CHINESE TRADITIONAL MEDICINAL COMPOSITION FOR STRENGTHENING BONES AND LIGAMENTS, RELIEVING ACHES AND PAINS, AND ENERGIZING THE LIVER AND KIDNEYS, AND METHOD OF MANUFACTURING SAME, AND USES OF SAME

BACKGROUND OF THE INVENTION

1. The Field of the Invention

The present invention relates to traditional Chinese medicinal (TCM) compositions, and to their therapeutic use of relieving aches and pains, for energizing kidneys and liver, for strengthening bones and ligaments, and for benefiting joints. The term “energizing” means producing and stimulating energy that affects the physical condition and/or the mental condition of a person. The “benefiting of the joints” means managing the joint points to disperse stagnating fluids and blood as well as to help repair damaged tissues

The present invention relates, more particularly, to traditional Chinese medicinal compositions, which comprise water extracts prepared by extraction and cooking of naturally occurring or cultivated herbs that are known to have medicinal benefits, and to methods for making the aforesaid traditional Chinese medicinal compositions, and to methods of use thereof.

2. The Description of the Related Art

Herbs growing in the wild and cultivated on farms have been used for centuries, especially in China, for their nutritional and medicinal properties. Herbal supplements have been prepared from individual herbs and mixtures of herbs to strengthen various systems and organs in the body and to improve mental processes as well as overall feelings of well-being of individuals. Traditional Chinese Medicines (TCM) prepared with individual herbs and herbal mixtures have been used to treat diseases and conditions of the human body, such as blood problems, clot formation leading to stroke, hardening of the arteries, kidney problems like urinary incontinence, memory loss due to aging, erectile dysfunction, diabetes, aches and pains of the lower back, and even various forms of Cancer.

Traditional Chinese Medicines (TCM) prepared with mixtures of herbs and herbal dietary supplements aimed at improving the performance and longevity of organs and systems in the human body are now recognized as having effective properties and are marketed and used worldwide. Natural product chemists study traditional Chinese medicinal compositions prepared from herbs using modern analytical tools, such high performance liquid-phase chromatography (HPLC) for separation of components of ingredients and visible and UV spectroscopy, to identify and characterize

the active chemical compounds responsible for the benefits provided by of these products.

Known traditional Chinese medicinal compositions and dietary supplements are often in the form of liquids, e.g. teas, prepared by liquid phase extraction methods to obtain effective water extracts of the roots and rhizomes of wild and natural herbs.

Traditional Chinese medicinal compositions in liquid form can be prepared from the roots, stems, and other parts of herbs by known processes including decoction, which in many cases comprises cooking and extracting with water, and then separating the liquid extract from the residual solid matter to eventually obtain the water extract of the solid parts of the herbs, which contains the therapeutically active ingredients.

After a water extract containing the active ingredients is first obtained from the herbal mixture by cooking and extraction, a second extraction process may be performed to obtain another portion of the water extract from the solid residual parts of the herbal mixture remaining after the first extraction. This procedure may be repeated several times in a typical decoction and then the several portions of water extract thus obtained may be combined prior to adding the auxiliary ingredients.

Dietary supplements or medicinal compositions are known and marketed for strengthening bones and preventing Osteoporosis. For example, Dura-Bone® Formula marketed by Wellness Living contains a mixture of powdery or solid herbal ingredients in capsules for oral administration. The capsules contain a mixture of the following herbal ingredients: Rehmannia Root Tuber, Dong Quai Root, Drynaria Rhizome, Siegesbeckia Stems & Leaves, Eleuthero Root & Rhizome, Sichuan Teasel Root, Eucommia Bark, Loranthus Stems & Leaves, Fo Ti Stems & Leaves, and Astragalus Root.

Another product for strengthening bones is known as “Strong Bones” and is marketed by Dragon Herbs®. This product comprises capsules for oral administration, which each contain a mixture of Chinese herbal ingredients, specifically Eucommia bark, Drynaria Rhizome, Dipsacus Root, Morinda root, and Dragon Bone. It also provides benefits for the kidney and liver according to the manufacturer.

