Sarcos Subsidiary RE2, LLC Achieves Technical Milestone with Dexterous Underwater Robotic Gripper for U.S. Navy

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The Company bolsters its End-of-Arm Tooling capabilities with tactile feedback for underwater manipulation

PITTSBURGH--(BUSINESS WIRE)--Jun. 28, 2022-- RE2, LLC, a wholly owned subsidiary of Sarcos Technology and Robotics Corporation (“Sarcos”) (NASDAQ: STRC and STRCW), today announced that it has achieved a significant technical milestone with its Strong Tactile mARitime hand for Feeling, Inspecting, Sensing and Handling (STARFISH), an underwater end-of-arm tooling (EOAT) project being funded through the U.S Navy's Office of Naval Research (ONR). STARFISH is an advanced gripper EOAT with tactile feedback that is being developed for mine countermeasures and explosive ordnance disposal (EOD) for the U.S. Navy. With this technical milestone, the company has successfully assembled and lab-tested a complete STARFISH gripper capable of grasping and holding a variety of different objects.

This press release features multimedia. View the full release here: https://www.businesswire.com/news/home/20220628005128/en/

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During lab testing, the STARFISH prototype used three tactile-sensing fingers to successfully achieve a variety of fine- and large-gripping skills, including squeezing a pair of tweezers and grasping larger objects. Each finger conforms to the shape it is grasping, enabling it to securely hold objects upon contact.

The Company is developing this technology with professors Dr. Veronica Santos, director of the Biomechatronics Laboratory at UCLA, and Dr. Jonathan Posner, professor of mechanical engineering and chemical engineering at the University of Washington. Dr. Posner’s team, in collaboration with Dr. Santos’ team, designed the multimodal tactile sensor skin that enables the grippers’ sensorized fingertips to feel normal and shear forces.

“When visual feedback is limited, complementary senses such as touch play a critical role in completing dexterous tasks,” explains Santos. “This is true for humans as well as for robots remotely controlled by humans. Tactile sensation will enhance the teleoperation and semi-autonomous control of underwater robot hands for difficult manual tasks.”

“STARFISH uses advanced touch sensors and next-generation haptic feedback to provide robot operators with the last link in terms of robotic perception capabilities—the ability to ‘feel’ objects in the environment,” said Dr. Adam Brant, project manager, Sarcos. “This will enable EOD personnel to locate, sense, and interact with objects they both can and cannot visualize from a remote, safe distance.”

The gripper uses an advanced array of visual and underwater sensors to orient itself to its environment. It will operate in hazardous underwater environments that would typically damage end effectors, including turbidity, ocean swells, and other dynamic underwater conditions. Data collected from the hand’s interactions within the environment will be sent back to the operator control unit (OCU), allowing the operator to perform complex manipulation tasks from a remote location.

“STARFISH significantly advances the capabilities of underwater robotics across a variety of military and commercial applications,” said Jorgen

Pedersen, Chief Operating Officer, Sarcos. “Adding the STARFISH EOAT to our Sapien Sea Class robotic arms will provide robot operators with even greater mobility, visualization, and dexterity in precarious underwater environments.”

During the next phase of the project, the STARFISH grippers will be attached to Sapien Sea Class underwater arms, which will then be mounted on an underwater ROV and tested in a subsea environment.

About Sarcos Technology and Robotics Corporation

Sarcos Technology and Robotics Corporation (NASDAQ: STRC and STRCW) is a leader in industrial robotic systems that augment human performance by combining human intelligence, instinct, and judgment with the strength, endurance, and precision of machines to enhance employee safety and productivity, enable remote operations and reduce operational costs. Sarcos’ mobile robotic systems, including the Guardian ® S, Guardian® GT, Guardian® XO®, and Guardian® XT™, along with the Sapien family of robotic arms from RE2, RE2 Detect computer vision software, and RE2 Intellect autonomy software, are designed to revolutionize the future of work wherever physically demanding work is done. Sarcos is headquartered in Salt Lake City, Utah, and now has a second location in Pittsburgh, PA. For more information, please visit www.sarcos.com.

Forward-Looking Statements

This press release contains forward-looking statements within the meaning of the Private Securities Litigation Reform Act of 1995, including, but not limited to, Sarcos’ product roadmap, including the expected timing of commercialization or new product releases,; products and markets of each company; the expected benefits of the acquisition of RE2 and Sarcos’ ability to realize those benefits; Sarcos’ performance following the acquisition of RE2, customer interest in Sarcos’ products, Sarcos’ plans to expand its product availability and Sarcos’ use of capital, including Sarcos’ ability to accomplish the initiatives outlined above. Forward-looking statements are inherently subject to risks, uncertainties and assumptions. Generally, statements that are not historical facts, including statements concerning possible or assumed future actions, business strategies, events, or results of operations, are forward-looking statements. These statements may be preceded by, followed by or include the words “believes,” “estimates,” “expects,” “projects,” “forecasts,” “may,” “will,” “should,” “seeks,” “plans,” “scheduled,” “anticipates,” “intends” or “continue” or similar expressions. Such forward-looking statements involve risks and uncertainties that may cause actual events, results or performance to differ materially from those indicated by such statements. These forward-looking statements are based on Sarcos’ management’s current expectations and beliefs, as well as a number of assumptions concerning future events. However, there can be no assurance that the events, results, or trends identified in these forward-looking statements will occur or be achieved. Forward-looking statements speak only as of the date they are made, and Sarcos is not under any obligation and expressly disclaims any obligation, to update, alter or otherwise revise any forward-looking statement, whether as a result of new information, future events, or otherwise, except as required by law. Readers should carefully review the statements set forth in the reports which Sarcos has filed or will file from time to time with the Securities and Exchange Commission (the “SEC”). In addition to factors previously disclosed in Sarcos’ reports filed with the SEC and those identified in this press release, the following factors, among others, could cause actual results to differ materially from forward-looking statements or historical performance: Sarcos’ ability to execute on its business strategy, address staffing shortages and supply chain disruptions, launch its products within expected timelines, develop new products and services and enhance existing products and services; ability to respond rapidly to emerging technology trends; ability to compete effectively, recruit and retain qualified personnel and manage growth and costs; the risk of litigation or regulatory actions in connection with the acquisition of RE2; the ability of Sarcos to successfully integrate RE2’s operations, personnel, products and technologies; the risk that the anticipated benefits of the acquisition of RE2 may not be realized or may take longer than anticipated to be realized, including as a result of the impact of, or problems arising from, the integration of the two companies or as a result of the economy and competitive factors in the areas where Sarcos and RE2 do business; and other risks and uncertainties set forth in the section entitled “Risk Factors” and “Cautionary Note Regarding Forward-Looking Statements” in documents filed from time to time with the SEC. The documents filed by Sarcos with the SEC may be obtained free of charge at the SEC’s website at www.sec.gov.

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