

(12) INTERNATIONAL APPLICATION PUBLISHED UNDER THE PATENT COOPERATION TREATY (PCT)

(19) World Intellectual Property Organization
International Bureau



(43) International Publication Date
7 July 2011 (07.07.2011)

(10) International Publication Number
WO 2011/080699 A3

(51) International Patent Classification:

A61M 5/158 (2006.01)

(74) Agent: **DR. MARK FRIEDMAN LTD.**; Moshe Aviv Tower, 54th Floor, 7 Jabolinsky St., 52520 Ramat Gan (IL).

(21) International Application Number:

PCT/IB2010/056094

(81) Designated States (unless otherwise indicated, for every kind of national protection available): AE, AG, AL, AM,

(22) International Filing Date:

28 December 2010 (28.12.2010)

AO, AT, AU, AZ, BA, BB, BG, BH, BR, BW, BY, BZ, CA, CH, CL, CN, CO, CR, CU, CZ, DE, DK, DM, DO, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, GT, HN, HR, HU, ID, IL, IN, IS, JP, KE, KG, KM, KN, KP, KR, KZ, LA, LC, LK, LR, LS, LT, LU, LY, MA, MD, ME, MG, MK, MN, MW, MX, MY, MZ, NA, NG, NI, NO, NZ, OM, PE, PG, PH, PL, PT, RO, RS, RU, SC, SD, SE, SG, SK, SL, SM, ST, SV, SY, TH, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, ZA, ZM, ZW.

(25) Filing Language:

English

(26) Publication Language:

English

(30) Priority Data:

61/290,534 29 December 2009 (29.12.2009) US

(84) Designated States (unless otherwise indicated, for every kind of regional protection available): ARIPO (BW, GH, GM, KE, LR, LS, MW, MZ, NA, SD, SL, SZ, TZ, UG, ZM, ZW), Eurasian (AM, AZ, BY, KG, KZ, MD, RU, TJ, TM), European (AL, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HR, IE, IS, IT, LT, LU, LV, MC, MK, MT, NL, NO, PL, PT, RO, RS, SE, SI, SK, SM, TR), OAPI (BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG).

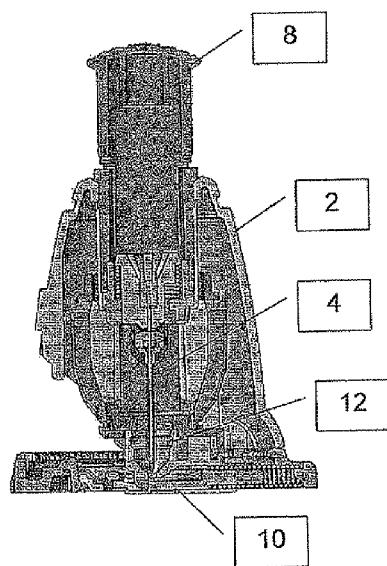
(71) Applicant (for all designated States except US): **MEDX-SET LTD.** [IL/IL]; 3 Hasadna St., 39032 Tirat-Carmel (IL).

(72) Inventors; and

(75) Inventors/Applicants (for US only): **SHEKALIM, Avraham** [IL/IL]; 24 Hashoshanim St., 36842 Nesher (IL). **PELEG, Noam** [IL/IL]; 406 Sachlav St., 19351 Gan-Ner (IL). **BEN-TSUR, Gilad** [IL/IL]; 169 Tsivoni St., 19351 Gan-Ner (IL).

[Continued on next page]

(54) Title: INSERTER MECHANISMS FOR DRUG DELIVERY CANNULAS



(57) Abstract: AB infusion set for use with a patient, the infusion set having an infusion cap to which at least a portion of the drip/infusion tube is pre-attached and a base section that is configured for deployment on the patient prior to attachment of the infusion cap therewith, such that a cannula is held in place by a cannula trap extends from the base section into the patient wherein the infusion cap is attachable to the base section at substantially any angular orientation about a central axis of the base section.

FIG. 1A

Published:

- *with international search report (Art. 21(3))*
- *before the expiration of the time limit for amending the claims and to be republished in the event of receipt of amendments (Rule 48.2(h))*

(88) Date of publication of the international search report:

1 December 2011

INTERNATIONAL SEARCH REPORT

International application No
PCT/IB2010/056094

A. CLASSIFICATION OF SUBJECT MATTER
INV. A61M5/158
ADD.

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)
A61M

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 practical, search terms used)

EPO-Internal

C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category*	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	US 2008/243051 A1 (DESTEFANO MARK A [US]) 2 October 2008 (2008-10-02) paragraphs [0070], [0077] - [0090]; figures 15-18 ----- X WO 02/070037 A2 (STERLING MEDIVATIONS INC [US]) 12 September 2002 (2002-09-12) paragraphs [0042] - [0045] ----- X WO 2004/091692 A2 (STERLING MEDIVATIONS INC [US]; DOUGLAS JOEL S [US]) 28 October 2004 (2004-10-28) page 3, line 3 - line 14 page 5, line 21 - page 6, line 4; claims 8-11 ----- -/-	1-5, 9 1, 9 1, 9

Further documents are listed in the continuation of Box C.