In some cases the treatment according to Chinese Traditional Medicine has been found to be superior to the corresponding treatment according to Western medical practice, for example the treatment for diminished ovarian reserve (DOR) that is used to improve pregnancy rates (see Tian Xia, et al, in Chinese Herbal Medicines, Volume 6, Issue 2, May 2014, pp.

93-102, available via world wide web at http://www.sciencedirect.com/ science?_ob=ArticleListURL&_method=list&_ArticleListID).

For a comprehensive evaluation of one Chinese Herbal Medicine see the review article entitled “Comprehensive Evaluation of Powdered Chinese Herbal Medicines -- An Exemplification of *Isatidis Radix*”, by Xue Han, in Chinese Herbal Medicines, Volume 8, Issue 3, July 2016, pp. 286-292.

SUMMARY OF THE INVENTION

An object of the present invention is to provide a new traditional Chinese medicinal (TCM) composition to be marketed as a medicinal composition or food supplement for treatment of individuals suffering from aches and pains, especially of the joints, and/or for energizing the kidneys and liver, and/or for strengthening bones and ligaments, and/or for benefiting joints.

It is a further object of the invention to provide an efficient and economical method for manufacturing the new traditional Chinese medicinal (TCM) composition for treating individuals suffering from aches and pains, especially of the joints, and/or for energizing the kidneys and liver, and/or for strengthening bones and ligaments, and/or for benefiting joints according to the present invention.

It is an additional object of the present invention to provide a new liquid herbal extract of a mixture of naturally grown herbal drugs according to the present invention for administration to individuals suffering from aches and pains, especially of the joints, and/or to energize the kidneys and liver of individuals, and/or to strengthen bones and ligaments, and/or for benefiting joints, of healthy persons.

The present invention selects and combines the following herbal ingredients: Arillus Longan, Rhizoma Cibotii, Radix ET Rhizoma Clematidis, Radix Morindae Officinalis and Cortex Eucommiae, to provide a traditional Chinese medicine in which the combination of these active medicinal ingredients exhibits a synergistic effect multiplying their effectiveness in treating kidney and liver problems and relieving aches and pains, especially of the lower back. In addition, Arillus longan is known to protect blood vessels and treat atherosclerosis. Radix Morindae Officinalis is known for the treatment of liver and kidney deficiency type weaknesses, the wasting of tendons and bones and for soreness and pain in the lower back and knees. Rhizoma Cibotii and Cortex Eucommiae are known for strengthening bones, esp. the spine, and tendons; they are indicated for tonifying liver and kidneys and are known to be effective for treating urinary incontinence and lower back sore due to kidney problems. Radix ET Rhizoma Clematidis is indicated for combating numbness of the

limbs, spasms of the tendons and vessels, and difficulty of flexing and extending.

The above-stated objects, and others which will be made more apparent hereinafter, are attained in a traditional Chinese medicinal (TCM) composition for treatment of individuals suffering from aches and pains, especially of the joints, and/or for energizing kidneys and liver, and/or for strengthening bones and ligaments, and/or for benefiting joints, which comprises a liquid extract, preferably an aqueous extract, of a herbal mixture of Arillus Longan, Rhizoma Cibotii, Radix ET Rhizoma Clematidis, Radix Morindae Officinalis and Cortex Eucommiae. The aqueous or water extract may be obtained by a process including solvent extraction of the herbal mixture with water to directly obtain the water extract or by decoction techniques or by,an alternative process comprising solvent extraction with an organic solvent, such as ethyl alcohol followed by further processing the resulting liquid abstract to obtain a water extract. In addition, pharmaceutically acceptable auxiliary additives, such as preservatives, may be added to the water extract to form the traditional Chinese medicinal (TCM) composition, prior to packaging and marketing it.

In various embodiments the herbal mixture used to prepare the aforesaid water extract contains from about 3 to about 90 parts by weight of Arillus

Longan, from about 2 to about 64 parts by weight of Rhizoma Cibotii, from about 1 to about 150 parts by weight of Radix ET Rhizoma Clematidis, from about 1 to about 140 parts by weight of Radix Morindae Officinalis, and from about 0.5 to about 100 parts by weight of Cortex Eucommiae.

