IN THE UNITED STATES DISTRICT COURT
NORTHERN DISTRICT OF FLORIDA
GAINESVILLE DIVISION

THE UNIVERSITY OF FLORIDA RESEARCH FOUNDATION, INC., **Plaintiff,**	)	**Civil Action No. _____** **Jury Trial Demanded**
vs.	)	
GENERAL ELECTRIC COMPANY, GE MEDICAL SYSTEMS INFORMATION TECHNOLOGIES, INC., and GE MEDICAL SYSTEMS, INC., **Defendants.**	)	

PLAINTIFF'S ORIGINAL COMPLAINT
FOR PATENT INFRINGEMENT AND JURY DEMAND

Plaintiff, The University of Florida Research Foundation, Inc. ("UFRF") hereby pleads the following claims of patent infringement against Defendants General Electric Company ("GENERAL ELECTRIC"), GE Medical Systems Information Technologies, Inc. ("GE MEDICAL IT"), and GE Medical Systems, Inc. ("GE MEDICAL") (GENERAL ELECTRIC, GE MEDICAL IT, and GE MEDICAL are collectively referred to as "GE").

PARTIES

1. The University of Florida ("UF") is a non-profit public educational institution based in Gainesville, Florida. UF is consistently ranked

among the nation's top universities. It has more than 50,000 students and has more than 5,000 faculty members, including 30 Eminent Scholar chairs and more than 40 members of the National Academy of Sciences, National Academy of Engineering, the Institute of Medicine, and the American Academy of Arts and Sciences. UF generates more than 100,000 Florida jobs, including more than 41,000 university employees. In 2016, UF ranked third in the nation for licenses and options executed on technologies developed at the university level, 16th in the total number of patent applications filed, and 10th in patents issued.

2. The Florida Legislature established UFRF in June of 1986 as a direct support organization ("DSO") under Title XLVIII, Chapter 1004 of the Florida Statutes, Section 1004.28. UFRF's mission is to promote, encourage, and assist the research activities of UF faculty, staff, and students. UFRF is a not-for-profit organization that enables research to be conducted flexibly and efficiently, and ensures that discoveries, inventions, processes, and work products of UF faculty, staff, and students can be transferred from the laboratory to the public. Funds generated by licensing UF innovations are channeled back to UF to enhance UF's research and education mission.

3. UFRF is an arm of the State of Florida. As a statutory DSO for UF, UF has been granted the statutory authority and administrative discretion

to supervise and control UFRF's day-to-day operations. UFRF enjoys sovereign immunity, including sovereign immunity under Title XLV, Chapter 768 of the Florida Statutes, Section 768.28. By filing this action, UFRF expressly reserves its sovereign immunity from any *inter partes* review.

4. UFRF is the assignee and exclusive owner of more than 2,400 active patents, including U.S. Patent No. 7,062,251 (the "'251 patent."). UFRF has a principal place of business at 288 Grinter Hall, Gainesville, Florida 32611-5500.

5. Upon information and belief, Defendant GENERAL ELECTRIC is a New York corporation with a principal place of business at 33-41 Farnsworth Street, Boston, Massachusetts 02210. GENERAL ELECTRIC may be served with process through its agent for service of process at CT Corporation System, 1200 South Pine Island Road, Plantation, Florida 33324.

6. Upon information and belief, Defendant GE MEDICAL IT is a Wisconsin corporation and a wholly owned subsidiary of GENERAL ELECTRIC with a principal place of business at 8200 West Tower Avenue, Milwaukee, Wisconsin 53223-3219. GE MEDICAL IT may be served with process through its agent for service of process at CT Corporation System, 1200 South Pine Island Road, Plantation, Florida 33324.

7. Upon information and belief, Defendant GE MEDICAL is a Delaware corporation and a wholly owned subsidiary of GENERAL ELECTRIC with a principal place of business at 3000 North Grandview Boulevard, Waukesha, Wisconsin 53188. GE MEDICAL may be served with process through its agent for service of process at CT Corporation System, 1200 South Pine Island Road, Plantation, Florida 33324.

JURISDICTION AND VENUE

8. This is an action for patent infringement arising under the patent laws of the United States of America, Title 35 of the United States Code, and this Court has subject matter jurisdiction over the matters pled herein under 28 U.S.C. §§ 1331 and 1338(a).

