

A DIVISION OF J&S
Fisiocomputer
Made to Last

FISIOCOMPUTER PRODUCTS

Elite Line

BFB4

Double Channel Electromyographic Biofeedback



Fisiocomputer's BFB4 is a two-channel surface electromyographic biofeedback, that is an electromedical device designed to detect and present in graphic form superficial potentials transmitted by nerve fibers, that is essential for rehabilitation exercises with visual feedback.

The BFB4 consists of a single electronic unit that includes both a PC-Tablet, where the software is pre-installed, and the patient interface, where the two signal detection cables have to be inserted.

Those are connected to the patient adhesive electrodes by special clips. The power is exclusively supplied by the battery inside the tablet.

From a very detailed analysis of the available literature, we can see that countless scientific articles on the use of biofeedback in orthopedic rehabilitation have been written all over the world.

Given the statistical significance of these works it's clear that today it's possible to define a state of art in the field of rehabilitation protocols with biofeedback, so that even the Nomenclator National rate list includes at least two voices: "Individual motor re-education in patients with injured motor skills...including biofeedback "among the outpatient specialist national services recognized by LEA.

Given that, based on the bibliographic references analyzed during the Clinical Validation, regarding the therapeutic indications, these can be defined as:

exercises assisted by feedback in motor rehabilitation, with additional possibility of comparison in real time between two muscles (for example "agonist" / "antagonist").

Strengths:

- Two separate channels for the detection and presentation in graphic form of the superficial potentials transmitted by nerve fibers
 - Motor rehabilitation exercises with real-time comparison between two muscles (agonist / antagonist)
 - Strongly indicated for pelvic floor rehabilitation, with virtual obstacles of variable size
 - Extreme sensitivity ($2\mu\text{V} / \text{div}$) for exercises below threshold
 - Data storage in graphical and numerical form
 - Patient registry and planned exercises
 - Glossary of images, movements and associated muscles for positioning electrodes

Physical Features:

The device consists of an 8" tablet inserted in a protection section, the box containing the interface electronics with cables is positioned behind it.

The BFB4 Fisiocomputer comes complete with the following elements:

- Main unit, which includes both the tablet 8" and the interface electronics. The identification plate is put behind the patient interface box. The battery that supplies all the power is contained in the PC Tablet. The micro-USB cable that connects the two units are accessible from the outside.
- (2 pieces) Patient-cables, with 2.5mm jack plug for insertion into the interface and at the other side three colored cables (black-red-green) ending with a female clip, for the connection to the electrodes. The three cables come from one box on which the identification plate is put.
- (Envelope of 30 pieces) Single-skinned adhesive, circular electrodes (diameter 26mm.) with male clip connection.
- Mains adapter for battery recharging. Italian plug (US plug adapter included) and USB Female lateral output. Connection cable to the interface from USB-A Male to micro-USB male. Input 100-240V ~ / 50 - 60Hz / 0,16A. Output 5V = / 1A.
- (optional) pelvic floor rehabilitation kit.
- (optional) Articulated and adjustable floor rod, complete with clamp to support the apparatus.



Functional Features:

- Exercises with virtual obstacles that constitute a feedback tool for the patient;
- Signal acquired in oscillographic mode;
- Patient Card with different settable values;
- Printing with a device connected via WiFi with preview possibility;
- Sensitivity in $\mu\text{V} / \text{div}$;
- Rest time in Sec. (Time between the end of one cycle and the next);
- Target intensity in μV (obstacle height);
- Target start time from the beginning of the cycle to the obstacle
- Target time in Sec. (Obstacles);
- Decontrol time in Sec. (From the last obstacle to the end of the cycle);
- Number of obstacles (from 0 to 3);
- Channel color (chosen from a table);
- $\mu\text{V} / \text{D}$ alarm (can be inserted / removed).



IP1

HYPERTHERMIA

The Focalized Thermotherapy



When we talk about Hyperthermia, we refer to the possibility to focus on a well defined area inside the body, at a variable depth (from 1 cm to 8 cm), enough energy to carry the relevant part (target volume) at a very specific and controlled high temperature.

