SCHLE conference

Innovations in Agriculture: Scaling Up to Reach Millions

purdue.ag/scaleup

SEPTEMBER 25-27, 2018 | PURDUE UNIVERSITY | WEST LAFAYETTE, INDIANA, USA

PARTNER ORGANIZATIONS







Schedule at a glance (see full schedule for more details)

Posters are located in Stewart Center, Rooms 214 and 218. Buffet Photo Exhibition: 40 Chances, Finding Hope in a Hungry World, is located in the Rueff Galleries, Pao Hall.

TIME	EVENT	LOCATION
TUESDAY, SEPTEN	ABER 25	
1:00 - 4:00pm	Conference Registration	Stewart Center, 2nd floor hallway, east end
4:00pm - 5:15pm	Opening Event — Keynote presentation: Scale Up: A Necessity for Transformative Development	Stewart Center, Loeb Playhouse
5:30-8:30pm	Welcome Reception and Dinner	Shively Club, Ross-Ade Stadium

WEDNESDAY, SEPTEMBER 26				
7:00am	Breakfast	Stewart Center, Room 214		
8:00am	Session 1: Planning with Scale in Mind	Stewart Center, Loeb Playhouse		
9:20am	Break	Stewart Center, West Lobby		
9:50am	Session 2: Assessing Scalability	Stewart Center, Loeb Playhouse		
11:15am	Case Studies – Session 2 Breakout Groups	Stewart Center, Rooms 202, 204, 218, 278, 279		
12:15pm	Lunch	Purdue Memorial Union North Ballroom		
1:30pm	Session 3: Market Success & Access to Finance, Part I – Markets	Stewart Center, Loeb Playhouse		
3:05pm	Break	Stewart Center, West Lobby		
3:35pm	Session 3: Market Success & Access to Finance, Part II – Finance	Stewart Center, Loeb Playhouse		
5:30pm	Dinner	Purdue Memorial Union, North Ballroom		
6:30-8:15pm	Discussion Groups	Stewart Center, Rooms 202, 204, 218, 278, 279		

THURSDAY, SEPTEMBER 27				
7:00am	Breakfast	Stewart Center, Room 214		
8:00am	Session 4: Laying the Foundations for Successful Scaling	Stewart Center, Loeb Playhouse		
8:50am	Session 4 Breakout Groups	Stewart Center, Rooms 202, 204, 218, 278, 279		
9:45am	Break	Stewart Center, Rooms 214 and 218		
10:45am	Session 5: Effectively Engaging and Leveraging Partners	Stewart Center, Loeb Playhouse		
12:15pm	Lunch	Purdue Memorial Union, Faculty Lounge		
1:30pm	Session 6: Examples of Successes and Failures; Lessons Learned	Stewart Center, Room 218		
1:50pm	Case Studies – Session 6 Breakout Groups	Stewart Center, Rooms 202, 204, 214, 278, 279		
4:00pm	Break	Stewart Center, Room 214		
4:20pm	Session 7 : Applications — Assessing New Technologies/ Innovations for Possible Scale Up	Stewart Center, Rooms 202, 218, 278, 279		
6:00pm	Closing Reception	Rueff Galleries, Pao Hall		



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DEAR SCALE UP CONFERENCE PARTICIPANTS:

Welcome to Purdue University! We are extremely pleased to host the Scale Up Conference in partnership with the African Development Bank, just as Purdue University embarks on a yearlong sesquicentennial anniversary celebrating a century and a half of serving as one of the nation's leading land-grant universities.

Our "Giant Leaps" theme for the anniversary emanates from the symbolic giant leap made by Purdue alum Neil Armstrong when he set foot on the moon nearly 50 years ago. The theme extends to celebrate the footprints that many from Purdue have left across the U.S. and around the world, like our keynote speaker Akinwumi Adesina, World Food Prize Laureate and Purdue alum.

While we celebrate 150 years of Giant Leaps, we look ahead at the giant leaps needed to solve the world's most pressing challenges. Therefore, it is fitting that a global audience has gathered at Purdue to focus on the practices needed to achieve global food security.

The individuals and organizations represented at the conference are key players for the introduction, diffusion and adoption of agricultural innovations that can truly feed billions. The conference is aligned with Purdue's focus on research that provides solutions, along with our recognition that global engagement and multiple partnerships are often critically important to achieve impact.

For more than 60 years, Purdue's College of Agriculture has led and managed large agricultural research and development projects. This has included institution-building efforts in developing nations and collaborative research linkages with national and international research centers as well as with other institutions of higher learning. Reflecting a long history of significant agricultural innovations, we note that in the past 11 years three Purdue graduates — Phillip Nelson, Gebisa Ejeta, and Akinwumi Adesina — were named World Food Prize Laureates. Purdue has considerable experience in converting results from USAID-funded and other donor funded projects into large-scale implementation. A recent example is the hermetic storage of grain with PICS (Purdue Improved Crop Storage), which has enabled extensive and significant reduction in postharvest losses of crops, especially in Africa.

We are honored by your presence at Purdue and believe this conference offers a unique opportunity for researchers, implementing organizations, the business community, policymakers, the donor community and others to identify best practices for scale up of agricultural technologies. We trust that the conference will help build collaborations critical for success in large-scale implementation of agricultural innovations to attain global food security.

Sincerely,



Mitchell E. Daniels, Jr. President

Wite Daniel

Jay T. Akridge President for Academic

Affairs and Diversity

Provost and Executive Vice

Suresh V. Garimella Executive Vice President for Research and Partnerships



Conference Organizers

PURDUE UNIVERSITY

- Office of the Executive Vice President for Research and Partnerships
- Office of the Provost and Executive Vice President for Academic Affairs and Diversity
- > IPIA International Programs in Agriculture

AFRICAN DEVELOPMENT BANK GROUP

LEAD ORGANIZERS AT PURDUE UNIVERSITY

- Suzanne Nielsen
- Carolyn Woo

ORGANIZING COMMITTEE

- Dieudonné Baributsa
- Carole Braund
- Betty Bugusu
- Andrea Burniske
- Gary Burniske
- Indrajeet Chaubey
- Suzanne Nielsen
- Jacob Ricker-Gilbert
- Jerry Shively
- > Lonni Kucik
- Marcy Wilson
- > Carolyn Woo

OFFICIAL CONFERENCE ADVISORS

- Larry Cooley President Emeritus of Management Systems International (MSI) and Curator of Global Community of Practice on Scaling Up Development Outcomes
- Charlene McKoin International Development Consultant for Value Chain Development, Post-Harvest Loss Mitigation, and Impact Investing; formerly, Senior Program Officer, Agricultural Development Team, Bill & Melinda Gates Foundation

WiFi

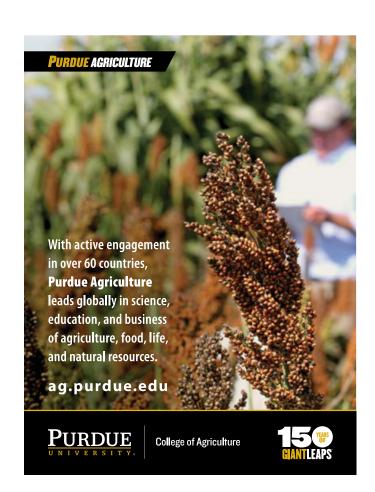
NETWORK: ATTWIFI

No password needed. See information sent by email or at the registration table for step-by-step instructions on connecting to WiFi.

Guidelines for Attendees

<u>Keeping the conference on schedule is a priority</u>, to be respectful of everyone's time and role. Please do your part to help us stay on schedule.

