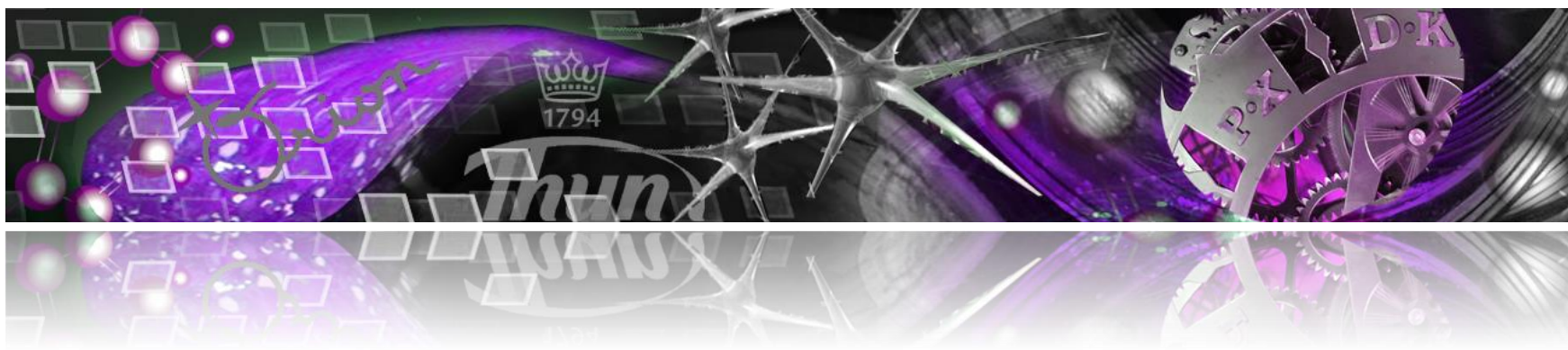





# USPTO ([www.uspto.gov](http://www.uspto.gov))

Hana Churáčková

Brno, MZK, 10. 4. 2019



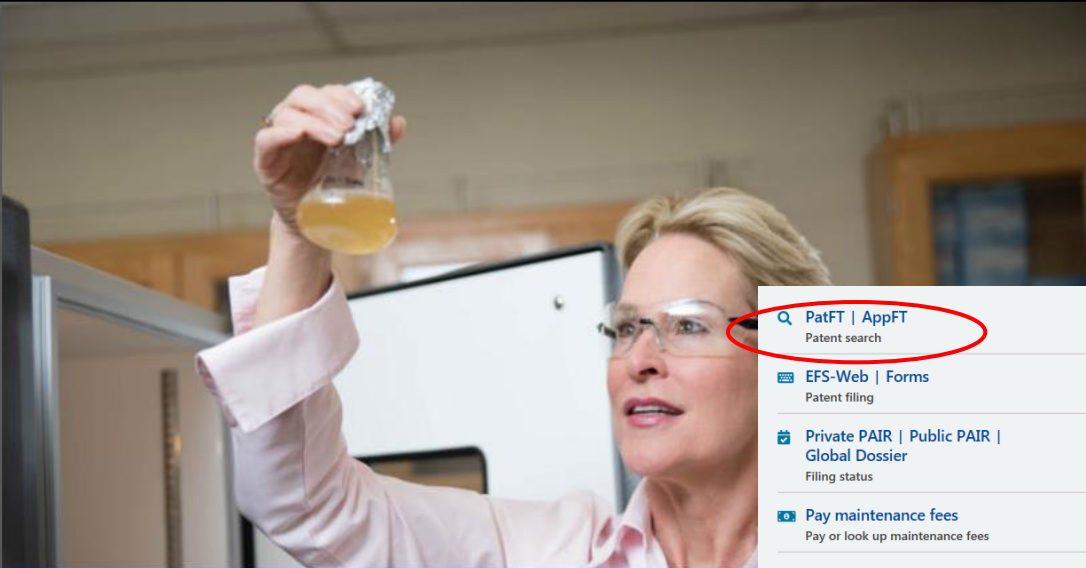
http://www.uspto.gov



UNITED STATES  
PATENT AND TRADEMARK OFFICE

[About Us](#) | [Jobs](#) | [Contact Us](#) | [MyUSPTO](#)

[Patents](#) | [Trademarks](#) | [IP Policy](#) | [Learning and Resources](#)



## Beyond the Nobel

Insights from the first American woman to win the Nobel Prize in chemistry

## Find It Fast

Quick links to applications and tools.