Hyperthermia is indicated for pathologies of different nature. The therapeutic indications are as follows: bruising outcomes, myalgia, tendinitis, compartment syndromes, post-traumatic and post-surgical articular stiffness, vertebral pain, arthrosis and calcific periarthritis of the shoulder.

The great peculiarity that makes this thermotherapy unique is the excellent reproducibility of thermal parameters, thanks to the use of sophisticated systems for controlling and implementing of the radiant energy addressed to the target.

All subsystems that form the IP1 have been designed and realized with particular care to the aspects of security, reliability and functionality of the product compared to the simplicity of use.

This thermal induction method was found to be so far the most suitable one for treating and resolving situations of the aforementioned pathologies, that appeared tough and with an unsteady and chronic development; all this makes us understand how hyperthermia is far more effective than many others therapies that rely on heat as a mean to treat the patient.

Strengths:

- High precision in achieving the target temperature
- Extremely fast in achieving the temperature of the target
- Easy to use thanks to the smart mode
- Innovative touch screen display





Physical Features:

- Body Features: Anti-corrosion tubular frame and steel, galvanized with lacquered aluminum frame;
- External dimensions:
Heights from the ground: 985 mm on the top shelf;
1130 mm above the console;
1540 mm at the center of the arm;
Width and depth to the ground: 710x525 mm;
Weight: 75 Kg;



Description: The apparatus is contained in a four-wheeled metal cabinet (two are hidden inside the body, two under the wooden shelves). The control console is located on the top, facing the operator side (the one that has above the handle, visible in the picture), and contains the control electronics, with a practical 7" TFT screen of the "touch-screen" type, which can be used by the operator for all the operations of both setting and control and verification of the supply. The applicator (antenna with bolus, in the foreground on the picture) is placed on a hinged arm fixed to the chassis rear (to the right of the console watcher). The mains plug, fuse holders and light switch are located below on the right side, between the grid and the wooden shelf visible in the picture.

Functional Features:

Touch Screen Panel:

- Smart mode with 3 parameters to set: target depth, temperature and power;
- Parametric Mode: more settable parameters;

RF Generator / Booster:

- Emission frequency: 433.92 MHz;
- Maximum power output: 100 Watt;
- Power setting: 0-100% step 5%;
- Disadvantage protection: total (infinity ROS);
- Direct power measurement: constant in real time;
- Reflected power measurement: constant in real time;
- security controls: absorbed current sense, operating temperature;

Main Applicator:

- Used technology: teflon microstrip;
- Pairing with the patient: silicon bag with thermoregulated liquid;
- Rated frequency: 433.92 MHz;
- Maximum working power: 200W;
- Transfer efficiency: 90% min. (From RF to useful heat);
- Maximum therapeutic penetration: 80mm;
- Maximum footprint: 186x196mm;
- Actual field (50% S.A.R.): 80x120mm (96cmq);

LTS-60

Power Scanning Laser



Laser therapy applied to physiotherapy for therapeutic purposes consists in using the effects of electromagnetic energy generated by two laser sources. The acronym L.A.S.E.R. stands for light amplification by simulated emission of radiation. The flow of the laser, penetrating the tissues, causes biochemical reactions on the cell wall and inside the mitochondrion, producing different effects including, for example, vasodilation and increased lymphatic drainage.

LTS-60 is designed for the use of laser at a certain wavelength (1064 nM) for therapeutic purposes in different pathologies that require an accurate and non-invasive power. The interaction between laser light and living tissues, composed of an aqueous solution capable of absorbing light, is risk-free and, essential for the patient, does not cause pain.

The intended use is high power laser therapy with the following therapeutic indications: tendinitis, muscle contractions, trauma, osteoarthritis, rheumatoid arthritis, arthritis, ulcers and bedsores, scars, edema, Bell's paralysis, impingement syndrome, radiculopathy.

