

FARMASONYC CARD

USER MANUAL

Instructions for use

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**WARNING: READ CAREFULLY THE
INSTRUCTIONS BEFORE USE**

Chap. 1 – PRESENTATION

FARMASONYC CARD belongs to the new line of electromedical equipment for physiotherapy and beauty care. It is small, easy to use and versatile – these are the main features of this innovative line of products.

1.1 – What is FARMASONYC CARD ?

Unceasing research in the field of medical devices has led to the creation of this new system for ultra-sound therapy, consisting of the FARMASONYC CARD generator. In order to ensure the user the utmost **reliability and safety** in compliance with the current Safety Rules of Medical Devices, this generator carries out control tasks, while the CARDS – small electronic cards to be fitted into it - make it possible to generate Ultra-sounds for therapy and beauty treatment and for treating pathologies (wounds, accidents, illness) and aesthetic problems (cellulitis, skin affections). The memorized programs can be updated at any time, and new ones can be set; this, plus the technological innovation and the ease of use make it an **extremely versatile and innovative** product in the electromedical appliance business.

1.2 – Why use the FARMASONYC CARD ?

FARMASONYC CARD houses inside itself all the technology needed to generate ultrasounds and modulate their parameters, through the use of pre-set programs contained in its Card memory and through setting new programs in order to adapt the sessions to the individual patients or to personal requirements. Thanks to FARMASONYC CARD, therefore, ultrasounds can be applied using standard programs and then, later on, by monitoring the effects and the trend of the therapy, one can make new ones, customizing the parameters according to the patients' needs.

1.3 – Whom is FARMASONYC CARD addressed to ?

The most suitable fields for FARMASONYC CARD to express its full potential are medicine (especially physiotherapy) and beauty treatment. However, thanks to its ease of use, it can be used by physicians, by rehabilitation therapists and professional beauticians, but also by anybody who wants to take care of his or her own physical well being at home, thanks to the ease of use and the versatility of the product.

Chap. 2 – INDICATIONS / CONTRAINDICATIONS

This Chapter lists the main situations where the use of ultrasounds is advisable, and the restrictions on the use of this therapy.

2.1 – Indications

The most common pathologies treated by ultrasounds are those involving the bone, muscle and tendon system; they are especially indicated for the treatment of:

- periostitis;
- tendinitis;
- arthrosis;
- muscular contractures;
- scarring;
- organized oedemas.

Ultrasounds today also have proven validity in the treatment of such extra-articular rheumatological alterations as **scapulothoracic periarthritis**, elbow epicondylitis and other pathologies, thanks to their anti-pain, fibrolytic and decontracting effect.

The structures involved suffer their main traumas especially during physical activity; however, in many cases, they may also be due to aging (rheumatisms, muscular hypotrophy, lack of balance due to little movement); these cases are increasing steeply due to the progressive rising of the average age, not accompanied by a suitable improvement of the quality of life.

In sports, the most frequent traumas affect the articulations of the knee and the ankle and can be cured by ultrasounds through daily applications, repeated in several sessions. The treatments are especially performed for anti-pain purposes and are preparatory for kinesitherapy sessions.

2.2 – Contraindications

Ultrasounds have the same contraindications as any physical media which act through endogenous production of heat:

- degenerative osteoporosis;
- presence of metal fragments;
- varicose veins
- acute thrombosis and thrombophlebitis;
- obliterative arteriopathies haemorrhages;
- menstruations;
- neoplasms;
- tuberculosis;
- acute inflammatory processes;
- skin injuries;
- altered sensitivity.

During applications with ultrasound techniques, use on the following is not advisable:

- specialized tissues (fertile metaphysis, testicles, ovaries), since they could suffer damage;

- avoid use in the neighbourhood of the heart, especially if there are any electro-mechanical appliances (pace-maker), since this could damage them permanently.

Special precautions should be taken when carrying out applications on the rachis of patients with a diagnosis of laminectomy, for possible damage to the spinal medulla.

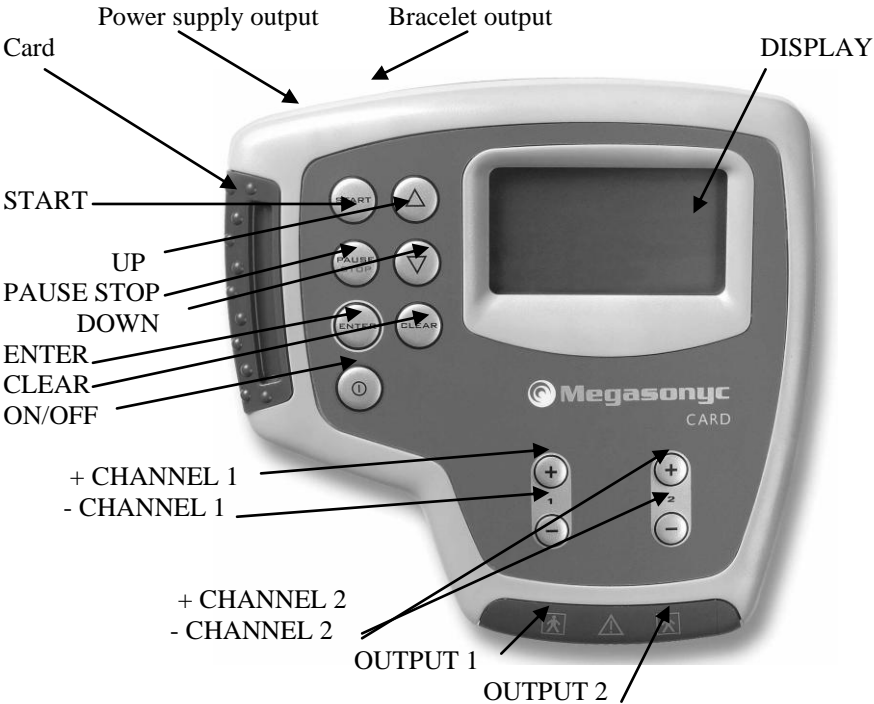
No applications must be made in the immediate neighbourhood of the eyes or the uterus (abdomen/lumbar area) in case of pregnancy, due to the risk of provoking cavitation, even with a proper dosage.

