



(12) **EUROPEAN PATENT APPLICATION**

(88) Date of publication A3:
04.11.2015 Bulletin 2015/45

(51) Int Cl.:
F24C 15/02 (2006.01)

(43) Date of publication A2:
21.10.2015 Bulletin 2015/43

(21) Application number: **15162367.5**

(22) Date of filing: **02.04.2015**

(84) Designated Contracting States:
AL AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HR HU IE IS IT LI LT LU LV MC MK MT NL NO PL PT RO RS SE SI SK SM TR
Designated Extension States:
BA ME
Designated Validation States:
MA

(30) Priority: **08.04.2014 IT TO20140295**

(71) Applicant: **Indesit Company S.p.A.**
60044 Fabriano (AN) (IT)

(72) Inventors:
• **Gambardella, Fabio**
88100 Catanzaro Lido (CZ) (IT)
• **Mezzopera, Bruno**
60044 Fabriano (AN) (IT)
• **Scoponi, Matteo**
62012 Civitanova Marche (MC) (IT)

(74) Representative: **Santonicola, Paolo**
Indesit Company S.p.A.
Viale Aristide Merloni 47
60044 Fabriano (AN) (IT)

(54) **HOUSEHOLD COOKING APPLIANCE**

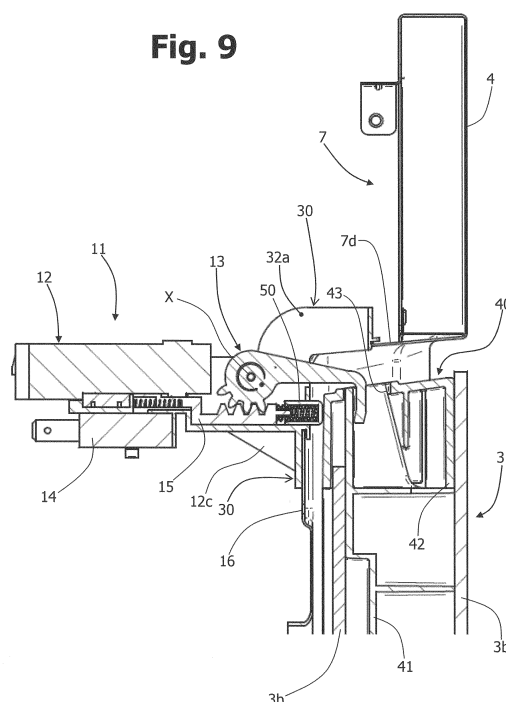
(57) A household cooking appliance has a load-bearing structure associated to which is a front door (3) of a cooking chamber, and a door-lock device (11) that comprises at least:

- a device body (12), which is fixed to the load-bearing structure (2);
- a locking member (13), displaceably mounted in a front region of the device body (12), the locking member (13) being designed to co-operate with a retention element (43) of a structure (3a, 3b, 40) of the door (3) that is displaceable with respect to the load-bearing structure;
- an actuation system having actuator means (14) that can be controlled for causing passage of the locking member (13) between an inoperative position, where the locking member (13) is not engaged to the retention element (43), and an operative position, where the locking member (13) is engaged to the retention element (43).

The device body (12) is fixed to the load-bearing structure at a passage of a front frame (7) and extends longitudinally in a direction generally transverse to said front frame (7).

The device body (12) is fixed at a front (30, 32) thereof to the front frame (7) so as to be supported substantially in cantilever fashion by the frame itself towards the inside of the load-bearing structure.