This frontier of the Laser application allows LTS-60 to have a continuous emission of 6 Watts, guaranteed by a sophisticated optical group, which allows the entire system to achieve a remarkable precision in the areas to treat, excellent even in the small ones. All this combined with a perfectly collimated guide light to the main laser beam. The LTS-60 comes from the intelligent combination of available technologies and the latest knowledge on the application of laser light, designed to achieve an ideal depth for therapeutic treatments. Moreover, thanks to the 6 Watt emission, which can be continuous or pulsed, the treatment time is greatly reduced, increasing at the same time the effectiveness of the therapy. The goal of this laser device of the Fisiocomputer's line is to give to the world of physical therapy a reliable and powerful ally that, thanks to the work of the company and the various principals that actively collaborate in the improvement of application protocols, can optimize to the maximum of the potential of the product through a series of specific protocols for the different treatable pathologies.

Strengths:

- 6 Watt Emission, pulsed or continuous
- Absolute precision in the areas to treat
 - Highly reduced time of treatment
 - Specific protocols for tractable pathologies
 - Higher stability and precision due to the absence of handpiece
 - No protruding parts

Physical Features:

- Used materials: base and body in fire-painted sheet steel RAL9006 e RAL9007, internal frame in galvanized and welded tubular steel.
- External dimensions: clutter in plan 500x600mm. (LxP), max height from the ground 1637mm.
- Total weight: 43 Kg.

Description:

Fisiocomputer's LTS-60

It is presented as a floor tower inclined towards the emission side (conventionally defined as the back one) and it is fixed on a rectangular base big enough to ensure stability (and that hides the four wheels). At the front it presents the keyboard and the retroilluminated graphic display for the controls, besides the emergency key "stop" to the ignition key the two main fuses.

Behind, there is (on the top, slightly on the left) "LASER'S OPENING". The left side has a handle to facilitate the movement of the device. From the base goes out, through special cable gland, the main power cable and there's also the remote lock connector.

Functional Features:

- Adjustment of treatment time: from 1' to 60'
- IR source of work: laser diod at high efficiency
- Wavelength 1064 nM
- Wavelength guide ligh: 635 nM
- Maximum continuous power: 6W (5mW the guide light) power regulation: from 0 to 100 % (guide light non adjustable);
- Emission regulation: from continuous to 5000 Hz, automatic calculation of the total energy supplied during the whole treatment, in joule;
- Scanning regulation: in horizontal width from +0° to +30° and speed from 0,25 a 2 Rad/sec, in vertical width from +30° to +85° from the vertical, fixed frequency;
- Alimentation:
- Net's characteristics: 230V-/50Hz;
- Net's absorption: 600 VA;
- Net's fuses: 2 rapid (5x20) of F6,3A
- Type of net's cable: fixed wih flexible cable gland
- Characteristics net's cable: 3x1 sq. mm flameproof (2mt);
- Net's plug: 10A+T p. 19mm.





MOVESCAN

3D Proprioception, ROM Test and Rehabilitation

Fisiocomputer's MOVESCAN is a positional, tridimensional, rotational total body Biofeedback with rehabilitation function. In particular, it's build in order to measure joints' angles and to make the patient do rehabilitation exercises through direct visual feedback. From a very detailed analysis of the available scientific literature, we can see that countless scientific articles about the use of IMU sensors (Inertial Measurement Unit) have been written all over the world. Most of this articles are about the orthopedic rehabilitation and the functional evaluation (measure). Knees, ankles, shoulders and spine's cervical segment are the most treated joints. Few works were done on the other anatomic parts and in particular on muscular traumas, trunk and hip; however it's clear that today it's possible to define a state of art in the measure method and joints' rehabilitation with IMU's help and a specific role in rehabilitation protocols with biofeedback.

Based on the bibliographic references analyzed during clinic validation, measures can be extended to almost very part of the body. MOVESCAN allows to measure the angles of rotation of all joint in 3D. Regarding the therapeutic indications instead, it can be used for exercises such as knees, ankles, shoulders, elbows, wrists and cervical joints' proprioception.