The presence of articular prostheses and metal synthesis media may cause problems, since they can absorb a higher amount of ultrasounds and thus deteriorate or damage the adjacent tissues.

Use of such physical therapy is not advisable when treating pathologies of young people, especially children (e.g. fertile conjugation cartilage).

The staff performing the operations must not be exposed for too long a time to the action of ultrasounds, since this could cause lesions (the so-called “ultrasound illness”).

Chap. 3 – OPERATION



SUMMARY:

ENTER: confirms the selection and goes over to the next Menu

CLEAR: deletes or goes back to the previous Menu

UP: moves the cursor up / increase the Timer

DOWN: moves the cursor down / decrease the Timer

START: starts the program (the Timer decreases)

PAUSE STOP: interrupts the program (pressing once) or stops it (pressing twice)

(I) = ON/OFF: turns the device on/off

+/- (1): increases/decreases the intensity in output 1 or the value of the parameter

+/- (2): increases/decreases the intensity in output 2 or the value of the parameter

3.1 – Connect the head

Before turning the device on, connect the head to the output socket of the device via the connector. To introduce the connector, turn it so that the connections coincide with the output socket; once you have introduced it, screw it all the way down in order to fasten the cable firmly to the device.


3.2 – Turn on the device

In order to turn FARMASONYC CARD on, press the button (I) – ON/OFF. The display will show a welcome message, with the name of the Card which has been introduced, and the Selection Menu screen will appear.

WARNING: do not turn the device on without a Card inside it. To replace the Card which is inside, turn the device off first.

3.3 – Select the program type

On the selection Menu use the UP/DOWN keys to choose the frequency you want to use (1/3 MHz) or else the USER item (free programs stored in memory) and press ENTER to confirm.

NOTE: if the USER Menu is empty, the symbol  (wrong operation) will appear.

3.4 – Choose the Mode

Confirm USER to move directly over to the list of stored programs and select the right one using the UP/DOWN + ENTER keys; on the other hand, if you choose 1 or 3 MHz, you will go over to the Mode Menu, i.e. to choosing the PRESET Mode (to use a pre-set program) or else to the FREE mode (to set a free program - see the Chapter FREE PROGRAMS).

3.5 – Choose the program

On the program selection Menu, choose the kind of program you want to use with the UP/DOWN keys; repeat the operation on the following menus, choosing the kind of treatments you want, and always press ENTER to confirm. If two heads are connected to the device at the same time, for example a free one and one connected to the mechanical arm (accessory – not included), the display will show the choice Channel 1/Channel 2. After the latter selection, the words “Press START Welcome” will appear.

3.6 – Start

Press START to begin; the intensity of the stimulation will start from 0 so you must set it using the + key of the Channel you are using, pressing it several times or else keeping it pressed until you achieve the power of emission you want. The minimum increment of intensity is 0.1 W/cm² and the maximum intensity you can set is 3.0 W/cm².

NOTE: if no head has been fitted into the device at the START time, the display will show the words “Insert the head” until it is inserted, then it will start up again automatically. To go back to the previous Menu, press PAUSE STOP.

3.7 – Intensity regulation

Use the + and – keys of the used Channel to set the intensity of emission. Generally speaking, it stays constant throughout the duration of the program; however, in case of pain or overheating of the area being treated, you must diminish the intensity using the – key or else break off the therapy.

NOTE: during the program it is possible to increase or decrease the Timer by pressing UP/DOWN keys (one minute for each touch).

3.7.1 – Contact control

To detect the contact between head and skin, fasten the bracelet in the patient's wrist and in the back output of the device. If the head does not adhere perfectly to the treating area or to the mean of transmission (gel, water in immersion) the device will let out an acoustic signal and interrupt the program; adjust the contact to continue.

3.8 – End/interruption of the therapy

The stimulation will stop automatically as soon as the Timer reaches 0 and the end of program acoustic signal will go off; if you want to break off the program before the end, press the PAUSE key: once to make a pause (to continue, press START and reset the previous intensity), twice to stop the program and go back to the selection phase. You can now start again, choose another program or else – if the session is over – turn the device off.