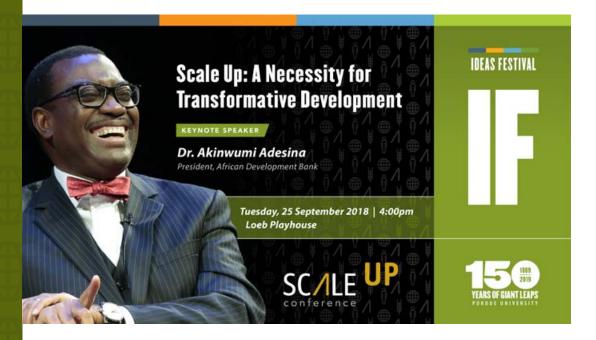
- > When asking questions and/or making comments to speakers or panelists:
 - Use a microphone so all can hear.
 - · Give name and affiliation when you begin speaking.
 - · Limit questions and comments to 1 minute.
- During the sessions, please move to the lobby area/hallways for side conversations.
- Given the full agenda, there is not adequate time for conference participants to ask questions of the featured speakers after their short session-opening talks. However, we are soliciting feedback electronically and on cards provided after each session. Please share questions relevant to the session that remain in your mind or important topics relevant to the session that were not covered by the featured speaker and/or in the panel discussion. These will be considered for coverage in the wrap-up after Session 6, in the "Scale Up Sourcebook" being developed as a user guide for scale up (see page 34), or as a basis for other conference follow-up.
- All large-group presentations are being audio recorded. All recordings, slides, and poster abstracts will be available to participants after the conference.
- Conference Organizing Committee members and student helpers will be wearing name tags with "Volunteer" ribbons. They will be glad to answer your questions and be of help to you. Conference Organizing Committee members will serve as facilitators in all breakout sessions.



SCHEDULE

TUESDAY, SEPTEMBER 25

TIME	EVENT	DESCRIPTION	LOCATION
1:00 - 4:00pm	Conference Registration		Stewart Center 2 nd floor hallway, east end
4:00pm - 5:15pm	Opening Event	Setting the Stage: Videos of Successful Scale Ups Carolyn Woo — Distinguished President's Fellow for Global Development, Purdue University	Stewart Center Loeb Playhouse
		Welcome & Introduction Mitch Daniels — President, Purdue University	
		KEYNOTE PRESENTATION Scale Up: A Necessity for Transformative Development Akinwumi Adesina — President, African Development Bank Group	
5:30-8:30pm	Welcome Reception and Dinner	Master of Ceremonies: Jay Akridge — Provost, Purdue University Featured Speaker: Robert Bertram — Chief Scientist, Bureau for Food Security, USAID	Shively Club Ross-Ade Stadium (see maps on page 32)





WEDNESDAY, SEPTEMBER 26

TIME	EVENT	DESCRIPTION	LOCATION
7:00am- 7:50am	Breakfast	Continental breakfast available to all delegates	Stewart Center Rooms 214 and 218
8:00am	Conference Opening	Opening remarks : Suresh Garimella — Executive Vice President for Research & Partnerships, Purdue University	Stewart Center Loeb Playhouse
Session 1	: Planning with Scale i	n Mind	
8:15am	Featured Speaker	Planning with Scale in Mind Larry Cooley — President Emeritus of Management Systems International (MSI) and Curator of Global Community of Practice on Scaling Up Development Outcomes	Stewart Center Loeb Playhouse
8:35am	Panel Discussion: Linking Planning with Scale in Mind to Scale Up Successes	Moderated by Alesha Black — Director, Global Food and Agriculture Program, The Chicago Council on Global Affairs. Panelists (representative of the three videos from Sept. 25): Dieudonné Baributsa — Associate Professor, Purdue University Kola Masha — Managing Director, Babban Gona Simon Winter — Executive Director, Syngenta Foundation	Stewart Center Loeb Playhouse
9:20am	Break	Refreshments available outside Loeb Playhouse	Stewart Center West Lobby
Session 2	: Assessing Scalability		
9:50am	Featured Speaker	Assessing Scalability Richard Kohl — Lead Consultant and VP for Scaling and Strategy, Strategy and Scale LLC	Stewart Center Loeb Playhouse
10:05am	Panel Discussion: Assessing Scalability — Perspective of USAID, a CGIAR unit, and a company	 Moderated by Paul Winters — Associate VP, Strategy and Knowledge Dept.; Director, Research and Impact Assessment Division, International Fund for Agricultural Development (IFAD). Panelists: Mark Edge — Director of Collaborations for Developing Countries, Bayer Julie Howard — Non-resident Senior Adviser, Center for Strategic and International Studies (formerly Chief Scientist at USAID) Lennart Woltering — Scaling Advisor, International Maize and Wheat Research Center (CIMMYT) 	Stewart Center Loeb Playhouse
10:55am	Case Study Snapshots	Plenary snapshot of 5 case studies to be featured in breakout groups (by representative of each case study).	Stewart Center Loeb Playhouse
11:15am- 11:40am	Case Studies — Session A	Case Study Breakout Groups: Reflecting on assessing scalability. Two 25-min. repeated sessions on 5 case studies. Attendees can participate in 2 sessions over a 60 min. period. <i>For details see page 11.</i>	Stewart Center
11:45am - 12:10pm	Case Studies — Session B	> Africa's Private Sector-Led Seed Revolution. Joe DeVries — Vice President, Program Development and Innovation, Alliance for a Green Revolution in Africa (AGRA)	Room 202
		 Incentivizing Affordable On-Farm Storage for Smallholder Farmers. Parasto Hamed – AgResults Field Coordinator, Deloitte 	Room 278
		USAID's Tool for Assessing Scalability: Lessons from Development and Applications. Richard Kohl — Lead Consultant and Vice President for Scaling and Strategy, Strategy and Scale LLC; Mark Huisenga — Senior Program Manager, Bureau for Food Security, Market & Partnership Innovations Office, USAID	Room 218
		> Scaling Up Agricultural Machinery in Bangladesh. Tim Prewitt (CEO) and Conor Riggs — Director of Market Systems and Entrepreneurship, International Development Enterprises (iDE)	Room 279
12:15pm	Buffet Lunch	From Thousands to Millions: Selected World Bank Experience on Scaling Up Innovations in Agriculture Simeon Ehui — Agriculture Global Practice, World Bank Group	Purdue Memorial Union North Ballroom

TIME	EVENT	DESCRIPTION	LOCATION
Session 3	: Market Success & Acce	ess to Finance	
1:30pm	Overview	Introduction to Markets and Finance as Critical Drivers for Successful Scaling Charlene McKoin — Independent Consultant, McKoin International Development	Stewart Center Loeb Playhouse
1:40pm	Part I: Markets Featured Speaker	Importance of Markets as a Driver Mary Beggs — Technical Director, Cardno International Development	Stewart Center Loeb Playhouse
1:55pm	Panel Discussion: The Importance of Market Access and Public-Private Partnerships as Drivers for Scaling	Moderated by Charlene McKoin. Panelists: Sriram Bharatam — Founder & CEO, Kuza.One Jennifer Billings — Agriculture Development Leader, Corteva Agriscience™ John Ellenberger — Senior Vice President, Land O'Lakes International Development Kevin Pixley — Director of Genetic Resources Program and Seeds of Discovery Program, CIMMYT Fanus Swart — General Manager, Curativo Simon Winter — Executive Director, Syngenta Foundation for Sustainable Agriculture	Stewart Center Loeb Playhouse
3:05pm	Break	Refreshments available outside Loeb Playhouse	Stewart Center West Lobby
3:35pm	Part II: Finance Featured Speaker	Seed Capital Timothy Runnalls — Senior Director of Real Assets, Ascension Investment Management	Stewart Center Loeb Playhouse
3:55pm	Panel Discussion: Examples of Capital Types and Strategies Linked to Scale Up	 Moderated by Carolyn Woo. Panelists: Patricia Dinneen — Senior Advisor, Chair of Impact Investing Council, Emerging Market Private Equity Association (EMPEA) Brian Heese — Director, Investor Relations, One Acre Fund Brian Milder — Executive VP, Strategy & Innovation; Director, Smallholder Agricultural Finance, Root Capital Mezuo Nwuneli — Managing Partner, Sahel Capital Agribusiness Managers Ltd. 	
5:00pm	Snapshots of Evening Discussion Group Topics	Plenary snapshot of topics for evening discussion groups (by representative of each group).	Stewart Center Loeb Playhouse
5:30pm	Dinner		Purdue Memorial Union North Ballroom
Discussion	n Groups		
6:30 - 7:20pm 7:25 -	Discussion Groups Session A Discussion Groups	Facilitated Group Discussions: Two 50-min. repeated sessions. Attendees can participate in 2 groups over 105 min. period, or stay in one group the entire time. For details, see page 12.	Stewart Center
8:15pm	Session B	 ICT4D. Shaun Ferris — Director of Agriculture & Livelihoods Program, Catholic Relief Services Institutionalization of Scaling. Johannes Linn — Nonresident Senior Fellow, Brookings Institution Seed Systems. Louise Sperling — Senior Technical Advisor, Agriculture and Livelihoods, Catholic Relief Services Responsible Scaling of Agricultural Innovations. Seerp Wigboldus — Senior Advisor/Researcher, Wageningen Center for Development, Wageningen Univ. & Research; and Robert McLean and Tricia Wind — Senior Program Specialists, International Development Research Center (IDRC) Monitoring & Evaluation. Paul Winters — Associate VP, Strategy and Knowledge Dept.; Director, Research and Impact Assessment Division, International Fund for Agricultural Development (IFAD) 	Room 202 Room 204 Room 279 Room 218