MOVESCAN is a system for instrumental physic therapy and it's composed by an innovative support with big monitors, where the control electronics is assembled, including a last generation pc. The equipment is completed by a wireless keyboard, a monopodal tilting platform, a pair of motion sensors and the accessories needed to wear them; platform and sensors can be connected to the central unit via cable (USB), or in wireless mode, using BLE (Bluetooth Low Energy) connection technique. Through its innovative technology of military derivation, MOVESCAN allows to analyze the 3D joints' movement, allowing to identify position, speed, movement and angular movement. IMU sensors guarantee the extreme precision that makes this product unique on the market.

Strengths:

- Measurement of the angles of rotation of all the body joints with simultaneous optional 3D view.
- Extreme precision in measuring angles and load for lower limb exercises
- Countless combinations of analysis and exercises with the possibility of custom configurations
- Possibility for the patients to do the exercises even remotely
- Optional complete file of patients and exercises.

Physical Features:

Cart on 4 wheels with 2 shelves plus a swivel bracket:

- 43 "monitor;
- Wireless keyboard;
- Dimensions: maximum clutter in plan (base 800x500mm - LxP);
- Center-plate height-Monitor: adjustable from 1310 to 1910mm.
- Height from the ground keyboard shelf: adjustable from 192 to 1230mm;
- Height from ground lower shelf: 122mm.
- Weight: 19.9 Kg;
- Command Unit with Central Unit and Signal Processor;
- Isolation Unit from the net with power supply 230V ~ / 50Hz and input fuses: 2 x T500mA (type 5x20).

Tilting platform composed by:

- Hemisphere covered with integral rubber on a wooden support covered with a neoprene mat plasticised and silk-screened;
- Support for the support foot;
- Weight: 2,900 Kg .;
- Dimensions: 320x165mm. the shelf, 100mm. height;
- Power supply: 5Vdc / 0.01Amax (from USB) or 2 3.7V LiPo batteries - type 18650.

Wearable Inertial Sensors consisting of:

- Pair of sensors complete with smart interface and USB connection cable (BLE optional), dimensions: 30x25,5x11mm .;
- Weight: max. 0.250 Kg. Total
- Power supply: 5Vcc / 0.05A max. from the USB cable (or 7.4Vdc from two LiPo 18650 batteries);
- Wearable Sensors supports Kit

Functional Features:

Simultaneous measurement through inertial sensors of the following three rotary movements:

- Rotation (yaw)
- Lateral inclination (roll)
- Posterior anterior flexion (pitch)

For the following joints:

- Head (cervical in the three axes)
- Trunk
- Hip
- Shoulder
- Elbow
- Wrist
- Knee
- Ankle

With a range of $\pm 89^\circ$ in the degrees of freedom and a precision of $\pm 0.1^\circ$. The presence of two simultaneous sensors allows you to evaluate precisely the angles of

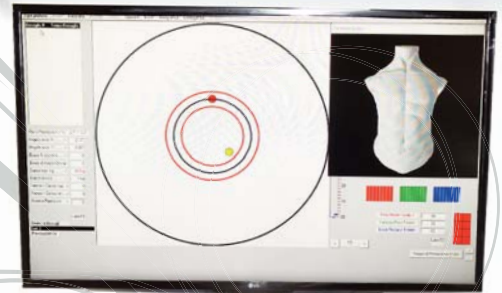
rotation, regardless the position of the patient in the space, or to eliminate possible errors due to complex movements of the patient.

Simultaneous measurement, by tilting platform, of the two angles of pitch and roll of the foot under examination:

- the pitch angle measurement takes place in the range of $\pm 15^\circ$;
- the measurement of the roll angle in the range of $\pm 15^\circ$;

Basic application that allows:

- Creation and management of the Patient Registry
- Creation and management of the Exercise Data
- Memorization of all the exercises organized for each patient during the rehabilitation phase
- The measurement of the results in the test phase
- Analysis of results



TK1

TECARTHERAPY

Professional, portable and fixed



Tecartherapy today represents the most commonly used physical device in Italy.

For some years it has found ample room for the treatment of musculoskeletal disorders. The ultimate goal is to cure the injured area by activating the repair processes that are related to our body.

The peculiarity of this electromedical device is in the ability to stimulate and transfer energy directly from within the muscle tissue, as opposed to other machines that transfer it from the outside.