3.9 – Turn off the device

To turn the device off, keep the (I) – ON/OFF key pressed for a few seconds.

3.10 – Symbols on display

The following symbols may appear on the bottom line of the display during the selection, setting or performance of the programs.



- ERROR: wrong operation during the setting of the free programs



- BATTERY STATE: charge level of the battery



- USER: choosing the stored free programs

Chap. 4 – APPLICATION TECHNIQUES

There are different techniques of application for ultrasound therapy; they are usually performed in one of two ways: direct or indirect contact.

4.1 – Direct contact method

With this technique, the head comes directly into contact with the skin through a medium allowing both surfaces to adhere perfectly to each other (e.g. gel for ultrasounds, provided together with the device); during direct contact the head may be:

- **fixed** – in order to treat a very limited surface, holding the head firmly down on the area affected by hand or by the mechanical arm (not provided together with the device) which allows the operator to devote himself to other patients until the end of the program;
- **mobile** – in order to treat a large surface, making small movements, backward and forward or else circular, throughout the area to be treated. This technique is used to treat large flat and regular surfaces.

Note: if the surface to be treated is very small and/or hard to reach, we suggest you use a smaller head (see Accessories).

4.2 – Indirect contact method

The indirect method consists of applying a medium between the head and the skin for transmitting the ultrasound waves (usually water). This way the number of vibrations which reaches the skin becomes uniform. This is used to treat body areas with an irregular surface (hands, feet), which are hard to reach and do not permit perfect adhesion between the two surfaces (head of the head and skin). To perform the application, use a rather deep basin, full of water, and immerse the body part you want to treat entirely in the water together with the head; direct the flat surface of the head towards the area you want to work on, from a distance of about 10 to 15 cm, and then start the therapy.

NOTE: full colour pictures with examples of the applications (therapy / beauty) appear in the attachment to the centre of the manual; in any case, before applying ultrasound therapy, check the contraindications and refer to a physician or a professional beautician.

Chap. 5 – THERAPY

Ultrasound therapy has long been used to treat certain pathologies which can benefit from the effects of mechanical vibrations: chronic pathologies, phlogosis, oedemas, etc. This chapter lists the techniques of application and certain examples on how to carry out ultrasound therapy sessions in order to cure these pathologies through use of the FARMASONYC CARD programs.

5.1 – Preset programs

FARMASONYC CARD has 18 **preset programs**, i.e. with all the parameters memorized and ready to use, plus 7 new therapy programs for superficial pathologies with 3 MHz frequency. The various available programs are subdivided according to the kind of tissue being treated:

- 1) **Bone tissue**: programs which deliver ultrasounds with the most common parameters for the treatment of pathologies affecting the bone structure and related structures.
- 2) **Articulations**: preset programs for the therapy of the main problems affecting articulations and cartilages.
- 3) **Muscles**: specific programs for the therapy of pathological or traumatic situations affecting the muscles, due to physical activity or to daily life;
- 4) **Tendons**: programs of various kinds for carrying out therapy sessions applied to the tendon structures, to muscle-tendon insertions and to bursae containing synovial fluid.

5.2 – List of preset programs

1 MHz THERAPY Program

Program Type	No.	Name of the program
Bone tissue pathologies	1	Bone atrophy
	2	Callus
	3	Ossification lag
	4	Osteitis and Periostitis
Articulation pathologies	5	Arthritis-Arthrosis
	6	Articulation stiffness
	7	Sprains
	8	Lumbago
Muscle pathologies	9	Myalgia
	10	Pangs
	11	Strains
	12	Contractures
	13	Bruises

Program Type	No.	Name of the program
Tendon pathologies	14	Tenosynovitis
	15	Tenovaginitis
	16	Epicondylitis
	17	Periarthritis
	18	Bursitis

3 MHz Therapy Programs (new*)

Program Type	Name on display	Timer	Power	Freq. Mod.
Superficial pathologies	Sprains	10	1,5 W	Continue
	Strains	10	1,5 W	Continue
	Contractures	8	1 W	Continue
	Oedemas	10	1 W	Continue
	Tenonitis	10	1 W	1/2
	Epicondylitis	10	1 W	1/2
	Cicatrization	10	1 W	Continue

NOTE (*): some 1 MHz therapy programs are available also with 3 MHz frequency for superficial pathologies (see table) except **Cicatrization** program, which is completely new and specific for skin scars, cuts, wounds, etc. For the use see 1 MHz Programs.

5.3 – Description of preset programs

The following tables describe the various preset programs, subdividing them according to the anatomic parts involved in the pathologies they were designed for. On each of the following tables, the first column shows the program on the display – so it can be identified immediately – together with its duration, while the second column contains explanations regarding the program and its applications.

NOTE: during the program it is possible to change the Timer with UP/DOWN keys.

Program Description Tables

PROGRAMS FOR BONE TISSUE	
These programs feature specific parameters for treating pathologies involving the bone structure and related structure. They must be used every day until the problem disappears.	
NAME ON THE DISPLAY	USE OF THE PROGRAM
Bone atrophy 10 minutes	This helps regenerate the bone through stimulation of the metabolism of calcium and local circulation.
Callus 8 minutes	This prevents the development of callus after fractures; it helps the physiological regeneration of the bone.
Osteitis and Periostitis 8 minutes	Treatment of phlogosis affecting the bone structures and the periostium covering it.
Ossification lag 10 minutes	This stimulates local metabolism and helps the regeneration of the bone, delayed by problems of circulation or other situations.