[Patents ▾](#)


[Trademarks ▾](#)


## New to IP?


Learn the basics of intellectual property.


[Patent basics >](#)


[Trademark basics >](#)


 **PatFT | AppFT**  
Patent search


 **EFS-Web | Forms**  
Patent filing

 **Private PAIR | Public PAIR | Global Dossier**  
Filing status

 **Pay maintenance fees**  
Pay or look up maintenance fees

 **PTAB**  
Patent Trial and Appeal Board

 **Search assignment | Record assignment**  
Search recorded assignment and record ownership changes


 **MPEP | Classification**  
Guides and manuals

Latest news

Public events

### Clara Barton and the success of American women

Op-ed by USPTO Director Iancu and Deputy Director Peter honors legacy of famous nurse and Patent Office clerk.



In [any] innovation ecosystem, intellectual property is a

# USPTO PATENT FULL-TEXT AND IMAGE DATABASE

[Home](#)[Quick](#)[Advanced](#)[Pat Num](#)[Help](#)[View Cart](#)

Data current through February 27, 2018..

Query [\[Help\]](#)

Term 1:  in Field 1:

Term 2:  in Field 2:

Select years [\[Help\]](#)

W

All Fields

Title

Abstract

Issue Date

Patent Number

Application Date

Application Serial Number

Application Type

Applicant Name

Applicant City

Applicant State

Applicant Country

Applicant Type

Assignee Name

Assignee City

Assignee State

Assignee Country

International Classification

Current CPC Classification

Current CPC Classification Class

Patents from 1790 through 1975 are searchable only by Issue Date, Patent Number, and Current US Classification. In the Patent Number field, utility patent numbers are entered as one to eight numbers in length, excluding optional, as are leading zeroes).

## Postup při provádění rešerše:

- Výběr časového období pro vyhledávání
- Zadání selekčního termínu (bez ohledu na velikost písmen)
- Výběr rešeršního pole
- Výběr operátoru – AND, OR, ANDNOT
- Provedení rešerše

Znak pro pravostranné rozšiřování: \$

Frázové vyhledávání: „vacuum cleaner“ (nelze použít \$)

Vyhledávání časových rozmezí:

např. Term 1: 11/1/1997 -> 5/12/1998 Field 1: Issue Date

# USPTO PATENT FULL-TEXT AND IMAGE DATABASE

[Home](#)[Quick](#)[Advanced](#)[Pat Num](#)[Help](#)[View Cart](#)

Data current through February 27, 2018..

[Query](#) [\[Help\]](#)

ttl/needle ANDNOT ttl/((record and player) OR  
sewing) AND apd/1/1/2000->12/31/2000

Examples:

ttl/(tennis and (racquet or racket))

isd/1/8/2002 and motorcycle

in/newmar-julie

[Select Years](#) [\[Help\]](#)

1976 to present [full-text] ▼

Search

Obnovit

Patents from 1790 through 1975 are searchable only by Issue Date, Patent Number, and Current Classification (US, IPC, or CIP).  
When searching for specific numbers in the Patent Number field, utility patent numbers are entered as one to eight numbers in length, excluding commas (which are used for design patents).

