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- (74) Agent: **PLAGGENBORG, Menko, Bernard**; Octrooibureau Los en Stigter B.V., Weteringschans 96, NL-1017 XS Amsterdam (NL).
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- (71) Applicant (*for all designated States except US*): **TECHNISCHE UNIVERSITEIT DELFT** [NL/NL]; Julianalaan 134, NL-2628 BL Delft (NL).
- (72) Inventors; and
- (75) Inventors/Applicants (*for US only*): **DALMIJN, Wijsand, Ludo** [NL/NL]; Cannenburg 30, NL-1081 GZ Amsterdam (NL). **DE JONG, Tako, Pieter, Rinze** [NL/NL]; Fijnjekade 64, NL-2521 CR The Hague (NL). **FRAUNHOLCZ, Norbert** [NL/NL]; Tichelberg 6, NL-2716 LL Zoetermeer (NL). **GLASS, Hylke-Jan** [NL/NL]; Clara van Sparwoudestraat 26, NL-2612 SP Delft (NL).
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(54) Title: A METHOD AND APPARATUS FOR ANALYSING AND SORTING A FLOW OF MATERIAL

(57) Abstract: The invention relates to a method and an apparatus for analysing a flow of material using X rays. The method comprises radiating the material with at least two energy levels and measuring the transmission of radiation through the material for each level separately, and is characterized in that a sensor is used for measuring the radiation transmission, which sensor comprises a plurality of substantially adjacent pixels, and on the basis of the transmission values measured determining the thickness and composition of the material. This may be performed in combination with one or more blank contact detection techniques, for example, on the basis of infrared radiation, visible light radiation, or ultraviolet radiation.