



Hello New Harvest Donors,

It was a pleasure to see so many of you at the New Harvest conference this past month. With so much change in the cellular agriculture space in the recent past, the conference proved, once again, to be an incredibly grounding and re-energizing convening of up-and-coming talent, the existing agriculture industry, and cellular agriculture pioneers.

[The public FDA meeting on July 12](#) was another milestone in cellular agriculture history. I understand that the last time a public meeting of this type had been held, it was nearly a decade ago, on the equally regulatory-groundbreaking topic of GMO animals. To be part of this historical conversation about food biotechnology regulation, [do not forget to submit your comments about foods produced via cellular agriculture to the public docket, open until September 25.](#)

And with that, here's the latest from New Harvest!

8/1/2018 YTD SNAPSHOT

- + Raised **\$220,474***
- + **38** new donors
- + Spent **\$125,564** in research grants
- + **12** speaking engagements
- + **48** media engagements

*Income & pledges in 2018

Conference



- Our [3rd annual cellular agriculture conference](#) was a success! The event took place July 20 & 21 at the MIT Media Lab in Boston. Check out [Erin's #NewHarvest2018 recap blog post](#), and our [photo gallery of the event](#). An official recap video & talk videos will be released in the coming weeks. For a quick overview of some conference highlights:



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Isha moderated a panel with science communicator Jack Bobo, philosopher Dr. Patrick Hopkins, and cattle veterinarian Cody Creelman about how to talk about cellular agriculture.



Dr. Glenn Gaudette of WPI covered the use of plants - such as spinach - for scaffold materials.



Caleb Harper of the OpenAg Initiative, New Harvest Research Fellow Andrew Stout, IP litigator Kathi Cover, community biohacker Yuki Hanyu and Shuttleworth Foundation Director Karien Bezuidenhout talked about the importance and challenges of openness in cellular agriculture.



A conference highlight was a discussion of industry parallels: what could cellular agriculture learn from other industries? Adam Flynn, the conference's star skeptic, covered biofuels, Niya Gupta talked about vertical farming, Vince Sewalt on the enzyme industry, and Katharine Kreis on mission-driven food science. The discussion was moderated by Don Atkins of BIO.



Prakash Iyer of Ginkgo Bioworks discussed the importance and challenges of scaling up biotechnology.



And last but not least, a frank discussion about regulatory considerations for cellular agriculture products, with Deepti Kulkarni, Larisa Rudenko, and Ron Stotish.

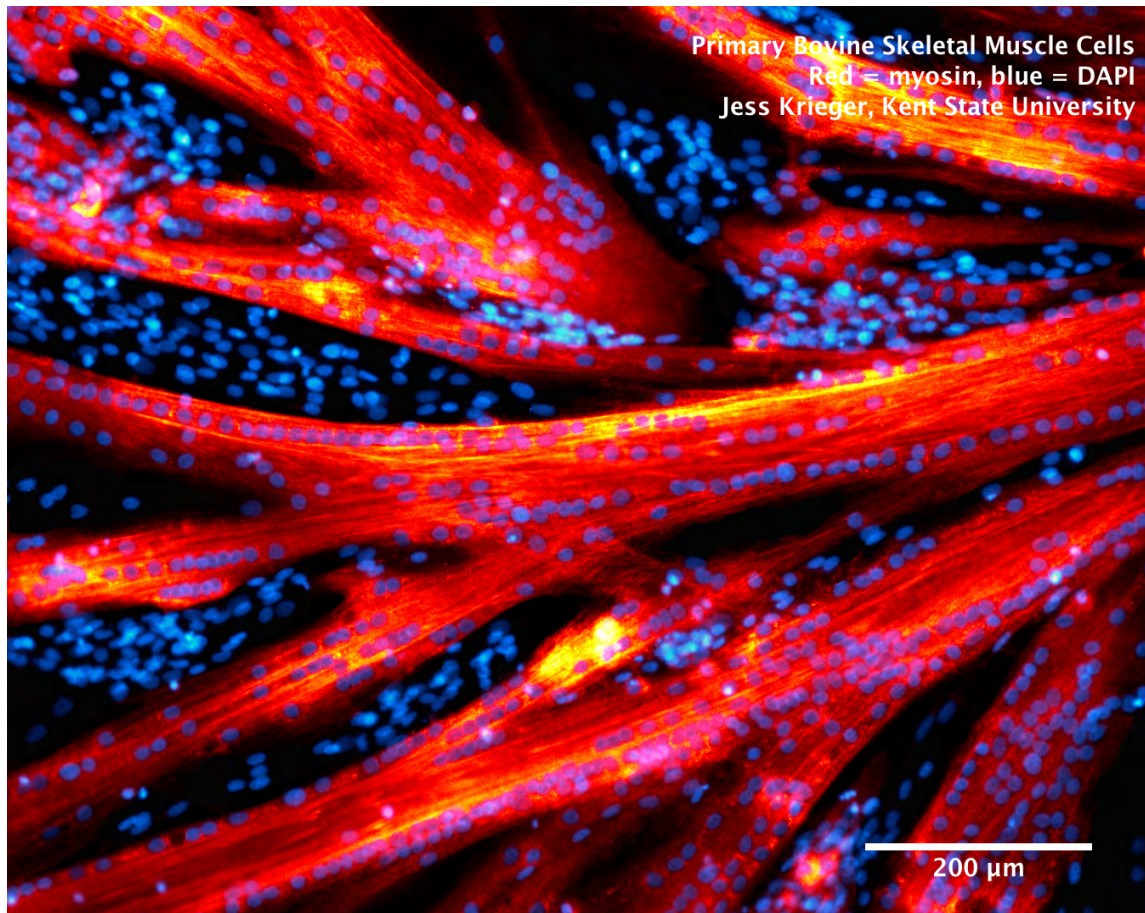
- Did you attend #NewHarvest2018? **We've extended the deadline to respond to our attendee feedback survey.** [Let us know](#) what you liked, disliked, and hope to see at a future New Harvest cellular agriculture event!

