

The new  
freedom in VR

# VR PluraView 4K

Take VR meetings and interaction to the next level with PluraView and 3D glasses



- Head tracking for an intuitive VR experience
- Object tracking with spheres or pens
- Flicker-free, comfortable 3D viewing
- Realistic, intuitive 3D model interaction
- Maximum brightness – suitable for daylight
- Ideal complement to HMD & immersive VR



## 3D CAD becomes Virtual Reality – The VR PluraView monitor from Schneider Digital

A revolution in 3D-stereo and VR work environments for CAx applications

With the 28" VR PluraView monitor, the term "3D CAD" takes on a whole new meaning for CAx, i.e. engineering, manufacturing, construction and design! Our innovative VR system realizes comfortable, intuitive working in Virtual Reality environments and real stereoscopic visualization today, not just sometime in the future.

The new VR PluraView is a passive-display Virtual Reality stereo monitor. As a fully-fledged desktop VR/AR system, it is based on the successful 3D PluraView monitors from Schneider Digital. The tried and tested, flicker-free beam-splitter technology allows the user to work in an intuitive VR environment without becoming tired, even over long periods. Transparent, lightweight polarized glasses allow unrestricted communication with customers and colleagues.

Equipped with a high-tech tracking system, the VR PluraView now allows smooth interaction with 3D-stereo content in 3D-space plus zooming, rotating and tilting - without a mouse! The VR PluraView connects to more than 15 tracking devices and is ideal for head-, hand- or finger-tracking interfaces.



## Virtual Reality and 3D-stereo in a CAD environment

The VR PluraView's integrated infrared tracking system immerses the user "virtually" inside the 3D environment. Retroreflective markers on the passive 3D glasses allow for reliable detection by IR cameras and enable smooth movement in virtual space when looking at models from different perspectives. 3D models become "reality" as with head-mounted devices. Using the VR PluraView, the user interacts with the model intuitively from different angles through the 3D glasses. A multitude of separate tracking devices can be connected in seconds and complement our interactive tracking pen or passive tracking spheres, which allow for especially realistic 3D model handling.

The great advantage of the beam-splitter technology: In contrast to active 3D systems with "flickering", shuttered LCD glasses, the VR PluraView guarantees a totally flicker-free stereo experience! This allows not only short 3D visualizations or presentations, but facilitates fatigue-free permanent work within VR environments. In addition, the superlative display quality with 10-bit color depth, 4K resolution per eye, and exceptional display brightness, provides a comfortable work environment, even in office daylight conditions.



Unrestricted communication with colleagues and customers during VR meetings



Object tracking with spheres or 3D-Pens for realistic model interaction



Ideal complement to HMD and immersive VR systems



Flicker-free for stress-free 3D work



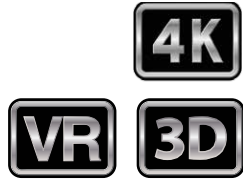
Provides 4K monitor resolution per eye; compatible with office daylight conditions



