



Virtual viewings

the future of real estate

Welcome to the future

01 - New approaches
02 - Higher returns
04 - Virtual reality (VR)
06 - Property viewings

08 - From viewing to construction
10 - Viewing the future
12 - Our References
17 - About us



New approaches in the real estate sector

Business as a whole is taking up the challenges of this digital age. But progress has varied from sector to sector, as we can see in the real estate business.

While digitalization has already converted the manufacturing sector to Industry 4.0, the real estate sector is really lagging behind: taking Germany as an example, in 2016 as many as 81 % of employees in real estate companies stated that their companies had still not tasked any departments or management positions with implementing digital transformation. But there is a lot of interest: according to the survey, 92 % of real estate companies are actively looking into the topic of digitalization¹.

They have already succeeded in taking that leap forward into a mobile future: 99 % of the companies in the survey are sure that they will be deploying mobile devices in the year 2021, and 75 % are doing this already. But things look very different when it comes to another medium of the future: in 2016, only 2 % of German companies stated that they were using virtual reality, although 11 % of companies were already thinking about deploying this technology².

In fact, digitalization is now impacting on practically all areas of our lives. Apart from the obvious topics such as mobility, data structuring, big data and cloud sharing, digital technology can open up lots of other potentials

for generating revenues, even when it comes to processes we have always thought it was not possible to digitalize.

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Increased revenues with (digital) home staging

You would think that viewing properties would be something firmly stuck in analogue reality. In fact, digitalization has also made inroads into this field and is ready to take off for the next dimension.

One example of this is with home staging, a trend from the USA which has also led to higher revenues for real estate sales in other countries: in home staging, apartments and houses are decorated and arranged according to the latest interior design principles so as to show them off to their best advantage. The trick is to get everything in place before the first viewing of the property is arranged.

**NEW FURNITURE,
CAREFULLY POSITIONED
LIGHTING AND
DECORATIONS SHOW
OFF THE PROPERTY TO
ITS BEST ADVANTAGE
AND DEMONSTRATE
ITS FULL VALUE TO
POTENTIAL BUYERS.**

This really pays off: 95 % of the properties prepared with home staging get sold an average of 11 days faster and achieve up to 17 % more revenue than without home staging³. Surveys of US American real estate sellers and buyers, showed that a quarter of respondents achieved at least 5 % more

for each property when they used home staging during the sales process⁴. Savings can also be made when it comes to refurbishment and renovation: instead of carrying out time-consuming and costly conversions, subtle changes to the furniture and furnishings can be made – and they can also be re-used in the next property. This has a huge impact on potential buyers, making a noticeable and positive difference to the way customers see the property that is being sold.

Just how big the market potential for such small enhancements can be, is shown by the way this sector has grown so dramatically in Germany: the first home staging agency was founded here in 2006, and now there are already more than 200 professional agencies throughout the country.

But what can you do if the property is still being lived in, or is being built, or is in the middle of being renovated? So-called virtual home staging has long since been the answer here. The actual property is not enhanced in such cases, just digital images of it.

On the largest real estate portals, it is standard practice, for example, to overlay enhanced photos depicting



what appear to be completed new construction projects into original photos of the actual landscape.

Photos are also adapted using Photoshop and other graphics programs so you can experience the property in its best possible form. It is also possible to show before-and-after comparisons which can be used as yet another selling point.

However, 2D photoshopped property images still can't compete with the feeling you can get for a space from a real viewing. Customers see the pictures but they still cannot see how big it is or look at the rooms or properties from different perspectives. For a long time, these problems have seemed unsolvable. But the home staging sector is now undergoing a revolution thanks to the latest generation of devices which enable us to experience virtual reality.



Virtual Reality (VR)

What does that mean today?

Since 2016, there have been some dramatic changes in the VR sector: for the first time we have solutions which can really fulfil our expectations for plausibility, quality, immersion and interaction.

With Oculus Rift, HTC Vive and Sony Playstation VR, we see extensive multimedia systems which, with the help of fully developed operating concepts and tracking systems, can deliver a full immersion experience without giving you motion sickness. Thanks to the potent hardware, they can connect photo-realism with full interactivity.

Virtual reality can now reach its full potential in the new generation of devices. It enables us to experience an environment which has been animated in the computer in a format which very much correlates to how we see our analogue reality. In contrast to conventional computer applications on your monitor, users find themselves directly within the program when they use VR glasses. That means that the virtual environment is always in their field of vision, they can turn around, look to the front or behind, up or down. The movements the VR user makes, e.g. when they move their hands or head, are also transferred seamlessly into the virtual reality. All of this can be controlled simply and naturally with voice control.

As it is the computer that is animating the external environment, things which are impossible in our analogue reality are suddenly made possible: the user can be looking round a loft in New York

one minute and then, after making a quick gesture, be wandering around a luxury villa on Mallorca the next minute. Make another gesture and you can look at the plans, the furniture disappears or you can change the decorations.

