

## Video Processing or Color Scientist



### **Job Description:**

As a member of display algorithms R&D team in the Consumer Products Engineering division of Digital Home Group, you will be exposed and engaged the leading edge of technologies in the field of Consumer Electronics. We are looking for a versatile and enthusiastic candidate who will be responsible for conducting research and development on innovative video processing algorithms to deliver best-in-class visual quality for digital video on Intel platforms including media SoCs and programmable architectures. The work ranges from exploratory research to rapid prototyping to reference software model development, and entails technical leadership in an area such as advanced spatial-temporal video processing and enhancement, or advanced color processing/enhancement for high resolution future video displays. The successful candidate will join a team of specialists engaged in all aspects of video processing R&D for consumer multimedia products, supports Si development and verification, and owns the process of visual quality management and optimization.

### **Qualification:**

#### **Minimum Requirements**

#### **Skills:**

For video processing track: advanced expertise in digital signal, image, and video processing; non-linear and adaptive image/video processing for resolution enhancement; algorithms for sharpness/color/contrast enhancement, de-noising, and reformatting.

For the color science track: color science, color perception models, color appearance models and color quality evaluation methodologies; algorithms for content/illumination adaptive color and contrast correction and enhancement for HD and higher resolutions.

#### **Experience:**

For video processing scientists, advanced research and practical projects involving state-of-the art video and image processing in 2 or more of the following areas:

- Motion-estimation/motion-compensation and applications
- Advanced video processing in spatial and transform domain
- Low-complexity superresolution, image-based rendering, high-ratio image scaling
- Color processing (enhancement, correction)
- No reference video quality metrics for adaptive video processing

For color scientists, expertise in 2 or more of the following areas:

- Color correction and enhancement for high resolution, deep color, wide gamut
- Color quality evaluation methodology, setup and execution
- Color processing (enhancement, noise reduction)
- Color and contrast models (illumination, motion, stereoscopic)

**Education:** For video processing: Ph.D. Electrical Engineering, Computer Engineering or Computer Science; for color scientists: Ph.D. Color Science, Electrical Engineering, Computer Engineering or Computer Science

### **Preferred Requirements**

**Skills:** practical projects and research relevant to consumer video applications and interactive multimedia; advanced software engineering and design; awareness of hardware design and verification methodologies.

For color scientists: practical projects and research on color processing/enhancement relevant to future display technologies (HD and higher resolution), knowledge of display technologies including characterization and calibration methods; advanced software engineering and design skills.

**Experience:** Dissertation research and industry internships or research projects directly relevant to consumer video technology, and visual quality.

**Education:** PhD degree in electrical engineering, computer science or engineering

### **For further information, please send resumes to**

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