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Pressure BioSciences Announces Second Major Contract Utilizing its BaroFold Protein Refolding and Disaggregation Biopharma Services

Company Expects Significant Services Revenue Increase in 2019 as it Expands its BaroFold Platform into the Estimated \$44 Billion Global Bioprocess Technology Market

SOUTH EASTON, MA / ACCESSWIRE / July 24, 2019 /Pressure BioSciences, Inc. (OTCQB: PBIO) ("PBI" and the "Company"), a leader in the development and sale of broadly enabling, high pressure-based instruments, platform technologies and related consumables for the worldwide life sciences industry, today announced it has signed a contract services agreement with a world-renown, multi-billion dollar biotherapeutics company to enhance the process manufacturing of one of their candidate protein drugs.

The manufacturing of therapeutic proteins can be a complex and challenging process. According to a report in *F1000 Research* (Lagasse, Feb 2017), producing a typical protein drug may include more than 5,000 critical steps. Two of the major challenges associated with manufacturing recombinant proteins are (i) the formation of aggregates, and (ii) protein misfolding. These are significant issues that can prevent a protein drug candidate from ever making it to market. PBI's BaroFold™ technology platform offers a unique and cost-effective way to address these manufacturing challenges.

PBI purchased the assets of BaroFold, Inc. in late 2017, including their extensive patent portfolio. Since that time, the Company has incorporated its own proprietary technology and developed a cost-effective way to improve the process manufacturing of proteins by utilizing high pressure. To capitalize on these capabilities, PBI launched the BaroFold Biopharma Services Business in January 2019.

Dr. Alexander Lazarev, Chief Science Officer of PBI, said: "The BaroFold platform can be applied to the development and production of many different therapeutic proteins, can improve product safety, and is scalable and practical for standard bioprocess environments. Moreover, it offers ways to reduce or eliminate the use of aggressive chemicals in the protein manufacturing process. Thus, we believe this unique technology platform can help biopharmaceutical companies create and manufacture high quality novel protein therapeutics and biosimilars, lower the cost of existing formulations, and help protect our environment."

Protein-based therapeutics are a large and growing part of the global healthcare industry. Based on data in the THPdb database (<http://crdd.osdd.net/raghava/thpdb/>), there are over 200 therapeutic proteins and peptides currently approved by the FDA for clinical use in the

US. These target therapies have shown significantly improved outcomes for many patients suffering from severe medical conditions, such as cancer and immunological diseases. According to a report from *Research and Markets* (May 2016), the global protein drug market will reach approximately \$248 billion by 2020.

Richard T. Schumacher, President and CEO of PBI, commented: “Our proprietary BaroFold Biopharma Services Business offers us a unique opportunity to enter the estimated \$44 billion (by 2026) global bioprocess technology market (Transparency Market Research, July 2018). In addition to successfully performing contract services for two biopharmaceutical companies since the beginning of 2019, we are also in discussions with three additional biopharmaceutical companies interested in utilizing our proprietary BaroFold services for their protein drug candidates. To take full advantage of this opportunity, we have doubled the capacity of our contract services team, purchased additional sophisticated equipment, and developed new high-pressure concepts that further improve and enhance our BaroFold process scalability and its GMP compliance.”

Mr. Schumacher concluded: “We believe our recently launched BaroFold Biopharma Services Business could add as much as \$500,000 to 2019 total revenue and significantly more to total revenue for 2020 and beyond. It is important to note that these estimates do not include the anticipated growth in Barocycler™ 2320EXT sales that we believe will result from biotechnology and biopharmaceutical companies developing their own manufacturing, quality control, and protein characterization applications on our leading PCT-based instrument system. These are truly exciting times for all stakeholders in PBI.”

About the BaroFold Technology Platform

The BaroFold™ platform is a patented technology that employs carefully controlled high pressure for the disaggregation and controlled refolding of recombinant proteins into their native structures for desired drug activity. The BaroFold technology platform is transformative and practical for biopharmaceutical manufacturing processes, offering substantially reduced production costs due to its increased process yield and throughput in both mammalian and non-mammalian systems. The BaroFold technology platform is easily scalable and has been utilized for the cGMP production of pre-clinical and phase 1 through phase 3 clinical materials.

About Pressure BioSciences, Inc.

Pressure BioSciences, Inc. (OTCQB: PBIO) is a leader in the development and sale of innovative, broadly enabling, pressure-based solutions for the worldwide life sciences industry. Our products are based on the unique properties of both constant (i.e., static) and alternating (i.e., pressure cycling technology, or PCT) hydrostatic pressure. PCT is a patented enabling technology platform that uses alternating cycles of hydrostatic pressure between ambient and ultra-high levels to safely and reproducibly control bio-molecular interactions (e.g., cell lysis, biomolecule extraction). Our primary focus is in the development of PCT-based products for biomarker and target discovery, drug design and development, biotherapeutics characterization and quality control, soil & plant biology, forensics, and counter-bioterror applications. Additionally, major new market opportunities have emerged in the use of our pressure-based technologies in the following areas: (1) the use of our recently acquired, patented technology from BaroFold, Inc. (the “BaroFold” technology) to allow entry into the bio-pharma contract services sector, and (2) the use of our recently-patented,

scalable, high-efficiency, pressure-based Ultra Shear Technology ("UST") platform to (i) create stable nanoemulsions of otherwise immiscible fluids (e.g., CBD Oil and water) and to (ii) prepare higher quality, homogenized, extended shelf-life or room temperature stable low-acid liquid foods that cannot be effectively preserved using existing non-thermal technologies.

Forward Looking Statements

This press release contains forward-looking statements. These statements relate to future events or our future financial performance and involve known and unknown risks, uncertainties and other factors that may cause our or our industry's actual results, levels of activity, performance or achievements to be materially different from any future results, levels of activity, performance or achievements expressed, implied or inferred by these forward-looking statements. In some cases, you can identify forward-looking statements by terminology such as "may," "will," "should," "could," "would," "expects," "plans," "intends," "anticipates," "believes," "estimates," "predicts," "projects," "potential" or "continue" or the negative of such terms and other comparable terminology. These statements are only predictions based on our current expectations and projections about future events. You should not place undue reliance on these statements. In evaluating these statements, you should specifically consider various factors. Actual events or results may differ materially. These and other factors may cause our actual results to differ materially from any forward-looking statement. These risks, uncertainties, and other factors include, but are not limited to, the risks and uncertainties discussed under the heading "Risk Factors" in the Company's Annual Report on Form 10-K for the year ended December 31, 2018, and other reports filed by the Company from time to time with the SEC. The Company undertakes no obligation to update any of the information included in this release, except as otherwise required by law.

For more information about PBI and this press release, please click on the following website link:

<http://www.pressurebiosciences.com>

Please visit us on Facebook, LinkedIn, and Twitter.

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