Digital Health Company Streamlines Critical Care Monitoring

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CEOCFO: *Mr. Cooke, what attracted you to Etiometry?*
Mr. Cooke: What attracted me was how Etiometry is on the forefront of a key change in the market that I see taking place, which is using the power of data to help transform patient care. There is so much information that clinicians must process every minute of every day from so many different sources and Etiometry puts all of that on one platform and includes key analytics on top of that to help clinicians make more informed decisions for their patients. This technology is transformative for critical care, where time is of the essence, and this is what initially drew my interest to the company.

CEOCFO: *What did you find when you looked at the company? What have you learned since you have been there?*
Mr. Cooke: The key thing that I have learned, which is one of the top reasons I am here is the list of customers that we have as a company, which are some of the best pediatric hospitals in the world. The fact that these hospitals have chosen to deploy this technology in their institution to help their decision making and to help the communication between doctors and nurses, really spoke volumes to me about the company and where we are. We are still young as a company and working to drive awareness of our technology, and engaging a lot more clinicians in hospitals, but the track record that the company has already is impressive.

CEOCFO: *Would you tell us about the Etiometry platform?*
Mr. Cooke: There are a couple of key aspects to the platform. First is the T3 technology, which focuses on data aggregation and visualization.

This takes all the data, inputs and key parameters from various devices that a clinician needs to process every minute to care for their patient and shows high-fidelity data on one platform. Using the Etiometry Software, you can look at all the parameters, and you can track back and review the history and the trends for each of those patients for as long as those data inputs have been coming into the system. It is often used for rounding and communication between physicians, nurses and even the family about where the patient is and what might be leading to an elevated parameter or certain clinical condition. Vital data is there on one screen, which is often displayed right by the bedside or clinicians can log into this from a web application. That is the first key part of the technology, the aggregation of data consolidating it from multiple medical devices, lab results and other sources and putting this all on one platform.

The second key aspect of the technology is applying advanced algorithms to some of the data to make it more personalized for each patient. You have heard of things like population health where they are looking at thousands of patients and looking for outcomes across that full, massive data set. This is very important work that is being done in the industry. However, what we do is essentially personalize it. We are looking at the unique parameters and information for each patient and comparing it to what we call a dynamic digital twin, which is a model based on all the data that we have collected over the years about human physiology and about all of their parameters and different values such as heart rate, blood pressure, etc.. We compare the current patient situation to what the model shows, and we flag any key differences based on our algorithms so clinicians can provide more attention to that patient. One example is our IDO2 Index, which is an FDA cleared algorithm for pediatric patients. With this algorithm, we show the probability that a patient is experiencing inadequate delivery of oxygen at any given time. If the index is red, this is typically when clinicians bring more attention to that patient to assess the current situation.

The third piece is what we call our Quality Improvement Sandbox. All of the data that is being collected and aggregated on our system is stored behind a hospital's firewall, which they can use for research to improve their care, generate quality reports to inform their practice, or to do some retrospective studies on the patients they have seen and the impact of different treatment paths they have taken. All elements of our technology are focused on improving care, helping clinicians, and trying to bring a good signal through all of the noise that clinicians see every day.

CEOCFO: *Does a doctor or hospital decide what information they want, what devices they want attached, what they might want to be alerted to, or is it standardized?*
Mr. Cooke: There are some elements that are standard, but for the most part it is very customizable. We work with the hospital to evaluate their existing infrastructure and customize the interfaces to accommodate solutions they already have in place - such as key inputs from other devices, which makes it easier for clinicians since they do not have to input anything. We do have the ability to customize, with our

Tech-Dev team, who are some of the best in the industry. We have the ability to move quickly and react to customer needs very quickly.

CEOCFO: *What have you heard from the doctors? What might they pay attention to now that they either did not focus on or maybe it was harder to read so it did not come into the forefront?*

Mr. Cooke: The feedback I have heard from clinicians, is that putting everything on one platform just brings attention to it for everyone. Many doctors and nurses we meet with discuss how their communication for each patient has improved when they use our system. Everyone seems to be on the same page, which is vital especially when caring for critically ill patients where time is of the essence and every bit of information is very important. Ensuring that everyone has that information and can see it all on one platform is very important to our customers.