This means reducing the pain threshold in the subject and accelerating recovery times during rehabilitation. The TK1 system allows you to select waveforms and frequencies, making the device the most versatile in the market. With TK1, tecartherapy can be transformed according to the different needs, varying frequencies and waveforms, and from time to time be as a different product, with extraordinary patient and operator safety systems.

Thanks to this electromedical unit, it is possible to check in real time the power supply based on the impedance, to make treatments in acute phases, minimizing the thermal effect and maintaining an adequate current flow of the tissues.



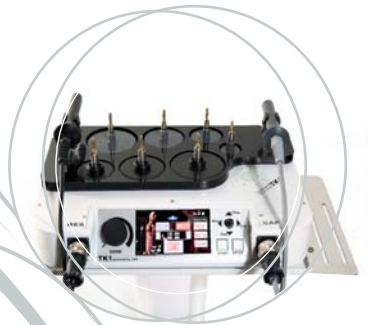
Strengths:

- Extremely light, portable and as big as a book
- Target reaching in a precise and accurate manner, thanks to the various modulation of waves and frequencies
- Separated capacitive and resistive mode
- Touch display and joystick, very functional when hands are covered by cream gel
- Safety and ease of use
- Many available accessories, such as professional carriages and bags
- Vocal Support

Compare it with the others on the market and personally verify the superior quality of the TK1!

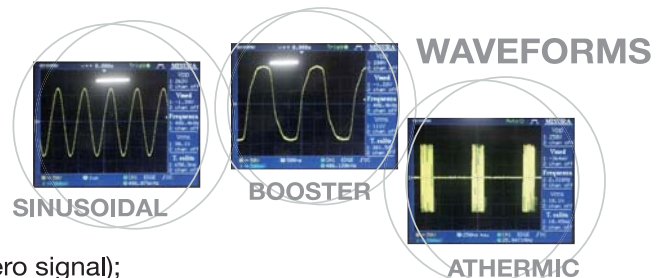
Physical Features:

- Very small dimensions (cm 36 x 26 x 5, weight 5,2 Kg), as a book;
- 12/10 steel case, impact resistant and shielded, complete with electromagnetic waves;
- Absolutely silent, with 7 fans controlled by a microprocessor;
- 7 electrodes of various dimensions:
 - 3 resistive steel electrodes with fast connection;
 - 4 capacitive electrodes with fast connection, realized in aluminum, covered with biocompatible alloy such as titanium prostheses and thus resistant to falls;
- Magnetic electrodes holder that fits exactly on the surface of the TK1;
- 2 dispersion plates:
 - 1 optional of medium dimension;
 - 1 large dimension;
- 2 transport bags:
 - 1 black tissue, for the transportation of the complete TK1;
 - 1 optional in faux leather, that allows both backpack transportation and the immediate use with the device still inserted, simplifying and speeding up the start of the treatment;
- Optional standard four-wheel cart with two shelves;
- Optional three-wheel design trolley with two shelves, particularly suitable for small or big Physiotherapy Centres.



Functional Features:

- Voice synthesis support at all stages of the treatment to get the most out of the results and minimize the risk of error;
- Class A Amplifier, to generate the purest waveform of sinusoidal wave;
- Maximum available power 600w. Maximum effective power 150 watt;
- Due modes of command settings:
 - Touch Screen with the visualization of all the parameters;
 - Joystick, very functional when hands are covered by cream gel (unique in the Italian market);
- Two waveforms:
 - Sinusoidal;
 - Square;
- Two functional frequencies:
 - 485 KHz;
 - 1 MHz;
- Two modes:
 - Standard;
 - Athermic (real athermic, emission 250 ms, 750 ms zero signal);
- Two Channels: resistive and capacitive, physically separated with two different connectors besides the plate, with different maximum tensions (real athermic mode);
- Measure and visualization in each moment of:
 - Required tension in the form of a mobile red bar;
 - Current absorbed by the patient in the form of a mobile yellow bar ;
 - Impedance by display in figures;
 - Real absorbed power by display in figures;
- Dedicated microprocessor for the control of the current, thus total protection from electrical discharges towards the patient and the operator in any kind of situation.



