



IMAGE: SHUTTERSTOCK / MONKEY BUSINESS IMAGES

Children's foot health online

STEWART C MORRISON, CHARLOTTE GROWCOTT, LISA HODGSON, CHRIS NESTER, ANITA WILLIAMS

Recent advances in social media and online platforms have seen the internet emerge as a common and very popular resource for seeking and sharing health advice. In recent years there has been considerable growth of the internet as a health-information provider and there are now more than 70,000 websites focusing specifically on health matters. In addition, the internet supports many forums which offer convenient 24-hour, readily accessible and engaging communities supporting the rapid sharing of personal knowledge and experiences of health-related topics. Children's foot health is a common one on many of these forums with the concerns expressed by parents ranging from baby walkers to footwear for children.

Little is understood about the nature of the information that is shared on these

forums and the accuracy or influence of this information on health behaviour. Research has reported mixed opinions on the accuracy of online health information for other health conditions and supports the contention that there is a need to review information regarding children's foot health and footwear. Concerns that information shared online may be inaccurate or anecdotal have been raised and further re-iterate the importance of ensuring that online information is safe, accurate and credible.

Despite the rapid growth of online platforms, there remains a need for professional communities to take responsibility for the dissemination of accurate, reliable health information which offers parents clear, coherent and accessible details on children's foot health. Many of the popular sources of this information are disseminated by

footwear brands in very attractive and effective formats. It is important to ensure that this information is evidence-based and updated as new knowledge emerges from further research.

It is also important for health and industry professionals to understand how parents view this information and, ultimately, how it informs their understanding. They have a duty to ensure that health information is impartial, accurate and based on the best available evidence. This will help to ensure greater consistency in messages and reduce confusion for parents who may be accessing multiple forums and web-pages.

Few studies have actually examined what parents know about their children's feet, where this knowledge originates from and how it then influences their behaviour in relation to the health of their children's feet.

LITTLE FOOTNOTES PROJECT

We are undertaking a five-year research project which will define current knowledge, practice and health perceptions of children's feet. Through this we are investigating online information and resources related to children's foot health. This will provide the first ever global perspective on current opinions and trends relating to children's foot health. Within this work, we are looking to characterise knowledge regarding foot development, approaches to managing paediatric foot disorders and understanding the role of health professionals in the care provision of paediatric foot disorders. Through a detailed study and analysis of internet-based media and communications, we will also look to assess what messages (both content and form) are conveyed through these media.

This work will describe trends emerging from discussions and information online so that we can begin to understand what the priorities are for parents and professionals. This approach will allow us to understand for the first time the culture of child foot health. This is an inclusive project which we hope will have real-world application through integration of the knowledge and perspectives of parents, professionals and the footwear industry in general. In the first phase of this work we are using content analysis to answer the following questions:

- Do online media sources offer a consistent message to parents and health professionals about the growth and development of the children's feet?
- Is evidence used to inform common trends relating to children's foot health?
- How is the role of the health professional in children's foot health defined?
- How are online children's foot health messages developed & disseminated?

We will then follow on from this with some further qualitative research where we will conduct one-to-one interviews with parents and health professionals in order to help us understand what they know about children's foot health and what matters to them. We are interested in understanding the following:

- What factors inform foot health knowledge, beliefs and approaches?
- What are the current practices for accessing foot care/foot health services?



Research has reported mixed opinions on the accuracy of online information in regard to children's foot health. IMAGE: SHUTTERSTOCK / ELVIRA KONEVA

- What are the messages about foot health and footwear advice that parents/carers receive, and believe to be important?
- What information about paediatric foot health are parents seeking?

FINDINGS FROM ONLINE MEDIA

To better understand the information about children's foot health that parents access online, we have spent the last two years undertaking a content analysis of it. Content analysis is a research approach which allows us to evaluate information and artefacts. In this instance, we are interested in web pages and have undertaken an internet search based on 81 search terms agreed with parents. We used three main search engines Google, Bing and Yahoo, and the top 10 results (page 1 of a search) on each search engine were recorded.

Secondary sites were also recorded which enabled us to click off the original web page and onto a further relevant site. After this initial trawl through, the list of web pages was then refined, removing duplicates and irrelevant sites such as for adult foot care instead of children. The final list consisted of 414 web pages of information about children's feet. This was then analysed using software called NVivo to develop themes and topics that emerged from all this information.