9. Defendants regularly and deliberately engage in and continue to engage in activities that result in at least using, selling, offering for sale, and/or importing the patented invention in or into the United States, the State of Florida and this judicial district, and thus violate UFRF's United States patent rights under the '251 patent. This Court has personal jurisdiction over Defendants, because, among other things, patent infringement is a cause of action arising under the laws of the United States, and Defendants conduct business in the United States and the State of Florida such that they enjoy the privileges and protections of federal and Florida law. GE sells products,

including infringing products, directly into the State of Florida and this District and is subject to general and specific jurisdiction in this State.

10. GE also has a regular and established place of business in this District. Through its GE Healthcare division, GE maintains an office at 6500 West Newberry Road, Suite 80, Gainesville, Florida 32605, which is within this District. As more fully discussed herein, the patent at issue relates to patient monitoring devices; GE offers services to repair and maintain biomedical equipment, such as the devices at issue in this Complaint, from its location in this District.

11. Venue is proper in the Northern District of Florida pursuant to 28 U.S.C. § 1400(b).

BACKGROUND OF U.S. PATENT NO. 7,062,251

12. The '251 patent is entitled "Managing Critical Care Physiologic Data Using Data Synthesis Technology (DST)" and issued on June 13, 2006. A true and correct copy of the '251 patent is attached hereto as Exhibit A. The '251 patent is valid and enforceable.

13. The inventors of the '251 patent are Willa H. Drummond ("Dr. Drummond"), Tony C. Carnes ("Dr. Carnes"), Kevin R. Birkett ("Mr. Birkett"), and Samuel W. Coons ("Mr. Coons").

14. Dr. Drummond graduated from the Perelman School of Medicine at the University of Pennsylvania in 1970 and subsequently obtained a fellowship in pediatric cardiology.

15. Dr. Drummond is board-certified in pediatrics, pediatric cardiology, and neonatology.

16. In the late 1970s, Dr. Drummond was recruited to UF to research cardiovascular pediatrics utilizing in utero lamb testing. UF was one of the top five national programs for lamb testing and research.

17. While researching, Dr. Drummond continued an active practice in pediatrics, pediatric cardiology, and neonatology.

18. Through both her research and clinic experience, Dr. Drummond identified a need faced by physicians when both treating patients and collecting research data.

19. Namely, while personal computers and the internet were beginning to gain ubiquity, medical monitoring and bedside devices began to proliferate. Physicians were faced with a large amount of available data but had no reliable means to collect or consolidate that data in real-time.

20. One such problem faced a practitioner. While treating a patient in a "hands-on" situation, a physician was unable to record data or switch

between data sources on a nearby computer because her hands were literally touching and treating the patient.

21. Another problem that faced Dr. Drummond, this time as a researcher, was recording and analyzing data from multiple data sources and bedside devices. It was impossible to record using pen and paper the variety of different data available to create a historical record of patient vital signs that could be used to identify treatment options or other concerns.

22. In fact, nurses spent an estimated five out of every 24 hours transcribing numbers of bedside machine displays onto paper flow charts that folded out into four feet in length. A file of these charts for one premature infant could be two feet thick before the baby was discharged, as demonstrated by Dr. Drummond in the following picture:

23. In 1998, Dr. Drummond received grant funding to pursue a degree in medical informatics. During that coursework, Dr. Drummond learned about database organization and optimization and how those fields could be utilized by medical practitioners. Dr. Drummond obtained a Master of Science degree in Informatics from the University of Utah School of Nursing in 2000.

24. In late 2000, Dr. Drummond contacted the Dean of Engineering at UF to identify additional researchers who could help her revise, finalize, and reduce to practice her idea. Dr. Drummond was referred to Dr. Carnes, an adjunct professor in UF's Computer Science and Engineering Department who was working on issues relating to patient care.

25. At that time, Dr. Carnes was working with Mr. Coons and Mr. Birkett and talking about starting a new company. With Dr. Drummond, they had the beginnings of an idea that would be the foundation of that company.

26. The inventors of the '251 patent received some initial funding from Cenetec and moved into UF's innovation hub, at the time known as the GTech Building.

27. In 2001, Dr. Carnes, Mr. Coons, and Mr. Birkett began working full time for their burgeoning company, ICU DataSystems. While Dr. Drummond was still intimately involved with the company, she continued treating patients.