TIME	EVENT	DESCRIPTION	LOCATION
7:00- 7:50am	Breakfast	Continental breakfast available to all delegates	Stewart Center Rooms 214 and 218
Session 4:	Laying the Foundations	for Successful Scaling and Supporting the Scaling Process	
8:00am 8:15am 8:30am	Overview Behavior and Culture Policy and Governance	Johannes Linn — Nonresident Senior Fellow, Brookings Institution William Ryerson — Founder and President, Population Media Center David Spielman — Senior Research Fellow, International Food Policy Research Institute	Stewart Center Loeb Playhouse
8:50- 9:15am	Breakout Groups — Session A	Facilitated Group Discussions: 5 Topics associated with important drivers and enabling conditions. Two 25-min. repeated sessions. Attendees can participate in 2 groups over 60 min. period. For	Stewart Center
9:20- 9:45am	Breakout Groups — Session B	 details, see page 13. Resource Constraints. Shaun Ferris – Director of Agriculture & Livelihoods Program, Catholic Relief Services 	Room 218
		Institutional Support. Richard Kohl — Lead Consultant and VP for Scaling and Strategy, Strategy and Scale LLC	Room 204
		 Infrastructure. Holger Kray — Lead Economist; Head of Africa Agriculture Policy Unit, World Bank Group 	Room 202
		 Behavior & Culture. William Ryerson — Founder and President, Population Media Center Policy & Governance. David Spielman — Senior Research Fellow, International Food Policy Research Institute (IFPRI) 	Room 278 Room 279
9:45am	Break		Stewart Center Rooms 214 and 218
10:15am	Breakout Group Reports	Leaders of 5 breakout groups report from group discussions. Johannes Linn to close session.	Stewart Center Loeb Playhouse
Session 5	: Effectively Engaging a	and Leveraging Partners	
10:45am	Featured Speaker	The Importance of Partnerships to Catalyze and Sustain Inclusive Agricultural Transformation (IAT) in Sub-Saharan Africa and South Asia: BMGF Perspective Enock Chikava — Deputy Director, Agricultural Development, Bill & Melinda Gates Foundation	Stewart Center Loeb Playhouse
44.0-			
11:05am	Panel Discussion: Roles of Actors That Help Take Technology to Market	 Moderated by Jennifer Blanke – VP, Agriculture, Human and Social Development, African Development Bank. Panelists: Extension. Tunji Arokoyo – Prof.; Consultant Agriculturist and Participatory Extension Specialist & Trainer, Ahmadu Bello University Local Business. Suraj Devani – Director, Pee Pee Tanzania Ltd. (PPTL) Smallholder Farmers. Brian Heese – Director, Investor Relations, One Acre Fund Development Organization-Facilitated PPPs. Floortje Jacobs –Public-Private Partnerships Advisor, SNV Netherlands Development Organization Global Company. Thavy Staal – Sustainability and Project Manager, Crop Protection Africa & Middle East, BASF 	Stewart Center Loeb Playhouse
11:05am 12:15pm	of Actors That Help Take	 Development Bank. Panelists: Extension. Tunji Arokoyo – Prof.; Consultant Agriculturist and Participatory Extension Specialist & Trainer, Ahmadu Bello University Local Business. Suraj Devani – Director, Pee Pee Tanzania Ltd. (PPTL) Smallholder Farmers. Brian Heese – Director, Investor Relations, One Acre Fund Development Organization-Facilitated PPPs. Floortje Jacobs –Public-Private Partnerships Advisor, SNV Netherlands Development Organization Global Company. Thavy Staal – Sustainability and Project Manager, Crop Protection Africa & 	Loeb Playhouse Purdue Memorial
12:15pm	of Actors That Help Take Technology to Market Lunch	 Development Bank. Panelists: Extension. Tunji Arokoyo – Prof.; Consultant Agriculturist and Participatory Extension Specialist & Trainer, Ahmadu Bello University Local Business. Suraj Devani – Director, Pee Pee Tanzania Ltd. (PPTL) Smallholder Farmers. Brian Heese – Director, Investor Relations, One Acre Fund Development Organization-Facilitated PPPs. Floortje Jacobs – Public-Private Partnerships Advisor, SNV Netherlands Development Organization Global Company. Thavy Staal – Sustainability and Project Manager, Crop Protection Africa & Middle East, BASF A Robust Ecosystem to Support Entrepreneurial Activity 	Purdue Memorial Union Faculty Lounge
12:15pm	of Actors That Help Take Technology to Market Lunch	 Development Bank. Panelists: Extension. Tunji Arokoyo — Prof.; Consultant Agriculturist and Participatory Extension Specialist & Trainer, Ahmadu Bello University Local Business. Suraj Devani — Director, Pee Pee Tanzania Ltd. (PPTL) Smallholder Farmers. Brian Heese — Director, Investor Relations, One Acre Fund Development Organization-Facilitated PPPs. Floortje Jacobs —Public-Private Partnerships Advisor, SNV Netherlands Development Organization Global Company. Thavy Staal — Sustainability and Project Manager, Crop Protection Africa & Middle East, BASF A Robust Ecosystem to Support Entrepreneurial Activity Tim Peoples — Managing Director, Purdue Foundry, Purdue University 	Purdue Memorial Union Faculty Lounge

TIME	EVENT		DESCRIPTION		LOCATION	
1:50- 2:20pm 2:25-	Case Studies Session A Case Studies		· ·	pups : Reflecting on topics of all earlier sessions. Two 30-min. repeated e studies. Attendees can participate in 2 sessions over s, see page 13.	Stewart Center	
2:55pm	Session B	,	> From Science to Sca Africa-wide Aflasafe	Ile: Aflasafe. Ranajit Bandyopadhyay — Principal Scientist; Leader of Initiative, and Abdou Konlambigue — Managing Director, Aflasafe and Commercialization, IITA	Room 214	
			> Scaling Up Orange-F Leader, Sweet potato			
				> Scaling Agricultural Mechanization Worldwide: Case of the 2-Wheel Tractor (2WT). Jelle van Loon — Mechanization Specialist, Latin America and Lennart Woltering — Scaling Advisor,		
			Bob Rabatsky – Seni			
			> Scaling Quality Veg	netable Varieties in Africa. Pepijn Schreinemachers — Flagship Program pact, World Vegetable Center	Room 204	
3:00pm	Reports on C Discussions	ase Study	Purdue University facilita	ntors of 5 breakout groups report from case study discussion	Stewart Center Room 218	
3:30pm	Session Close	e	Larry Cooley — President Management Systems In	Emeritus, Curator of Global Community of Practice on Scaling Up, ternational (MSI)	Stewart Center Room 218	
3:40pm	Session 1-6\	Vrap-up	·	Summary and recommendations; Plans for engagement through Community of Practice; Plans for completion of "Scale Up Sourcebook;" Survey of participants Larry Cooley		
4:00pm	Break				Stewart Center Room 214	
Session 7	: Applicati	ons – Asse	ssing New Technolog	ies/ Innovations for Possible Scale Up		
4:20- 5:05pm	Technology A	Assessments		oposed technologies for scale up, then expert panel assessment and	Stewart Center	
5:05- 5:50pm	Technology A Session B	Assessments	1	ases/panel; 45 min./case (15 min. presentation, 30 min. evaluation); imarize/give comments at end of 2 cases evaluated.		
5:50-	Summary Co	mments			Stewart Center	
5:55pm	Sessi	on Poste	r Technology/Innovation	Panelists		
	Group 1	A	I > Hygrometer	Larry Cooley – Management Systems International	Room 202	
		В	II > Cyclone Pearl Millet Thresher	Shaun Ferris — Catholic Relief Services Charlene McKoin — McKoin International Development		
	Group 2	A I	II > Chimney Solar Dryer	Julie Howard — Center for Strategic and International Studies	Room 278	
		В	V Cassava Peel Processor	Richard Kohl — Strategy and Scale LLC Marc Schut - IITA		
	Group 3	Α	V Mastitis Control	David Hong — One Acre Fund	Room 279	
		В	Xero Porridge Flour	Paul Winters – IFAD Lennart Woltering - CIMMYT		
	Group 4	A V	Mobile Utility GrainStorage	Mark Huisenga — USAID David Spielman — IFPRI	Room 218	
		B VI	Hub & Spoke Food Processing System	Simon Winter — Syngenta Foundation		
6:00- 7:00pm	Closing Rece	ption	Buffet Photo Exhibition:	40 Chances, Finding Hope in a Hungry World	Rueff Galleries, Pao Hall	