PROGRAMS FOR THE ARTICULATIONS

Programs for treating pathologies affecting the articulations and cartilages. They must be used every day until the problem disappears.

NAME ON DISPLAY	USE OF THE PROGRAM
Arthritis-Arthrosis 10 minutes	Treatment of phlogosis affecting the articular cartilages; it stabilizes the local metabolism and favours the afflux of the blood.
Articular stiffness 15 minutes	
Sprains 10 Minutes	Treatment of sprains; it diminishes pain and functional limitation.
Lumbago 10 minutes	Treatment of pain affecting the lumbar spinal chord; it diminishes pain and functional limitation.

PROGRAMS FOR MUSCLES

Programs for treating muscle problems of various kinds. They must be used every day until the problem disappears.

NAME ON DISPLAY	USE OF THE PROGRAM
Myalgia 10 minutes	Treatment of muscle pain; it warms the area being treated and favours the afflux of blood.
Pangs 6 minutes	Treatment of phlogosis affecting the articular muscles; it stabilizes the local metabolism and favours the afflux of the blood.
Strains 10 minutes	Treatment of phlogosis affecting the articular muscles; it stabilizes the local metabolism and favours the afflux of the blood.
Contractures 8 minutes	Treatment of muscle contractures; it warms up the affected area and favours the afflux of the blood which eliminates the metabolites.
Bruises 10 minutes	Treatment of muscular oedemas after bruises; it warms the affected area and helps to reabsorb the oedema.

PROGRAMS FOR TENDONS

Programs for the treatment of phlogosis to tendon structures, including bursae. They must be used every day until the problem disappears.

NAME ON DISPLAY	USE OF THE PROGRAM
Tenosynovitis 10 minutes	Treatment of phlogosis of the synovial sheath of the long tendons (e.g. fingers).
Tenovaginitis 10 minutes	Treatment of phlogosis of the wide and flat tendons (e.g. Achilles tendon).
Epicondylitis 10 minutes	Treatment of phlogosis of the insertion of the outside forearm muscles on the elbow (tennis elbow)
Periarthritis 10 minutes	Treatment of phlogosis of the tendons of the articulation of the shoulder (rotator cuff); this removes pain and allows you to get back the mobility of the arm.
Bursitis 10 minutes	Treatment of the phlogosis affecting the synovial bursae located between the tendons and the bones.

5.4 – Areas of application of the head

The following table shows some examples of application of the head on the main areas of the body affected by the most common kinds of pathology, to be carried out using the direct technique (mobile and fixed) and the indirect technique (by immersion).

DIRECT METHOD: MOBILE TECHNIQUE	
Area to be stimulated	Notes about the position of the head
Muscle	Move the head all over the surface of the muscle
Knee, ankle	Move the head over the hurting side of the articulation (if the pain is widespread, on the other side as well)
Back	Move the head over the hurting side of the back
Neck	Move the head over the back of the neck
Tendon (large)	Move the head backward and forward along the tendon
Shoulder	Move the head over the back of the shoulder


DIRECT METHOD: FIXED TECHNIQUE	
Area to be stimulated	Notes about the position of the head
Spinal chord	Place the head on the affected part of the back
Tendon (small)	Place the head on the inflamed tendon

INDIRECT METHOD: UNDERWATER	
Area to be stimulated	Notes about the position of the head
Hand	Immerse the head directed towards the hurting area
Foot	Immerse the head directed towards the hurting area

5.5 – Adjusting the power of emission

Adjusting the intensity of the vibrations is fundamental for the success of the ultrasound therapy program. The adjustment must differ depending on the kind of program being used, the technique of application and the features of the patient. The following table shows the initial adjustment of intensity, i.e. right after the START of the program, which can be increased during the program, in order to increase the effects, or else diminished in case of skin overheating or pain.

Initial intensity	Modulation
The power of emission must be set by the user and will change depending on the kind of application (see following table).	The power of emission may be modified: increasing by a few tenths (+ 0,1) to increase the effects of the therapy; diminishing the value in case of overheating of the treated area. (*)

 Should the power of emission which has been set, or its adjustment, lead to excessive heating or pain in the area being treated, you must immediately reduce the intensity of stimulation or else turn the application off.

Next table shows the intensities suggested for the most common applications:

Application	Suggested intensity
Ossification lag, articular stiffness, myalgia, epicondylitis, peri-arthritis	0.5 – 1 W/cm ²
Bruises, tenosinovitis, bursitis	1 – 1.5 W/cm ²
Arthritis - arthrosis, callus, lumbago, pangs, tenovaginitis	1.5 – 2 W/cm ²
Bone atrophy, osteitis – periostitis, sprains	2 – 2.5 W/cm ²

5.6 – Position to be kept during the sessions

During the ultrasound therapy programs, the ideal position is a relaxed one, with the body either supine or prone, depending on the area of application. This position must be kept throughout the duration of the session, in order to facilitate the effects produced by the vibrations, especially the flow of blood increased due to vascular expansion, as a consequence of the heating induced in the affected area.