28. Over the next several years, the inventors continued refining and developing the ideas in the ’251 patent. They worked on obtaining data from multiple devices, marrying the timing and type of that data, creating translation tables, and mapping data output for use in a singular display.

29. A provisional application for the ’251 patent was filed on March 5, 2003.

PROBLEMS SOLVED BY U.S. PATENT NO. 7,062,251

30. Treating physicians are dependent on the relevant physiologic data.

31. The environment in which a physician works is complex, fast-paced, and crowded with both people and devices.

32. Improper treatment decisions, based upon incorrect or improperly organized data, result in life-altering consequences.

33. Physicians are required to move from patient to patient very quickly, particularly in emergency situations, during which even accurate physiologic data from bedside machines is useless unless it is presented in a cohesive and intelligible manner.

34. The ’251 patent provides mechanisms for obtaining and utilizing accurate physiologic data from multiple bedside machines.

35. Bryan Bergeron, M.D., FACMI ("Dr. Bergeron") testified regarding the background of, problems solved by, and inventions disclosed in the '251 patent. His declaration is attached as Exhibit B and is incorporated herein in full ("Bergeron Decl."). Among other qualifications, Dr. Bergeron has taught at Harvard Medical School and the Massachusetts Institute of Technology for over 30 years, developed a commercial multimedia patient simulator, worked with electronic medical records applications, developed a variety of decision support tools and associated user interfaces for a clinical workstation, and has practiced in the field of medical informatics for more than 30 years, including publications in over two-dozen books, numerous chapters, and over 500 articles on topics ranging from clinical medicine, technology, and robotics to computing and the business of technology. *See generally*, Bergeron Decl. ¶¶ 3–26.

36. The introduction of bedside machines "created a new technological need—that of integrating data from bedside machines that created and communicated data using different protocols. Before standards were established, bedside machine manufacturers both large and small typically developed bedside machines that generated and communicated data using proprietary protocols." *Id.* ¶ 35.

37. The most common methodology of obtaining information from multiple bedside machines was to do everything by hand. *Id.* ¶ 31. This, however, rendered real-time decision support impossible and provided transcription errors, lost records, and no automatic checks on the data. *Id.*

38. Recording and storing paper information was time-consuming and expensive and could result in errors that in turn resulted in improper treatment.

39. As explained by Michael D. Weiss, M.D. ("Dr. Weiss"), an Associate Professor in the Division of Neonatology at UF, hand-recorded vital information was often recorded "retrospectively" during an acute event, was often inaccurate, and tended to be illegible when multiple events within a short time were coded. *See* Declaration of Dr. Weiss at ¶ 9 ("Weiss Decl."). The Weiss Decl. is attached as Exhibit C and is incorporated herein in full.

40. In the context of clinical research, the manual entry of paper-collected physical data consumes hundreds of hours, increases the likelihood of errors, and results in the failure to identify clinically important cases because of the inability to format, search for, and identify those cases.

41. If the health care provider instead elected to utilize only one manufacturer's bedside machines instead of manual paper entry, it would be "locked into" that manufacturer's products which could result in the selection of products with lower fidelity or supra-competitive costs. This was a "rare

occasion" because of the wide variety of possible bedside monitoring machines that could be used on a particular patient. Bergeron Decl. at ¶ 29.

42. Another possible substitute would be to use bedside machines from different manufacturers that all used the same data format standard. *Id.* ¶ 30. This did not guarantee compatibility with the electronic medical record system in place at the hospital or necessarily provide the physician with an adequate selection of bedside machines. *Id.*

43. As another alternative, a "screen scraper" could be used to capture the pixels on one monitor and copy them to another monitor. *Id.* ¶ 32. While this allowed parts of displays from one or more bedside machines to be viewed on a single display, the interface was non-interactive, the logic and underlying meaning of the data were lost, and the processing and reformatting and analysis of the data were not possible. *Id.*

44. These alternates sources demonstrate that the '251 patent does not preempt the field of data informatics for medical service providers.

INVENTIONS CLAIMED IN U.S. PATENT NO. 7,062,251

45. The inventions disclosed in the '251 patent solve the aforementioned problems by utilizing data synthesis technology to integrate physiologic data from at least one bedside machine with data from other data sources.

46. One aspect of the inventions includes receiving physiologic data from at least two bedside machines and converting the physiologic data into a machine independent format that is dynamically matched with discreet workflow data elements.