Compatible with all VR software and most CAD environments





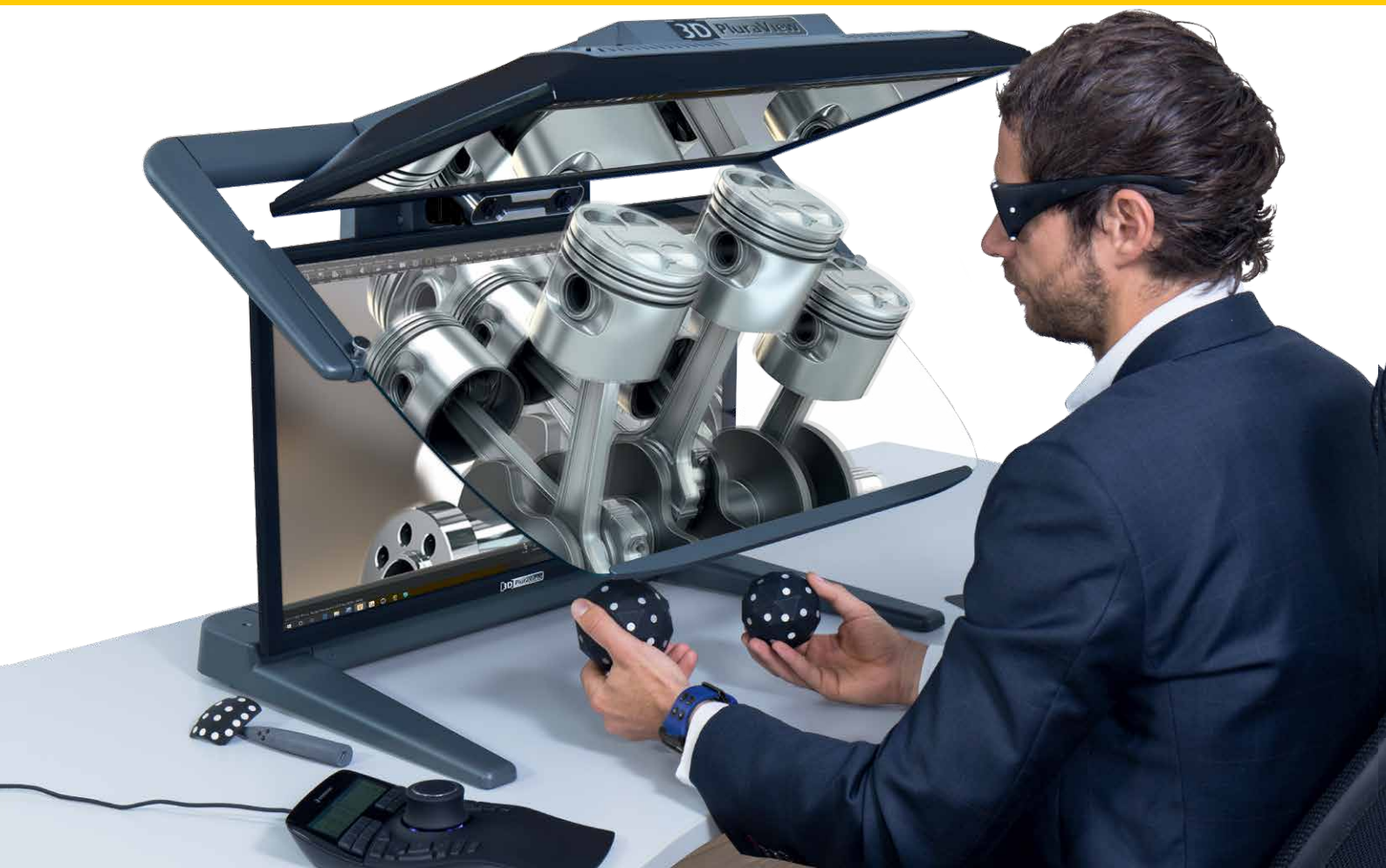


## The ideal complement to HMD and immersive VR systems

As a true desktop system, the VR PluraView represents the ideal complement to a Head-Mounted Display (HMD). With our light-weight VR glasses, professional users quickly get an excellent sense of intricate details and orientation of their 3D models. Without any special preparations or additional HMD devices, results can be easily discussed by several participants in front of the 28" PluraView system and modifications can be red-lined or implemented immediately.

## VR PluraView functions and benefits

- Simultaneous, smooth head and object tracking for intuitive VR work
- Model interaction through head tracking, spheres, 3D pens and gesturing devices
- Optional use of 2D / 3D mouse and stationary 3D input devices, augmented or replaced by head tracking and gesture recognition
- Very comfortable, light-weight 3D glasses with a wide viewing angle
- Transparent lenses allow unrestricted communication with colleagues and customers
- Very high brightness levels allow VR work in office daylight conditions
- Exceptional, detail-rich VR display quality with 4K (3,840 x 2,160) resolution per stereo-channel
- Flicker-free, passive stereo system with beam-splitter technology
- Compatible with all VR software and most CAD environments
- Ideal complement to HMD and immersive VR systems