Chap. 6 – BEAUTY TREATMENTS

Ultrasounds can also be used on the surface or below the skin to heal and treat certain pathologies of the skin and the derma. Also, steady application of such treatments can help local thinning and lead to a regression of cellulitis tissue.

6.1 – Preset programs

FARMASONYC CARD has **preset aesthetic programs**, i.e. programs with all the parameters memorized and ready for use. The various available programs are subdivided according to the kind of treatment to be performed:

1. **Cellulitis**: programs which deliver high frequency ultrasounds to treat cellulitis in the area where it tends to collect most (thighs, glutei, hips, abdomen...).
2. **Lymphatic draining**: preset programs for warming and stimulation of the circulation in areas with marked water retention and swelling.
3. **Local thinning**: specific programs to reduce fat accumulation in men (or in women without cellulitis) due to a sedentary lifestyle or to disorderly diets.
4. **Skin pathologies**: programs to be applied to the skin in order to cure various surface pathologies.

6.2 – List of preset programs

FARMASONYC Card has 15 different preset stimulation programs, subdivided according to the differentiations described in the previous section. The programs are listed in the following table.

Kind of Program	No.	Name of the program
Cellulitis	1	Localized oedematous cellulitis
	2	Localized flaccid cellulitis
	3	Localized compact cellulitis
	4	Diffuse oedematous cellulitis
	5	Diffuse flaccid cellulitis
	6	Diffuse compact cellulitis
Lymphatic draining	7	Localized lymphatic draining
	8	Diffuse lymphatic draining
Thinning	9	Local thinning
	10	Diffuse thinning
Skin pathologies	11	Boils
	12	Granulomas
	13	Warts
	14	Local dermatosclerosis
	15	Paravertebral dermatosclerosis

6.3 – Description of preset programs

The following tables describe the various preset programs, subdivided according to the kind of treatment they were designed for. Each of the following tables is set up as follows: the first column shows the program on the display, in order to facilitate identification, together with its length in minutes, whereas the second column contains the explanations about the program and the relevant kind of application.

NOTE: during the program it is possible to increase or decrease the Timer by pressing UP/DOWN keys.

CELLULITIS	
Programs for treating every kind of cellulitis. They can be used every day until the problem disappears.	
NAME ON DISPLAY	USE OF THE PROGRAM
Localised oedematous cellulitis 10 minutes	Treatment of localized and clearly limited cellulitis: it breaks down the fat, frees the fluids which are being withheld and facilitates local circulation and lymphatic draining.
Localised flaccid cellulitis 12 minutes	Treatment of localized and clearly limited cellulitis: it breaks down the fat, frees the fluids which are being withheld and facilitates local circulation and lymphatic draining.
Localised compact cellulitis 15 minutes	Treatment of localized and clearly limited cellulitis: it breaks down the fat, frees the fluids which are being withheld and facilitates local circulation and lymphatic draining.
Diffuse oedematous cellulitis 20 minutes	Treatment of diffuse cellulitis; it breaks down the fat, frees the fluids which are being withheld and facilitates local circulation and lymphatic draining.
Diffuse flaccid cellulitis 25 minutes	Treatment of diffuse cellulitis; it breaks down the fat, frees the fluids which are being withheld and facilitates local circulation and lymphatic draining.
Diffuse compact cellulitis 30 minutes	Treatment of diffuse cellulitis; it breaks down the fat, frees the fluids which are being withheld and facilitates local circulation and lymphatic draining.

LYMPHATIC DRAINING	
Programs for treating water retention and widespread swelling. They can be used every day until all the excess fluids have been drained away.	
NAME ON DISPLAY	USE OF THE PROGRAM
Localized lymphatic draining 15 minutes	Treatment of water retention localized in certain clearly limited surface areas; it helps reabsorption of the lymphatic vessels and local circulation.
Diffuse lymphatic draining 20 minutes	Treatment of diffuse water retention in certain body areas; it helps reabsorption of the lymphatic vessels and local circulation.

THINNING

Programs for treating the accumulation of fat in men and in women without cellulitis. They can be used every day until the desired goals have been achieved.

NAME ON DISPLAY	USE OF THE PROGRAM
Local thinning	Treatment of deposits of fat localized in certain well defined body areas; it helps to dissolve the adipose cells and reabsorb the fats through local circulation.
20 minutes	
Diffuse thinning	Treatment of deposits of fat spread through various body parts (e.g. men's waists); it helps to dissolve the adipose cells and reabsorb the fats through local circulation.
30 minutes	

SKIN PATHOLOGIES

Programs for superficial beauty treatments and skin pathologies. They can be used every day until the problem disappears.

NAME ON THE DISPLAY	USE OF THE PROGRAM
Boils	Programs for the treatment of boils.
8 minutes	
Granulomas	Programs for the treatment of granulomas.
4 minutes	
Warts	Programs for the treatment of warts.
8 minutes	
Local dermatosclerosis	Programs for the treatment of local dermatosclerosis.
6 minutes	
Paravertebral dermatosclerosis	Programs for the treatment of paravertebral dermatosclerosis.
6 minutes	

6.4 – Head application areas

The following table shows some examples of application of the head on the main areas of the body affected by the most common aesthetic problems, to be carried out using the direct technique (mobile and fixed).