In preferred embodiments the traditional Chinese medicinal (TCM) composition includes a water extract of the aforesaid herbal mixture and a preservative, such as sodium benzoate. In some embodiments the preservative is the only auxiliary additive included in the composition.

In other embodiments at least one antioxidant and aspartame may be included in the water extract to prepare the traditional Chinese medicinal composition in addition to the preservative. The auxiliary agents for the liquid composition of the invention may also include ingredients selected from surfactants, diluents and color-imparting ingredients, which are known to be pharmaceutically acceptable in pharmaceutical compositions.

The above-stated objects, and others which will be made more apparent hereinafter, are also attained in a traditional Chinese medicinal (TCM) composition for treatment of individuals suffering from aches and pains, especially of the joints, and/or for energizing kidneys and liver, and/or for strengthening bones and ligaments, which comprises, or is made from, an aqueous liquid concentrate made by decoction of an herbal mixture of the

following herbal ingredients for the therapeutic purposes described herein: Arillus Longan, Rhizoma Cibotii, Radix ET Rhizoma Clematidis, Radix Morindae Officinalis and Cortex Eucommiae. In addition, the pharmaceutically acceptable auxiliary additives, such as preservatives, may be included in the aqueous liquid concentrate, prior to packaging and marketing.

For the purposes of this application the term “decoction” means an herbal preparation created by boiling herbs, including bark, roots, medicinal mushrooms, and hard non-aromatic seeds, in a liquid, usually water. The liquid extract may of course be concentrated by removing a portion of liquid used to prepare the extract, or may be diluted by adding additional liquid to the abstract.

The objective of the decoction preparation is to obtain, in a usually aqueous solution, the soluble active principles of herbal matter that is hard and woody and has a close, dense texture. Thus, the extract obtained by decoction will have the fully effective medicinal properties available in the herbal matter.

The liquid concentrate of the invention containing the therapeutically effective active compounds extracted from the solid herbal material may be prepared by cooking a herbal mixture of Arillus Longan, Rhizoma

Cibotii, Radix ET Rhizoma Clematidis, Radix Morindae Officinalis and Cortex Eucommiae in water, and then straining or filtering the resulting mixture of herbs and water to obtain the water extract without any solid matter, and subsequently heating to concentrate the water extract to obtain a liquid concentrate.

In various embodiments the herbal mixture used to prepare the water extract of the present invention may contain from about 3 to about 50 parts by weight of Arillus Longan, from about 2 to about 55 parts by weight of Rhizoma Cibotii, from about 3 to about 94 parts by weight of Radix ET Rhizoma Clematidis, from about 7 to about 33 parts by weight of Radix Morindae Officinalis, and from about 0.5 to about 55 parts by weight of Cortex Eucommiae.

A new method of treating an individual suffering from aches and pains, especially of the joints, is also part of the present invention. This method of treatment according to the invention preferably includes oral administration of a liquid concentrate, which is obtained by decoction, or extraction with water followed by concentration of the liquid extract, of an herbal mixture of about 4 to about 40 parts by weight of Arillus Longan, from about 3 to about 50 parts by weight of Rhizoma Cibotii, from about 1 to about 90 parts by weight of Radix ET Rhizoma Clematidis, from about 1

to about 90 parts by weight of Radix Morindae Officinalis, and from about 0.5 to about 95 parts by weight of Cortex Eucommiae.

A new method of strengthening bones and ligaments, and/or for benefiting joints, is also part of the present invention. This method of treatment according to the invention preferably includes oral administration of a liquid concentrate obtained by decoction, or extraction with water followed by concentration of the liquid extract, of an herbal mixture of about 4 to about 40 parts by weight of Arillus Longan, from about 3 to about 50 parts by weight of Rhizoma Cibotii, from about 1 to about 90 parts by weight of Radix ET Rhizoma Clematidis, from about 1 to about 90 parts by weight of Radix Morindae Officinalis, and from about 0.5 to about 95 parts by weight of Cortex Eucommiae. For example, administration may include oral administration of a measured dosage, e.g. 50 ml, of the liquid extract twice daily.