Wednesday, September 26 – 9:50am

Africa's Private Sector-Led Seed Revolution (Room 202)

J.D. DeVries (Vice President, Program Development), AGRA

Investments by The Rockefeller Foundation and others in agro-ecology-based crop breeding and private sector seed supply in the early 2000s, revealed that Africa's farmers were highly interested in higher-yielding seed but lacked dependable access to seed of improved varieties adapted to local growing conditions. Rockefeller's focus on African crop breeding. establishing private, independent seed companies, and village-based agro-dealers received a major boost when the Gates Foundation joined up with Rockefeller in 2006 to establish the Alliance for a Green Revolution in Africa (AGRA). AGRA's first major program was the Program for Africa's Seed Systems (PASS), which targeted the investment of \$150 million in crop breeding, over 100 private seed companies, and thousands of agro-dealers. Private seed supply is boosted by the introduction of hybrid maize seed plus fertilizer among smallholder farmers. Profits earned from the sale of hybrid maize seed allow companies to expand into the production and sale of seed for other crops. In 2016, annual seed production by 100 private, African seed companies reached 130,000 MT. New private entrants continue to be registered each year even as large, regional and multi-national seed companies have expanded their operations across the continent. Average crop yields have increased in most countries, reversing decades of stagnation in the agricultural sector. Large seed subsidies, which fail to discriminate between high-quality, high-yielding seed and sub-standard seed, pose a threat to the health of seed sectors in many African countries. Secondly, many additional African countries with high population growth and growing food insecurity remain outside the "African Seed Revolution". Extending private sector-led supply of improved seed into these countries represents a major opportunity for improving food security and economic growth in Africa.

Incentivizing Affordable On-Farm Storage for Smallholder Farmers (Room 278)

Parasto Hamed (AgResults Field Coordinator), Deloitte Consulting

The AgResults Kenya On-Farm Storage Challenge Project attempts to address the challenge of reducing post-harvest grain losses by incentivizing private sector actors to develop, market, and promote new or redesigned on-farm storage devices to smallholder farmers who cultivate five hectares or less. Under the pay-for-results (P4R) model, monetary awards are given to participants that achieve predetermined result thresholds. The distribution of awards is based upon the cumulative storage capacity sold by the private sector companies to smallholder farmers. The P4R mechanism is technology, marketing, and distribution agnostic, encouraging participating companies to consider cost and storage effectiveness as well as the economic benefits to smallholder farmers. It is structured to test which private sector initiatives are more successful while determining smallholder farmer (SHF) demand and adoption. Lessons learned from the Challenge Project will inform future project design and contribute to scaling initiatives by the participating donors. The successful participants were those that established distribution networks reaching to the farmer level. These networks were different in their approach but in all cases provided SHF with easy access to purchase the products in outlying areas, even in some cases where these networks both sold and distributed within a walkable distance of the beneficiaries. The Challenge Project proved that SHFs had the financial capacity to purchase devices as well as the food security benefits derived from the use of these devices. Key partnerships were with agro-dealers as well as county government agents.

USAID's Tool for Assessing Scalability: Lessons from Development and Applications (Room 218) Pichard Kohl, Load Consultant and VD for Scaling Stratony Stratony and Scala LIC and Mark Hydronga, Soniar Program.

Richard Kohl, Lead Consultant and VP for Scaling Strategy, Strategy and Scale LLC and Mark Huisenga, Senior Program Manager, Bureau of Food Security, Market & Partnerships Innovations Office, USAID

The Agricultural Scalability Assessment Tool (ASAT) is designed to provide a qualitative appraisal of an innovation's scalability. While innovations do have intrinsic features that may make them more or less scalable in general, most of the factors affecting scaling potential can only be assessed relative to a specific socio-economic context and the characteristics of target adopters. The ASAT provides information on the strengths and weaknesses of the innovation relative to scalability, the most promising scaling up pathways (i.e., commercial, public, or public-private partnerships), and information on the extent to which target contexts — locations and populations — and their market and public-sector capacity currently facilitate scaling. The ASAT is not meant to be the decision-making toolkit. Instead, the toolkit is intended to identify constraints to and opportunities for scaling. These will serve to inform decisions about whether, and where, to invest in the scaling up of specific innovations, or for further investment in research and development. The ASAT can also inform design efforts to improve the scalability of an innovation, improve and strengthen market and public-sector systems to facilitate scaling, or both. The ASAT's greatest value is not the scoring per se, but in the assessments behind the scoring and the conversations provoked in making and justifying an assessment. It is strongly recommended that the ASAT be applied by a team comprised of at least three people: a researcher with knowledge of the relevant sector, a markets expert, and someone with considerable knowledge of the

country(ies) or region(s) targeted for scaling. The ASAT consists of two components, or tools: an Agriculture Scaling Decision Tree (ASDT) and an Agricultural Scalability Assessment Matrix (ASAM). A dashboard also summarizes the results of the tools and provides recommendations based on that analysis. The ASDT is used to help select the appropriate scaling up pathway for an intervention (i.e., private, public, or donor driven). It should be applied first, since scoring via the ASAM is contingent on the choice of pathway.

Scaling up of Agricultural Machinery in Bangladesh (Room 279) Timothy Prewitt, CEO, and Conor Riggs, International Development Enterprises (iDE)

The innovations currently being scaled up are three agricultural machines that are relatively new to Bangladesh. These are: (1) axial flow pumps (AFPs) which are used for irrigation from surface water sources and operated by separate diesel engines; (2) power tiller operated seeders (PTOS) which provide tilling, seeding and, in principle, fertilizing services; and (3) self-propelled reapers (SPRs) which cut field crops like rice, wheat, jute and possibly other crops like jute. In all three cases, the introduction of new machinery was combined with a business model of using Local Service Providers (LSPs) to provide services to small farmers on the assumption that it was neither economic nor affordable for small farmers to buy their own machines. More specifics on the Bangladesh enabling environment can be found in the case study.

DISCUSSION GROUPS – WEDNESDAY EVENING

September 26 - 6:30pm

ICT4D (Room 202)

Leader — Shaun Ferris, CRS

Having access to information is a critical prerequisite for scaling at all levels. Information and communication is the glue that brings together people and ideas and forges relationships that lead to transactions. ICT offers a means to connect people living in remote areas and leapfrog many areas of activity where infrastructure and markets have failed.

- > Mobile has enabled people to communicate.
- > Mobile enables financial transactions to take place.
- > Remote sensing provides a means of establishing a plot/farm record.
- > Sharing of data on who can provide and who needs specific products.
- **>** Extends rural advisory services, where face to face is not possible.
- > When combined, these data points will support credit scores that will channel the right finances to people.