DIRECT METHOD: MOBILE TECHNIQUE	
Area to be stimulated	Notes about the position of the head
Arms	Move the head over the back of the arm and repeat the program on the other arm
Abdomen	Move the head over the whole surface of the abdomen
Hips	Move the head over one hip and then repeat the program on the other
Glutei	Move the head over the whole area affected by cellulitis
Thighs (inside/outside)	Move the head over the side affected by cellulitis

DIRECT METHOD: FIXED TECHNIQUE	
Area to be stimulated	Notes about the position of the head
Skin	Rest the head against the affected skin part

6.5 – Adjusting the power of emission

Adjustment of the intensity of vibration is a basic component for the success of the ultrasound therapy program and differs according to the type of program being used, the technique of application and the features of the patient. The following table shows the initial adjustment of intensity, i.e. right after the START of the program, which can be increased during the program, in order to increase the effects, or else diminished in case of skin overheating or pain.

Initial intensity	Modulation
The power of emission must be set by the user and will change depending on the kind of application (see following table).	The power of emission may be modified: increasing by a few tenths (+ 0,1) to increase the effects of the therapy; diminishing the value in case of overheating of the treated area. (*)

 Should the power of emission which has been set, or its adjustment, lead to excessive heating or pain in the area being treated, you must immediately reduce the intensity of stimulation or else turn the application off.

This table shows the intensities suggested for the most common applications:

Application	Suggested intensity
Boils, granulomas, dermatosclerosis (loc./paravert.)	1 – 1.5 W/cm ²
Loc. oedem./flacc. cell., Loc. lymph. draining	1.5 – 2 W/cm ²
Comp. loc. cell., Comp. oedem./flacc. cell., Diff. lymph. draining, Loc. thinning	2 – 2.5 W/cm ²
Comp. diff. cell., Diff. thinning, Warts	2.5 – 3 W/cm ²

6.6 – Position to be kept during the sessions

During the ultrasound therapy programs, the ideal position is a relaxed one, with the body either supine or prone, depending on the area of application. This position must be kept throughout the duration of the session, in order to facilitate the effects produced by the vibrations, especially the flow of blood increased due to the vascular expansions, as a consequence of the heating induced in the affected area, thus facilitating the draining of the freed substances (fats, excess fluids).

6.7 – Integrated thinning program

To achieve the best results from the body thinning and modelling program, we suggest you integrate different methods: along with ultrasounds, which produce localized effects, it is good practice to carry out aerobic exercise (fast walking, cyclette/cycle, slow running or Aerobics or spinning in a gym) plus a controlled and regular **diet**, restricting hydrocarbons and drastically cutting down fat (sweets, fried foods, soft cheese). A very effective thing to do during local thinning sessions is to combine ultrasounds with **electrostimulation**, using specific beauty programs, CAPILLARIZATION and programs for firming and toning the more relaxed muscles.

Chap. 7 – FREE PROGRAMS

The free programs can be used to create new therapies or beauty treatments with the parameters chosen by the user.

7.1 – Setting

To access the setting of these programs, first choose the frequency of emission (1/3 MHz), then choose the FREE item and press ENTER to confirm. This way, you can access the screen of the Phases you want to set (from 1 to 3); you can select each Phase using the ARROW UP/ARROW DOWN keys (follow the order). Press ENTER to confirm and access the setting of the parameters; you can select each item using the ARROW UP/ARROW DOWN keys. To adjust the desired value, use the + and – keys of the Channel 1 or 2. The values which are available for the parameters of the free programs are summarized on the following table.

NAME ON DISPLAY	KIND OF PARAMETER	SETTABLE VALUE
Emission	Frequency Modulation	CNT (continuous), 1/2, 1/5, 1/10
Time	Duration of the program	1-30 minutes
Stop	Stop the phase	YES/NO

The following table shows some guidelines for setting parameters properly in the free protocols: the first column shows the available parameters with the relevant settable values, while the second column shows the areas they belong to and the relevant kind of application.

FREQUENCY OF EMISSION (f)	KIND OF APPLICATION
1 MHz	Therapeutic
3 MHz	Beauty
FREQUENCY MODULATION (EM)	TECHNIQUE USED
CNT (continuous)	Indirect, direct mobile
1/2, 1/5, 1/10 (throbbing ON/OFF)	Fixed
DURATION OF THE PROGRAM (Timer)	USE
Up to 5 min	Warming, blood afflux
5 to 15 min	Anti-pain, relaxing effect
15 to 30 min	Lipolysis, lymphatic draining

Following are some examples of free program for the most common applications:

1 MHz (therapy)

Example 1: therapeutic program with direct mobile technique:

EM – CNT **Timer** – 15 **Stop** – YES

Example 2: therapeutic program with direct fixed technique:

EM – 1/2 **Timer** – 10 **Stop** – YES

Example 3: therapeutic program with indirect technique:

EM – CNT **Timer** – 20 **Stop** – YES

3 MHz (beauty)

Example 4: beauty program with direct mobile technique:

EM – CNT **Timer** – 20 **Stop** – YES

Example 5: beauty program with direct fixed technique:

EM – 1/2 **Timer** – 15 **Stop** – YES

The last item to the bottom on the set-up Menu is End of Selection. Press ENTER to confirm in order to exit the setting up of the parameters and to go back to the Phases Menu. You can now set a new Phase or – if the set-up is over – scroll down using the ARROW DOWN key and select one of the following operations:

- **start the program** (RUN + ENTER) and press START;
- **memorize the program** (MEMO + ENTER) and key in the name you want (up to 16 characters), choosing the letter using the + and – keys and moving the cursor onto the following letter via the ARROW UP/ARROW DOWN keys. Press ENTER to memorize the name and all the parameters you set;
- **exit the free program** (ESC + ENTER) without memorizing the parameters.


7.2 – Using and changing a free program

Once it has been memorized, a free program can be used again as a normal, preset program, and then changed to adapt its parameters to the development of the treatment or else deleted to free memory. In order to access the free programs, on the Selection Menu press ENTER at the item USER and then use the ARROW UP/ARROW DOWN keys to choose the program, always pressing ENTER to confirm. The Run Menu is displayed inside the selected program and here you can carry out the following operations:

- **start the program** (RUN + ENTER) and press START;
- **modify the program** (MODIFY + ENTER), changing the value of the parameters (using the + and – keys) and repeating all the set-up operations;
- **delete the program** (DELETE + ENTER).

Chap. 8 – BATTERY

FARMASONYC CARD is supplied by an internal rechargeable 12 V – 1.8 Ah Ni-Mh battery, which – under normal conditions of use – has an autonomy of a few hours. The guaranteed autonomy depends on the kind of emission being used.

 To identify the battery and the power supply provided with the appliance, refer to the chapter on “Technical specifications”. The power supply and the battery must be replaced only by expert staff who must only use the equipment provided by the manufacturer.

8.1 – Charge indication

When the FARMASONYC CARD is being supplied by the inside battery, the symbol bar on the display will show the BATTERY symbol "■".

Legend:

- - Battery charged
- - Battery run out

Intermediate charge is shown by partial darkening of the BATTERY symbol "▒".

As soon as a condition of run out battery appears on the display, you should start the recharging cycle. To protect the battery, FARMASONYC CARD is provided with a system for turning itself off: if you do not recharge when the battery has run out, an acoustic signal advises the user and turns the device off.

8.2 – Recharge

To recharge the FARMASONYC CARD battery, connect the power supply to the back of the appliance and to the power source.

When the recharge starts, the battery symbol on the display will start to fill and empty continuously. **Leave the instrument charging until the battery symbol appears as completely full on the display (■);** charging will take at most two hours' time.

As soon as charging has been completed, you can disconnect the power supply from the power source and use the FARMASONYC CARD with battery supply.

8.3 – Maintenance suggestions

The life of a rechargeable battery depends on the number of charging/discharging cycles it has undergone and on how these cycles are performed. Following is some advice on how to prolong the life of the battery:

- if you do not use the FARMASONYC CARD frequently, we suggest you charge the battery once a month.
- To prolong the battery life, we suggest you let it run out as completely as possible (see battery run out symbol).

8.4 – Replacement

You can tell when the battery is running out by seeing how long it lasts after a normal recharge. If you notice that the duration of the battery is considerably less than it was when new, you must replace it. To replace the battery, refer to an authorized **Service Centre**, which can replace the battery preserving the safety of the appliance and dispose of the old battery.



Do not reverse the polarity of battery connections, as this will lead to the destruction of the electronic circuits.

8.5 – Caution

- (1) Do not throw the battery away with ordinary waste; deliver it to the staff authorized to dispose of it.
- (2) Do not open the battery or throw it into a fire.
- (3) Do not short circuit the terminals.
- (4) Avoid provoking sparks or flames above or around the battery.
- (5) If any material leaks from the battery and touches the skin or clothes, wash at once using water. If the material touches the eyes, wash with a lot of water and call a doctor at once.

Chap. 9 – MAINTENANCE

The following **routine maintenance** must be performed so the appliance can work regularly and in a safe condition, even long after the date of purchase.

9.1 – Head

The head and the connecting cable must be checked regularly in order to make sure there are no cracks which the conductor fluid (water, gel) can leak into; also, the head must be cleaned **after each application** using a damp cloth and dried before storing.

9.2 – Appliance and /or power supply

In order to clean both the power supply and the appliance, we suggest you use a damp cloth. **Never use any liquid, since they are not protected against their penetration (IP20).**

9.3 – Replacing the power supply

It is good practice to constantly check the state of wear of the insulation (cover and cables) of the power supply before connecting it to the power mains. If it has been damaged, even in part, replace the power supply at once.

Immediate maintenance: New Age Italia or staff authorized by New Age Italia must perform immediate maintenance if:

- the appliance has been submitted to outside mechanical stress, such as serious falls;
- the appliance has been subject to strong overheating, for example if it is left near intense heat sources;
- one suspects that fluids may have leaked into the appliance;
- the power supply, the cover or any other part of the appliance is damaged, broken or missing;
- the operation of the device appears to be altered.



