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(54) Title: MODIFIED POLYVINYL ALCOHOL AND A WATER VAPOR- AND SMOKE -PERMEABLE SYNTHETIC CASING FOR FOOD PRODUCTS, COMPRISING IT

(57) Abstract: This invention relates to a method for production modified polyvinyl alcohol and to a water vapor- and smoke-permeable synthetic food casing, with improved optical properties, containing such modified polyvinyl alcohol. Polyvinyl alcohol powder with the degree of hydrolysis of 70-98 mole % and 3-30 cPs viscosity of 4% aqueous solution is loaded while stirring into a mixer for dry and highly viscous materials and 0.05-3.0% of concentrated aqueous solution of sodium peroxide and/or potassium peroxide and/or calcium peroxide and/or hydrogen peroxide in neat hydrogen peroxide equivalent are added. The dry by touch reaction mixture is stirred at 45-100°C until virtually complete consumption of the peroxide compound and formation of modified polyvinyl alcohol powder. This polyvinyl alcohol can be converted to a form convenient for extrusion, by addition of virtually non-volatile plasticizers and subsequent molding operations. Another object of the present invention is a single- or multilayer water vapor- and smoke- permeable synthetic sausage casing with improved optical properties, comprising in at least one of its layers such modified PVA and polyamide material. The layer comprising such modified PVA is extruded from a blend containing from 10 to 95.5% of polyamide material, and from 4.5 to 50% of modified PVA obtained in one or another form according to the present invention, and also from 0 to 40% of additives.



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INTERNATIONAL SEARCH REPORT

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A. CLASSIFICATION OF SUBJECT MATTER
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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)
A22C C08F

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 practicable, 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.
A	EP 1 188 775 A2 (KURARAY CO [JP]) 20 March 2002 (2002-03-20) the whole document -----	1-27
A	EP 0 587 114 A2 (KURARAY CO [JP] KURARAY CO [DE]) 16 March 1994 (1994-03-16) the whole document -----	1-27
A	EP 0 692 494 A1 (KURARAY CO [JP]) 17 January 1996 (1996-01-17) the whole document -----	1-27
A	EP 0 889 068 A2 (SUMITOMO CHEMICAL CO [JP]) 7 January 1999 (1999-01-07) the whole document -----	1-27

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	"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
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INTERNATIONAL SEARCH REPORT

Information on patent family members

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