The need for a nuanced understanding of the digital world

Sally Hogg, Senior Policy Fellow at the Centre for Play in Education, Development and Learning (PEDAL), University of Cambridge, UK

Digital technology is ubiquitous in modern life, bringing with it a range of both opportunities and threats to babies' and families' wellbeing. This technology is a critical part of many parents' journey to parenthood long before their baby is even conceived – perhaps through the dating apps that brought couples together, the social media world in which they navigated their early relationships, and the menstruation and fertility trackers that might have supported their conception.

I've written before about the rapid acceleration in the adoption of digital technologies to deliver services to families during and after the pandemic. In understanding the impact of remote delivery, we need a nuanced understanding about how and why digital technology is being used, and how it complements or replaces face-to-face service. There are huge differences, for example, between providing passive information on a website or app, compared with delivering one-to-one support by video. Used alongside face-to-face services, digital technologies can increase the reach and depth of a service. Used in place of face-to-face delivery, they can represent a loss of the relational and personal elements of care that are so critical to experiences and outcomes.

The research I was involved in during the pandemic, which I spoke about at the IJBPE conference in January, showed both the value and the harm caused by the 'pivot' to remote delivery. Some women, for example, appreciated the ability to access online breastfeeding support any day of the week, without having to leave home or feed in public. Others despaired that, when they had concerns, they couldn't access a trusted professional who could set eyes on their baby and address their worries. Some health visitors welcomed the efficiencies, such as the reductions in travel time, and the ability digital appointments gave them to engage fathers and pregnant women who might not make it to the clinic. But at the same time, many were immensely worried about what they weren't seeing – the indications of developmental delay or safeguarding concerns that remain out of shot on video calls, or the missed cues in a parent's or baby's body language that might have exposed that things weren't quite right in their mental health or early relationship.

To split service delivery simply into 'face-to-face' and 'digital' lacks the nuance we need to really understand what works, and the benefits and risks of different ways of delivering services.

A similar nuance is required to understand the implications of 'screen time' on families' lives. As an overarching term, it is often an unhelpful one, ignoring the vast differences in how screens are used, the content viewed, the nature and level of engagement, and the psychosocial context. Jenny Radesky, a fantastic researcher and expert on the impact of digital device use on families in the early years, has argued against the focus on 'screentime' as a measure of the use of digital technology, stating, 'When we live our lives through technology, the unidimensional concept of time doesn't capture how inspiring, meaningful or toxic a digital experience has been' (Radesky, 2021).

Even a form of digital engagement as simple as watching TV, for example, cannot be measured only by thinking about 'screentime'. There are huge differences between children actively choosing to watch age-appropriate and educational television with an adult, compared with being passive recipients of adult television watched alone. Context and content matter. At times, TV watching might support early relationships: Wolf and Tomasello (2020) suggest that joint attention and shared experiences involved in watching films with adults can support relationship development. But it can also be damaging. Kirkorian et al. (2009) showed that even background television will decrease both the quantity and quality of parent-child interaction. Schidmt et al. (2008) found that the play of babies and toddlers was disrupted by background television, even when they pay little overt attention to it. This is particularly concerning when we know how many children are exposed to background television. In 2012, it was estimated that the average US child was exposed to more than three and a half hours of background television every day (Lapierre, 2012).

My own children, age six and eight, do not yet own their own digital devices but use screens in a wide range of ways at home and at school. They use digital technologies to facetime grandparents and family overseas, to catch up on football scores and highlights, to submit homework, to practise times-table, to watch TV, to play word games with family members, to do yoga workouts and more. When I go away, I send a video of me reading the next chapter of their bedtime stories.

Digital technology use can facilitate relationships, physical activity and learning in some instances, but it can also jeopardise these things. I'm also hugely conscious of the digital threats that lie ahead for my children and their friends. Even at six, my youngest has encountered children bringing phones to holiday clubs, and making and sharing films of other children. I worry about teenage years with threats of cyber bullying, access to inappropriate content and negotiating peer relationships in the age of social media.

But perhaps some of the biggest threats to children from digital devices come before they even start using those devices themselves. Those of us working in the early years know the vital importance of the relationships and interactions between parents and their babies and toddlers. These early relationships are perhaps the most important factor in children's cognitive and psycho-social development.

Early relationships may be disrupted by parental digital media use

I want to say at this point, that it is important not to be too judgemental of parents or to look back, through rose-tinted glasses, at times when parents are perceived to have interacted more with their children. Adults have always been, at times, distracted from their children by the chores of daily life, work and adult conversation. And children do not need their parents to be constantly fully attentive and alert, and immediately responsive to every cue. Paediatrician and psychoanalyst, Donald Winnicott was clear that children only need 'good enough' parents, and that when their primary caregivers fail them in tolerable ways, it helps children to learn to live in an imperfect world. Many of us might remember parents and grandparents hidden behind large broadsheet newspapers in the days before news came through smartphone apps. Shirley Hughes' lovely story, 'Alfie's Feet' (2009), shows Dad sitting on a park bench behind his newspaper, not noticing that Alfie's wellies are on the wrong feet.

It is true, however, that digital media use can disrupt our most important relationships, interactions and conversations. Tronick's well-known 'still-face' experiment (1978) shows how stressful it can be, even to small babies, if parents are not responsive to cues, or respond in ways not contingent on those cues. And whilst is it true that parents have always had things that distract them from their children, there is something unique about today's digital devices. Smartphones are mobile, omnipresent, designed only to be engaged with by individuals, and have built-in features and enhancements designed specifically to grab and retain users' attention. Radesky's studies (2015, 2014) show how parents become highly absorbed in their smartphones which results in them being less responsive, and leads to more parent-child conflict and less conversation.

There is much we still need to learn about the benefits and risks of digital technology as a tool and as a powerful environmental factor in families' lives. As educators, it is important to be up-to-date, as much as possible, with rapidly emerging and evolving evidence, and to be rational, reasoned and informed in the advice and information we give to parents. None of us knows yet what the digital world that today's babies will grow up into will be like, but we do know that, even before birth, their lives and life chances are being shaped by the technology around them.

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