A new method of treating a patient or an individual to energize liver and kidneys, especially to treat urinary incontinence, is also part of the present invention. This method of treatment according to the invention preferably includes oral administration of a liquid concentrate, which is obtained by decoction, or by extraction with water followed by concentration of the liquid extract, of a mixture of about 4 to about 40 parts by weight of Arillus Longan, from about 3 to about 50 parts by

weight of Rhizoma Cibotii, from about 1 to about 90 parts by weight of Radix ET Rhizoma Clematidis, from about 1 to about 90 parts by weight of Radix Morindae Officinalis, and from about 0.5 to about 95 parts by weight of Cortex Eucommiae. For example, administration to a patient may include oral administration of a measured dosage, e.g. 50 ml, of the liquid extract twice daily to the patient or the individual.

Definitions

The term “Arillus longan” (Chinese name: Long Yan Rou) means the dried fruit of the Longan plant. Arillus longan has long been known as a food article, because of its sweet, exotic flavor, but also as a source of medicinal ingredients. These medicinal ingredients are used in treatments generally for improving Qi and also for treating hardening of the arteries, aging-caused deficiencies, cancers such as cervical cancer, and Shigella. Arillus longan grows in Asia, particularly China.

In addition, other modern compositions and treatments in which Arillus longan are described in the following US Patent Applications: US 2017/0071996 (memory deficiencies), US 2016/0199431 (fatigue) and US 2010/0173007 (skin conditions).

The dried pulp of the longan fruit contains a 79.77% soluble fraction, 19.39% an insoluble material, and 3.36% ash. Its soluble fraction contains glucose 26.91%, sucrose 0.22%, acids (mainly tartaric acid) 1.26%, and adenine, choline and other nitrogen-containing substances 6.309%. In addition, it still contains 5.6% protein, fat impurities and residual shell.

The term “Rhizoma Chibotii” (Chinese name: Guo ji) obtained from the Chibotium barometz plant) means an elongate somewhat subterranean plant stem that often has food material connected with it, i.e. it’s a dried rhizome. This herbal ingredient is known to be useful for treating kidney and liver deficiencies that cause stiffness or soreness in the lower back or lower extremities, and also urinary incontinence, spermatorrhea and vaginal discharge. The plant source of the Rhizoma Chibotii in the Yunnan, Guangxi and Zhejiang provinces of China (for more information, see https://tcmwiki.com/wiki/rhizoma-cibotii).

The term “Radix Morinda Officinalis” means the dried root of the Morinda officinalis plant, family Rubiaceae. It is also known as Ba ji tian (Pinyn name). The Morina officinalis plant primarily grows in Guangdong, Guangxi and Fujian provinces of China.

Traditional Chinese medical treatments for kidney deficiencies, aches and pains in the lower back, erectile dysfunctions, and menstruation disorders

and weakness of bones and ligaments utilize medicinal compositions and preparations made from the dried root of the Morinda officinalis plant, i.e. from “Radix Morinda Officinalis”.

The term “Radix ET Rhizoma Clematidis” means the dried root and rhizome of Clematis Chinensis Osbeck or Clematis Manshurica, Rupr. (Ranunculaceae). Its Chinese phonetic name is Weilingxian. The root and rhizome may be obtained by collecting them in autumn, removing clinging soil, and then drying them under the sun to obtain Clematidis Radix et Rhizoma.

Water extracts of “Radix ET Rhizoma Clematidis” have been found to contain the steroid derivatives: hederagenin, oleanolic acid and clematichinenoside AR by HPTLC (high performance thin layer chromatography).

The term “Cortex Eucommiae” means the dried stem bark of Eucommia ulmoides Oliv., (Eucommiaceae). Its Chinese name is Duzhong. This natural product may be collected from April to June. Usually the coarse outer portion of the bark is removed and piled up for 5-7 days until the inner surface becomes purplish-brown, then dried under the sun to obtain the Cortex Eucommiae. Flat pieces, or the two edges somewhat curved inward, vary in size and are 2 to 7 mm thick. A water extract of this herbal

ingredient contains not less than 0.10 % of pinoresinol diglucoside, based on dry weight of this herbal ingredient.