Fig. 9





EUROPEAN SEARCH REPORT

 Application Number
EP 15 16 2367

5

10

15

20

25

30

35

40

45

DOCUMENTS CONSIDERED TO BE RELEVANT			
Category	Citation of document with indication, where appropriate, of relevant passages	Relevant to claim	CLASSIFICATION OF THE APPLICATION (IPC)
X	WO 2010/092529 A1 (BITRON SPA [IT]; PROMUTICO FABRIZIO [IT]) 19 August 2010 (2010-08-19) * figures 6A, 6B *	15	INV. F24C15/02
X	US 2006/001274 A1 (SMITH DONALD E [US]) 5 January 2006 (2006-01-05) * paragraphs [0028] - [0032], [0036], [0046]; figures 1-5 *	1,5-7, 12,15 2-4,13 8-11	
Y	US 6 079 756 A (PHILLIPS BRYAN T [US]) 27 June 2000 (2000-06-27) * figures 2,3 *	1,15	
Y	WO 2009/116094 A1 (FILIPPI S R L [IT]; FILIPPI FILIPPO [IT]) 24 September 2009 (2009-09-24) * page 7, line 6, paragraph 16 - line 14; figure 1b *	2-4,14	
Y	EP 1 901 006 A2 (BSH BOSCH SIEMENS HAUSGERÄTE [DE]) 19 March 2008 (2008-03-19) * paragraph [0016]; figures 1,2 *	2-4	TECHNICAL FIELDS SEARCHED (IPC) F24C H05B
Y	WO 2010/076133 A2 (ARCELIK AS [TR]; TURKOZ SERDAR [TR]; YAMAN YALCIN [TR]) 8 July 2010 (2010-07-08) * figure 3 *	2-4,14	
Y	DE 77 37 890 U1 (BOSCH-SIEMENS HAUSGERÄTE GMBH [DE]) 17 May 1979 (1979-05-17) * page 4, line 18 - line 19; figure 2 *	13	
A	EP 1 828 686 A1 (ELLENBERGER & POENSGEN [DE]) 5 September 2007 (2007-09-05) * abstract; figures *	1	
		-/--	
The present search report has been drawn up for all claims			
Place of search The Hague		Date of completion of the search 24 September 2015	Examiner Verdoodt, Luk
CATEGORY OF CITED DOCUMENTS X : particularly relevant if taken alone Y : particularly relevant if combined with another document of the same category A : technological background O : non-written disclosure P : intermediate document		T : theory or principle underlying the invention E : earlier patent document, but published on, or after the filing date D : document cited in the application L : document cited for other reasons & : member of the same patent family, corresponding document	

 1
EPO FORM 1503 03.82 (P04C01)

50

55



EUROPEAN SEARCH REPORT

Application Number
EP 15 16 2367

5

10

15

20

25

30

35

40

45

50

55

DOCUMENTS CONSIDERED TO BE RELEVANT			
Category	Citation of document with indication, where appropriate, of relevant passages	Relevant to claim	CLASSIFICATION OF THE APPLICATION (IPC)
A	WO 2010/041210 A1 (ITW IND COMPONENTS SRL [IT]; CHIRUMBOLO DINO [IT]) 15 April 2010 (2010-04-15) * figure 6 *	1	
A	WO 2006/123220 A1 (ITW IND COMPONENTS SRL [IT]; CHIRUMBOLO DINO [IT]) 23 November 2006 (2006-11-23)	1	
			TECHNICAL FIELDS SEARCHED (IPC)
The present search report has been drawn up for all claims			
Place of search The Hague		Date of completion of the search 24 September 2015	Examiner Verdoodt, Luk
CATEGORY OF CITED DOCUMENTS X : particularly relevant if taken alone Y : particularly relevant if combined with another document of the same category A : technological background O : non-written disclosure P : intermediate document T : theory or principle underlying the invention E : earlier patent document, but published on, or after the filing date D : document cited in the application L : document cited for other reasons & : member of the same patent family, corresponding document			

EPO FORM 1503 03.82 (P04C01)

**ANNEX TO THE EUROPEAN SEARCH REPORT
ON EUROPEAN PATENT APPLICATION NO.**

EP 15 16 2367

This annex lists the patent family members relating to the patent documents cited in the above-mentioned European search report.
The members are as contained in the European Patent Office EDP file on
The European Patent Office is in no way liable for these particulars which are merely given for the purpose of information.

24-09-2015

Patent document cited in search report	Publication date	Patent family member(s)	Publication date
WO 2010092529 A1	19-08-2010	NONE	
US 2006001274 A1	05-01-2006	US 2006001274 A1 US 2007090655 A1	05-01-2006 26-04-2007
US 6079756 A	27-06-2000	NONE	
WO 2009116094 A1	24-09-2009	NONE	
EP 1901006 A2	19-03-2008	DE 102006042177 A1 EP 1901006 A2	27-03-2008 19-03-2008
WO 2010076133 A2	08-07-2010	EP 2370737 A2 WO 2010076133 A2	05-10-2011 08-07-2010
DE 7737890 U1	17-05-1979	DE 7737890 U1 JP S5492465 A	17-05-1979 21-07-1979
EP 1828686 A1	05-09-2007	AT 521856 T CA 2597793 A1 DE 102004061231 B3 EP 1828686 A1 PT 1828686 E US 2007241568 A1 WO 2006066646 A1	15-09-2011 29-06-2006 20-04-2006 05-09-2007 03-11-2011 18-10-2007 29-06-2006
WO 2010041210 A1	15-04-2010	EP 2344712 A1 WO 2010041210 A1	20-07-2011 15-04-2010
WO 2006123220 A1	23-11-2006	CN 101137870 A EP 1888971 A1 ES 2317548 T3 KR 20080008351 A US 2008196707 A1 WO 2006123220 A1	05-03-2008 20-02-2008 16-04-2009 23-01-2008 21-08-2008 23-11-2006

EPO FORM P0459

For more details about this annex : see Official Journal of the European Patent Office, No. 12/82