See patent family annex.

* 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 document 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	Date of mailing of the international search report
8 September 2011	16/09/2011
Name and mailing address of the ISA/ European Patent Office, P.B. 5818 Patentlaan 2 NL - 2280 HV Rijswijk Tel. (+31-70) 340-2040, Fax: (+31-70) 340-3016	Authorized officer Messmer, Melitta

INTERNATIONAL SEARCH REPORT

International application No PCT/IB2010/056094

C(Continuation). DOCUMENTS CONSIDERED TO BE RELEVANT

Category*	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	US 2005/107743 A1 (FANGROW THOMAS F JR [US] FANGROW JR THOMAS F [US]) 19 May 2005 (2005-05-19) paragraphs [0038] - [0042] -----	1,9
X	US 2005/101910 A1 (BOWMAN LEIF N [US] ET AL) 12 May 2005 (2005-05-12) paragraphs [0015], [0055] - [0059]; claim 1 -----	1,9
X	WO 2004/026375 A1 (DISETRONIC LICENSING AG [CH]; HORISBERGER RONNY-PATRICK [CH]; WYSS MAR) 1 April 2004 (2004-04-01) the whole document & US 2005/020972 A1 (HORISBERGER RONNY-PATRICK [CH] ET AL) 27 January 2005 (2005-01-27) paragraphs [0005], [0012] - [0019], [0025] - [0030], [0036] -----	1,2,4-12
X	US 2004/249361 A1 (DENOTH PATRIK [CH] ET AL) 9 December 2004 (2004-12-09) paragraphs [0013], [0014], [0041] -----	1-9
X	WO 2006/062680 A1 (MEDTRONIC MINIMED INC [US]; MOBERG SHELDON B [US]; HOLT MARK D [US]; C) 15 June 2006 (2006-06-15) paragraphs [0052] - [0055] -----	1,9
2		

INTERNATIONAL SEARCH REPORT

Information on patent family members

International application No

PCT/IB2010/056094

Patent document cited in search report		Publication date	Patent family member(s)		Publication date
US 2008243051	A1	02-10-2008	US 2008249471 A1		09-10-2008
			US 2008243083 A1		02-10-2008
			US 2008243053 A1		02-10-2008
			US 2008243062 A1		02-10-2008
<hr/>					
WO 02070037	A2	12-09-2002	AU 2002245588 A1		19-09-2002
			EP 1368080 A2		10-12-2003
			JP 4387105 B2		16-12-2009
			JP 2004537339 A		16-12-2004
			JP 2009240814 A		22-10-2009
<hr/>					
WO 2004091692	A2	28-10-2004	US 2005267441 A1		01-12-2005
			US 2007213673 A1		13-09-2007
			US 2004260235 A1		23-12-2004
<hr/>					
US 2005107743	A1	19-05-2005	AU 2004291104 A1		02-06-2005
			CA 2544579 A1		02-06-2005
			EP 1694385 A2		30-08-2006
			JP 2007511325 A		10-05-2007
			US 2009112166 A1		30-04-2009
			US 2006270990 A1		30-11-2006
			US 2006270992 A1		30-11-2006
			US 2006211990 A1		21-09-2006
			US 2006211991 A1		21-09-2006
			US 2006276760 A1		07-12-2006
			US 2006224119 A1		05-10-2006
			US 2011130722 A1		02-06-2011
			WO 2005049117 A2		02-06-2005
<hr/>					
US 2005101910	A1	12-05-2005	NONE		
<hr/>					
WO 2004026375	A1	01-04-2004	AT 326246 T		15-06-2006
			AU 2003260508 A1		08-04-2004
			DE 10242419 A1		25-03-2004
			EP 1539276 A1		15-06-2005
			ES 2263064 T3		01-12-2006
			US 2005020972 A1		27-01-2005
<hr/>					
US 2004249361	A1	09-12-2004	WO 03020343 A1		13-03-2003
			EP 1420836 A1		26-05-2004
<hr/>					
WO 2006062680	A1	15-06-2006	AT 400311 T		15-07-2008
			CA 2585901 A1		15-06-2006
			DK 1817068 T3		03-11-2008
			EP 1817068 A1		15-08-2007
			US 2006129090 A1		15-06-2006
<hr/>					
WO 2006062680	A1		US 2009163878 A1		25-06-2009