

Aligner, again and again – for two decades!



Werner Schupp

For most of us, the meteoric impact of Aligners on the stable world of orthodontics two decades ago will be vividly remembered. A new, revolutionary therapy, born of economic interests and made possible via the digitisation of orthodontic processes, begun to disrupt the order of orthodontists. Many reject this new form of therapy, some work with it and develop it further. After two decades, we know that many Aligner treatments are possible in the same way as treatments with fixed appliances. A direct comparison between aligner treatment and fixed appliances is not possible since there is no patient we can treat twice: once with aligners and then with fixed appliances split-mouth. In other words, the same clinical situation can not be treated concomitantly with both techniques in order to compare them. However, the articles published in the JAO have so far been able to show the high level of aligner therapy possibilities. If one searches the literature, it is apparent that this has also been shown by articles published in other high-quality scientific journals. A working group from the University of Ferrara, Italy, demonstrated that 73.4% of the planned corrections can be achieved in the first working phase of Aligner therapy by using a newly developed technology (F22). Of course, with this technique, one does not reach the end of treatment; further treatment stages can be followed with additional aligners until a perfect result is achieved, similarly to what we know from the multibracket-technique.

It is precisely this phased aligner treatment, divided into individual stages, considering the biomechanical properties

of tooth movement step-by-step, that seems to be the future. Current scanning technology, modern software and practical printers are available to orthodontists, which has allowed them to organise treatment plans more efficiently and fabricate Aligners via in-house printing. Today, we are able to carry out even complex treatments, through several independent steps, using in-house or laboratory fabrication of aligners. The development continues for Aligner orthodontics, just like what happened with the multiband technology: from the conventional Edgewise technique with steel arches to the multibracket technology of our time. And as with fixed technology, to become an Aligner orthodontist requires the necessary qualifications, advanced training, competence and, above all, responsibility. The responsibility of orthodontists towards their patients, a responsibility associated with medical ethics, is partly the reason why an orthodontist cannot be supplanted by an operator of an 'Aligner shop', who should not take over, indeed, cannot even take over.

Now, it is easy to blame the colleagues who supported and started the scientific and technical development of Aligner orthodontics, 20 years ago, since they may be held responsible for the birth of today's 'Aligner shops'. I think everyone was on the right track to develop a new, future-oriented and now globally dominant orthodontic technique. I also believe that this was correct and that we could not prevent the spread of Aligner orthodontics. In Germany, the industries' goal with a path clearly planned in 2001, was to



carry out treatments with general practitioners, and if necessary, also with its own Aligner centres. Luckily, this has not happened, and the number of treatments performed by orthodontists worldwide is dominant. But it is true: we did not foresee the lack of medical-ethical competence of start-ups and some dental suppliers, also in Germany.

We all know that after two decades, Aligner orthodontics has gained a high status in orthodontics and can certainly extend it further. We will continue to promote this development in a technically sound and serious way in this journal.

Let me finish this editorial with a quote from Arthur Schopenhauer applied to the professional and scientific component of Aligner orthodontics:

"All truth passes through three stages:
At first it seems ridiculous,
Then it is opposed,
Finally, is accepted and goes without saying."

Werner Schupp

A handwritten signature in black ink, which reads 'Werner Schupp'.