In time, these systems will help to identify and organize people, and build credibility and trust among customers and clients, and these factors will support financing that is essential for scaling to take place. Discussion:

- > Input side: What innovative methods are being used to collect data and transform it into near and real-time information that can be accessed anywhere in the world?
- Output side: What apps (or other digital tools) are helping farmers and other actors along the value chain improve decision making on a large scale?

Institutionalization of Scaling (Room 204)

Leader — Johannes Linn, Brookings Institution

Many organizations are confronted with a growing need to show the impact, or the effectiveness, of the resources put toward alleviating poverty and ending hunger. But how do you gear your organization toward scaling? In this session, we will discuss the experience of some organizations that went down that path. The experience ranges from setting up scaling units, developing scaling strategies, adapting the vision and mission, changing HR and admin procedures, internal capacity building on scaling and integrating it in the communication strategy.

Seed Systems (Room 279)

Leader, Louise Sperling, CRS

This session will focus on critical leverage points needed to scale up the delivery of modern varieties of seed among smallholder farmers, especially in sub-Saharan Africa. Seed is a sector that can potentially contribute to families' food security, nutrition, income and farming resilience goals. However, across much of Africa only a handful of crops/seed types can be delivered at scale (e.g., hybrid maize and vegetable seed), with much of this seed business unfolding in medium-and higher-potential areas. In contrast, rigorous data shows that smallholders still source over 90% of their seed from informal systems with the local markets, which is particularly important for accessing seed of most legumes. A key broad challenge to leverage the strengths of the formal sector with the informal: What catalytic links can and should be made?

Discussion specifically will focus on real options for:

- > Extending delivery, including information, to "Last Mile" areas.
- Widening the overall crop portfolio of quality seed accessible to smallholders.
- > Specific options for moving "climate-smart" and nutritionally enhanced crops and varieties (to high-stress zones and among malnourished populations).

Responsible Scaling of Agricultural Innovations (Room 218)

Co-Leaders - Seerp Wigboldus, Wageningen University; Robert McLean and Tricia Wind-IDRC

Scaling up (agricultural) innovations is not just about asking how to make it happen. It also requires asking what wider implications this may have, which includes potential negative (side-) effects. Nearly all grand challenges facing humanity originate from the scaling of innovations. The clearest example is climate change and the scaling of carbon emissions resulting from growing numbers of livestock, growing use of fossil fuels, etc. It illustrates the need for considering what makes for "responsible" scaling of innovations and for considering questions such as who decides whether scaling particular innovations is a good idea; who really benefits short-term and long-term (inclusiveness issues); how could it affect long-term sustainability (social, economic, and environmental) and farmer resilience/vulnerability; who are the "winners" and who are the "losers" involved? These are just some of the (societal) concerns that need to be considered. Addressing these questions helps to enrich perspectives on scalability and connects to issues related to food ethics, food justice, and food sovereignty. Questions to explore in this session may include: What important (potential) effects and wider implications tend not to be part of what informs decision-making in scaling initiatives? Is it possible to develop principles for "responsible scaling of agricultural innovations"?

Monitoring & Evaluation (Room 278)

Leader – Paul Winters, IFAD

Having good and timely information is a critical prerequisite for scaling. It helps with building credibility among customers and clients, raising financing for scaling from funders and investors, and forming strategic partnerships with the government and other key stakeholders. However, when we define scaling as a system change, what indicators can we use to monitor that? Counting the number of farmers doing X or Y is not enough. We need to move from output to outcome indicators, to measure not only the progress in terms of scaling out (horizontal) but also scaling up (vertical). How do we measure those indicators? How do we attribute them? Do we want that?

BREAKOUT GROUPS – SESSION 4

Thursday, September 27 – 8:45am

Resource Constraints (Room 218)

Leader - Shaun Ferris, CRS

This breakout session will look at some of the key constraints to scaling up opportunities in agriculture in developing economies. These include a range of natural resources such as water, soil, climate and local cropping systems. It will also include information about local marketing systems and levels of farmer organization. For farmers to be able to scale up new opportunities, they need to have the right set of basic conditions: Does it grow in this environment, or can the environment be adapted? Is there a market that will support the investments for scaling up? Are farmers sufficiently well organized to take advantage of the opportunity?

Institutional Support (Room 204)

Leader - Richard Kohl, Strategy and Scale LLC

The strength and capacity of existing institutions in the target locations for scaling heavily influence the choice of scaling up pathways, the tasks required in scaling up and creating sustainability, and, where donors are involved, what donor projects need to do. Institutions serve as intermediaries in helping to drive the scaling process forward and/ or fill important tasks, such as creating demand for and supply of the innovation, or providing training and technical support to ensure proper use and full impact. If value

chain institutions are weak, missing, or lack the incentives to fulfill their respective roles (e.g., distribution, providing complementary inputs and services, processing output, certifying quality of inputs and outputs), they will need to be created, strengthened or incentivized as part of the scaling up process to ensure they can provide the quality and handle the quantities associated with scale and sustainability. This is irrespective of who fills those roles — the public or private sector or civil society.

Infrastructure (Room 202)

Leader – Holger Kray, World Bank

The enabling factor of rural infrastructure for scaling up agricultural and rural development interventions includes secondary and tertiary rural roads, rural water and sanitation, irrigation works, and also rural education and health infrastructure, all of which are critical for agricultural market access and productivity growth, as well as for rural development and poverty reduction. This group will discuss the role of rural infrastructure development in supporting scaling pathways, including how the design and implementation of rural infrastructure can effectively link systemwide planning with farmer and rural community preferences and participation, how it addresses operation and maintenance requirements, and how it can assure sustainable and scalable financing.

Behavior & Culture: Social and Behavior Change Communications

Leader - Bill Ryerson, Population Media Center (Room 278)

This breakout session will be a discussion of how perceived cultural norms affect efforts to scale up agricultural production. This includes misinformation (including intentional misinformation and myths), religious practices and beliefs, fears of effects of new practices on health and/or economic welfare, sources of information and media consumption practices, and other perceived barriers to adoption of new practices. The group will also discuss effective communication strategies for reducing such barriers and motivating individual behavior change and changing social norms.

Policy & Governance: Public Policy Solutions to Advance the Scaling Agenda (Room 279)

Leader - David Spielman, IFPRI

Public policy and governance systems are the broad enablers of innovation scaling in developing-country agriculture. The design and implementation of laws, regulations, administrative procedures, public investments, and evaluation mechanisms are vital to any effort that seeks to advance technological change in agriculture. But in both design and implementation, limited use of evidence is commonplace. Insufficient attention is often paid to identifying the precise ways in which policy affects durable change at scale; the risks and unintended consequences induced by policy change; or the winners and losers in these change processes. This breakout session will discuss the policy and governance dimensions of scaling, with an emphasis on understanding the reach of public policy, its limits, and the complexities of policy change processes.

CASE STUDIES – SESSION 6

Thursday, September 27 – 1:30pm

From Science to Scale: Aflasafe (Room 214)

Ranajit Bandyopadhyay, Principal Plant Pathologist and Leader, Africa-wide Aflasafe Initiative, IITA, and Abdou Konlambique, Managing Director, Aflasafe Technology Transfer and Commercialization, IITA

In Africa, the bio-control product Aflasafe developed by IITA, USDA-ARS and partners, lowers aflatoxins throughout the value chain. The AgResults Initiative in Nigeria works with private-sector partners who disburse Aflasafe. They

facilitate access to technical knowledge and inputs that farmers require to boost productivity and move from subsistence to market-driven producers. The paper provides lessons learned of how Aflasafe Technology Transfer and Commercialization is now working towards handing over the manufacturing and distribution of Aflasafe to Private companies and public entities in 11 sub-Saharan African nations. The Aflasafe case provides a good example how scaling of innovation requires public-private partnerships throughout different phases of technology development and dissemination.