UNIK 4

An Entire Physiotherapy Centre in One Hand



Among the most widespread methodologies in the physiotherapy environment we can surely find Electrotherapy, Lasertherapy, Magnetotherapy and Ultrasoundtherapy. Each therapy is used for disturbs, pathologies, toning and/or muscle strengthening.

We therefore resort to one (or more) of these therapies to resolve situations ranging from simple bruises to tendonitis, sciatic nerve, strains and so on.

The UNIK4 - Multifunctional Device is designed for anyone wishing to own an entire Physiotherapy Center in one device. It is the most complete electro-medical device for physiotherapy, designed and engineered to treat and solve all those pathologies that currently require the use of various and expensive machines. The UNIK4 is indispensable as a reference point for all those wishing to use Physical Therapy on a professional level in any place, where the intervention of qualified and specialized personnel is required.

The UNIK4, with over 200 preset protocols, offers a range of programs designed specifically for every single need, no matter if it is of analgesic, rehabilitation or preparation nature.

This new frontier of technological innovation applied to the Physical Medicine allows the user to choose between four different methods: Lasertherapy, Magnetotherapy, Ultrasoundtherapy and Electrotherapy: the latter with separate outputs: two for impulse stimulation and one for Ionophoresis, Iontophoresis, Dyadinamiche. This is a device born from the clever combination of the newest technologies and, thanks to its micro-engineering, it is possible to use two different therapies at the same time, obtaining the desired results even faster than with any other existing apparatus. In fact, it is possible to use a therapy between Lasertherapy, Magnetotherapy and Ultrasoundtherapy, associating it with Electrotherapy (Pulsed or Continuous), with the possibility of exploiting more therapeutic combinations.

Strengths:

- Very small size and ease of transport - as big as a book
 - Weight lower than any other device - only 3 kg
 - 4 Usable methods, of which 2 can be used simultaneously
 - Over 200 preset protocols

Physical Features:

- Dimensions (of the apparatus, handle excluded): 280x195x97mm. (LxWxH);
- Weight of the apparatus: 3kg;
- Weight (complete with bag and applicators): 4900 grams;
- Power supply from the network
- Power supply with a separable cable: 230V ~ / 50Hz - maximum absorption 50VA

Description:

The UNIK4 looks like a parallelepiped developed in width, which is overlapped anteriorly by the control console, entirely covered by the membrane keyboard that groups all the commands and also encloses the transparent window of the LCD (backlit). On the lower side there is the plate containing all the identification data.

Functional Features:

Electrotherapy:

- 2 Independent Channels
 - Tens/iono/Dya/Kotz/biphasic pulses
 - Maximum exit 100 mA over 500 Ohm
- Iono duty-cycle 95%

Lasertherapy:

- Wavelength 904 nM
- 30 Watt peak power
- Pulses of 200 ns.
- Frequency up to 4000 Hz

Ultrasoundtherapy:

- Maximum Power 3W/cmq
- Mode: Continuous or Pulsed from 10/90%
- Watertight head
- Frequency 1 MHz

Magnetotherapy:

- Power from 0 to 100 Gauss
- Frequency 5/10/20/50/99 Hz
- Frequency scanning to avoid addiction
- 2 bearings with 2 solenoids each



USF1

CRYOSONIC



The therapy with cold ultrasound (also called cryoultrasound therapy), is a new therapy, of great effectiveness for the treatment of any kind of inflammation and pain. Together with the anti-inflammatory action of ultrasound, in fact, it is associated the analgesic, anti-edema and anti-pain action of cryotherapy (cold therapy).

How does cryoultrasound therapy work?