47. For example, a data stream can be received from each of the bedside machines and a transport protocol particular to one of the bedside machines can be determined for each data stream. Thereafter, the data stream can be segmented into discrete elements.

48. Data segmentation and manipulation may occur by multiple means. In one embodiment, the bedside device can contain a driver for each different connected bedside machine. That driver can translate the data stream into content or interpret device specific protocols for data streams of the bedside machine.

49. A person of ordinary skill in the art would understand that these machine-specific drivers require detailed analysis of the data stream created by each bedside machine to discover where in the data stream a particular datum was represented, as well as any error correction codes or other signal data that were represented. Bergeron Decl. ¶ 37.

50. A person of ordinary skill in the art would understand that developing a driver would require first insuring hardware compatibility,

including voltage layers, operating system compatibility, which provisions for features such as interrupts, timing and built-in error correction and then correctly parsing and interpreting the data stream. *Id.* ¶ 39.

51. These drivers can solve for differing formats in data streams of different bedside devices. For example, a machine may have a data stream having discrete 20 byte segments, where the first 4 bytes in each byte segment identify the machine, the next 6 bytes contain a timing parameter, the next 5 bytes a systolic value, and the final 5 bytes a diastolic value. The device driver for the bedside machine can correctly interpret the segment data stream for the machine. Notably, a different manufacturer of a different beside machine could segment a data stream into 30-byte segments. The different bedside machine thus may have a different driver associated with it to properly sort the byte segments.

52. A person of ordinary skill in the art would also understand that bedside machine-specific drivers would have to be designed for error detection and to recover gracefully from a failure. *Id.* ¶ 43.

53. The incorporation of these drivers—which are in and of themselves sets of rules—improved the existing technological process by allowing the automation of further tasks. Dr. Carnes and his team did exactly

that, creating a library of 40 drivers for approximately 150 different devices and 32 different manufacturers.

54. Data conversions can also utilize tables to cross-reference machine or database specific data to standardized data. In that embodiment, each data source, such as a bedside machine, can have appropriate cross reference tables for data conversion. For example, one bedside machine can store pulse rate as a floating-point variable called RATE, while the data standard can record pulse rate as an integer variable called PULSE. In that example, data stored within the machine specific data store can detail that RATE equals PULSE.

55. A person of ordinary skill in the art would also understand that the use of conversion tables would require data cleaning and verification. *Id.* ¶ 45. Using heart rate as an example, a value outside the physiologically possible range of 35 to 140 beats per minute would not be processed by the conversion table. *Id.*

56. These conversions occur real-time or near-real time. Accordingly, the standardized data can then be conveyed to a graphical user interface or bedside device for display. Requiring prior art systems or hand calculations, in contrast, can ultimately result in patient death. Treating physicians and nurses need real-time access to all relevant data to make appropriate treatment

decisions. Reducing the practitioners' access to data results in uninformed or misinformed treatment decisions with potentially disastrous results.

57. As a result of the foregoing, the '251 patent does not simply instruct a practitioner to implement an abstract idea on a generic computer or to perform repetitive calculations, but instead presents a solution that is necessarily rooted in medical computer technology in order to overcome a problem specifically arising in the realm of medical practice—the immediate use of vast amounts of synthesized data in a manner that can help save lives. *See also id.*, ¶ 48.

58. Incorporation of the data tables and specially-designed drivers, not the use of a computer, improved previously existing technological processes by allowing the automation of further tasks.

59. The '251 patent is thus directed to an improvement in the way bedside devices work in the physiologic context—time and unit syncing to better utilize data for patient outcomes. The claimed invention thereby accesses and combines disparate information sources from different bedside devices rather than synthesizing information from singular sources. The functionalities allow for true clinical decision support, including multi-variate graphs collected from different machines, review of trends over time, and multiple-variable alerts to detect true clinical issues.

60. The inventions claimed in the ’251 patent do not merely collect electronic information, display information, or embody mental processes that could be performed by humans, but rather collect, manipulate, interpret, and display information in a manner that could not be and was not performed by humans.

61. The inventions in the ’251 patent produce more accurate results by taking into consideration the differences in bedside machines from different manufacturers that may use different proprietary data standards. Absent this improvement, data streams would not match based on time or units, and the data would be rendered useless to a practitioner.

62. Moreover, the inventions claimed in the ’251 patent transformed the subjective process employed by physicians regarding which data to select and record into an automated process executed at the bedside.