CEOCFO: *Can a physician access this information remotely or is it strictly when you are looking at the patient in person?*

Mr. Cooke: You can do both. Most of our customers use what we call persistent displays, which is where the Etiometry platform is displayed right at the patient's bedside so the doctors and nurses can gather around, look at the data and look at the trends. You can access the same near real-time data right on a web browser. We integrate with the hospital's security system, so users can log in through the internet from anywhere.

CEOCFO: *What has changed since the concept and what have you learned as more and more hospitals are using Etiometry?*

Mr. Cooke: The key thing that has evolved is that the original concept of data aggregation and visualization is just the first step. The platform continues to evolve and now includes applying key algorithms and analytics to help clinicians better guide patient care. We are also including a hospital's specific protocols for particular areas of care which have been important technology developments since the concept was first created.

What our customers are asking for is help with facilitating their own protocols which can help guide clinicians to specific care pathways for certain clinical situations. There are a number of specific clinical use cases that we are implementing in our current customers, such as rounding, nursing hand-offs, care escalation, etc.

CEOCFO: *What are the challenges in getting adoption?*

Mr. Cooke: I think with any earlier stage company, the challenge is getting the attention of clinicians and nurses as there are so many things they need to focus on every day, with so little time to do it. I also think that regardless of the technology, it typically involves changing behavior, and with every technology, you have your early adopters and your late adopters. We continue to engage with the early adopters that we have converted thus far and learning what drove their usage of that technology. Then it is trying to take that to more of the larger portion of the market and building awareness of the technology and how you can use it. It all starts with focusing not necessarily on the technology itself

but the problems that we are solving. That is what we focus on, how we are best solving a problem for clinicians that they face on a daily basis. I firmly believe that we are doing that better than anyone else in the industry and we are seeing this across multiple centers that use our system, as they are simplifying workflows and reducing time to accomplish key tasks.

CEOCFO: *It is that some hospitals just do not think it is necessary or recognize what might be missed in looking at a number of machines or once it is explained, do they understand whether or not they have the money or the will to adopt it?*
Mr. Cooke: I think it is more of the latter. Once clinicians experience the technology for themselves, it is easy to understand the immediate benefits and long-term solutions. I have not found anyone that thinks our technology will not be useful in their unit. We are helping to solve real problems they face everyday, the value of it is there, and then we have to go through the hospital purchasing process and get everybody on board and that can take some time.

CEOCFO: *Are you seeking funding, partnerships or investment as you move forward?*
Mr. Cooke: We are open to any opportunities which will expand our reach, build awareness, and help us to have a meaningful impact on critical care. I'm reaching out to a number of companies that align with our same principles of transforming patient care.

CEOCFO: *With so much potential, how do you decide where to reach out?*
Mr. Cooke: We are going to focus on market segments that allow for the largest number of patients to benefit from our technology - currently, this is the complex critical care environment. We want to do more and more for every single patient out there and we let the needs of the market guide us. We are a very data-driven, and market-driven company, and are committed to tackling key problems that exist for both patients and clinicians.

CEOCFO: *Does it tend to be larger hospitals or might it be rural hospitals where you need a nurse to be able to see everything because there might not be a doctor around?*
Mr. Cooke: I think the need exists everywhere. As a company, we have focused more so initially on the academic hospitals, as a lot of early stage companies do because they tend to be the first to adopt new technologies. As we continue to progress as a company, I see a huge benefit of going more towards the rural or community hospitals where you might not have as many physicians present and we can help to show more data to guide decision making, and ensure everyone is on the same page. This will certainly be a focus area for us as we grow.

CEOCFO: *What if anything might people miss when they first look at Etiometry?*
Mr. Cooke: There is a lot of talk in the industry about big data and machine learning. Someone might look at our company, they may mistake us for a machine learning type of approach in analyzing thousands of data points and trying to come up with a trend between

them to help guide care. We are actually doing that on a per patient basis, with a model-based approach. We are looking down to the patient's level, working to personalize and transform care for that particular patient.