Cortex Eucommiae is used for Chinese medicinal compositions that strengthen bones, esp. the spine, and tendons and tonifies liver and kidneys (treats urinary incontinence and lower back sore due to kidneys). It is often included in medicinal compositions with Rhizome Chibotii for these purposes.

According to a further aspect of the present invention the aforesaid objects, and others which will be made more apparent hereinafter, are also attained in a method of manufacturing a traditional Chinese medicinal composition for treatment of individuals suffering from aches and pains, and/or for energizing the kidneys and liver, and/or for strengthening bones and ligaments, and/or for benefiting joints, which comprises

a) selecting respective amounts of Arillus Longan, Cortex Eucommiae, Radix ET Rhizoma Clematidis, Radix Morindae Officinalis and Rhizoma Cibotii in proportions that are sufficient to provide a therapeutically effective traditional Chinese medicinal (TCM) composition for treatment of individuals suffering from aches and pains and/or for energizing the kidneys and liver, and/or for strengthening bones and ligaments, and/or for benefiting joints;

b) extracting the above-named herbal ingredients in step a) with water under reflux to obtain an aqueous liquid extract of the aforesaid active ingredients and optionally separating the liquid extract from any remaining solid matter;

c) optionally concentrating the extract by heating to reduce a volume thereof by removing a portion of water, as needed, and thus to obtain an aqueous concentrate from the liquid extract; and

d) adding auxiliary additives, such as a preservative like sodium benzoate, to the liquid extract or aqueous concentrate in amounts sufficient for their respective purposes, in order to obtain a final product, which is the therapeutically effective traditional Chinese medicinal composition for treatment of individuals suffering from aches and pains, and/or for energizing the kidneys and liver, and/or for strengthening bones and ligaments, and/or for benefiting joints.

In some embodiments of the aforesaid method, the extracting and optionally concentrating comprise heating an aqueous herbal mixture comprising water, preferably purified water such as distilled water, and the Arillus Longan, Cortex Eucommiae, Radix ET Rhizoma Clematidis, Radix Morindae Officinalis and Rhizoma Cibotii herbal mixture to boiling, refluxing, and subsequently reducing the heating to reach cooking temperatures of from 70^{o}C to 80^{o}C, and then cooking the mixture at those cooking temperatures, and finally separating a water extract from the

residual solid matter by solvent extraction techniques, to obtain the water extract or an aqueous concentrate by further processing to remove water from the water extract.

In some embodiments the separating of the liquid extract from remaining solid matter comprises straining or filtering the mixture of the aforesaid herbal ingredients and water to obtain the water extract and a solid or semisolid precipitate.

The process of extraction and optional concentration described in the above paragraphs may be repeated in further embodiments using the solid or semisolid precipitate obtained by the straining or filtering in place of the initial mixture of five herbal ingredients to obtain another liquid extract portion, which may be then combined with the first liquid extract in order to obtain additional product.

Alternatively instead of extracting the herbal mixture as defined above with water, it may be extracted with a volatile organic solvent in order to obtain active chemical species, which are difficult to extract with water. In these embodiments the volatile solvent is then driven off by heating to totally remove it leaving an herbal precipitate consisting of solid chemical species or compounds. After that the herbal precipitate may be mixed with water to dissolve the water soluble active ingredients in the herbal precipitate. Optionally the solution of active ingredients may be concentrated by removing a portion of water to obtain a concentrate or the

water may be removed by a process such as heating or vaporization to provide solid medicinal composition or a powder for marketing.

Alternatively, in various embodiments the preparation process of the traditional Chinese medicinal composition according to the present invention may include the steps of:

a) weighing the following Chinese herbal ingredients as raw materials: from about 3 to about 90 parts by weight of Arillus Longan, from about 2 to about 64 parts by weight of Rhizoma Cibotii, from about 1 to about 150 parts by weight of Radix ET Rhizoma Clematidis, from about 1 to about 140 parts by weight of Radix Morindae Officinalis, and from about 0.5 to about 100 parts by weight of Cortex Eucommiae; and

b) extracting the above crude herbal ingredients with alcohol and/or water under reflux to obtain a liquid extract, and adding auxiliary additives, such as a preservative, to subsequently produce various dosages.

