

Smartphone Camera Tool Captures Endoscopic Images



MobileOptx (PA, USA) has developed an easy-to-use device for attaching endoscopes to smartphones to give clinicians more mobility when they use these medical devices. As most physicians carry smartphones, it is logical to use the devices to capture images—both pictures and video—for later review by supervisors, patients, or for the medical record. The need for repeat endoscopy will be reduced by having such records, thus improving safety.

In addition to its functionality, the hybrid device could help improve workflow since it offers a useful way for nurse practitioners to gather information about the patient that the doctor can later replay during diagnosis, according to Jodi Cook, MobileOptx CEO. The company is a spinout of the University of Pennsylvania's UPStart's incubator at the Center for Innovation at Penn and the University of Pennsylvania Perelman School of Medicine.

Cook, in an interview with *MedCity News*, talked about some of the challenges the company faced to bring the physician inventors Natasha Mirza and Jason Brant's concept to market. She pointed out that amongst the things the device needed to accomplish, it was critical that the holder aligned the endoscope and smartphone camera correctly. The device also had to be held just as easily by men and women so it was tested by both.

Dr. Mirza is a professor in the Otolaryngology department at Penn's medical school, while Dr. Brant is doing a fellowship with the department. It was Dr. Mirza who developed the concept for the attachment; however, it took a few iterations with the help of engineers to move from the initial prototype to get the best version. "We had 10 potential ideas and we took three forward, and settled on this one rather quickly," Cook revealed.

MobileOptx is bootstrapped and to keep it that way, the company took on some of the assembly work that it would have otherwise contracted a manufacturer to do, Cook said, adding that she had to host an assembly party on Labor Day weekend to put the kits together.

Small physician practices like the device, said Cook. The device is also useful for medical training purposes. "The MobileOptx adapter will revolutionise how we train residents and fellows in the academic setting. Gone are the days of needing to repeat endoscopic procedures in order to validate findings," according to Steven E. Sobol, MD, MSc, of the Children's Hospital of Philadelphia, and associate professor in the Department of Otorhinolaryngology, Head and Neck Surgery at Penn's medical school.

MobileOptx's approach is interesting because most of the time it is the sexy medical device design or mobile app that grabs the attention rather than a contraption that joins them together, *MedCity News* said. Smartphones, particularly iPhones, are a growing presence in the physician's office. Furthermore, there is increased interest in making medical devices that typically depend on a computer screen more mobile. This has spurred interest in medical device innovation that can meet that demand, Cook noted.

MobileOptx is planning a marketing pitch at the IMPACT conference next month. Through Cook's contacts, the company has progressed to the point where it can demonstrate a market for its device. While the company's focus has been in ear, nose and throat applications, it also sees opportunity in gynaecology, urology, and emergency medicine.

Source: MedCityNews.com Image Credit: MobileOptx

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