| Field Code | Field Name                                       |
|------------|--|
| PN         | <a href="#">Patent Number</a>                    |
| ISD        | <a href="#">Issue Date</a>                       |
| TTL        | <a href="#">Title</a>                            |
| ABST       | <a href="#">Abstract</a>                         |
| ACLM       | <a href="#">Claim(s)</a>                         |
| SPEC       | <a href="#">Description/Specification</a>        |
| CCL        | <a href="#">Current US Classification</a>        |
| CPC        | <a href="#">Current CPC Classification</a>       |
| CPCL       | <a href="#">Current CPC Classification Class</a> |
| ICL        | <a href="#">International Classification</a>     |
| APN        | <a href="#">Application Serial Number</a>        |
| APD        | <a href="#">Application Date</a>                 |

| Field Code | Field Name                        |
|------------|-----------------------------------|
| IN         | <a href="#">Inventor Name</a>     |
| IC         | <a href="#">Inventor City</a>     |
| IS         | <a href="#">Inventor State</a>    |
| ICN        | <a href="#">Inventor Country</a>  |
| AANM       | <a href="#">Applicant Name</a>    |
| AACI       | <a href="#">Applicant City</a>    |
| AAST       | <a href="#">Applicant State</a>   |
| AACO       | <a href="#">Applicant Country</a> |
| AAAT       | <a href="#">Applicant Type</a>    |
| LREP       | <a href="#">Attorney or Agent</a> |
| AN         | <a href="#">Assignee Name</a>     |
| AC         | <a href="#">Assignee City</a>     |
| AS         | <a href="#">Assignee State</a>    |

[Query](#) [\[Help\]](#)

ttl/needle ANDNOT ttl/((record and player) OR  
sewing) AND apd/1/1/2000->12/31/2000

**Results of Search in US Patent Collection db for:**

**((TTL/needle ANDNOT TTL/((record AND player) OR sewing)) AND APD/20000101->20001231): 213 patents.**

**Hits 1 through 50 out of 213**

Next 50 Hits



















Jump To

Refine Search

ttl/needle ANDNOT ttl/((record and player) OR sewing)

**PAT. NO.**

**Title**

- 1 [8,079,982](#)  [Injection catheter with needle electrode](#)
- 2 [8,025,673](#)  [Needle for use in reflexotherapy, and an applicator using the same](#)
- 3 [7,329,238](#)  [Safety needle medical bearing devices](#)
- 4 [7,201,731](#)  [Treatment device with guidable needle](#)
- 5 [7,128,280](#)  [Injection nozzle for internal combustion engines, which has an annular groove in the nozzle needle](#)
- 6 [7,090,656](#)  [Medical devices with retractable needle](#)
- 7 [7,070,583](#)  [Medical bevel needle](#)
- 8 [7,056,306](#)  [Fluid sampling device with retractable needle](#)
- 9 [7,048,718](#)  [Winged injection needle having needle covering means](#)
- 10 [7,014,622](#)  [Interchangeable needle safety syringe](#)
- 11 [6,783,509](#)  [Single-use needle-less hypodermic jet injection apparatus and method](#)
- 12 [6,749,595](#)  [Cement delivery needle](#)
- 13 [6,749,588](#)  [Catheter and introducer needle assembly with needle shield](#)
- 14 [6,743,206](#)  [Endoscopic needle](#)
- 15 [6,733,465](#)  [Holder for blood collection needle with blunting mechanism](#)
- 16 [6,730,061](#)  [Multiple hypodermic needle arrangement](#)
- 17 [6,719,721](#)  [Safety port needle assembly](#)
- 18 [6,712,793](#)  [Needle guard assembly for the needle of a syringe body](#)

[Home](#)[Quick](#)[Advanced](#)[Pat Num](#)[Help](#)

[Hit List](#)[Next List](#)[Previous](#)[Next](#)[Bottom](#)

[View Cart](#)[Add to Cart](#)

[Images](#)

United States Patent  
Mithiue , et al.

