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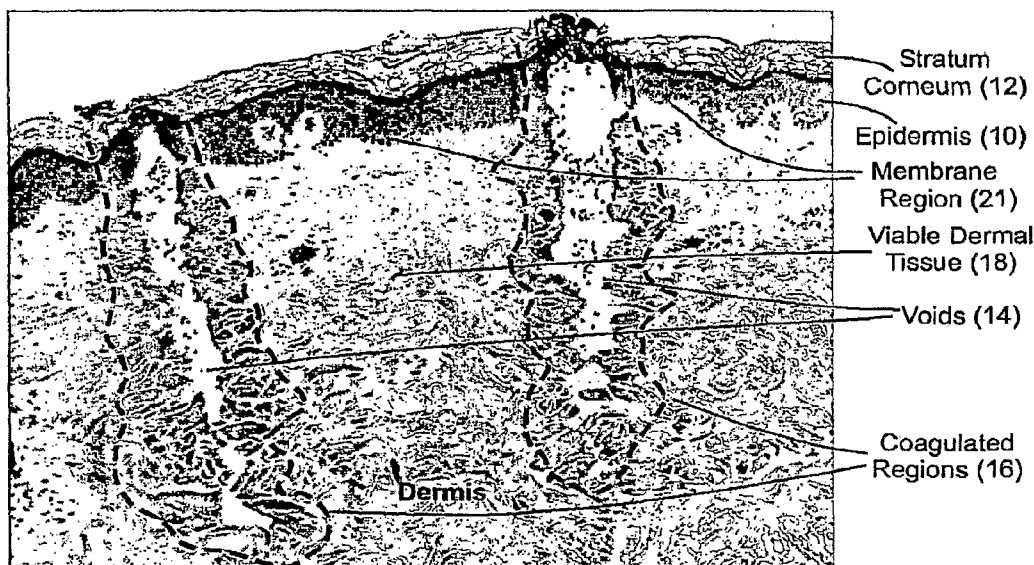
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60/773,192 13 February 2006 (13.02.2006) US
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- Published:  
— with international search report

[Continued on next page]

(54) Title: LASER SYSTEM FOR TREATMENT OF SKIN LAXITY



(57) Abstract: A method of reducing wrinkles in skin includes irradiating the skin with laser pulses to ablate an array of spaced apart voids in the skin. A region of coagulated tissue surrounds each of the voids and there is viable tissue between the coagulated regions. Tissue in the coagulated regions is in tension due to shrinkage of collagen by the heat generated during the ablation. This tension rapidly closes the voids, tightening the skin and reducing the wrinkles. A healing process replaces the coagulated tissue with new tissue after a period of about one-month. The method is also applicable to lightening abnormally pigmented skin, as the new tissue replacing the coagulated tissue is not abnormally pigmented.

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INTERNATIONAL SEARCH REPORT

International application No.  
PCT/US07/03694

A. CLASSIFICATION OF SUBJECT MATTER  
IPC(8) - A61B 18/18; A61N 5/06 (2007.01)  
USPC - 606/9; 607/89  
According to International Patent Classification (IPC) or to both national classification and IPC

B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)  
IPC(8) - A61B 18/18; A61N 5/06 (2007.01)  
USPC - 606/9; 607/89

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the international search (name of data base and, where practicable, search terms used)  
PatBase

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category*	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	US 6,881,212 B1 (CLEMENT et al) 19 April 2005 (19.04.2005) entire document	1-2, 7, 11, 17-19, 23, 28
Y		3-6, 8-10, 12-16, 20-22, 24-27
Y	US 2005/0049582 A1 (DEBENEDICTIS et al) 03 March 2005 (03.03.2005) entire document	3-6, 8-10, 13-16, 20-22, 24-27
Y	US 2005/0015077 A1 (KUKLIN et al) 20 January 2005 (20.01.2005) paragraph [0023]	12
X	US 2005/0154382 A1 (ALTSHULER et al) 14 July 2005 (14.07.2005) entire document	29, 34-35
Y		30-33, 36-37
Y	US 2001/0023351 A1 (EILERS et al) 20 September 2001 (20.09.2001) entire document	30-33, 36-37
Y	US 5,908,415 A (SINOFSKY) 01 June 1999 (01.06.1999) columns 5 and 6	36-37

Further documents are listed in the continuation of Box C.

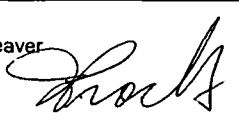
\* Special categories of cited documents:  
 "A" document defining the general state of the art which is not considered to be of particular relevance  
 "E" earlier application or patent but published on or after the international filing date  
 "L" document which may throw doubts on priority claim(s) or which is cited to establish the publication date of another citation or other special reason (as specified)  
 "O" document referring to an oral disclosure, use, exhibition or other means  
 "P" document published prior to the international filing date but later than the priority date claimed  
 "T" later document published after the international filing date or priority date and not in conflict with the application but cited to understand the principle or theory underlying the invention  
 "X" document of particular relevance; the claimed invention cannot be considered novel or cannot be considered to involve an inventive step when the document is taken alone  
 "Y" document of particular relevance; the claimed invention cannot be considered to involve an inventive step when the document is combined with one or more other such documents, such combination being obvious to a person skilled in the art  
 "&" document member of the same patent family

Date of the actual completion of the international search  
04 January 2008

Date of mailing of the international search report  
**22 FEB 2008**

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**INTERNATIONAL SEARCH REPORT**

International application No.

PCT/US07/03694

**Box No. II Observations where certain claims were found unsearchable (Continuation of item 2 of first sheet)**

This international search report has not been established in respect of certain claims under Article 17(2)(a) for the following reasons:

1.  Claims Nos.:  
because they relate to subject matter not required to be searched by this Authority, namely:
  
2.  Claims Nos.:  
because they relate to parts of the international application that do not comply with the prescribed requirements to such an extent that no meaningful international search can be carried out, specifically:
  
3.  Claims Nos.:  
because they are dependent claims and are not drafted in accordance with the second and third sentences of Rule 6.4(a).

**Box No. III Observations where unity of invention is lacking (Continuation of item 3 of first sheet)**

This International Searching Authority found multiple inventions in this international application, as follows:  
Group I, claims 1-28, drawn to a method of treating skin having irradiating the skin with laser radiation.  
Group II, claims 29-37, drawn to an apparatus for laser treatment of skin having a housing, a scanning apparatus, a lens and a tip.

1.  As all required additional search fees were timely paid by the applicant, this international search report covers all searchable claims.
2.  As all searchable claims could be searched without effort justifying additional fees, this Authority did not invite payment of additional fees.
3.  As only some of the required additional search fees were timely paid by the applicant, this international search report covers only those claims for which fees were paid, specifically claims Nos.:
  
4.  No required additional search fees were timely paid by the applicant. Consequently, this international search report is restricted to the invention first mentioned in the claims; it is covered by claims Nos.:

**Remark on Protest**

- The additional search fees were accompanied by the applicant's protest and, where applicable, the payment of a protest fee.
- The additional search fees were accompanied by the applicant's protest but the applicable protest fee was not paid within the time limit specified in the invitation.
- No protest accompanied the payment of additional search fees.