RETIMAX MINIGANZFELD
Hand held Miniganzfeld stimulator RETIMAX CSO is the most advanced device for ERG and VEP. Useful for children and patient in supine position or to be used in surgery room. Thanks to the built in infrared CCD camera it is possible monitoring the patient during the examination in the dark room. Supply constant and accurate stimulus strength related to the patient's pupil size. Miniganzfeld RETIMAX CSO is conform to ISCEV standard (International Society for Clinical Electrophysiology of Vision) for ERG and VEP. Weight: 0.5 Kg. Dimension: 20x25 cm. flash strength: 0 to 10 cd/deg2Sec, background intensity: 0 a 500 cd/m2, patient observation by infrared CCD Camera, pupil meter (optional).

ELECTRODES AND ACCESSORIES
SNAP CABLE
Touch proof connection terminal for PREGELLED electrode: Cm. 65
Package 5 pieces

SILVER CUP SKIN ELECTRODE
With touch proof terminal, Ag-Ag/CL disk. For skin application only. Cm. 65
Package 10 pieces

HK LOOP
Ring fiber electrode for conjunctiva fornix ERG and PERG examination. Stable and extremely comfortable. It can be used several times throughout autoclave sterilization. The application, usually, does not need local anesthesia. It does not touch the cornea directly protecting it from abrasion.
Package 20 pieces

ERG JET
Contact lens Electrodes for ERG and MFERG
Single use in sterile package
Package 50 Pcs

TEN 20
Special electroconductive very adhesive cream for skin electrodes in AG-Ag/CL. It does not contain abrasive substances. Net weight 114 gr.
Package 3 pieces

NLPREP
Package 3 pieces

CHINREST PAPER
Disposible paper for chinrest. 100 papers cd
Package 10 pieces

RETIMAX BASIC, ADVANCED E ADVANCED PLUS
PERG (Elettroretinogramma Pattern) ERG (Elettroretinogramma) VEP Pattern (Potenziale Visivo Evocato Pattern) VEP Flash (Potenziale Visivo Evocato Flash) EOG (Elettrooculogramma) MFPERG (Multifocal ERG) MFPERG (Multifocal PERG) MfVEP (Multifocal VEP) ENG (Elettroistagnogramma) GPH (Glaucoma PERG hemifield test) Sweep VEP (Sensibilità al contrasto e acuità visiva) Vision Trainer (Riabilitazione visiva per mezzo di VEP biofeedback)
RETIMAX BASIC AND ADVANCED

PERG (Pattern Electroretinogram) ERG (Electrooculogram) VEP Pattern (Visual Evoked Potential) VEP Flash (Visual Evoked Potential) EOQ (Electrooculography) MFERG (Multifocal ERG) MFERG (Multifocal PERG) MVVEP (Multifocal VEP) ENG (Electroangiogram) GPH (Glucoma PERG) hemifield Sweep VEP (contrast sensitivity and visual acuity, optional) Vision Trainer (Rehabilitation by VEP biofeedback)

Conform to ISECE standard (International Society for Clinical Electrophysiology of Vision).

Infrared CCD Camera for patient’s fixation control. Automated electrodes impedance meter. Automatic calibration of the pupil center. Self calibration of Pattern and Ganzfeld Flash stimuli. Automated adjustment of subtended visual angle, depending to the optical correction applied to the patient. Compact and user friendly

RETIMAX (Patent pending), the newest device for the early detection of Glaucoma. RETIMAX performs an objective test based on ocular electrophysiology, useful for the functional assessment of retina and ganglion cells. RETIMAX is essential for the early detection of glaucoma and monitoring of its progression. RETIMAX detects dysfunction in the retinal ganglion cells before the irreversible process of cell death; it provides a rationale for early treatment to prevent or delay the death process.

RETIMAX Test is very fast requiring 2 minutes. The readout is an electrooculogram (PERG) whose waveform is automatically analyzed, and the comparison of lower and upper retina hemifield show the deviation of the patient respect to the normal subject for the early diagnosis of glaucoma.

RETIMAX provides to evaluate the function of retinal ganglion cells within 30 degrees centered to the fovea of the retina, and can be compared with the Mean Defect of the Standard Automated Perimetry. Different from perimeter, the two eyes are tested simultaneously and the response does not depend on subject’s attention. The analysis of both hemifields avoid the variability due to the age of the patients, cataract and refractive problems.

What is more important, RETIMAX test is often altered before the Standard Automated Perimetry. More than 40% of pre-perimetric glaucoma patients have abnormal RETIMAX test. Imaging techniques of the retinal nerve layer or optic disc provide a measure of missing retinal ganglion cells and their axons, whereas RETIMAX provides a measure of both missing retinal ganglion cells and dysfunction of remaining ganglion cells. Hence, it gives the ophthalmologist the possibility to detect glaucomatous dysfunction before irreversible retinal damage actually occurs. In some cases, glaucomatous dysfunction can be reversed, as shown by PERG improvement after reduction of the intraocular pressure. Therefore, RETIMAX provides a means of evaluating the beneficial effects of treatment for glaucoma.

RETIMAX ADVANCED PLUS

The Multifocal ERG, PERG and VEP test are very reliable and really help in the detection and following the progression of a macular or other limited retinal area and Optic nerve disorders. RETIMAX Advanced plus system allows assessment of Multifocal ERG, PERG and VEP in small areas of retinal and optic nerve dysfunctions.

With this method it is possible to record the bioelectrical activity from hundreds of small retinal areas or correlated to Visual cortex, simultaneously, in less than 5 minutes per eye. Glaucoma, Age Related Macular Degeneration (ARMD), Pigmented retinitis, Scotomas of few millimeters in diameter can be mapped. The extension of retinal dysfunction is quantified very accurately particularly in early stages of disease process. RETIMAX Advanced Plus provides the newest Total Length binary M-sequence Real-time (Patent Pending) up to 22°. Visual angles from 7° to 241° of retinal fields, in order to detect the objective bioelectrical response of each stimulated retinal field. Thanks to the innovative features of RETIMAX Advanced Plus, it is possible to display in real time the results of each stimulated retinal field. It gives to the ophthalmologist the possibility of interact directly with the patient during the test to obtain his best cooperation. That avoids artifacts or attention loss during the test. RETIMAX Advanced Plus provides age correlated normative data for Multifocal ERG, PERG and VEP in order to compare the patient examined with the normal control group. A plurality of stimulus settings are available for the user: An automated adjustment of subtended visual angle depending to the optical correction applied to the patient, Number of stimulus field, stimulation of areas, eccentricity, Checkerboards, Colors. For CRT Plasma and OLED display. The advanced analysis strategy includes: Traces array, 3D array, 2D array, retinal rings analysis, quadrants analysis, Hamfield analysis (Patent Pending) and user defined personal settings.

Additionally RETIMAX Advanced plus provides interface with Sita Lamp, Fundus camera, and laser scanning ophthalmoscopy OCT, in order to obtain simultaneously the detection of functional test and retinal image, or RNFL (Retinal Nerve Fiber Layer).

Results of analysis strategy are printout with high resolution color printer. File of graphics and text data can be exported to other program for statistical analysis. A large range of electrodes is available as HEXLOOP Ring, Finger or Contact lens for the best comfort of the patient during the examination.

RETIMAX Advanced plus has been designed in order to meet the international standard ISECE (International society for Clinical Electrophysiology of Vision).