

KnipBio Inc 110 Canal Street Lowell MA 01852

July 12, 2017

## For immediate release

## KnipBio Announces Successful Completion of BioProcessing Feed Scale-Up Program

(Lowell, MA) July 12, 2017. KnipBio Inc. announces the successful completion of the latest phase in its plan to produce KnipBio Meal, a premium aquaculture feed ingredient from low-cost, readily available feedstocks. The development was done in conjunction with the <a href="National Research Council of Canada">National Research Council of Canada (NRC)</a>.

According to Larry Feinberg, PhD, co-founder and CEO of KnipBio, "One of the key challenges facing humankind is to meet the protein needs of a growing global population. Aquaculture offers the best means to achieve this. It is currently a \$110B market that is expected to double by 2030 when two-thirds of all fish will be farm-raised. However, there is a significant roadblock to this growth- a lack of sustainable and healthy proteins and oils to feed the fish. KnipBio Meal could be the solution to this problem."

Feinberg added, "The primary goal for our scale-up program was to advance our process technology from a laboratory-scale research project to pilot-size vessel production. Additionally, we wanted to transition from a batch process to semi-continuous fermentation and to demonstrate the viability of methanol as a feedstock to compliment our previous work with ethanol. Our collaboration with the scientists and engineers at the NRC helped us successfully achieve these goals. We also gained tremendous insight into the fermentation process that will enable us to advance to commercial-scale manufacturing at a significantly faster pace than originally anticipated."

"Our research teams are supporting KnipBio's efforts in the areas of commercialization, new product development, value-added improvements, and new market opportunities," said Denise LeBlanc, General Manager, Aquatic and Crop Resource Development, at the National Research Council of Canada. "Our collaboration is improving the sustainability of the aquaculture industry by increasing diversity, reducing costs, and improving product quality."

Feinberg added, "The next phase in our development roadmap has already commenced and the goal now is to partner with leaders of the biofuel industry to achieve near-commercial scale fermentation. Additionally, we will continue to focus on field trials of our next-generation feeds to demonstrate the efficacy of KnipBio Meal in improving health and reducing mortality in fish



and shrimp populations. If successful, the market opportunity for KnipBio Meal could be immense. "

## About KnipBio

KnipBio, Inc. is a Massachusetts-based company pioneering advanced nutritional solutions for animal feeds using innovative biotechnology to develop a range of single cell protein products from non-food feedstocks. For more information, visit www.knipbio.com or contact us at <a href="mailto:info@knipbio.com">info@knipbio.com</a>.