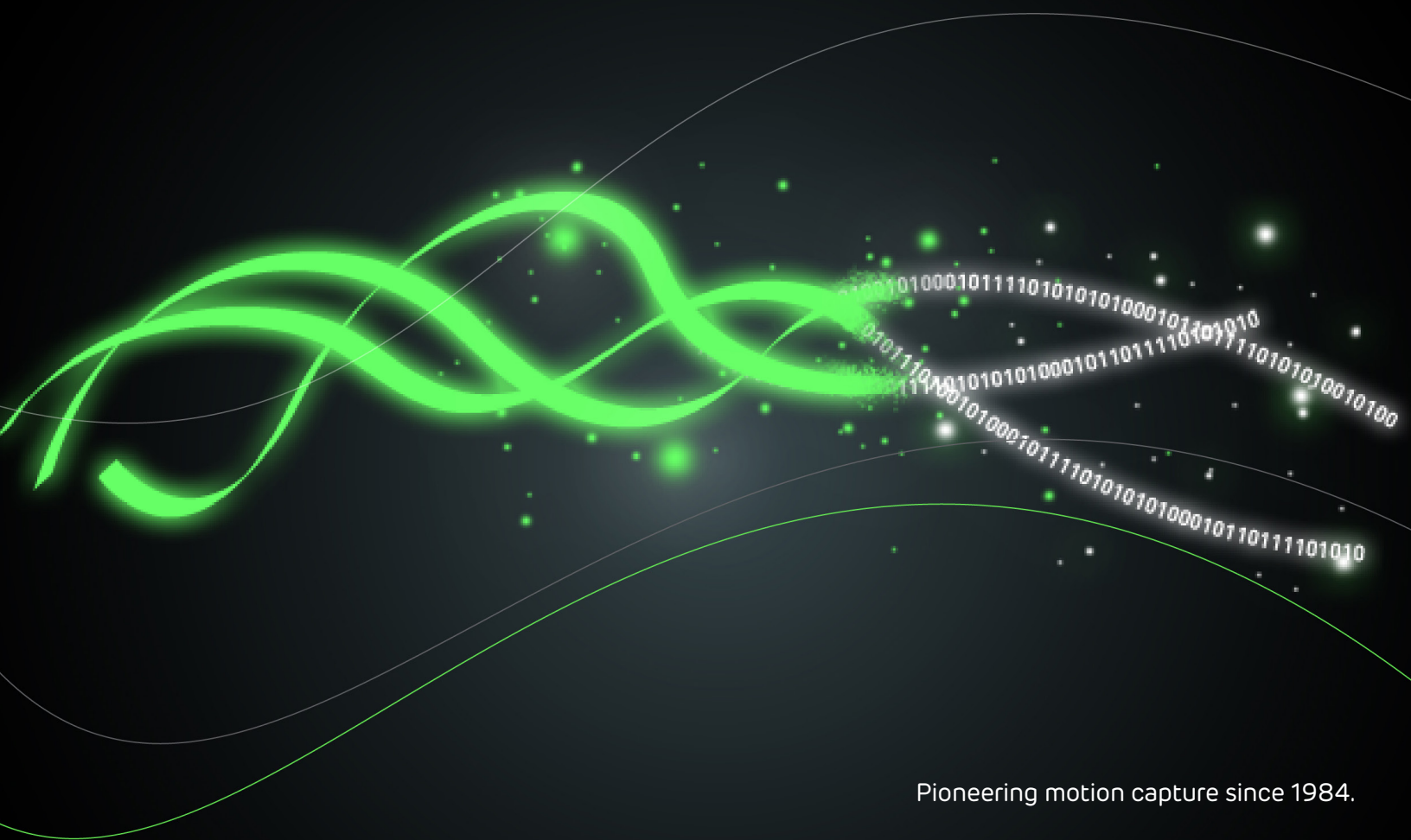


NICON

# Tracker 3

Fast.Flexible.Precise.



Pioneering motion capture since 1984.

# Tracker 3

**Fast. Flexible.  
Precise.**

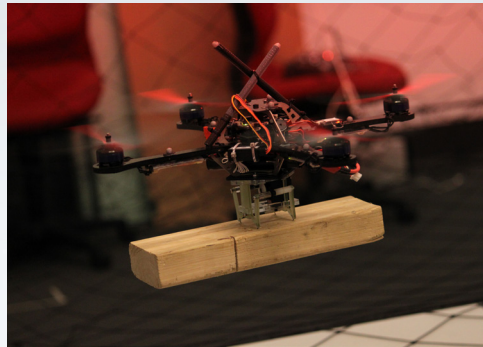


Image courtesy of the University of Pennsylvania



Image courtesy of Artanim

A simple to learn yet highly functional user interface, real-time data with minimal latency combined with over 30 years of perfecting camera calibration and 3D reconstruction techniques has resulted in an accurate and affordable 3D tracking solution.

#### EASY TO LEARN

Everything you need from calibration to streaming data is neatly arranged within the Tracker interface. Time is precious. Tracker has been designed so you can quickly concentrate on the important work.

#### FAST, RELIABLE DATA FOR VR

Tracker 3.0 can process data in as little as 1.5ms, at more than 500 frames per second, which is up to five times less than other systems. With the added ability to recognize rigid bodies in 2D, your data will continue even if the markers become visible to only one camera. This results in fewer gaps and more reliable data.

With smart algorithms that select the best bits of data to use from the cameras, and new adaptive filtering techniques that

change according to how fast an object is moving, Tracker 3 delivers a VR experience you can believe in.

#### REAL-TIME SYSTEM MODELING WITH SIMULINK

Vicon is now the only optical motion capture provider to be able to offer low latency real-time modeling of robots out-of-the-box. Streaming data by UDP, Tracker 3 talks directly to Mathworks' Simulink package for hardware in loop (HIL) testing. Get feedback from your robot directly into Tracker 3 for fast, low latency system testing.

#### FLEXIBLE INTEGRATION

Tracker's robust integration methods enable you to read data in UDP, TCP, and the VRPN Open Source protocol. VRPN allows support in the following 3D applications:

- VirTools
- Open Scene Graph
- WorldViz®
- Panda3D
- VR Juggler

Tracker's support of the Vicon DataStream allows both Unicast TCP connections and Multicast UDP connections. This is

useful when latency is critical, such as transmitting real-time data over Wireless data links for UAV tracking, controlling the flight of a helicopter or path of a robot.

The DataStream SDK is available for Win32, Win64 and Linux for C++. A Win32 SDK for .NET applications (C# and VB.NET) is also available.

All these different interfaces give you the ultimate choice for integration in your own software. Partnering with Mechdyne, Autodesk, Dassault Systems and others ensures support of your CAVE or other Virtual environment.

#### APEX

Designed to work perfectly with Tracker, Apex is Vicon's interaction device, built for virtual reality. Not only can you use multiple devices in one volume, but it also provides haptic vibration for user feedback and delivers reliable, robust tracking with only two Bonita cameras. It streams precise data in even the largest volumes, giving you plenty of space to be creative.

Discover More

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Denver  
 T: +1 303.799.8686  
 Los Angeles  
 T: +1 303.799.8686

Oxford  
 T: +44 (0) 1865 261800  
 Singapore  
 T: +65 6400 3500