The anti-inflammatory, pain-relieving and anti-edema action is expressed due to various factors: the mechanical factor, represented by the "set in vibration" by ultrasounds of the treated tissue cells, thus determining a sort of "micro-massage" in depth; the thermal factor: the rise in temperature caused by ultrasound promotes vascularization and elimination of the molecules responsible for inflammation (toxic metabolites); however, the temperature increase occurs only at the surface level, subtracting the blood to the muscles and thereby obtaining hemostasis, (i.e stop of the leakage of blood), very useful after trauma; on the other hand, the action of cold, (which first causes vasoconstriction immediate, but then vasodilation by "vase paralysis), is essentially represented by an analgesic and relaxant effect; the chemical factor: ultrasounds accelerate the demolition of toxic metabolites responsible for inflammation; also, applying an ultrasound anti-inflammatory ointment, ultrasounds facilitate its penetration in the tissues, (thus increasing its effectiveness), with a technique called sonophoresis. The ultrasounds emission from the head may be continuous or intermittent; similarly, the operator may use the handpiece in a circular motion or simply holding it.

The Fisiocomputer USF1 is a medical device for physical therapy designed to match the delivery of ultrasound therapy at 1 MHz and cryotherapy (up to $-9,9^{\circ}\text{C}$).

The synergy of the two therapeutic techniques eliminates the contraindication of the ultrasound in acute and sub-acute traumas and in acute and sub-acute inflammatory states. The head of the cooled ultrasound, placed in correspondence of the lesion to be treated, causes an initial dermal vasoconstriction followed by a strong vasodilation, while in depth a circulatory decrease (hemostasis process) occurs. The decrease in temperature in the deep tissue also creates an increase in the density of the fabric itself, with an increase in the mechanical effect of ultrasound and with a completely canceled thermal effect. In the lesions and inflammation of the musculoskeletal system of the musculoskeletal system, the healing process is accelerated, with a faster recovery of the movement due to the rupture of the pain-inactivity spasm cycle. Therefore this technique is particularly indicated in sports rehabilitation, where the rapid recovery of an injured athlete is made possible because the USF1 allows to treat immediately both a recent trauma and an acute and subacute inflammatory state.

Strengths:

- Epicyclic function to simulate the circumference of the handpiece on the area to be treated
- Ability to treat multiple patients simultaneously
- 1 MHz ultrasound therapy and cryotherapy up to -9.9°C

Physical Features:

- Dimensions and weight:
External dimensions:
Ground print, arm excluded, 380 x 450 mm. (width x depth);
Height of the console at the top 1140 mm.;
Support shelf height 815 mm.;
Total weight: 73 Kg.;
Head diameter US: 62 mm.
- Materials used:
Ground base, upper shelf and console support: steel sheet 30/10;
Supporting frame: anticorodal corner profiles;
Control console: 12/10 steel sheet;
Side panels: 30/10 anticorodal sheet;
Articulated arm: aluminum profiles and light alloy castings;
Treatment head: AISI 304 steel applicator, medical PVC supports;
- Finishes:
Support frame: natural color anodization;
All other metal parts: RAL9006 fire painting;
Other non-metallic components: natural;
- Supply:
From urban power grid with IEC plug to rear panel;
Supplied with detachable mains cable with plug (Italian 19mm pitch.) 10A + T;
Mains supply: 230V ~ / 50Hz, maximum absorption: 660VA;
General mains fuses: 2xT6.3A (5x20);



Description:

The Fisiocomputer USF1 is a physical therapy device designed to deliver ultrasound combined with cryotherapy, combining in this way both the intrinsic advantage of directly applied cold to the tissues and that of the much greater tolerability of ultrasounds at low temperatures (therefore with the possibility of greater doses and consequent durations of the treatments much inferior). There is a floor unit (with four articulated wheels, two of them with brakes) on which the raised control console is mounted so as to leave the upper support surface free. On the left is fixed the support-base of the articulated arm (with three joints), which supports the Ultrasound treatment head. All connections to the head itself are contained in a flexible tube (of a special type for robotic applications) that protrudes from the body of the device immediately to the left of the support for the control console. Above the base frame, a shelf with folded up edges acts as a tray and / or shelf, and also contains, on the opposite side to the console of control, a sturdy bridge handle to facilitate the operations of movement / positioning of the apparatus. The power cord socket must be inserted into the IEC plug located on the rear panel (bottom). Next to the mains plug there are both the ignition light switch and the two mains fuse holders. In addition to the (detachable) mains cable and the treatment head cable (not detachable and contained in the aforementioned flexible sheath) there are not other cables and / or other connections (fixed or removable).

