

Title (en)

A PROCESS FOR THE PRODUCTION OF PAPER

Title (de)

VERFAHREN ZUR HERSTELLUNG VON PAPIER

Title (fr)

PROCEDE POUR LA FABRICATION DE PAPIER

Publication

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Application

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Abstract (en)

[origin: WO2004104299A1] The invention relates to a process for the production of paper which comprises (i) providing a main aqueous flow containing cellulosic fibres; (ii) introducing one or more retention components into the main aqueous flow to form a main aqueous flow containing one or more retention components; (iii) providing a diluting aqueous flow; (iv) introducing a low molecular weight cationic organic polymer into the diluting aqueous flow to form a diluting aqueous flow containing a low molecular weight cationic organic polymer, the low molecular weight cationic organic polymer having a weight average molecular weight up to 5,000,000; (v) introducing the diluting aqueous flow containing a low molecular weight cationic organic polymer into the main aqueous flow containing one or more retention components to form a resulting aqueous flow; and then (vi) ejecting the resulting aqueous flow onto a wire and dewatering the resulting aqueous flow to form a web of paper. The invention further relates to a process for the production of paper on a paper machine containing a dilution headbox which comprises (i) introducing one or more retention components into a main aqueous flow containing cellulosic fibres, and feeding the obtained main aqueous flow into the dilution headbox; (ii) introducing low molecular weight cationic organic polymer having a weight average molecular weight up to 5,000,000 into a diluting aqueous flow and feeding the obtained diluting aqueous flow into the dilution headbox; (iii) mixing the obtained main aqueous flow with the obtained diluting aqueous flow in the headbox to form a resulting aqueous flow; and (iv) ejecting the resulting aqueous flow onto a wire and dewatering the resulting aqueous flow to form a web of paper. The invention also relates to a process for the production of paper from an aqueous suspension containing cellulosic fibres, and optional filler, which comprises introducing one or more retention components into the suspension followed by introducing into the suspension a low molecular weight cationic organic polymer having a weight average molecular weight up to 5,000,000, and then forming and draining the suspension on a wire.

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