Fundraising

- **Fundraising status.** New Harvest has received **\$220,474** in donations and pledges in 2018 to date. This does not include conference ticket sales, sale of merchandise, or income from speaking engagements.
- **Interested in funding cultured meat research?** New Harvest co-designs research projects around donor's interests. If you are interested in backing specific cultured meat projects, [let's chat](#) about how we can work together.

Research

- **New Harvest Fellow Jess Krieger** has been analyzing her recent isolation of bovine skeletal muscle cells. The cell nuclei below are labelled in blue, and the muscle is labelled in red. They're looking pretty muscular already! 💪



Jess's bovine skeletal muscle cells. The cells were isolated from a male calf at Morning Mist Farm in Alliance, Ohio.

- Over the past couple of weeks, **the New Harvest bioreactor team** led by Jess Krieger has been working hard on their core design. Here is an early image of the bioreactor exterior design. IRNAS, our engineering partners on the project, are experts in open hardware design and implementation. Below, you can see the five rows of trays and the pump for the fifth tray.



The design for the exterior of the New Harvest bioreactor.

- Last week, **Research Director Kate Krueger** conducted a **site visit** with the In Vivo Foundation to visit New Harvest Fellow Santiago Campuzano in his lab at the University of Ottawa.



Santiago shows his cells to Rachel of the In Vivo Foundation.

- **Did you know?** Jerky was first invented in the Inca Empire and was made using a freeze drying process. Read more about it [here](#).

Communications

- **New Harvest 2018 has generated a wave of fantastic stories from throughout our community!** Here are a few highlights:
 - Cattle veterinarian and speaker Cody Creelman's [conference vlog](#)
 - Food historian and speaker Nadia Berenstein's [article](#) for *New Food Economy*
 - Anna Nowogrodzki's [piece](#) for *NEO.LIFE*
 - Chase Purdy's [take on the regulatory outlook](#) for cellular agriculture at Quartz

- Attendee Leah Persaud's [blog post](#) on *LinkedIn*
- Have you created content around #NewHarvest2018 that you'd like to share? [Get in touch!](#)
- **New Harvest also received mentions following the regulatory conversation** at the July 12th FDA meeting:
 - Brian Sylvester's [report](#) for the Food and Drug Law Institute
 - Emma Cosgrove's [recap](#) for *AgFunder*



- **Conference attendees got to see our Annual Report & Reader for 2017 make its public debut in hard copy last month.** An online version will soon be made available for download on our website!

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It's incredible to see the progress the cellular agriculture community has made, and it was incredibly fun to share it at the New Harvest 2018 wrap party. Stay tuned for the details of the next conference, it would be great to have you, our generous donors, there!

Until next month,

Isha, Erin, & Kate

The New Harvest Team