Scaling Up Orange-Fleshed Sweet Potato for Nutrition and Incomes (Room 279)

Simon Heck, Program Leader (Sweet Potato), International Potato Center (CIP), and Howarth Bouis, Interim Chief Executive Officer, HarvestPlus

CIP and partners have been using an integrated agriculture-nutrition-marketing approach to develop and promote diversified utilization of biofortified orangefleshed sweet potato (OFSP) to address vitamin A deficiency in young children and women of reproductive age. This initiative has been coordinated through multiinstitutional technical support platforms in Uganda (for East and Central Africa), Mozambique (for Southern Africa), and Ghana (for West Africa). As a result, over the past 10 years, more than 4.5 million farming households with children under 5 years of age in at least 15 African countries have started to grow OFSP for family nutrition and increasingly also for sale. At the start of the strategy has been a key technology innovation — biofortified sweet potato — with a strong evidence base proving its efficacy for reducing vitamin A deficiency. The strategy has been driven by countrylevel and international commitments to making nutritious foods available for all, and has been organized around five elements: (1) a recognizable product to be promoted – locally adapted OFSP varieties, (2) supply chains of sufficient quantities of clean planting material, (3) pluralistic partnerships aligned to provide technical and financial support, (4) a technically sound approach to creating demand and achieving coverage in a timely manner; and (5) a monitoring, evaluation and learning system to assess scalability and enable adaptive management. This strategy has generated efficient delivery approaches addressing key technical and institutional constraints. Persistent challenges include strengthening commercial incentives for investment, though this is improving with commercial processing of OFSP, and creating feedback loops from expanding utilization into continued technology investments such as breeding new OFSP varieties.

Scaling Agricultural Mechanization Worldwide: Case of the 2-Wheel Tractor (2WT) (Room 202)

Jelle van Loon, Mechanization Specialist, Latin America, CIMMYT, and Lennart Woltering, Scaling Advisor, CIMMYT

Smallholders in the tropics increasingly look to agricultural mechanization to speed farm operations, reduce drudgery, and respond to mounting labor shortages. Questions, however, remain as how to most efficiently scale what is typically capital-intensive agricultural machinery. Based on North American and European farm models, numerous development programs have popularized four-wheel tractors, though with little sustained success. Two-wheel 'hand' tractors (2WTs) are arguably more appropriate to the small field sizes and limited investment capacities that characterize smallholder agriculture. Relatively inexpensive, lightweight and easy to repair, a wide range of equipment can be attached to 2WTs, including precise seed and fertilizer applicators, harvesters, and irrigation pumps. These options offer users a broad and integrated set of services, and can increase the timeliness of farm operations. 2WT owners can also act as scale catalysts — reaching many additional fields and farmers beyond their own — by offering farmers mechanized land preparation, seeding, irrigation, and harvesting on an affordable fee-forservice basis. This case study reviews experiences in Latin America, sub-Saharan

Africa, and South Asia in scaling-out 2WT-based farm machinery services to benefit smallholder farmers' livelihoods. We review crucial considerations in small-scale farm mechanization — with particular emphasis on multiple farm services provision, adaptable business models, and the facilitation of value chain and private sector 'push and pull' to catalyze adoption. The ways in which government subsidies can support or work for or against machinery scaling, and the role of policy and technology targeting in avoiding labor displacement, will be reviewed.

Commercializing Strigaway Maize to Address Witchweed (Striga) in East Africa (Room 278)

Bob Rabatsky, Director, Feed the Future Partnering for Innovation, Fintrac, and Andrew Bracken, Partnership Manager, Feed the Future Partnering for Innovation, Fintrac

For millions in East Africa, maize is a staple food and primary crop grown by smallholder farmers. The parasitic weed striga infests 1.4 million hectares of land around Lake Victoria, reducing maize production by 30 to 100 percent. Striga is saprophytic to maize, produces prolifically, and is difficult to kill using traditional herbicides since seed remain viable in the soil for up to 20 years. A recent collaboration between CIMMYT, BASF, the Weizmann Institute of Science, and NARS resulted in a maize variety with a trait that makes it resistant to the herbicide imazapyr. This seed, treated with imazapyr, kills striga in the field, and eliminates it after seven consecutive planting seasons. CIMMYT and BASF partnered with the African Agricultural Technology Foundation (AATF) to commercialize this seed technology through six seed companies in Uganda, Kenya and Tanzania. With Partnering for Innovation funding, AATF provided foundation seed to seed companies for replication, provided equipment and technical assistance for these companies to coat, demonstrate, and sell imazapyr-resistant maize seed to smallholder farmers, and monitored seed adoption and sales by agro-dealers. With four years of funding and support, seed companies produced and sold more than 785 MT of seed to smallholder farmers. The partnership overcame a number of challenges, including poor maize yields by seed companies, teaching agro-dealers safe handling and effective marketing of the seed, and farmer education on proper usage.

Scaling Quality Vegetable Varieties in Africa (Room 204)

Pepijn Schreinemachers, Program Leader — Enabling Impact, World Vegetable Center

Open-pollinated tomato lines, originally developed for Asia by the World Vegetable Center (WorldVeg), were tested in different locations in Tanzania, and two lines were released as varieties (Tanya and Tengeru-97) in 1997. Superior shelf life over existing varieties was their main advantage. WorldVeg and partners promoted the varieties and start-up seed companies commercialized seed production. In 2014, 26 tons of seed were produced of these varieties, accounting for 87% of total tomato seed production in Tanzania. These varieties generated US\$ 256 million in economic revenues for farmers and consumers in Tanzania from 1997 to 2014. The introduction of new tomato varieties in Tanzania coincided with the liberalization of the country's seed laws in the early 1990s. Seed companies emerged but had no suitable breeding lines of their own. Multinational seed companies were not yet present. Success was achieved by partnering with the public and private sectors with the support of international donors investing in research. To enable further impact of vegetable varieties, WorldVeg has formalized its partnership with seed companies in Africa and Asia through vegetable breeding consortia under the umbrella of regional seed trade associations. Over thirty seed companies have already joined these consortia, which means that new breeding materials can reach farmers rapidly.

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SPEAKERS

KEYNOTE SPEAKER



Akinwumi Ayodeji Adesina

President – African Development Bank

Dr. Akinwumi Ayodeji Adesina, the 2017 World Food Prize laureate, was awarded an honorary doctorate in 2015 from Purdue University, where he earned master's (1985) and doctoral (1988) degrees in agricultural economics. In 2015, Adesina was elected president of the African Development Bank Group (AfDB). In 2011, he was appointed Nigeria's minister of agriculture. Other positions he has held: principal economist for the West Africa Rice Development Association; associate director of food security at the Rockefeller Foundation; and vice president of the Alliance for a Green Revolution in Africa. In 2010, United Nations Secretary-General

Ban Ki-moon appointed him as one of the leaders to spearhead the Millennium Development Goals. *Forbes* magazine named him African Person of the Year in 2013.

Tunji Arokoyo



Dr. Tunji Arokoyo is a Professor at Ahmadu Bello University in Zaria, Kaduna State, Nigeria, working in the Department of Mass Communications. He obtained his BS in Agricultural Science and MS in Entomology from Kansas State University. His PhD was in Agricultural Extension Education from the University of Wisconsin. He has served as Director of both the Division of Agricultural Colleges and the National Agricultural Extension & Research Liaison Services at his university. He has done several international and local consultancies in agricultural extension and advisory services. Dr. Arokoyo is currently the President and Country Focal Person for the Nigerian Agricultural Forum for Agricultural Advisory Services (NIFAAS), the Country Chapter of the African Forum for Agricultural Advisory Services (AFAAS).

Ranajit Bandyopadhyay

Principal Plant Pathologist and Leader, Africa-wide Aflasafe Initiative — International Institute of Tropical Agriculture (IITA)

Ranajit Bandyopadhyay is a principal plant pathologist at the International Institute of Tropical Agriculture (IITA), Ibadan, Nigeria, guiding research and development related to crop diseases and mycotoxins since 2002. He completed his PhD at Haryana Agricultural University, Hisar, and joined the International Crops Research Institute for the Semi-Arid Tropics (ICRISAT) in 1980. He has 38 years of research and development experience in Asia, Africa and the Americas. Ranajit guides research, tech transfer, commercialization and scaling-up of the aflatoxin biocontrol technology Aflasafe in 17 African nations. He has authored nearly 175 publications and serves on the editorial board of two journals. Ranajit is a Steering Committee member of the African Union's Partnership for Aflatoxin Control in Africa (PACA), which named him a "Change Agent for Research and Technology" in 2016. The American Phytopathological Society gave him the Excellence in International Service Award in 2017.

