

Title (en)

MRA SEGMENTATION USING ACTIVE CONTOUR MODELS

Title (de)

SEGMENTATION IN MAGNETRESONANZANGIOGRAPHIE DURCH ANWENDUNG EINES AKTIVKONTURMODELLS

Title (fr)

SEGMENTATION EN ARM UTILISANT DES MODELES ACTIFS DE CONTOURS

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Application

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Priority

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Abstract (en)

[origin: WO0079481A1] A method and system of providing segmentation of volumetric three-dimensional image data set such as MRA images. Initially, a three-dimensional MRA volume is input. An initial surface S is then generated by thresholding the input. A signed distance function v to S is then generated, where $v=v(x,t)$ and S is the zero level set of $v(<.>,0)$. The process proceeds by iteratively updating v according to Formula (I) , the updating terminates at convergence or as determined by an operator. S' is then defined to be the zero level set of the current distance function v' and reinitialize v' to be a distance function to S'. The volume is continually iteratively updated such that a final distance function v is obtained. The first output obtained from this volume is a segmentation of vessels in the MRA data, obtained by computing the zero level set of v.

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