

## **iAssay Reduces Healthcare Costs with Cloud-Connected Universal Diagnostics Unit for Home Care Patients**



**Lonnie W. Adelman**  
Chief Executive Officer

**iAssay, Inc.**  
[www.iassay.net](http://www.iassay.net)

**Contact:**  
**Lonnie W. Adelman**  
**619-884-9220**  
[Lonnie.Adelman@iAssay.net](mailto:Lonnie.Adelman@iAssay.net)

**Interview conducted by:**  
**Lynn Fosse, Senior Editor**  
**CEOCFO Magazine**

**CEOCFO: Mr. Adelman, what is iAssay®, Inc?**

**Mr. Adelman:** iAssay is a company that is focused on point of care diagnostics. Point of care diagnostics are done at the patient's bedside and are typically decentralized from the hospital. This is a trend that everyone is looking at today. Our first project is bringing a patent pending hand held diagnostic system that is connected to The Cloud to the marketplace. It is also a universal tester, so we can essentially do any blood test on a patient wherever they are and the test results go into The Cloud. We partner with Health IT Partners use those results populate the electronic health records, and for other uses in the future. It is universal and quick; sample to answer in about five to ten minutes.

**CEOCFO: How can you do it so efficiently? What went into putting it together?**

**Mr. Adelman:** That is a great question! Before the whole smartphone and medical craze started we decided to use a smartphone as the engine for our system. Smartphones are produced in the tens or hundreds of millions at a time, so the cost of the device is very inexpensive compared to designing an engine ourselves, and producing it in tens of thousands a year. By using that phone you automatically get all the wireless capabilities; the WiFi, the Bluetooth, the 3G and 4G, so the communication with The Cloud and other devices around our iAssay device is done by the smartphone. The phone is already developed and in production, and it is already through FCC and safety regulatory approvals. We use the controller in the phone to do all the processing. If we get image data from one type of test cartridge that is produced by a manufacturer, we process that image data with the controller in the phone. We use the screen of the phone as the screen of the handheld, so that we do not have to have a separate liquid crystal or some other type of display and touchscreen. The smartphone is an all in one engine solution for us, and is one of the big secrets to being able to do this in a cost effective way. The other thing is that the test cartridges that we use are already being manufactured and have already been through the FDA and are already available on the market and are known to work. We don't do assay development. Somebody has already paid for the assay development and regulatory work. We adapt those test cartridges manufactured by dozens and dozens of manufacturers to our device with small adapter modules that we have designed specifically for a family of assay cartridges. Think about our adaptor module as a very small, little box that has the essence of what is necessary for a specific test cartridge. The rest of our device is a shared resource for any test cartridge that that we would run (enclosure, power source, operator panel, wireless capability, USB, audio, etc.). We are able to take the piece that is necessary to run than manufacturer's cartridge (the adaptor module), combine that with the shared resources in our device, and do a panel on a patient wherever they may be.

**CEOCFO: Would about fifty percent of typical tests be covered by what you do? Might it be higher? Would you give us a sense of how big a chunk you can really provide?**

**Mr. Adelman:** All the tests that are technically needed in home care are available in point of care cartridges already. The CBC, the complete blood count; includes many tests that are very data intensive and device intensive, and are not yet