

## **ABSTRACT**

### **IMAGE PROCESSING METHOD, TRAINING METHOD, DEVICES, APPARATUS AND COMPUTER-READABLE STORAGE MEDIUM**

The present invention provides an image processing method which involves: acquiring an image to be processed as an original rain-bearing image; generating by the first generator of a pure rain layer according to the original rain-bearing image, which pure rain layer indicates the position of raindrops in the original rain-bearing image; and generating by the second generator of a non-rain-bearing background layer according to the pure rain layer and the original rain-bearing image. The embodiments of the present invention obtain raindrop layer based on original rain-bearing image, and then obtain rain-free background image based on the pixel difference between the raindrop layer and the original rain-bearing image, which achieves image de-raining without using the corresponding rain-bearing and non-rain-bearing comparison chart as the training data set, reducing the reliance on external information, lowering costs and improving the efficiency of image de-raining. In addition, the embodiments of the present invention, making use of pre-training, improve the authenticity of images generated.

Fig. 1