

Computer Vision for Wildfire Detection

Computer vision with Generative Al for increased accuracy and confidence for when it matters

Chooch's computer vision and generative AI solutions for wildfire detection enable first responders to react faster at the first sign of smoke and fire. After years of training, Chooch's wildfire detection models can accurately distinguish smoke from cloud and fog and minimizes false positive alerts.

Chooch's edge optimized inference engine can monitor camera streams autonomously with no additional personnel needed. At the first sign of smoke and fire, real-time alerts can be sent to business systems or devices to initiate immediate intervention.



Dramatically improve the speed and accuracy of wildfire detection with ReadyNowTM computer vision

Easy deployment

Pre-trained ReadyNow models are available out-of-the-box and fast and easy to deploy; whether self-hosted, in the cloud, or on-premise.

Scalability

Add video streams seamlessly — from 1 camera to 1000s — the platform scales as your needs grow.

Accuracy and speed

Recognizes over 40 million visuals for unparalleled levels of accuracy and response precision in near real-time.

Versatility

Leverage you existing camera or sensor infrastructure and run 2 to 8 models on the same device to monitor for multiple applications.

Case Study

ALERTCalifornia Partnership

In 2020, California experienced 9,900 wildfires that burned 4.3 million acres of forest; causing \$19B in losses. As wildfire threats continue to increase, as do the visual monitoring requirements for California utilities and fire services. Traditional manual review efforts were not delivering the proactive fire detection that was needed.

Kern County collaborated with Chooch, Dell, and Vantiq to enhance their wildfire detection system and improve their video review capabilities to reduce false positives and accelerate fire detection.

They deployed pre-trained smoke and fire models on their existing camera infrastructure and using ImageChat created custom prompts to query camera frames for signs of smoke or fire.

At first signs of smoke, an alert was sent real-time to first responders on their smartphones or computers to initiate immediate response measures.

As a result, Kern County was able to simultaneously monitor 2,000 camera feeds, reduce false positives, respond faster, and ultimately save lives.