From this process, it soon became apparent that there was a vast range of websites hosting information about children's feet including commercial websites, blogs and forum-discussion, health websites, parent websites and many others. Footwear was a major topic, not only in terms of commercial broadcasting online, but also with health and general parenting sites discussing what footwear should be worn, when footwear should be placed on a child, the growth and sizing of children's feet and, of course, the cost associated with this.

Another main topic that emerged from the data was milestone achievement and what is classed as 'normal'. This included information about sitting, rolling over, crawling and walking expectations, as well as any deviations from what was perceived as being the 'norm' for these developmental steps and when a health professional should become involved.

Another common topic was the influence of baby walkers. This debate has been ongoing for many years and it was surprising that it is still a topic of concern. We identified that health sites focused particularly on the dangers and troublesome influences of a baby walker on a child's development and safety, whereas general health and parenting sites offered a more general overview of their pros and cons. In

comparison, parent-forum pages were divided on whether a parent should use baby walkers and whether this would lead to any negative consequences in the future.

This work has helped us to begin to understand what matters to parents about their children's feet. It is clear from this work that parents do have concerns, but that the information available to them is vast and does not always offer a consistent message.

INTERVIEWS WITH PARENTS

To complement our analysis of online health-information and seek further understanding about what matters to parents about their children's feet, we also undertook several interviews with parents themselves. This proved to be fascinating as these interviews allowed us to explore findings from our online search and really begin to understand the parent perspective about children's feet.

We undertook 18 interviews and from this we were able to identify many themes of interest. Again, footwear was an important topic and parents felt that having children's feet measured in the early years was very important. It was also evident that this was where parents required the most guidance and would seek advice. Parents typically sought information and advice from established and recognised footwear companies offering fitting services through major high-street children's footwear retailers and these sources were found to be more trustworthy.

However, when parents were asked to identify why these were good sources of information, responses suggested that footwear decision making could be influenced by cultural and parental views or shopping habits and, although uncomfortable with the cost of some footwear, they were also driven by brand – 'shopping where and what you know'. When talking about buying habits our parents variously said:

"My parents took me there to get my feet measured."

"Everyone goes there and recommend I get my child's foot measured. I go there because everyone else does."

"Just because, rightly or wrongly, their reputation amongst friends seems to be that they're the best to go to."



Interviews with parents has led to a better understanding about what matters to them about their children's feet. IMAGE: SHUTTERSTOCK / OLIMPIK

"To be honest, I don't know anywhere else that does that proper measuring or who else might be trustworthy."

Our interviews with parents confirmed that much of the online information about children's foot health information is inconsistent and, even though many sources existed, parents agreed that there needed to be more clear, concise and consistent messages about foot health and development. Parents reported that information on the internet was often vague and streamlining key foot health messages could increase parents understanding of what is 'good foot health' and improve confident decision-making to make appropriate foot health choices. It was interesting for us to understand that parents rated the trustworthiness of information.

The age, quality and geographical source of this information was also crucial on whether parents would trust or use the information. Parents preferred knowledge from UK websites with a perceived authority, e.g. NHS (the survey was carried out solely in the UK) or professional bodies, often labelling them as good sources of information, whereas parenting forums were viewed to contain anecdotal and less reliable sources of information. Some parents said that foot health messages should be founded on evidence and signposted by health professionals and footwear companies including acknowledgement of their sources to ensure it had

consistent and concise foot health advice. This has also been echoed in recent interviews we have undertaken with health professionals.

To summarise, parents are increasingly reliant on the internet when seeking answers about their children's feet and to support important decisions regarding footwear. Despite the increasing use of the internet, however, online material was often deemed to be unreliable, varied and out-of-date. Parents acknowledged the need for accurate foot health messages and expressed a desire to trust a 'brand'. It is therefore essential that health and industry professionals recognise their responsibility to provide accurate information and support parents in understanding more about children's foot development and foot-health. Footwear should not just be seen as a commodity driven by fashion trends but rather that it should be an integral part of an initiative to support good foot health throughout childhood. 

Stewart C. Morrison and Lisa Hodgson are with the School of Health Sciences, University of Brighton, Brighton, UK. Charlotte Growcott, Chris Nester and Anita Williams are with the School of Health Sciences, University of Salford, Salford, UK. They are continuing to conduct interviews with health professionals as well as industry representatives, and would welcome assistance from interested parties.