Alternatively, the preparation process of the traditional Chinese medicine composition according to the present invention may include the steps of:

a) raw materials preparation, in which the materials are prepared according to the above-described mixture composition, and wherein the above-described herbal mixture is put into a cloth bag;

b) extraction and concentration, in which the materials prepared according to step a) are soaked in water for a sufficient time, and then

decocted for 1-3 times with heating, the liquid extracts are combined and filtered, the liquid filtrate is concentrated to an appropriate level, the liquid concentrate is left to cool down, the impurities therein are then removed by ultracentrifuge, and the resulting concentrate is ready for use; and

c) formulation preparation, in which the concentrate obtained from step b), alone or with added pharmaceutically acceptable auxiliary agents, is put in a dosage form by conventional pharmaceutical techniques.

DETAILED DESCRIPTION OF THE INVENTION

In order to provide a better understanding of the spirit of the present invention, the following examples of the methods of making and using the therapeutically effective water extract for treatment of individuals suffering from aches and pains, and/or for energizing kidneys and liver, and/or for strengthening bones and ligaments, and/or for benefiting joints are provided.

EXAMPLES

The following examples illustrate the above-described invention in more detail, but the details in these examples should not be considered as limiting the claims appended herein below by any means.

Example 1: Method of Preparation

The traditional Chinese Medicinal (TCM) composition for strengthening bones and benefiting joints and relieving aches and pains according to the present invention may be prepared according to the following method.

First the following herbal ingredients are selected according to the following recipe in Table I and properly mixed in the respective amounts listed in Table I with 3000 kg of purified water in a cooking vessel, preferably made of ceramic or steel, in which the resulting herbal mixture is to be cooked.

Table I. Herbal Ingredients and Mixture Composition

Ingredient	Source	Amount, kg
Arillus Longan	Jiangzhong Pharmaceutical	267 (42.8%)
Rhizoma Cibotii	same	126 (20.2%)
Radix Morindae Officinals	"	76 (12.3 %)
Radix ET Rhizoma Clematidis	"	76 (12.3 %)
Cortex Eucommiae	"	76 (12.3 %)

Next the above aqueous herbal mixture is heated to boiling in the cooking vessel and then after reaching a boil, the heating is reduced so that the

temperature of the aqueous herbal mixture reaches a cooking temperature between about 70°C to about 80°C.

After reaching the cooking temperature, the aqueous herbal mixture is cooked and concentrated at a cooking temperature within the range between about 70°C to about 80°C until enough of the water is removed or evaporates so that the water volume of the mixture is reduced to around 1000 kg. The removal of water, i.e. the concentrating, of the herbal mixture may be performed efficiently using liquid extraction and vacuum concentration equipment for aqueous media, in order to obtain a liquid concentrate, which is then separated, e.g. by decantation or filtering, from the residual solid or semisolid material in the mixture of herbal ingredients and water. Equipment for the aforesaid method is available from INORA Pharmaceutical Machinery Co., Ltd., Taiwan.

The various auxiliary ingredients, such as a preservative, preferably sodium benzoate, may then be added in respective amounts, which are effective for their purpose, to the liquid concentrate containing the effective ingredients for the above-described methods of treatment.

In a preferred embodiment of the Chinese Traditional Medicine the marketed composition only includes the added preservative and the extracted herbal ingredients – no other auxiliary ingredients are included.

Then the resulting traditional Chinese Medicinal (TCM) composition according to the invention, i.e. the aqueous extract or concentrate of effective ingredients with the auxiliary ingredients, may be bottled using a conventional GMP bottling process in accordance with “Guidelines on Good Manufacturing Practice Standard and Good Distribution Practice Standard”, 2017, by means of a conventional capping procedure to seal the individual bottles when they have been filed. The product is then ready for marketing.

The product will be marketed under trademark: Bone BioPro^{TM} by Health Domain Pte Ltd.

Example 2: Use of the traditional Chinese Medicinal Composition according to the Invention for Strengthening Bones, Benefiting Joints, and for Relieving Aches and Pains

The traditional Chinese medicinal (TCM) composition or the preparation of example 1 is indicated for strengthening bones and ligaments, relieving aches and pains and for benefiting joints. The traditional Chinese medicinal composition of example 1 can also be used to energize liver and kidneys. This preparation or medication is contraindicated for pregnant women.