# Designed for CAD professionals

Amazing VR experience for daily, permanent use

The new Schneider Digital VR PluraView offers top-quality, innovative beam-splitter and tracking technology for VR visualization on the desktop. The VR PluraView is ideal for all stereo software applications in a wide variety of industries:

- Simulation & VR Training
- CGI / 3D video processing
- Mechanical design / CAD
- Architectural design
- 3D Urban planning, GIS
- Crystallography/molecular research
- Computer tomography, surgery planning
- Biochemistry / stereo microscopy
- BIM (Building Information Modeling)
- Mesh-model interaction

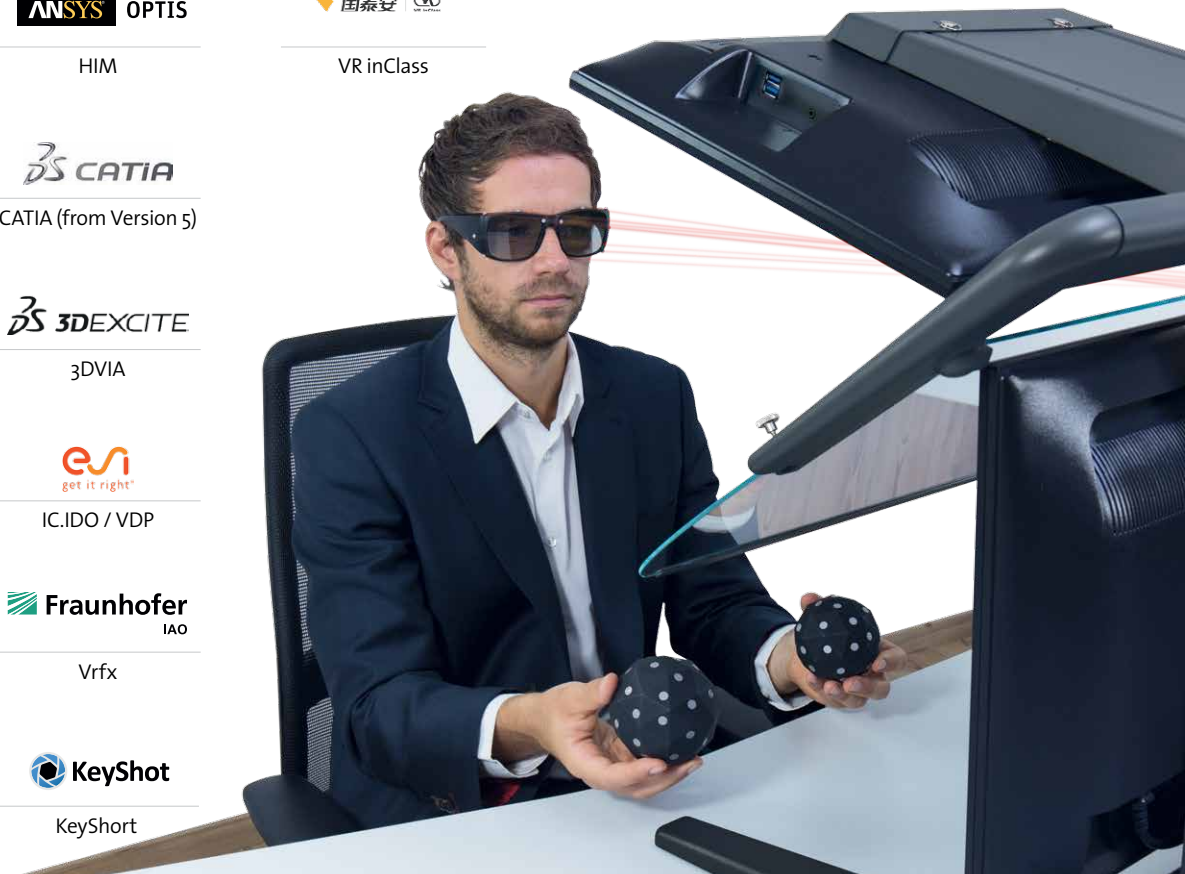
## CAD software applications compatible with VR PluraView:

The VR PluraView system can be plug & play operated with most CAx applications. Software solutions such as Siemens NX, Catia, HiCAD or Kompas-3D natively support 3D-stereo and can be used fully with the VR PluraView. On other CAD systems, the file viewers support 3D-stereo, for example PTC Creo data with CreoView and SolidWorks through eDrawings. AutoCAD and Inventor data can be viewed stereoscopically for example through NavisWorks.

