## a 2003 0171

The invention relates to the computer engineering and engineering cybernetics and may be used in the visual information perception and processing systems.

The method of determining the dimension of the image processor matrix consists in that it is formed an initial optical image, afterwards it is supplementary carried out the bidimensional Fourier transform of the initial image, it is formed the image Fourier spectrum, which is binarized, then it is circularly scanned with different radiuses, it is determined the maximum frequency of the binarized Fourier spectrum and its integrated intensity on the radius to the given frequency and it is calculated the dimension of the image processors' matrix, according to the formula:

## $L=4(f_m)^2D^2I_s/I_o$ , where

L – the value of dimension of the processor matrix;

 $f_m$  – the maximum frequency of the binarized Fourier spectrum;

D – the maximum linear dimension of the object in the image;

 $I_{s}$  – the integrated intensity of the binarized Fourier spectrum on the radius to the given frequency;

 $I_0$  – the standard value of the Fourier spectrum intensity on the corresponding radius.

Claims: 1 Fig.: 1