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(72) Inventors:
• **ALBERINI, Gianluca**
42016 Guastalla, Reggio Emilia (IT)
• **MICALI, Luciano**
42016 Guastalla, Reggio Emilia (IT)
• **BARBOLINI, Fabio**
41010 Limidi di Soliera, Modena (IT)

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(74) Representative: **Casadei, Giovanni**
Bugnion S.p.A.
Via Vellani Marchi, 20
41124 Modena (IT)

(71) Applicant: **FIVES OTO S.P.A.**
42022 Boretto, Reggio Emilia (IT)

(54) **A FORMING UNIT FOR A PROFILING MACHINE LINE**

(57) A forming unit for a profiling machine line, comprising: a plurality of lower rollers (11,12,13) shaped with outer surfaces that envelop, on at least a transversal section plane, a lower curve (P1); a plurality of upper rollers (21,22,23,24,25) profiled with outer surfaces that envelop, on the transversal section plane, an upper curve (P2) substantially parallel to the lower curve (P1).

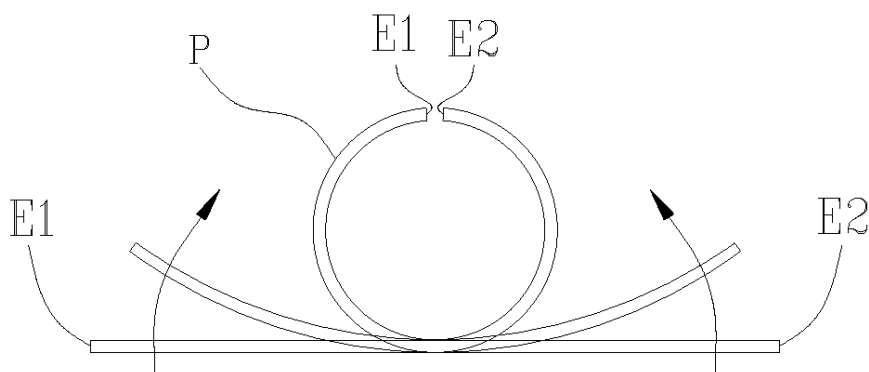
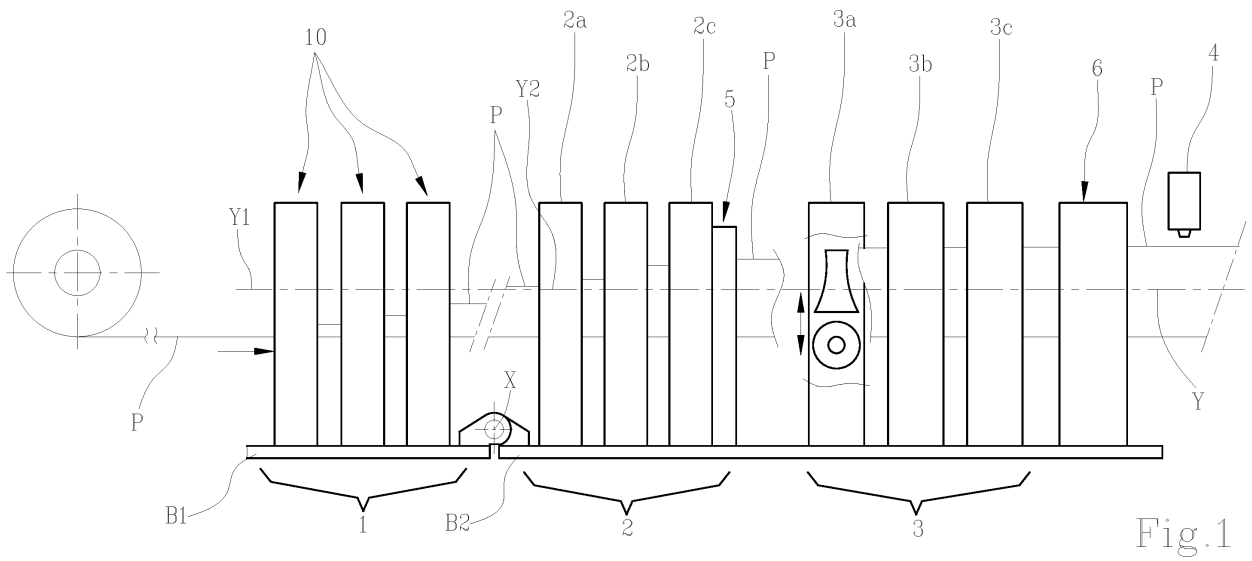


Fig.1a





EUROPEAN SEARCH REPORT

Application Number
EP 17 16 9403

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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	JP 2016 022534 A (SANYO SEIKI KK) 8 February 2016 (2016-02-08) * paragraphs [0023] - [0031]; figures 5-6 *	1-6,8,9	INV. B21C37/08 B21D5/12
A	DE 26 08 410 A1 (HIRZ KURT) 8 September 1977 (1977-09-08) * page 4, paragraph 2-3; figures 2-3 *	1,7	
X	US 2 012 795 A (PARK LAWRENCE H) 27 August 1935 (1935-08-27) * page 5, column 1, line 53 - page 5, column 2, line 33; figures 8, 10, 11 *	1	
			TECHNICAL FIELDS SEARCHED (IPC)
			B21C B21D
1 The present search report has been drawn up for all claims			
Place of search		Date of completion of the search	Examiner
Munich		5 September 2017	Augé, Marc
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)



Application Number

EP 17 16 9403

CLAIMS INCURRING FEES

The present European patent application comprised at the time of filing claims for which payment was due.

☐ Only part of the claims have been paid within the prescribed time limit. The present European search report has been drawn up for those claims for which no payment was due and for those claims for which claims fees have been paid, namely claim(s):

☐ No claims fees have been paid within the prescribed time limit. The present European search report has been drawn up for those claims for which no payment was due.

LACK OF UNITY OF INVENTION

The Search Division considers that the present European patent application does not comply with the requirements of unity of invention and relates to several inventions or groups of inventions, namely:

see sheet B

☐ All further search fees have been paid within the fixed time limit. The present European search report has been drawn up for all claims.

☐ As all searchable claims could be searched without effort justifying an additional fee, the Search Division did not invite payment of any additional fee.

☐ Only part of the further search fees have been paid within the fixed time limit. The present European search report has been drawn up for those parts of the European patent application which relate to the inventions in respect of which search fees have been paid, namely claims:

☒ None of the further search fees have been paid within the fixed time limit. The present European search report has been drawn up for those parts of the European patent application which relate to the invention first mentioned in the claims, namely claims:

1-9

☐ The present supplementary European search report has been drawn up for those parts of the European patent application which relate to the invention first mentioned in the claims (Rule 164 (1) EPC).



**LACK OF UNITY OF INVENTION
SHEET B**

Application Number
EP 17 16 9403

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The Search Division considers that the present European patent application does not comply with the requirements of unity of invention and relates to several inventions or groups of inventions, namely:

1. claims: 1-9

Forming unit with enveloping rollers

2. claims: 10-16

Line profiling machine

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

EP 17 16 9403

5 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.

05-09-2017

Patent document cited in search report	Publication date	Patent family member(s)	Publication date
JP 2016022534 A	08-02-2016	JP 5908542 B2 JP 2016022534 A	26-04-2016 08-02-2016
DE 2608410 A1	08-09-1977	NONE	
US 2012795 A	27-08-1935	NONE	