Technical Features:

- Emission Type: Continuous and pulsed (10/20/50/100 Hz);
- Emission frequency: 1 MHz;
- Transducer: Piezoelectric ceramics;
- Power density adjustable from 0.1 to 3.0 W / cmq;
- Cryotherapy: Adjustable up to -9.9°C;
- Delivery timer adjustable up to 60 'in steps of 1'.

Our Story

J&S was born in December 1973 with the aim of designing, producing and commercializing electronic devices.

1979 The activity focuses on medical devices, such as electrotherapies, and after that (1980) electromyography with the realization of a first model with wired logic and analog presentation on the screen, using for the first time in Italy, in this field, the microprocessor 6502.

1981 A new line of apparatuses for electrotherapy is produced (DYA10A, SM50, Farad2S). It presents very innovative characteristics (the DYA10A is the first automatic “dyadinamic” produced in Italy.).

1988 A second version of electromyography is made, this time with a microprocessor and possibility of examination of the nerves.

1990 A new set of equipment for physiotherapy with microprocessor is designed. Then the name “Fisiocomputer” is chosen and patented in 1992.

1991 It is the beginning of the sales of the model ET2 (electrotherapy with two outputs) and the entire line (complete with laser therapy, magnetic therapy, ultrasound) is presented to the Intersan in Milan.

1992 In 1992 began also a very important collaboration with the Italian Air Force, specifically with the flight test center (CSV), on the clinical situations of the pilot under different flight conditions. More details on the over twenty years old collaboration with the CSV are available on our Aerospace section.

1999 After three years of study and research, initially born in the field of oncology, the company receives the certification of an important machine for physical therapy: the Hyperthermia Fisiocomputer IP1.

2002 It is designed and optimized a new Bio Feedback. The production of Power Scanning Laser, the Fisiocomputer LTS Line, starts.

2004 It is certified the Multifunction Fisiocomputer UNIK4, which has a double output electrotherapy, magneto therapy, ultrasound therapy and laser therapy, each with the same power as the single products and with the possibility to set two therapies at the same time.

2005 It starts the production of the Proprioceptive Platform Fisiocomputer PDN1.

2007 The production of the cold ultrasound Fisiocomputer USF1 begins, with instant excellent results, thanks to its unique epicyclic function, that allows to simulate the convulsion of the handpiece on the treated area.

2008 The frequency laser technology called “neodimioyag” is adopted, diode source with frequency 1064Nm, that from that moment becomes a standard for the high level physio-therapy, leading to the development of the Laser Fisiocomputer LTS-60.

2013 Finalized the innovative Tecartherapy Fisiocomputer TK1, that includes top level elements, as a record of the experience and requests from the best italian professionals; the TK1 is a professional product that can also be portable and it carries many of the technologies that J&S has developed during the ten years partnership with the medical sector of the Italian Aeronautics.

2016 A new system for the Total Body proprioception is realized. Thanks to this product, the direct “3D Realtime” translation of the interested parts, makes it possible to make ROM test that are precise and accurate, complex exercises and an objective analysis of the rehabilitation course, based on numeral evidences.

PRODUCTS FISIOCOMPUTER

Elite Line

- BFB4 - Double Channel Biofeedback
- IP1 - Hyperthermia
- LTS-60 - Power Scanning Laser
- MOVESCAN - 3D Proprioception and ROM Test
- OMNIA31 - Articular Rehabilitator
- TK1 - Tecartherapy
- UNIK4 - Multifunctional Device for Physical Therapy
- USF1 - Cryosonic

Pro Line

- ET2 - Electrotherapy
- US1 - Ultrasound
- MG2 - Magnetotherapy
- TDR1 - Visual and Acoustic Reaction Time Meter



MARCATURA
CE
IMQ 184/MDD

CERTIFICATIONS

BUSINESS PARTNER

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