High Quality Digital Image Restoration Provides Faster Downloads with Less Storage and Bandwidth Requirements

High Quality Image Restoration Reduces Storage and Bandwidth Requirements

A technique has been developed to create, store and transmit images using only half of the data of conventional techniques without losing image quality. Digital images often require large amounts of data for storage and high bandwidth for transmission. Medical imaging, for example, frequently produces huge volumes of data which need to be stored or transmitted to a remote location. Most compression techniques result in a loss of information on image restoration.

Faster Downloads and Quicker Image Restoration

This technique uses only one component of the transformed data, rather than two as is generally used conventionally. Consequently, only half of the storage space is required. The way the image is created, transmitted and stored allows high quality restoration of images using a direct process rather than an iterative process, making it quicker and less computationally intensive. The technique has high potential where large numbers of images are required to be transmitted and restored such as medical, defense, satellite image and gaming applications.

This method consists of two patented technologies:

- Image restoration from transformed component data: US Patent #6873744
- Non-iterative method to restore image from transformed component data: US Patent <u>#7590293</u>

BENEFITS OF IMAGE RESTORATION USING ONLY HALF THE DATA

- Reduces data storage footprint and bandwidth requirements, leading to faster downloads.
- High quality image restoration, unlike lossy compression methods which can lose details.
- Uses a direct algorithm rather than an iterative process making it quicker and less computationally intensive.
- Ideal for applications where many images are required to be transmitted and stored, such as medical, defense, satellite image and gaming applications.

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Category

Engineering & Physical Sciences/Design Specifications Life Sciences/Health IT Software & IT/Communications & Networking Software & IT/Health IT Software & IT/Image & Signal Processing

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