7,048,718  
May 23, 2006

Winged injection *needle having needle* covering means

Abstract

A winged injection needle having a needle covering means used at treatments for infusion solution, blood transfusion and extracorporeal blood circulation, characterized by comprising a puncturing needle tube (206), a hub (208) for holding the base end of the needle tube, and a hollow needle housing member for permitting the hub to displace by sliding and to be housed in the entirely in its lumen, and by being provided with an erroneous puncturing prevention means satisfying the following three conditions: (1) the injection noodle can be easily and safety housed after use, (2) its construction is simple and easy to handle to permit easy production at low costs, and (3) it can be safely disposed of.

|                         |  |
|-------------------------|--|
| Inventors:              | Mithiue; Tetutoshi (Hirosima, JP), Fujii; Shyouiti (Izumo, JP), Doi; Takashi (Izumo, JP), Okamoto; Takeshi (Izumo, JP) |
| Assignee:               | JMS Co., LTD (Hiroshima, JP)   |
| Family ID:              | 26550411   |
| Appl. No.:              | 10/089,325   |
| Filed:                  | September 27, 2000   |
| PCT Filed:              | September 27, 2000   |
| PCT No.:                | PCT/JP00/06633   |
| 371(c)(1),(2),(4) Date: | July 12, 2002  |
| PCT Pub. No.:           | WO01/23021   |
| PCT Pub. Date:          | April 05, 2001   |

Foreign Application Priority Data

|                              |  |             |
|------------------------------|--|-------------|
|                              | Sep 27, 1999 [JP]  | 11-272845   |
|                              | Mar 17, 2000 [JP]  | 2000-077314 |
| Current U.S. Class:          | 604/171; 604/164.04  |             |
| Current CPC Class:           | A61M 25/0631 (20130101); A61M 25/0637 (20130101); A61M 5/3243 (20130101) |             |
| Current International Class: | A61M 5/00 (20060101); A61M 5/178 (20060101)                              |             |
| Field of Search:             | ;604/110,165.03,171,177,164.07,163,192,158,263,264                       |             |

References Cited [Referenced By]

| U.S. Patent Documents    |                |                  |    |
|--------------------------|----------------|------------------|----|
| <a href="#">3595230</a>  | July 1971      | Suyeoka et al.   |    |
| <a href="#">4198973</a>  | April 1980     | Millet           |    |
| <a href="#">4627841</a>  | December 1986  | Dorr             |    |
| <a href="#">4888001</a>  | December 1989  | Schoenberg       |    |
| <a href="#">5112311</a>  | May 1992       | Utterberg et al. |    |
| <a href="#">5147319</a>  | September 1992 | Ishikawa et al.  |    |
| <a href="#">5197956</a>  | March 1993     | Brizuela         |    |
| <a href="#">5266072</a>  | November 1993  | Utterberg et al. |    |
| <a href="#">5382240</a>  | January 1995   | Lam              |    |
| <a href="#">5433703</a>  | July 1995      | Utterberg et al. |    |
| <a href="#">5833670</a>  | November 1998  | Dillon et al.    |    |
| Foreign Patent Documents |                |                  |    |
| 197 38 558               | Mar 1999       |                  | DE |
| 56-30944                 | Mar 1981       |                  | JP |



## Claims

The invention claimed is:

1. A winged injection needle comprising: a needle tube for puncturing having a lumen, a base end, a terminus, a base end side and a forward end side opposite said base end side, a hub for retaining the base end of the needle tube, a hollow needle-housing member having left and right outer faces, a pair of flexible wings projectingly formed on the left and right outer faces of the hollow needle-housing member, and a guide tube joined to the hub, and wherein: (1) the hub is formed to have an arced curved shape including an upper part in the axial direction, wherein said upper part is formed from a middle part forming a maximum diameter in the axial direction and two side parts forming diameters gradually reduced from the maximum diameter, (2) the hollow needle-housing member is formed from a flexible material; (3) the hollow-needle-housing member has at least two expanded parts each formed with an inner surface and an outer surface corresponding to the inner surface expanding radially outward, wherein the expanded parts can house therein at least one part of an upper part of the hub; and (4) the two expanded parts are spaced via a reduced diameter part, wherein the reduced diameter part has a reduced inner and outer diameter.
2. The winged injection needle according to claim 1 wherein the rear end of the needle-housing member further includes a liquid drip prevention mechanism.
3. The winged injection needle according to claim 2 wherein the liquid drip prevention mechanism is a member separately provided on the rear end of the needle-housing member and capable of clamping the guide tube.
4. The winged injection needle according to claim 3 wherein the member capable of clamping the guide tube is a member having an opening capable of clamping the guide tube.
5. The winged injection needle according to claim 4 wherein the member capable of clamping the guide tube is provided on the side of the rear end of the needle-housing member, and the opening opens toward the forward end of the needle-housing member.
6. The winged injection needle according to claim 2 wherein the liquid drip prevention mechanism is a slit provided in the rear end of the needle-housing member.
7. The winged injection needle according to claim 1 wherein said hub has two side faces and both side faces of the hub have a straight shape.
8. The winged injection needle according to claim 1 wherein two of the expanded parts are provided in the vicinity of the forward end side and in the vicinity of the terminus of the hollow needle-housing member.
9. The winged injection needle according to claim 1 wherein the expanded parts have a shape housing substantially the entire upper part of the hub.
10. The winged injection needle according to claim 1 wherein the pair of flexible wings are upwardly foldable and have a flexibility and a length sufficient to cover the needle-housing member, and have an immovable attachment member allowing the wings to be immovably attached to each other after covering the needle-housing member.
11. The winged injection needle according to claim 1 wherein the guide tube has a liquid drip prevention mechanism.
12. The winged injection needle according to claim 1 wherein the pair of flexible wings and the needle-housing member are formed by molding as one piece using a flexible resin.
13. The winged injection needle according to claim 1 wherein the rear end of the needle-housing member further includes a liquid drip prevention mechanism.

## Description



Patent #: US007048718

Section: Front Page 1 of 18 pages

Help

Full Text  
Help

Go to Page:

Go



## Sections:

- Front Page
- Drawings
- Specifications
- Claims

## Full Document:

Full Pages



US007048718B1

(12) **United States Patent**  
**Mithiue et al.**

(10) **Patent No.:** US 7,048,718 B1  
(45) **Date of Patent:** May 23, 2006

(54) **WINGED INJECTION NEEDLE HAVING  
NEEDLE COVERING MEANS**

(75) Inventors: **Tetutoshi Mithiue**, Hiroshima (JP);  
**Shyouiti Fujii**, Izumo (JP); **Takashi  
Doi**, Izumo (JP); **Takeshi Okamoto**,  
Izumo (JP)

(73) Assignee: **JMS Co., LTD**, Hiroshima (JP)

(\*) Notice: Subject to any disclaimer, the term of this  
patent is extended or adjusted under 35  
U.S.C. 154(b) by 513 days.

(21) Appl. No.: **10/089,325**

(22) PCT Filed: **Sep. 27, 2000**

(86) PCT No.: **PCT/JP00/06633**

§ 371 (c)(1),  
(2), (4) Date: **Jul. 12, 2002**

(87) PCT Pub. No.: **WO01/23021**

PCT Pub. Date: **Apr. 5, 2001**

(30) **Foreign Application Priority Data**

Sep. 27, 1999 (JP) ..... 11-272845  
Mar. 17, 2000 (JP) ..... 2000-077314

(51) **Int. Cl.**  
**A61M 5/00** (2006.01)  
**A61M 5/178** (2006.01)

(52) **U.S. Cl.** ..... **604/171; 604/164.04**

(58) **Field of Classification Search** ..... **604/110,**  
**604/165.03, 171, 177, 164.07, 163, 192,**  
**604/158, 263, 264**

See application file for complete search history.

