journal has been put together to support continuing education in the field of Community Child Health, with a focus on developmental-behavioural paediatrics. Topics for the articles were selected as issues likely to arise in general paediatric clinical practice. Authors have been selected as leaders in their respective fields, to write 'state of the art' reviews of the relevant knowledge base, along with the implications of this for clinical practice.

Clinical challenges

Published information can only take us so far. How do we use this information in practice? This remains a clinical art.

Consider Fred, a 9 year boy referred to you for problems of sleep, learning and disruptive behaviour. Over time he is diagnosed with Attention Deficit Hyperactivity Disorder (ADHD), Autistic Spectrum Disorder (ASD), Oppositional Defiant Disorder (ODD), Anxiety Disorder, Sleep Disorder and mild Intellectual Impairment. On the basis of the available history, Fred also accumulates diagnoses of Fetal Alcohol Spectrum Disorder (FASD), along with Reactive Attachment Disorder (RAD) and Developmental Trauma. He lives currently in out of home care after a difficult early childhood.

How do we provide optimal medical care for Fred? A number of challenges will be immediately obvious to you. The first challenge is how to put all this together. Fred's presenting problems do not

fit into neat diagnostic boxes, each with a clear algorithmic management pathway. His many different diagnoses capture different aspects of the clinical picture. Some, such as FASD, RAD and Developmental Trauma, emphasise causation (presumed or known), with implications about natural history. These diagnoses provide less specificity about current problems, and what to do about them. By contrast, other diagnoses, such as Sleep Disorder, ASD, ODD, Intellectual Impairment and ADHD, reflect the presenting clinical picture, or 'behavioural phenotype', with less information regarding aetiology.

The next challenge is choosing and prioritising treatment goals over time. Some problems (such as sleep disorders and encopresis) may be transient in nature, with the possibility that they can be permanently overcome. Others, such as Intellectual Impairment and ASD, are likely to be life-long, where clinical care is aimed at optimal management of symptoms, rather than focussed on achieving a 'cure'.

A third challenge is the interaction of problems over time. The contribution of Fred's various diagnoses to his function, and development as he gets older, is likely to change. Children such as Fred meet criteria for more than one diagnosis, but these coexistence patterns are likely to change with chronological age, developmental stage and ecological context.

The term 'co-morbidity' implies diagnoses occur adjacent to each other, usually where presence of one increases likelihood of the second. This term, however, provides little information as to how individual problems clinically interact with each other. It does not inform the question of treatment pathways. How best to help children with this level of complexity remains a matter of clinical judgement.

Finally, these diagnoses do not easily guide how we structure Fred's care in terms of the interaction of health, education and disability services over time. The paediatrician needs to consider who will provide management for Fred into the future, and how this will be done. Whilst there is an emerging literature on 'how to treat', this is not the same as 'why to treat'. If psychotropic medications are

commenced, for example, what is their ultimate purpose? How do we address the questions of whether, when and how to stop them?

It is now clear that many of these ‘new morbidity’ problems persist, in some form, into adult life^{10–15}. In light of this, it seems appropriate that medical care should extend beyond the management of immediate issues, and incorporate the patient’s long-term outcome as a goal, or purpose, for which the profession should take responsibility¹⁶. Current systems of care, however, do not necessarily support this longitudinal model of service provision^{16,17}.

The role of the doctor

As medical practitioners, paediatricians have several roles. We can investigate biological aetiology. We can confirm certain diagnoses with a degree of authority. We can prescribe medication to modify symptoms. The set of problems incorporated in this ‘New Morbidity’, however, involves multiple professions both within and outside health. Beyond professional influence, the causation, management and outcomes are influenced powerfully by family and social factors. Where do our professional boundaries lie?

We believe that the paediatrician’s unique and powerful contribution to these complex and often chronic problems is to understand and interpret the role of biology in the context of ecology, and to use this to inform other aspects of management. A clear consideration of this, even if it is formulated as a hypothesis to be tested and reviewed, may inform our approaches to influence short and long term outcomes for children like Fred.

When it comes to diagnosis, the set of behavioural phenotype diagnoses do not communicate sufficient information about biological aetiology to inform successful management. It is therefore our job to address questions such as what is, and what is not, within the child’s power to change. It is our job to include biological realism into consideration of short term therapeutic interventions. It is our job to advocate for both an understanding of, and appropriate accommodations to the long term nature of a child’s challenges if we believe the biology is likely to persist in some form.

As a profession, paediatricians need to learn how to be comfortable with complexity, uncertainty, and unpredictable chronicity. This requires sufficient humility to offer opinions as hypotheses, rather than professional fact. Paediatricians need to follow up on these opinions and their consequences, with the self-reflective grace to revise hypotheses over time as new information emerges. We do this as both specialists in the biological understanding, and as advocates for the intelligent, compassionate and purposeful care of a population of people who are unable to advocate for themselves.

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