The need for accurate age verification online has become an important issue for society as children and young people increasingly access social media, gaming platforms and other online services. Without effective checks, under-18s can be exposed to harmful content such as violent material, online grooming or even the purchase of weapons. For companies, there is also the matter of legal compliance, as UK and international regulations place a duty of care on providers to protect young users. Reliable age verification helps balance the benefits of digital participation with the necessary safeguards.

One leading approach is biometric facial analysis. This works by asking a user to provide an image of their face, which is then compared against large datasets of known age profiles. The system analyses markers such as bone structure, skin texture and facial ratios to estimate whether someone falls above or below a required age threshold. A key advantage is that it can be carried out quickly without official documents, which some users may not have or may be reluctant to share. Increasingly, the process is being integrated with live images or video to minimise fraud.

Artificial intelligence plays a major role here. AI systems are trained on huge numbers of facial images of known ages, which improves the reliability of estimates. The technology can refine its predictions by learning subtle patterns invisible to humans. However, this also raises questions of fairness, as accuracy may be lower for people from under-represented demographic groups if training data lacks diversity.

The accuracy of biometric age verification is improving, with studies suggesting that current systems can estimate ages within two to three years. This is sufficient for many purposes, such as distinguishing whether a user is under 13 or over 18. Nevertheless, no system is flawless, and for higher accuracy some services adopt a layered approach, combining AI-driven facial analysis with document checks or parental consent.

**Additional resource:**  
Ofcom (2024) Children and parents: media use and attitudes report 2024. Available at: <https://www.ofcom.org.uk/siteassets/resources/documents/research-and-data/media-literacy-research/children/childrens-media-use-and-attitudes-2023/childrens-media-use-and-attitudes-report-2023.pdf> (Accessed 28 August 2024).

I found this report by searching Google with the terms Ofcom children online report. It was useful because it gave up-to-date statistics on how children in different age groups access media and on which devices. It also highlighted risks faced by young people and parents’ responses, which helped me explain why strong age verification is important.

**Word count: 393**