ICU DATASYSTEMS, iCURO, AND SUBSEQUENT LICENSEES

63. UF was granted all rights in the ’251 patent and assigned it to UFRF, and UFRF licensed the patent to ICU DataSystems.

64. The inventors of the ’251 patent, while working with ICU DataSystems, continued to develop products covered by the ’251 patent.

65. ICU DataSystems and its employees spent thousands of hours over multiple years to implement the inventions in the '251 patent and created a working product with the tradename iCuro.

66. ICU DataSystems developed, tested, and FDA certified iCuro as a 510K device.

67. The iCuro system was a bedside, networked, movable machine that automatically acquired and integrated time-stamped monitor, ventilator, and infusion pump data with patient data from labs, specialty devices, and bedside observations.

68. iCuro had a secure, HIPAA-standards compliant architecture and was locally configurable using push-button set-up and an integrated HL7 mapping utility. The iCuro device provided real-time access to trended clinical information streams at the bedside.

69. The iCuro user interface gave each treating clinician flexibility to generate "their" integrated information set on demand, in the desired format.

70. The device also automated nurse and respiratory therapist charting, and concatenated user-entered and machine-acquired data onto "zoom-able" trend graphic panels and paper reports.

71. Dr. Drummond demonstrated an early version of iCuro in the clinical environment:

72. Dr. Weiss has experience with the iCuro and the inventions embodied in the ’251 patent. Dr. Weiss has used iCuro and its successors since 2004. Weiss Decl. ¶ 11.

73. Dr. Weiss explained the problems with multiple bedside devices from different manufacturers, the use of different screens, different time durations and units, lack of appropriate sampling rates, and that it was “nearly impossible” to utilize paper charts to solve these problems. *Id.* ¶¶ 12–17.

74. Dr. Weiss used the iCuro, and the inventions embodied in the ’251 patent in both the clinical and research settings. *Id.* ¶ 18. He provides two examples of clinical applications for the iCuro and inventions embodied in the ’251 patent: “Premature Neonate” and “Term Neonate with HIE.”

75. The first example concerns a severely premature 25-week-old neonate. The current standard of care is to monitor these babies with physiologic monitoring including invasive blood pressure monitoring via an umbilical arterial catheter, a continuous EKG, a systemic saturation, and continuous cerebral oximetry. *Id.* ¶ 20.

76. Premature neonates are at risk for intraventricular hemorrhages (bleeding from fragile vessels that line the ventricles), which increase the risk for long-term neurodevelopmental impairments. Hypotension or low blood pressure may lead to intraventricular hemorrhages in unstable premature babies. *Id.* ¶¶ 21–22.

77. Prior to the iCuro and the inventions in the ’251 patent, a cerebral oximeter would evaluate low blood pressure in the cerebrum. The cerebral oximeter, however, was made by a different manufacturer than the physiologic monitors, which required the clinician to look at two separate monitors and try to guess the correlations between the two sources of information. This oftentimes is very inaccurate and time consuming. *Id.* ¶¶ 23–24.

78. Without the iCuro and the inventions embodied in the ’251 patent, the rapid and individual care of the patient by fixing the underlying problem—low blood pressure—which will decrease the probability of an intraventricular hemorrhage “would not be possible.” *Id.* ¶ 25.

79. The second clinical example regards a term neonate with HIE. HIE is a type of brain injury that occurs at the time of birth. The only current treatment is to lower core temperature to 33.5 degrees Celsius from the normal core temperature of 36.5 degrees Celsius using a cooling blanket. *Id.* ¶ 26.

80. These neonates are critically ill and are often on ventilators, require blood pressure support, and have seizures. They are monitored with continuous video EEG monitoring, cerebral oximetry, continuous EKG, systemic saturations, and cerebral oximetry. *Id.* ¶ 27.

81. In one particular example, Dr. Weiss managed a term neonate that was undergoing hypothermia using the iCuro and the inventions embodied in the '251 patent. He was able to rapidly identify an increase in heart rate which correlated with a decrease in blood pressure and cerebral oximetry. The patient, however, had an increase in urinary output which accounted for the changes. When infusion of fluids was decreased, the heart rate decreased and blood pressure and cerebral oximetry improved. *Id.* ¶ 29.

82. Without the iCuro and the inventions embodied in the '251 patent, a doctor would have been unable to identify this trend rapidly and intervene. *Id.* ¶ 30.