The daily dosage of the traditional Chinese medicinal (TCM) composition or preparation of example 1 is 100 ml of the final product, i.e. the concentrate or extract with all auxiliary ingredients, such as the preservative, added.

The preferred method of administration of this traditional Chinese medicinal (TCM) composition is oral. The preferred dosage for this example is 50 ml of the final product of example 1 taken twice daily.

Table II. Composition of the Herbal Mixture from which an Individual 50 ml Dosage of the TCM is Prepared

Herbal Ingredient	**Amount, g**
Arillus Longan	13.38
Rhizoma Cibotii	6.3
Radix Morindae Officinals	3.8
Radix ET Rhizoma Clematidis	3.8
Cortex Eucommiae	3.8

While the invention has been illustrated and described as embodied in a Chinese traditional medicinal composition or preparation for strengthening bones and ligaments, for energizing kidneys and liver and for benefiting joints, a method of manufacturing same, and uses of same, it is not intended to be limited to the details shown, since various modifications and changes may be made without departing in any way from the spirit of the present invention.

Without further analysis, the foregoing will so fully reveal the gist of the present invention that others can, by applying current knowledge, readily adapt it for various applications without omitting features that, from the standpoint of prior art, fairly constitute essential characteristics of the generic or specific aspects of this invention.

What is claimed is new and is set forth in the following appended claims.

WHAT IS CLAIMED IS:

1. A medicinal composition comprising a water extract of a herbal mixture obtained by a process, said process comprising solvent extraction using water or an organic extraction solvent to obtain a liquid extract;

wherein said herbal mixture consists of Arillus Longan, Rhizoma Cibotii, Cortex Eucommiae, Radix ET Rhizoma Clematidis and Radix Morindae Officinalis.

2. The medicinal composition according to claim 1, wherein the organic extraction solvent is ethyl alcohol or methyl alcohol.

3. The medicinal composition according to claim 1, wherein the liquid extract is a water extract and the process further comprises obtaining an aqueous concentrate from the water extract by removing a portion of the water in the water extract.

4. The medicinal composition according to claim 1, further comprising at least one pharmaceutically acceptable auxiliary agent selected from the group consisting of preservatives, antioxidants, surfactants, diluents, aspartame and color-imparting ingredients.

5. The medicinal composition according to claim 1, wherein the herbal mixture consists of from about 9 to about 17 parts by weight of the Arillus Longan, from about 2.5 to about 4.4 parts by weight of the Rhizoma Cibotii, from about 1.7 to about 5.0 parts by weight of the Radix ET Rhizoma Clematidis, from about 1.7 to about 4.7 parts by weight of the Radix Morindae Officinalis, and from about 1.0 to about 7.0 parts by weight of the Cortex Eucommiae.

6. A method of relieving aches and pains, and/or for energizing kidneys and liver, and/or for strengthening bones and ligaments, and/or for benefiting joints, said method comprising administering a therapeutically effective dosage of a medicinal composition to a person for relieving the aches and pains, and/or for energizing the kidneys and liver, and/or for strengthening the bones and the ligaments, and/or for benefiting the joints,

wherein said medicinal composition is a water extract of a herbal mixture of Arillus Longan, Cortex Eucommiae, Radix ET Rhizoma Clematidis, Radix Morindae Officinalis and Rhizoma Cibotii, said water extract being prepared by solvent extraction techniques or decoction of said herbal mixture.

7. The method as defined in claim 6, wherein the therapeutically effective dosage is orally administered to said person at least once each day.