What still sounds like science fiction is already possible today: In the year 2017, 12 million private and company users around the world are using VR products. Analysts predict that these figures will increase tenfold by the year 2021, which means more than 99.4 million VR devices will be in use⁵. This number only includes the number of devices sold. In fact, many more people will be experiencing virtual reality – that is how euphoric the prognosis is. Many analysts expect a breakthrough in the way we perceive reality and that it will have an even bigger influence on our lives than even the smartphone has had.



» THE NEXT GENERATION OF DEVICES WILL ENABLE VIRTUAL REALITY TO REVEAL ITS FULL POTENTIAL.

Real estate viewings of the future

Viewing the structure of a building from the comfort of the architecture's office using a VR-headset sounds like some vision of the future, but in fact it is already a real sales strategy with tangible advantages.

Immersion is one of the great strengths of the VR experience, making it particularly suitable for viewing real estate in a completely new quality. The first contact with this virtual innovation certainly awakens the customers' curiosity, and the practical advantages of a virtual environment soon become clear.

way through complex construction plans. Digital displays can be added to provide the sort of information which would be invisible in analogue reality: pipes, sockets, electric cables, telephone cables – make the right gesture and all of these just appear, and then disappear again whenever you want. All this is possible, around the clock, just when customers want it and without the costs involved in actually visiting the property.

The property itself can be shown off to its best advantage as well. The golden rules of traditional home staging are: tidiness, cleanliness, cover up blemishes, add decorative details, optimize room layouts and lighting⁶. All of these are dealt with by the technology in a virtual viewing. In virtual reality all the rooms are perfectly clean and tidy, with no previous owners' belongings to disturb the image.

Instead, a positive atmosphere is created in the multimedia images: the lighting, sound and surroundings can all be customized to suit the potential customers' needs and wishes.

No rainy days can put a dampener on a viewing now, VR creates the perfect experience, from sunset to romantic moonshine. At the same time, you can add

First of all, the high level of immersion in the VR environment makes it possible for you to experience the property as if you were really there. The size of everything is true to scale. The layout of buildings, spaces and rooms can be seen at a glance instead of having to work your



ALL THIS IS POSSIBLE AROUND THE CLOCK, JUST WHEN CUSTOMERS WANT IT AND WITHOUT THE COSTS OF ACTUALLY VISITING THE PROPERTY.

photographs of the local surroundings to provide a realistic view of the area around the property.

Make a small gesture and the property is fitted out to suit the customer's taste. Furniture can be changed, walls can change colour and flooring can be altered, and complete walls can even be removed virtually. There is a lot of potential for generating interest in alternative finance concepts as well.

How would the house look with a conservatory? Or a sauna? How would it be if we changed this wall into a glass facade? The customer can be shown anything they cannot imagine. This allows us to face up to the challenge of

the so-called imagination gap. British studies show that this is what prevents 40 % of customers from making changes to their homes. But 55 % of respondents stated that a visualisation tool could help them to decide to buy and 61 % want to try out different options. This was stated by people across all the different age groups as well⁷.



» **VIRTUAL MODELS
MAKE IT EASIER TO
MAKE PLANS AND
TO COORDINATE
EVERYTHING
AS WELL.**

From viewing to construction

Once virtual environments have been designed, they are not only used to promote sales, they can also be used to guide us through the steps involved in designing buildings or restoration projects.

Virtual viewings have another advantage as well; VR models can also be passed on to other service providers after a property purchase has been agreed. So new-builds, upgrades and conversions can all be supported with virtual construction plans. This is significant because more and more architects and builders are using VR plans when they design buildings nowadays.

According to a study published on the CHArchitect platform, the main users of VR for architecture visualisation are in Europe (40 %), ahead of the USA (21 %). Many of the respondents believe this technology will revolutionize the architecture sector. Almost 70 % of the respondents are already using or planning to use virtual reality, augmented reality or mixed realities in production in 2017 and 77 % of them are experimenting with this technology or are planning to⁸.

This is not really surprising when you think of the obvious advantages: virtual models make it much easier to make plans and coordinate everything as well. It is easier to get a feeling for dimensions and change requests can be incorporated immediately in the virtual model. Communication is much simpler too, partly because all the advantages of virtual viewings mentioned above,

also apply here: detailed information can be added and visualized, and the environment is always available so real models, which are expensive and difficult to transport, just won't be needed anymore.