83. In the clinical context, Dr. Weiss has researched neonatal brain injury, specifically neonates with Hypoxic-Ischemic brain injury. His team has

utilized the iCuro and the inventions embodied in the '251 patent for this research. *Id.* ¶¶ 32–33.

84. The inventions in the '251 patent allowed Dr. Weiss's team to adjust the data capture rate to customize data collection to meet the needs of his team. *Id.* ¶ 34.

85. For example, Dr. Weiss's team utilized collection of multiple bedside machines to predict brain injury on MRI at 3 days of life. Dr. Weiss's team was able to use the inventions described in the '251 patent to examine patterns of vital signs during the first 24–48 hours of life and have identified patterns with a sensitivity and specificity of 80%–90% in predicting injury on MRI based on vital sign patterns collected from multiple devices. The development of such patterns would not be possible without the inventions described in the '251 patent and embodied in iCuro. *Id.* ¶¶ 35–37.

86. While iCuro enjoyed local success at UF, ICU DataSystems faced capital concerns in 2006. At that time, ICU DataSystems transferred its assets to V2R, a private-equity company. ICU AcquisitionCo Inc. ("ICUA") was formed to hold the license to the '251 patent and a license was granted in ICUA's name.

87. Based upon the technology and promise regarding the '251 patent, Somanetics Corp. acquired ICUA in 2008.

88. In 2010, Covidien PLC acquired Somanetics Corp. and specifically named the license to the '251 patent as one of the acquired assets.

89. In 2015, Medtronic acquired Covidien PLC. Medtronic affirmatively assumed the duties under the license to the '251 patent.

90. In 2016, UFRF filed suit against Medtronic and Covidien to enforce its rights under the license to the '251 patent. Ultimately, the parties settled that lawsuit. As a material term of that settlement, the license to the '251 patent became non-exclusive so that UFRF could recoup from market free-riders the inventors' substantial monetary and time investments in the '251 patent.

COUNT 1—DIRECT INFRINGEMENT

91. UFRF incorporates herein its allegations in paragraphs 1–90.

92. All requirements under 35 U.S.C. § 287 have been satisfied with respect to the '251 patent.

93. The '251 patent teaches and claims an innovative and specific apparatus and method designed to improve the data connectivity and operational efficiency of medical devices.

94. Through the inventions claimed in the '251 patent, treating physicians and staff were enabled for the first time to utilize bedside machines

from a variety of manufacturers to most appropriately and efficiently treat their patients.

95. Those medical professionals were no longer required to utilize the products of only one manufacturer—with the potential lack of certain functionalities that risk negative patient outcomes—but could instead utilize the best equipment for each patient without losing data fidelity.

96. On information and belief, Defendants have been and continue to directly infringe the ’251 patent by making, using, offering for sale, selling, and/or importing in or into the United States, without authority, a family and product line of data connectivity systems and products including the CARESCAPE Network (“CARESCAPE”).

97. Examples of how one or more claims of the ’251 patent cover CARESCAPE is illustrated in detail in the claim chart attached hereto as Exhibit D.

98. For example, the Defendants meet ’251 patent claim 1 limitation of “receiving physiologic data from at least two beside machines” by utilizing its “Unity Network Interface Device” (“UNITY NETWORK ID”).

99. As a further example, the Defendants meet ’251 patent claim 1 limitation of “converting said physiologic treatment data from a machine specific format into a machine independent format” by utilizing the UNITY

NETWORK ID to connect to up to 8 stand-alone bedside devices, using Device Identification Communication Adapters to automatically identify a supported device and make a connection, converting the data to a Unity Network protocol, and/or transmitting the data via the Unity Network Ethernet protocol to a device such as a bedside monitor, clinical information system, or central station.

100. CARESCAPE and the UNITY NETWORK ID integrate and transmit data from devices including ventilators, infusion pumps and vital signs monitors.

101. Defendants also perform at least one programmatic action involving machine-independent data, by setting alarms levels from a Clinical Information Center and providing alarm alerts on patient monitors or other devices connected to CARESCAPE.

102. Defendants also present results from those programmatic actions upon a bedside graphical user interface.

103. Defendants have never expressly or impliedly been licensed under the ’251 patent.

104. Defendants’ direct infringement of the ’251 patent has caused, and will continue to cause, substantial and irreparable damage to UFRF. UFRF is, therefore, entitled to an award of damages adequate to compensate for

Defendants' infringement of the '251 patent, but no less than a reasonable royalty for Defendants' use and/or sale of UFRF's invention, together with interest and costs as fixed by the court under 35 U.S.C. § 284.