For safety purposes, do not work with any other accessories (for example heads or power supply) different from those provided together with the appliance.



Maintenance, functional control and monitoring the compliance with the safety regulations EN60601-1 on medical appliances – carried out using a secur-tester – must be performed once a year. The working life of the instrument is guaranteed by the company only if such maintenance is performed regularly.

IMPORTANT NOTICE: Service should be performed only by New Age Italia or by the specialized personnel appointed by New Age Italia. For maintenance purposes, the device may be sent directly to the company service laboratories or else delivered to the dealer it was purchased from.

Service Centre:

NEW AGE ITALIA srl

Via De Brozzi, 3 - 48022 Lugo (RA)

Tel:+39-0545.32019 – Telefax: +39-0545.369028

Website: www.newageitalia.it e-mail: info@newageitalia.it

Chap. 10 – SYMBOLS



CLASS II DEVICE



BF TYPE DEVICE

















WARNING, REFER TO ENCLOSED DOCUMENTATION



THIS DEVICE HAS CE MARKING ACCORDING TO THE EEC DIRECTIVE
93/42.

O476

Chap. 11 – WARNINGS

-  Always use the head which has the same serial number as the device.
-  Pay special attention when using the head, in order not to compromise the effectiveness of the treatment.
-  Use the appliance only with wiring systems which comply with current Safety Regulations.
-  The appliance enjoys safety class IP20 (see the chapter on “Technical specifications”). It should not be used in the immediate neighbourhood of fluids, since it is not protected against their entry.
-  You should not use cellular phones in the immediate neighbourhood (keep them at least a few metres away).
-  Do not operate near (for example at a distance of 1 metre) a short wave or microwave therapy appliance, as this could make the stimulator output unsteady.
-  Never connect the patient simultaneously to the FARMASONYC CARD and to an HF surgical appliance, in order to prevent danger both to the patient and to the appliance.
-  The instrument will work according to specification if the environment is kept at a temperature between 5° and 40° C and humidity less than 80%. The same conditions must be respected during transport and storage.
-  In case of faults or problems, the instrument should be sent only to the manufacturer.
-  Never work near any flammable substances.
-  Never use any kind of gel or accessories different from those provided with the device.
-  It is of the utmost importance to advise the patient about what he or she will feel during the therapy, so as to be able to act immediately, turning the session off via the instrument controls or else taking away the head if there is the wrong kind of perception.
-  If the power of emission which has been set or its adjustment cause excessive heating or pain in the treated area, you must immediately reduce the intensity of stimulation or else turn the application off.
-  Keep it out of reach of children.

Chap. 12 – TECHNICAL SPECIFICATIONS

The following sections list all the specifications of the FARMASONYC CARD and of the material provided with it. This information should be kept in mind, especially when replacing certain components, such as spare parts or accessories.

12.1 – Power supply

Power supply: Brand. Alpha Elettronica Mod. SW25418 -28 in

PRI: 230V~ 50Hz SEC: 18V- 1.4A 25.2VA max

Internal supply: Rechargeable Ni-MH 12V-1.8Ah battery

12.2 – Output specifications

Max power intensity (P): 3 W/cm²

Frequency (f): 1/3 MHz

Modulation degree: 100%

Modulation waveform: continuous or throbbing ON/OFF (1/2, 1/5, 1/10)

Modulation frequency: 2 Hz

12.3 – Other specifications

> Size: 175x165x100h [mm] Weight: 1 [Kg]

> Class: II Type: BF

> Classification in terms of fluid entrance: IP20

> Safe when there are flammable anaesthetic gases present: it does not belong to categories AP or APG

> Appliance designed to run: continuously

Manufactured according to the following standards:

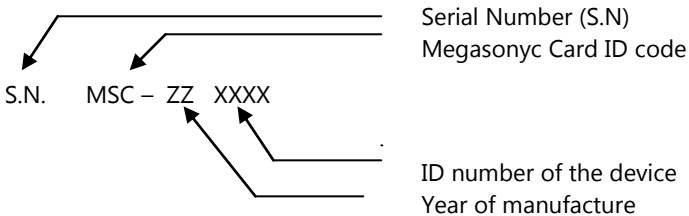
> EN 60601-1 (1998) – Electromedical appliances: General safety regulations

> EN 60601-1-2 (1998) – Collateral regulation: electromagnetic compatibility – Prescriptions and tests

> EN 60601-1-4 (1994) – Collateral regulation: Programmable electromedical systems

> EN 60601-2-5 (2001) – Electromedical appliances: special regulations on safety of the ultrasound therapy appliances

> CEI 62-84 (IEC487) – Symbols for electromedical appliances



Chap. 13 – BASIC EQUIPMENT AND ACCESSORIES

13.1 – Basic equipment

Device

1/3 MHz Ø 45 mm head

Professional Card

Battery charger

Gel for ultrasounds

User manual

Instrument case

13.2 – Accessories and expendable materials

Gel for ultrasounds

Head Ø 20 mm

Chap. 14 – BIBLIOGRAPHY

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