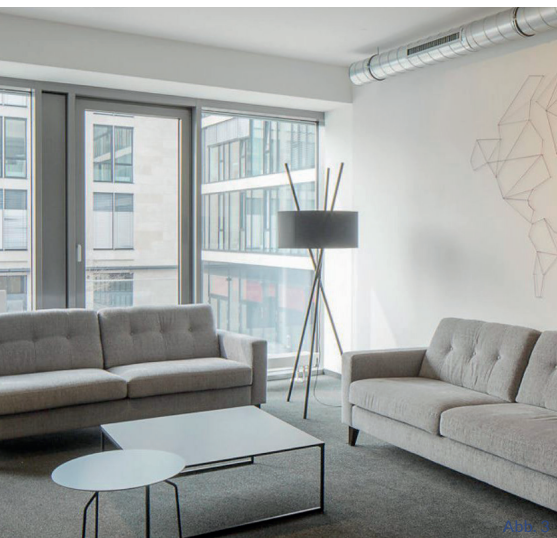
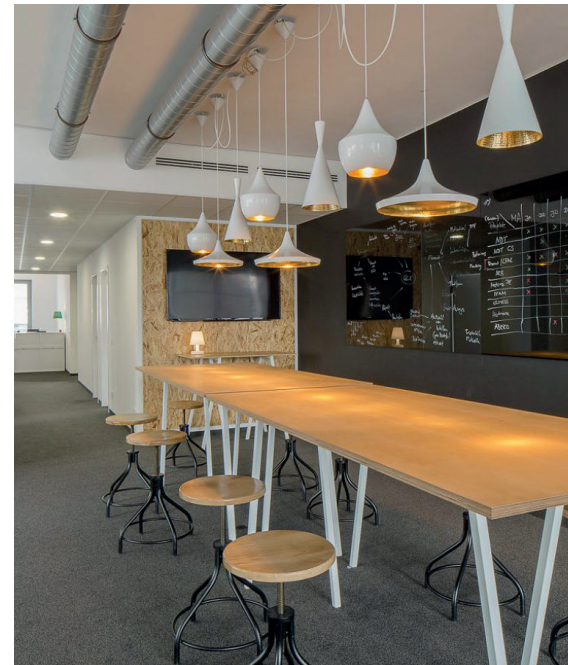
Thanks to cutting edge information technology, meetings can also be held directly in virtual space. Details can be coordinated across time zones which also leads to considerable savings.

Viewing the future – come and join in

Virtual reality is changing the housing and architecture sector. In the future, virtual viewings will be as normal as watching an image video on a website today.

Normal viewings on site will never disappear completely. But, in line with global trends of digitalization, the boundaries between virtual and analogue reality are becoming blurred.

Combining these two worlds creates benefits with clear business value: immateriality, share-ability, mobility and individual configurability, which, on top of enormous potential savings, open up new sales channels which in a few years will seem as normal as using mobile and internet channels today.



» **THE REAL ESTATE SECTOR WILL SOON BE FACING A TURNING POINT – JUST LIKE THE MOBILE REVOLUTION TEN YEARS AGO. NEW SKILLS WILL BE NEEDED TO MAKE REAL PROFITS IN THE VIRTUAL WORLD. SO VIRTUAL VIEWINGS ARE JUST THE FIRST STEP ON THE WAY TO THE FUTURE.**

Our Virtual reality

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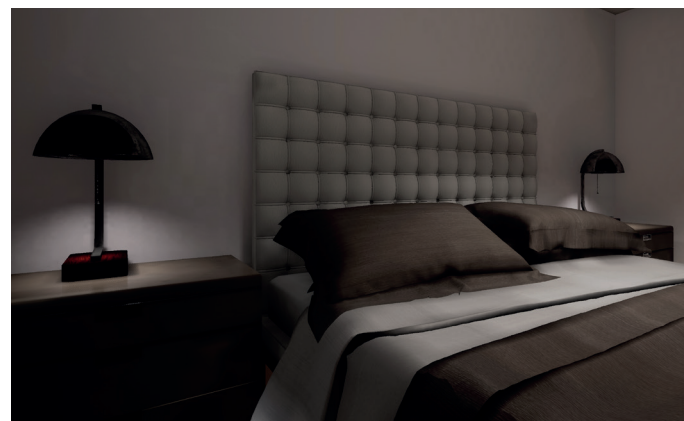


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We at Materna TMT...

About us

Know more – and make a difference: that is our motto at Materna TMT. For over 30 years now, we have been a strong partner for all aspects of company communication and digital learning.

It all started back in the 1980s with the development of software solutions to help educational institutions to plan, deliver, invoice and follow up on courses and events. Over the years we have extended our services and positioned ourselves successfully in digital learning and media production segments.

Today, we are a creative and skilful service provider producing media for all the different areas of corporate communication and digital learning. We have many years of expertise in the fields of consulting, design, media design and education, intranet and internet architectures, film production, camera work, post production and database development. We invest in future-oriented media production topics and implement virtual reality, gaming and voice control projects.

Our team includes camera operators, scriptwriters, psychologists, media educationalists, media designers for online and offline media, game designers, engine specialists, consultants, project leaders and application

developers. Everyone works together to implement innovative, expedient and real-time communication solutions.

Our technical equipment is cutting edge and our own film and sound studios enable us to do full justice to each and every project and to deliver top voice and sound quality. In our VRStudio we create digital worlds for you to experience live.

We are looking forward to getting to know you!

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