COUNT 2—INDIRECT INFRINGEMENT

105. UFRF incorporates herein its allegations in paragraphs 1–104.

106. Defendants indirectly infringe and induce infringement under 35 U.S.C. § 271(b) by actively and knowingly aiding and abetting the direct infringement of the '251 patent by medical practitioners and related healthcare entities. Defendants effectuate this infringement through sales literature, advertising, updating, training, and instructions that inform medical providers how to use CARESCAPE and the UNITY NETWORK ID to infringe the '251 patent. For example and without limitation, Defendants' CARESCAPE and UNITY NETWORK ID instructional and marketing literature direct medical practitioners and related healthcare entities to practice the invention claimed by the '251 patent. *See* Exhibits E–J.

107. Neither Defendants nor any medical practitioners or related healthcare entities utilizing Defendants' products have at any time expressly or impliedly been licensed under the '251 patent.

108. Defendants have had knowledge of the '251 patent since at least as early as the filing of this complaint.

109. Defendants know or should know that the acts described above would result in direct infringement of the '251 patent by medical practitioners and related healthcare entities, as Defendants know of the '251 patent and UFRF's allegations that CARESCAPE and the UNITY NETWORK ID infringe the '251 patent.

110. Defendants' specific intent to encourage medical practitioners and related healthcare entities to directly infringe the '251 patent may be reasonably inferred from the specific acts discussed above coupled with Defendants' actual knowledge of the '251 patent and UFRF's infringement allegations.

111. Defendants' indirect and induced infringement of the '251 patent has caused and will continue to cause substantial and irreparable damage to UFRF. UFRF is, therefore, entitled to an award of damages adequate to compensate for Defendants' infringement of the '251 patent no less than a reasonable royalty for Defendants' use and sale of UFRF's patented invention, together with interest and costs as fixed by the court under 35 U.S.C. § 284.

PRAYER

WHEREFORE, UFRF respectfully requests that judgment be entered in its favor and against Defendants and respectfully requests that the Court grant the following relief:

(a) Declare that the '251 patent is valid and enforceable;

(b) Declare that Defendants are liable for direct infringement of the '251 patent;

(c) Declare that Defendants are liable for inducing infringement of the '251 patent;

(d) Award damages to Plaintiff, The University of Florida Research Foundation, Inc., to which it is entitled for Defendants' infringement of the '251 patent;

(e) That Plaintiff, The University of Florida Research Foundation be awarded any other supplemental damages and interest on all damages, including, but not limited to, attorney's fees available under 35 U.S.C. § 285; and

(f) That Plaintiff, The University of Florida Research Foundation be awarded such other and further relief as this Court may deem just and proper, including but not limited to, equitable relief and all remedies available at law.

JURY DEMAND

Pursuant to Federal Rule of Civil Procedure 38(b), Plaintiff, The University of Florida Research Foundation, Inc., hereby demands a trial by jury on all issues triable to a jury.

Respectfully submitted this 5th day of July, 2017, by the following attorneys for The University of Florida Research Foundation, Inc.:

/s/ *John D. Jopling*
John D. Jopling
Florida Bar No. 348104
David M. Delaney
Florida Bar No. 121060
DELL GRAHAM, P.A
203 NE First Street
Gainesville, FL 32601
(352) 372-4381 - telephone
(352) 376-7415 - fax
jjopling@dellgraham.com
ddelaney@dellgraham.com
dgpleadings@gmail.com

AND

Michael W. Shore
Texas Bar No. 18294915
mshore@shorechan.com
Alfonso Garcia Chan
Texas Bar No. 24012408
achan@shorechan.com
Christopher L. Evans
Texas Bar No. 24058901
cevans@shorechan.com
Andrew M. Howard
Texas Bar No. 24059973
ahoward@shorechan.com
Russell J. DePalma
Texas Bar No. 00795318
rdepalma@shorechan.com
SHORE CHAN DEPUMPO LLP
901 Main Street, Suite 3300
Dallas, Texas 75202
Telephone: (214) 593-9110
Facsimile: (214) 593-9111

ATTORNEYS FOR THE UNIVERSITY OF FLORIDA RESEARCH FOUNDATION