(56) **References Cited**

**U.S. PATENT DOCUMENTS**

3,595,230 A \* 7/1971 Sryeoka et al. .... 604/192  
4,198,973 A 4/1980 Millet  
4,627,841 A 12/1986 Dorr  
4,888,001 A \* 12/1989 Schoenberg ..... 604/162  
5,112,311 A 5/1992 Uterberg et al.  
5,147,319 A 9/1992 Ishikawa et al.  
5,197,956 A 3/1993 Brizuela  
5,266,072 A 11/1993 Uterberg et al.  
5,382,240 A 1/1995 Lam  
5,433,703 A 7/1995 Uterberg et al.  
5,833,670 A \* 11/1998 Dillon et al. .... 604/263

**FOREIGN PATENT DOCUMENTS**

DE 197 38 558 3/1999

(Continued)

*Primary Examiner*—Nicholas D. Lucchesi

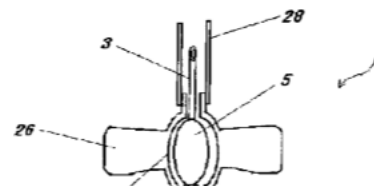
*Assistant Examiner*—Matthew F. DeSanto

(74) *Attorney, Agent, or Firm*—D. Peter Hochberg;  
Katherine R. Vieyra; William H. Holt

(57) **ABSTRACT**

A winged injection needle having a needle covering means used at treatments for infusion solution, blood transfusion and extracorporeal blood circulation, characterized by comprising a puncturing needle tube (206), a hub (208) for holding the base end of the needle tube, and a hollow needle housing member for permitting the hub to displace by sliding and to be housed in the entirely in its lumen, and by being provided with an erroneous puncturing prevention means satisfying the following three conditions: (1) the injection needle can be easily and safely housed after use, (2) its construction is simple and easy to handle to permit easy production at low costs, and (3) it can be safely disposed of.

**13 Claims, 9 Drawing Sheets**





## USPTO PATENT FULL-TEXT AND IMAGE DATABASE

[Home](#)[Quick](#)[Advanced](#)[Pat Num](#)[Help](#)[View Cart](#)

**Data current through February 27, 2018.**

Enter the patent numbers you are searching for in the box below.

Query [\[Help\]](#)

**Utility patents must have numbers entered as seven or eight characters in length, excluding commas, which are optional. Examples:**

10,000,000 -- 100000000 -- 6923014 -- 6,923,014 -- 0000001

*Note: Utility Patent 10,000,000 will issue in 2018*

**The below patent types must have numbers entered as seven characters in length, excluding commas, which are optional. Examples:**

Design -- D339,456 D321987 D000152

Plant -- PP08,901 PP07514 PP00003

Reissue -- RE35,312 RE12345 RE00007

Defensive Publication -- T109,201 T855019 T100001

Statutory Invention Registration -- H001,523 H001234 H000001

Additional Improvement -- AI00,002 AI000318 AI00007

X-Patents -- X011,280 X007640 X000001

Reissued X-Patents -- RX00116 RX00031 RX00001

USPTO PATENT FULL-TEXT AND IMAGE DATABASE

HomeQuickAdvancedPat NumHelp

Bottom

View CartAdd to Cart

Images

( 1 of 1 )

United States Patent  
Molteni

D487,654  
March 23, 2004

Extensible table

Claims

The ornamental design for an extensible table, as shown and described.

Inventors:  
Assignee:  
Appl. No.:  
Filed:

Molteni; Daniele (Cantu, IT)  
Solage Holding S.A. (Luxembourg, LU)  
D/181,020  
May 2, 2003

Foreign Application Priority Data

Nov 8, 2002 [IT]

AN2002O0025

Current U.S. Class:  
Current International Class:  
Field of Search:

D6/691.8  
0603  
;D6/480-489,495,511 ;108/153.1,155,156,157.1,161,65,69,70,77,78,83 ;248/188,188.1,188.8

References Cited [Referenced By]

