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- as to the applicant's entitlement to claim the priority of the earlier application (Rule 4.17(iii))

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(54) **Title:** THERMAL TREATMENT PROCESS FOR TOBACCO MATERIALS

(57) **Abstract:** A method of preparing a tobacco material for use in a smoking article is provided, including (i) mixing a tobacco material, water, and an additive selected from the group consisting of lysine, glycine, histidine, alanine, methionine, glutamic acid, aspartic acid, proline, phenylalanine, valine, arginine, di- and trivalent cations, asparaginase, saccharides, phenolic compounds, reducing agents, compounds having a free thiol group, oxidizing agents, oxidation catalysts, plant extracts, and combinations thereof; (ii) heating the mixture; and (iii) incorporating the heat-treated mixture into a smoking article as a smokable material. A smoking article in the form of a cigarette is also provided that includes a tobacco material pre-treated to inhibit reaction of asparagine to form acrylamide in mainstream smoke. Upon smoking, the smoking article is characterized by an acrylamide content of mainstream smoke that is reduced relative to an untreated control smoking article.



INTERNATIONAL SEARCH REPORT

International application No PCT/US2011/047385

A. CLASSIFICATION OF SUBJECT MATTER INV. A24B15/20 A24B15/30 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) A24B		
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, WPI Data		
C. DOCUMENTS CONSIDERED TO BE RELEVANT		
Category*	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	US 6 499 489 B1 (COLEMAN III WILLIAM MONROE [US]) 31 December 2002 (2002-12-31) claims 1-11; examples 1,2 -----	1,3-5, 7-20, 22-26
X	US 2009/304879 A1 (ZHANG YING [CN] ET AL) 10 December 2009 (2009-12-10)	1,4, 8-13, 17-19, 22-26
Y	paragraph [0020] - paragraph [0024]; example 12 -----	2,6,21
Y	US 2007/141225 A1 (ELDER VINCENT A [US] ET AL) 21 June 2007 (2007-06-21) claims 1,2 ----- -/--	2,6,21
<input checked="" type="checkbox"/> Further documents are listed in the continuation of Box C. <input checked="" type="checkbox"/> 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 4 April 2012	Date of mailing of the international search report 12/04/2012	
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C(Continuation). DOCUMENTS CONSIDERED TO BE RELEVANT

Category*	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X,P	WO 2010/141278 A1 (REYNOLDS TOBACCO CO R [US]; CHEN GONG [US]; GERARDI ANTHONY RICHARD [U] 9 December 2010 (2010-12-09) the whole document -----	1-26

INTERNATIONAL SEARCH REPORT

Information on patent family members

International application No

PCT/US2011/047385

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US 2009304879	A1	10-12-2009	US 2009304879 A1 10-12-2009
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			US 2010300463 A1 02-12-2010
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