Dieudonné Baributsa

ICT innovations in agriculture.

Associate Professor, Department of Entomology — Purdue University

Dieudonné Baributsa is an Associate Professor in Purdue University's Department of Entomology. He earned a bachelor's degree in Agriculture in the Democratic Republic of Congo and a master's and PhD from Michigan State University in Cropping Systems and Crop Physiology. Dieudonné worked at MSU as a Visiting Assistant Professor and the Program Associate for a USAID project in Central Asia. Previously, he was a director of an Agricultural Research Station in Northern Rwanda. In 2012, he became a Research Assistant Professor at Purdue. He leads the Purdue Improved Crop Storage (PICS) Program, which aims to reduce postharvest storage losses among smallholder farmers. Dieudonné focuses on applied research and innovative extension approaches to address post-harvest storage pest losses in developing countries. His broad areas of interest include agricultural technology development/dissemination, supply chain and market development for agricultural technologies, and



Mary Beggs

Technical Director — Cardno International Development

Mary is Cardno International Development's Agricultural Markets Systems Technical Director in the U.S. and USAID's

Avansa Agrikultura Project Director. Her 12 years' experience in market systems development and private-sector engagement cover USAID, DFID, MCC, IFC, the World Bank and the private sector in more than 20 countries. She specializes in private sector investment opportunity and constraints analysis, drawing from her experience on business enabling reform, financial sector development, and agricultural market systems projects. Recently, she was Study Director/Market Systems Specialist on a DFID-funded initiative to identify potential multinational enterprise investments in targeted countries in East Africa. She has conducted numerous market systems studies in emerging markets. Her focus lies in evaluating the intersection between corporations' core business practices and development objectives for long-term and mutually beneficial sustainable growth.



Robert Bertram

Chief Scientist — Bureau for Food Security USAID

Rob Bertram is the Chief Scientist in USAID's Bureau for Food Security and a key adviser on a range of technical and program

issues to advance global food security and nutrition. He leads USAID's evidencebased efforts to advance research, technology and implementation in support of the U.S. government's global hunger and food security initiative, Feed the Future. He previously was Director of the Office of Agricultural Research and Policy in the Bureau for Food Security, which leads implementation of the Feed the Future research strategy and related efforts to scale innovations in global food security efforts. Dr. Bertram's academic background in plant breeding and genetics includes degrees from California, Davis, Minnesota and Maryland universities. He studied international affairs at Georgetown University and was a visiting scientist at Washington University in St. Louis. He has been especially active in plant genetic resources policy as it relates to research for development, including applications of biotechnology in food security-related research.



Sriram Bharatam

Chief Mentor and Founder — Kuza Biashara Ltd.

Sriram Bharatam is an alumnus of MIT and an Ernst & Young Entrepreneur of the Year Award nominee. He won the Kauffman

award for social entrepreneurship and an EO Global Citizen of the year award. Sriram is a development visionary, technology innovator and a successful social entrepreneur on three continents. His passion is helping to solve big social challenges by empowering micro-entrepreneurs and enabling them to bring innovative positive changes to business, government and civil society. Sriram is the Founder & CEO of Kuza. One, a social technology enterprise that is spearheading the cause of capacity building of micro- and small entrepreneurs across Africa and Asia. Sriram was instrumental in architecting TIBU, the world's first comprehensive disease program management and monitoring solution for infectious diseases like tuberculosis and HIV/AIDS for the Ministry of Health, Kenya. This digital solution has more than 500,000 unique patient profiles and has won a Google Innovation award and WHO recognition.



Jennifer Billings

Agriculture Development Leader Corteva Agriscience, Agriculture Division of DowDuPont

As Agriculture Development Leader for Corteva Agriscience, Agriculture Division of DowDuPont, Jennifer Billings is developing and executing the global strategy to demonstrate Corteva's commitment to addressing the challenges of technology adoption and innovation in developing markets, with the goal of improving productivity for growers in developing countries. Through partnerships with stakeholders such as USAID, the Bill and Melinda Gates Foundation and CGIAR, Corteva is an industry leader in improving global food security with a focus on scaling innovative technologies to smallholder farmers. Before joining Corteva, Billings was the Senior Agriculture Advisor in the USAID Latin America and Caribbean Bureau, where she led interagency coordination and stakeholder engagement on Feed the Future and other programs. Prior to her position with USAID in Washington, she lived overseas for 10 years in Nepal, Jerusalem and Afghanistan, working on U.S. government programs to promote private sector-led growth and improve global food security. She has an MSc in Agribusiness and is a U.S. Army veteran.



Alesha Black

Director, Global Food and Agriculture Program — The Chicago Council on

Alesha Black is the director of the Global Food and Agriculture Program at the Chicago Council on Global Affairs. She oversees research publications, public events on food security and nutrition, and represents the council externally. From 2007 to 2015 she worked at the Bill & Melinda Gates Foundation in multiple roles, ranging from strategic partnerships with bilateral governments and UN agencies to managing a grant portfolio working to connect smallholder farmers to better market opportunities in sub-Saharan Africa. Black also co-led internal activities to link nutrition and agriculture programs, developed the first gender strategy, and supported advocacy activities to raise the profile of smallholder agriculture globally. Black received her bachelor's degree from the University of Arizona and her master's from the Maxwell School at Syracuse University.



Jennifer Blanke

Vice President, Agriculture, Human and Social Development African Development Bank

Jennifer Blanke is Vice President for Agriculture, Human and Social Development at the African Development Bank Group. From 2012 to 2017, she was Chief Economist at the World Economic Forum. Other roles held at the World Economic Forum included Lead Economist and Head of the Global Competitiveness and Benchmarking team, and Senior Programme Manager responsible for developing the business, management, and technology sections of the annual meeting in Davos, Switzerland. Dr. Blanke worked for a number of years as a management consultant for Eurogroup (Mazars Group) in Paris, France, where she specialized in banking and financial market organization. Dr Blanke holds a master's degree in International Affairs from Columbia University and an MA and PhD in International Economics from the Graduate Institute of International Studies, Geneva. She is a member of the Canadian government's Council of Economic Growth and holds a number of non-executive board responsibilities in the not-for-profit sector.



Howarth Bouis

Interim Chief Executive Officer — HarvestPlus

Dr. Howarth Bouis was awarded the World Food Prize in 2016, along with colleagues from the International Potato Center, in recognition

of efforts to promote and implement biofortification, the interdisciplinary, global effort to improve nutrition and health by developing and disseminating micronutrient-rich staple food crops. He helped pioneer this concept in the early 1990s, and it now reaches more than 30 million people in developing countries. HarvestPlus and its 400+partners deliver staple crops — including beans, cassava, maize, pearl millet, rice, sweet potato, and wheat — that provide higher amounts of vitamin A, iron, or zinc, three micronutrients identified as most lacking in diets globally. Biofortified crops have been released or are being tested in 60 countries. Dr. Bouis is the interim CEO and founding director of HarvestPlus, a joint program of the International Food Policy Research Institute and the International Center for Tropical Agriculture. Dr. Bouis earned BA, MA and PhD degrees from Stanford University.



Andrew Bracken

Partnership Manager, Feed the Future Partnering for Innovation Project — Fintrac

Andrew Bracken is a partnership manager for Fintrac's Feed the Future Partnering for Innovation project. He manages investments in private sector agricultural companies to commercialize technologies and services to smallholder farmers in Guatemala, Haiti, and Kenya. These investments include traceability software options, imazapyr-resistant maize commercialization, affordable cold storage, and improved chicken production and distribution. Andrew also conducts field research on the impact of project investments on smallholder farmers in Africa. He previously supported four global and two Zimbabwe-based projects in Fintrac's program management unit. Andrew holds BBA and MPP degrees from the University of Michigan. He was a Peace Corps volunteer in Cabo Verde and Mozambique and speaks Portuguese, Cabo Verdean Creole (Kriolu), and Spanish.