8. A method of making an herbal medicinal composition for treatment of individuals suffering from aches and pains, and/or for energizing kidneys and liver, and/or for strengthening bones and ligaments, and/or for benefiting joints, said method comprising the steps of:

a) selecting and mixing amounts of Arillus Longan, Cortex Eucommiae, Radix ET Rhizoma Clematidis, Radix Morindae Officinalis and Rhizoma Cibotii in respective proportions that are sufficient to provide a therapeutically effective traditional Chinese medicinal (TCM) composition for treatment of an individual suffering from the aches and the pains, and/or for energizing the kidneys and the liver, and/or for the strengthening of the bones and the ligaments, so as to form a herbal mixture; and then

b) extracting said herbal mixture with water to obtain a water extract and then separating the water extract from any remaining solid matter associated with the herbal mixture; and then

c) optionally concentrating the water extract to remove at least some of the water therein so as to obtain an aqueous concentrate; and

d) adding at least one pharmaceutically acceptable auxiliary additive to the water extract or the aqueous concentrate, said at least one auxiliary additive comprising a preservative in order to obtain said herbal medicinal composition.

9. The method according to claim 8, wherein the herbal mixture is made by mixing from about 134 kg about 801 kg of the Arillus Longan, from about 63 kg to about 378 kg of the Rhizoma Cibotii, from about 38 kg to about 228 kg of the Radix ET Rhizoma Clematidis, from about 38 kg to about 228 kg of the Radix Morindae Officinalis, and from about 38 kg to about 228 kg of the Cortex Eucommiae and the water extract is obtained by solvent extraction with from 1500 to 9000 kg of said water as extraction solvent.

10. The method according to claim 8, wherein the extracting of the herbal mixture with water comprises heating the herbal mixture and the water to boiling.

11. The method according to claim 10, wherein the extracting and the optionally concentrating comprises reducing the heating to reach cooking temperatures of from 70°C to 80°C after the heating of the water to boiling and cooking the herbal mixture at said cooking temperatures to remove a portion of the water and thus form the aqueous concentrate.

12. A therapeutically effective herbal medicinal composition for treatment of a person suffering from aches and pains, and/or for energizing the kidneys and liver, and/or for strengthening bones and ligaments, and/or

for benefiting joints, of the person, which comprises the water extract or the aqueous concentrate according to claim 8.

13. A method of treating a person suffering from aches and pains, and/or from kidney and liver conditions or deficiencies, and/or to strengthen bones and ligaments thereof, and/or for benefiting joints thereof, said method comprising daily oral administration of an effective amount of the medicinal composition according to claim 8.

14. A process for preparing a herbal medicinal composition for relieving aches and pains, and/or for energizing the kidneys and the liver of a person, and/or for strengthening bones and ligaments, and/or for benefiting joints, said process comprising the steps of:

a) preparing a herbal mixture of Arillus Longan, Cortex Eucommiae, Radix ET Rhizoma Clematidis, Radix Morindae Officinalis and Rhizoma Cibotii and putting the herbal mixture in a porous bag;

b) extracting the herbal mixture formed in step a) by soaking the porous bag containing the herbal mixture prepared in step a) in water for a sufficient time, then decocting at least twice with heating to obtain liquid extracts, combining and filtering the liquid extracts to obtain a combined extract, then concentrating the combined extract to obtain a liquid concentrate, and after the concentrating cooling down the liquid

concentrate and removing the impurities therein to obtain a purified liquid concentrate; and

c) formulating the herbal medicinal composition, said formulating comprising adding at least one pharmaceutically acceptable auxiliary agent to the purified liquid concentrate.

15. The process according to claim 14, wherein the removing of the impurities from the liquid concentrate occurs by ultracentrifuge.

16. The process according to claim 14, wherein the at least one pharmaceutically acceptable auxiliary agents are selected from the group consisting of preservatives, antioxidants, surfactants, diluents, aspartame and color-imparting ingredients.

17. The process according to claim 14, wherein the at least one pharmaceutically acceptable auxiliary agent is sodium benzoate, which acts as a preservative agent.

18. A therapeutically effective herbal medicinal composition for treatment of a person suffering from aches and pains, and/or for energizing the kidneys and liver of the person, and/or for strengthening bones and ligaments of the person, and/or for benefiting the joints of the person, which comprises the purified liquid concentrate according to claim 14.

19. A method of treating a person suffering from aches and pains, especially of the joints, and/or suffering from kidney and liver conditions or deficiencies, and/or in order to strengthen bones and ligaments thereof, and/or for benefiting joints thereof, said method comprising daily oral administration of an effective amount of the medicinal composition according to claim 14.