Respecting the evidence: Responsible assessment and effective intervention for children with handwriting difficulties

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Respecting the evidence demands a shift away from impairment or deficit-oriented approaches to assessment of underlying capacity. Goyen and Duff (2005), reflecting the unique focus of our profession on occupation, advocate a top-down model of occupation-centred handwriting evaluation. This includes assessment of the actual process and output of handwriting generated under differing conditions. Data gathering from multiple sources is also recommended, including perceptions of the child, parent and teacher as to aspects of handwriting performance and related abilities such as motivation, attention, cognitive and learning capacities. Goyen and Duff also urge responsible use of standardised assessments to complement a top-down assessment. Assessments should possess adequate psychometric properties and be used for the purposes intended. Several assessments of handwriting legibility and speed exist, which can be critically appraised to select the most appropriate for the population in question and the purposes required (Feder & Majnemer, 2003).

A challenge for occupational therapists is to consider how handwriting intervention may impact quality of the content of written work, which is a primary concern for students, parents and teachers. Written composition, or quality of the content of written output, is associated with production of timely, legible handwriting, that is, effective, automatic orthographic-motor integration. Contemporary theories such as systems theory and motor learning theories are eminently suitable for addressing handwriting difficulties and are consistent with Hoy et al.’s findings that handwriting instruction and practice, at an optimal frequency and intensity, appear necessary for optimising outcomes for children with handwriting difficulties. Examining the literature, including educational literature, for effective instruction and practice strategies is a priority for occupational therapists. In addition, approaches based on systems and motor learning theories, such as Cognitive Orientation to daily Occupational Performance (Missiuna, Mandich, Polatajko & Malloy-Miller, 2001), hold promise for providing specific and effective intervention aimed at improving handwriting. Collaboration with teachers and education specialists appears an appropriate strategy to ensure relevant intervention and outcomes for children with handwriting difficulties. Occupational therapists may also have a role in lobbying and informing educational authorities about the importance of, and evidence base for, adequate intensity of handwriting instruction as part of educational curriculum.