D188900  
D214741  
D218903  
D243983  
D273448  
D296057

Primary Examiner: Seeger, Janice E.  
Attorney, Agent or Firm: Armstrong, Kratz, Quintos, Hanson & Brooks, LLP

Current U.S. Class:  
Current International Class:  
Field of Search:

D6/691.8  
0603  
;D6/480-489,495,511 ;108/153.1,155,156,157.1,161,65,69,70,77,78,83 ;248/188,188.1,188.8

References Cited [Referenced By]

U.S. Patent Documents

D188900  
D214741  
D218903  
D243983  
D273448  
D296057

September 1960  
July 1969  
October 1970  
April 1977  
April 1984  
June 1988

Knoll  
Dean  
Chichester, Jr.  
Carter  
Colquhoun  
Rosen

Primary Examiner: Seeger, Janice E.  
Attorney, Agent or Firm: Armstrong, Kratz, Quinton, Hanson & Brooks, LLP

Description

FIG. 1 is a left perspective view of an extensible table, showing my new design.

FIG. 2 is a right perspective view thereof.

FIG. 3 is a front elevational view thereof.

FIG. 4 is a rear elevational view thereof.

FIG. 5 is a right side elevational view thereof.

FIG. 6 is a left side elevational view thereof.

FIG. 7 is a top plan elevational view thereof, and,

FIG. 8 is a bottom plan elevational view thereof.

\*\*\*\*\*

Images

View CartAdd to Cart

Top

HomeQuickAdvancedPat NumHelp



Patent #: US0D0487654

Section: Claims 1 of 6 pages

[Help](#)[Full Text](#)  
[Help](#)

Go to Page:

 Go

## Sections:

- [Front Page](#)
- [Drawings](#)
- [Specifications](#)
- [Claims](#)

## Full Document:

[Full Pages](#)

US0D0487654S

(12) **United States Design Patent** (10) Patent No.: **US D487,654 S**  
**Molteni** (45) Date of Patent: **\*\* Mar. 23, 2004**

(54) **EXTENSIBLE TABLE**(75) Inventor: **Daniele Molteni**, Cantu (IT)(73) Assignee: **Solage Holding S.A.**, Luxembourg (LU)(\*\*) Term: **14 Years**(21) Appl. No.: **29/181,020**(22) Filed: **May 2, 2003**(30) **Foreign Application Priority Data**

Nov. 8, 2002 (IT) ..... AN200200025

(51) **LOC (7) Cl.** ..... **06-03**(52) **U.S. Cl.** ..... **D6/484**(58) **Field of Search** ..... D6/480-489, 495,  
D6/511; 108/153.1, 155, 156, 157.1, 161,  
65, 69, 70, 77, 78, 83; 248/188, 188.1,  
188.8(56) **References Cited**

## U.S. PATENT DOCUMENTS

D188,900 S \* 9/1960 Knoll ..... D6/484  
D214,741 S \* 7/1969 Dean ..... D6/484D218,903 S \* 10/1970 Chichester, Jr. .... D6/484  
D243,983 S \* 4/1977 Carter ..... D6/484  
D273,448 S \* 4/1984 Colquhoun ..... D6/485  
D296,057 S \* 6/1988 Rosen ..... D6/484

\* cited by examiner

*Primary Examiner*—Janice E. Seeger(74) *Attorney, Agent, or Firm*—Armstrong, Kratz, Quintos,  
Hanson & Brooks, LLP(57) **CLAIM**

The ornamental design for an extensible table, as shown and described.

**DESCRIPTION**

FIG. 1 is a left perspective view of an extensible table, showing my new design.  
 FIG. 2 is a right perspective view thereof.  
 FIG. 3 is a front elevational view thereof.  
 FIG. 4 is a rear elevational view thereof.  
 FIG. 5 is a right side elevational view thereof.  
 FIG. 6 is a left side elevational view thereof.  
 FIG. 7 is a top plan elevational view thereof; and,  
 FIG. 8 is a bottom plan elevational view thereof.

**1 Claim, 5 Drawing Sheets**