

## **Challenges of Wireless communication in Video Sensing**

Video monitoring and analysis has been in use for quite some time, but using predominantly wired means to transmit video stream or still-frames to the operations center. With the costs and size of video sensors plummeting, they are ready to be deployed in large numbers in places where there may not be infrastructure present, typically so in the military environment. With broadband wireless access becoming ubiquitous and ad hoc networking having come-off age, backhauling of the video still poses a number of challenges, especially in ad hoc and mobile scenarios. After discussing the key requirements of wireless video communication, we present a number of potential architectures based on commercial solutions that are well-suited in these environments. Finally, we discuss the embedding of video sensors with other types of sensors to make the video sensing applications more efficient, in terms of power consumption, bandwidth requirements, resilience and robustness, management, and cost of operations.