Afinity Collamer Aspheric Single Piece NTIOL

PRICE	N/A
COMPANY	STAAR Surgical Company
PHONE	(626) 303-7902
WEB	http://staar.com

KEY FEATURES

- Available in powers of 10.50 to 30.50 D
- Can be delivered into the eye through a 2.2-mm incision with the NanoPoint injection system (STAAR Surgical Company)
- Designated a New Technology IOL by the Centers for Medicare & Medicaid Services

The Afinity Collamer Aspheric Single Piece NTIOL (STAAR Surgical Company, Monrovia, CA) features aspheric anterior and posterior surfaces that reportedly reduce the total amount of positive spherical aberration in the eye. The lens is designed for use with STAAR's NanoPoint injector system, which allows surgeons to insert the lens into the eye through a 2.2-mm incision. According to the company, the lens' proprietary Collamer material (a combination of collagen and a poly-HEMA–based copolymer) is highly biocompatible and induces fewer higher-order aberrations than silicone or acrylic.

ORange Intraoperative Wavefront Aberrometer

PRICE	N/A
COMPANY	WaveTec Vision
PHONE	(949) 273-5970
WEB	www.operateorange.com

KEY FEATURES

- Allows surgeons to measure sphere, cylinder, and axis in real time during cataract surgery
- Initial applications include guiding the placement of limbal relaxing incisions and aligning toric IOLs with the proper axis
- Instrument's large dynamic range (-5.00 to +20.00 D) suitable for measuring a wide spectrum of refractive errors

WaveTec Vision (Aliso Viejo, CA) launched its new ORange surgical wavefront aberrometer during the 2009 ASCRS annual meeting in San Francisco. The device attaches to the operating microscope and sends measurements (including wavefront data) to an adjacent processor and touch-screen monitor. Surgeons reportedly can use this information to help determine the placement of limbal relaxing incisions and to obtain a final pseudophakic refraction of the IOL's power at the end of the procedure.

TrueVision Flat Panel Display

PRICE	$54,900 for 24-inch 3D visualization system for the OR and $75,000 for 46-inch visualization system for microsurgery
COMPANY	TrueVision Systems, Inc.
PHONE	(805) 963-9700
WEB	www.truevisionsys.com

KEY FEATURES

- Flat panel display can be mounted on a portable cart, the wall, from the ceiling, or on a boom arm in ORs, examination rooms, and offices
- Panels range in size from 24 to 46 inches
- Optional customized 3D playback systems available for use outside the OR

The TrueVision 3D microsurgery system (TrueVision Systems, Inc., Santa Barbara CA) is now available with a high-quality LCD 1080-pixel flat panel display. The system's image-capture module converts the surgeon's view of the operative field to a 3D high-definition digital video stream that can be viewed on the flat panel display or stored on a separate image processing and recording unit. According to the company, the 3D video playback enables viewers to watch surgery as if they were looking through the microscope.

iTrace Combination Ray Tracing Aberrometer/ Topographer

PRICE	N/A
COMPANY	Tracey Technologies
PHONE	(877) 872-2393
WEB	www.traceytechnologies.com

KEY FEATURES

- Device's optical ray tracing technology projects 256 points of near-infrared laser light into the eye and translates the data into a visual representation of total ocular aberration (retinal spot pattern)
- Binocular open field fixation technique assesses the eye's complete accommodative volume while avoiding instrument accommodation
- Autorefraction with multizone refraction analysis allows clinicians to compare patients' visual acuity under daytime and nighttime conditions

The iTrace Combination Ray Tracing Aberrometer/Topographer (Tracey Technologies, Houston, TX) incorporates an autorefractor, corneal topographer, wavefront aberrometer, autokeratometer, and pupillometer into a single device. This combination of technologies allows users to isolate corneal and lenticular aberrations from measurements of total error, evaluate accommodation, and document the pupil's size under scotopic, mesopic, and photopic lighting conditions. According to the company, these features are useful for determining which patients will benefit from cornea- versus lens-based refractive procedures, selecting appropriately powered premium IOLs, and demonstrating the symptoms associated with specific optical aberrations. ■