## CAD software applications compatible with VR PluraView:

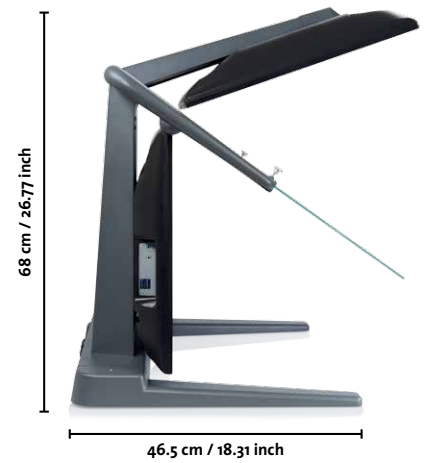
Supports the following four tracking protocols:  
VRPN, DTrack, trackd and native C++ SDK

 Theia-RT	 VRED Professional	 3DEXCITE
 Patchwork 3D	 HIM	 VR inClass
 Visenso/hlrs	 CATIA (from Version 5)	
 Delmia	 3DVIA	
 EON Reality	 IC.IDO / VDP	
 Team Center Visualization	 Vrfox	
 Fusion	 KeyShort	



## VR PLURAVIEW MONITOR - TECHNICAL SPECIFICATIONS

28" 4K/UHD	
Display	28" (16:9) screen 2x 3,840 x 2,160 resolution (8,3 MP) 1,073 billion colours (10-bit*) 300 cd/m <sup>2</sup> brightness LED Backlight Technology 1 ms response time 170°/160° viewing angle (H/V) BlackTuner for object detection in dark areas Contrast ratio 12 000 000:1 ACR
3D properties	180 cd/m <sup>2</sup> brightness with glasses 3,840 x 2,160 resolution per eye Linear polarisation 45°/135° beam-splitter: semi-transparent mirror Infrared tracking
3D formats	Quad Buffered OpenGL, Side-by-Side, Top-Bottom, Quad Buffered DirectX
Operating systems	32 & 64 bit Windows / Linux Support
Power consumption	Rating typically 98 watts; maximum 1 W in power management mode, annual power consumption 173 kWh/year Power Management VESA DPMS™, Energy Star 6.0 Power efficiency class B
Weight	27 kg, set with stand
Dimensions	80 x 68 x 54 cm (W x H x D)
Integrated ports	2x DisplayPort 1.2 cable 3 m 2x USB 3.0 for IR tracking 1 x mains connector AC 100 - 240 V, 50 / 60 Hz with main switch and 3.15 A microfuse
Audio	Integrated speakers 2 x 3 W
Highlights	Calibration-free user interaction tracker Supports up to 15 targets! Extremely wide viewing angle of almost 180 degrees
Technical information	Easy to use native C / C++ SDK and interface for C# and Python. Interface is also supported through VRPN, Trackd, Dtrack emulation.
Warranty	1 year unlimited warranty, can be extended to up 5 years with CarePack



### Graphics cards requirements

Any QuadBuffer-enabled NVIDIA Quadro and AMD FirePRO/RadeonPRO cards, which have at least 2x DisplayPort 1.1 monitor outputs. Use of an additional desktop monitor, adapted to the polarisation of the stereo system, is recommended for 3D PluraView.

\*The 10-bit colour depth feature with QuadBuffer 3D-stereo is currently available only with AMD graphics cards.



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Partner of:



**VR PluraView**

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