Enock Chikava

Deputy Director, Agricultural Development Bill & Melinda Gates Foundation

Enock Chikava is Deputy Director, Agricultural Development, Global Growth & Opportunity, at the Bill and Melinda Gates Foundation. He heads up the IDEAS (Innovations that Drive Effective Agricultural Systems) team. The team develops tools, solutions, and business models that can more cost-effectively deliver products, services, and practices in seed systems, soil health, agronomy, and fertilizer enabled by digital and finance to reach smallholder farmers at scale. Enock trained in Agricultural Economics and Business Strategy, with more than 25 years experience in Agriculture. Enock was on the African Seed Trade Association (AFSTA) board for 8 years and president from 2010 to 2012. Enock was raised on a smallholder farm (4ha) in a family of 11 and has dedicated his life to work toward the success of smallholder farmers as they use modern technologies to raise productivity, incomes, nutrition and economically empower themselves.



Larry Cooley

President Emeritus — Management Systems International (MSI); Curator of Global Community of Practice on Scaling Up

Larry Cooley is Founder and President Emeritus of MSI, a Tetra Tech company. He directed for 11 years the multi-country Implementing Policy Change

program and has been involved since 2003 in developing and applying a management framework and set of tools for assessing scalability and accelerating the scaling of development outcomes through public sector and commercial pathways. He has supported more than 100 scaling efforts in a variety of sectors; served as the scaling advisor to the MacArthur Foundation's 100&Change competition; and is founder and curator, with Johannes Linn, of the Global Community of Practice on Scaling Development Outcomes. Larry is the current Chair of the Governing Council of the Society for International Development and serves on the Board of Directors of the National Academy of Public Administration, ELMA Philanthropies, and World Learning. Larry holds graduate degrees from Columbia University, Princeton University and the Cranfield Institute of Technology in the UK.



Suraj Devani

Commercial Manager and Director — Pee Pee Tanzania Ltd. (PPTL)

With a background in Mechanical Engineering and over 19 years of experience in the woven flexible packaging industry in Africa, Suraj

has built up extensive technical and commercial knowledge of the business, having worked his way up from the production floor. In charge of PPTL's PICS project, he has overseen a team that has successfully disseminated the PICS technology from ground up and distributed over 3.5 million PICS bags regionally in the last three years. Having seen firsthand the impact of PICS in poverty alleviation and food security, his mission is to ensure availability of the technology at affordable prices to the rural poor.



Joseph D. DeVries

Vice President, Program Development and Innovation Alliance for a Green Revolution in Africa (AGRA)

Dr. Joseph D. DeVries is Vice President for Program Development and Innovation at the Alliance for a Green Revolution in Africa (AGRA). He earned a PhD in plant breeding and genetics at Cornell University in 1994, then joined World Vision International as Director for Food Security in Africa, based in Ghana, leading agricultural recovery and development activities in 20 countries. In 1997, he joined The Rockefeller Foundation, where he developed an initiative focused on genetic improvement of African crops and a farmer demand-driven system. In 2006, he led a team that developed the business plan for the Program for African Seed Systems (PASS), which became the first program of the newly formed AGRA. By 2016, 119 private, independent seed companies supported by AGRA were annually producing approximately 126,000 MT of certified seed, serving the needs of about 15 million smallholder farmers. Dr. DeVries currently oversees AGRA program investments in the areas of seed and fertilizer systems, agricultural extension, input supply, capacity building, and resilience.



Patricia Dinneen

Senior Advisor, Chair of Impact Investing Council — EMPEA

Dr. Patricia Dinneen is a Senior Advisor at the Emerging Markets Private Equity Association (EMPEA) and Chair of the Impact Investing

Council. Before joining EMPEA in early 2014, she spent nine years as Managing Director at Siguler Guff & Company, a global private equity firm with over \$10 billion in assets under management. She previously held positions at Cambridge Associates, British Telecommunications, Hughes Communications, RAND Corporation and the U.S. White House. She holds degrees from the University of Pennsylvania (BA), London School of Economics (M.Sc.) and MIT (PhD). She is involved in multiple philanthropic and impact investing activities, including CRS Board Member and Chair of the Impact Investment Funds Committee, Steering Committee Member of the Catholic Impact Investing Collaborative, and Funding Approval Committee Member of Convergence Finance.



Mark Edge

Director of Collaborations for Developing Countries — Bayer

Mark leads Bayer's collaborations with public-private partnership projects to improve food security and rural livelihood among

smallholder maize producers in sub-Saharan Africa. The WEMA (Water Efficient Maize for Africa) project is the signature project he leads. The WEMA project develops new drought-tolerant and insect pest-protected maize hybrids and provides the technology royalty-free. It helps build technical capacity in Africa to use conventional and molecular breeding as well as biotechnology. Mark grew up on a corn, soybean and livestock farm in Iowa. His background includes experience in biotech research and many aspects of managing seed business development, as well as the grain export business. He has a BS from Iowa State University, an MSc in Genetics from the University of California, Davis, and an MBA from Drake University.



Simeon Ehui

Director, Agriculture Global Practice — World Bank Group

Simeon Ehui was appointed Director of the World Bank's Food and Agriculture Global Practice in September 2017. He oversees the

Agriculture Global Practice work program with a focus on Africa, the Middle East, Eastern Europe and Central Asia. Since joining the World Bank in 2003, he was manager of the Food and Agriculture Global Practice for Africa (2015-2017) and South Asia (2009-2015) while based in Pakistan, and was Lead Economist and Sector Leader for the Sustainable Development Network in Nigeria. Before joining the World Bank, he worked for 15 years in the Consultative Group on International Agricultural Research (CGIAR). He managed multi-country agricultural research development programs in Africa and Asia for both the International Institute of Tropical Agriculture (IITA) and the International Livestock Research Institute (ILRI), Dr. Ehui holds a PhD in Agricultural Economics from Purdue University. He is an honorary fellow of the African Agricultural Economist Association, and a Distinguished Agricultural Alumnus of Purdue.



John leads the U.S. Dairy Foods business at Land O'Lakes, which includes retail and food services products and services. He assumed the role in 2014 after leading dairy foods teams since 2008. Before joining Land O'Lakes, John led marketing at American Medical Systems and spent 15 years in marketing leadership roles at General Mills. John serves on the boards of the American Butter Institute, ServeMinnesota and Gillette Children's Specialty Healthcare. He earned his bachelor's degree and MBA from the University of Minnesota.



Shaun spent 16 years with the Consultative Group for International Agricultural Research and the past 10 years with Catholic Relief Services. Shaun has also worked with several major agencies on short- and long-term projects including USAID, World Bank, USDA and FAO. In his current position, Shaun focuses on supporting smallholder farmers along the pathway to prosperity as part of the CRS's Signature Program Area for Agriculture. His work focuses on building the agro-enterprise capacity of last-mile field agents and enabling them to generate more value at the farm level through skills acquisition, use of digital technology, improving market linkage

and trading relationships. Shaun is currently working with a cross-agency team on generating agro-enterprise content for cloud-based distance learning systems and creating farmer-facing business tools using ICT solutions. Shaun holds a bachelor's in Horticultural Science from Reading University, a master's in Tropical Agriculture from Nottingham University and a PhD in Plant Physiology from Cranfield University.



Parasto Hamed

AgResults Field Coordinator — Deloitte

Parasto Hamed has nine years of experience in agricultural development and project management. She currently is the Field

Coordinator for the AgResults initiative, with project management responsibilities for Kenya, Nigeria, Uganda, and Zambia. She has a master's in International Agriculture and Rural Development from Cornell University. She also graduated with a master's in International Development from the London School of Economics and a bachelor's in International Relations from George Mason University. She has managed USAID Feed the Future projects based in Ethiopia and Uganda, and has worked on USAID-funded projects in Southern Africa, Egypt, Jordan, and Iraq.



Simon Heck

Program Leader (Sweet potato) — International Potato Center (CIP)

Dr. Simon Heck is a Program Leader at the International Potato Center (CIP), where he oversees the sweet potato research program

in 20 countries in Africa, Asia, and Latin America. Simon has more than 30 years of experience in agricultural, social and policy research. He leads a research project on Scaling Up Sweet Potato Through Agriculture and Nutrition (SUSTAIN) in five countries in Africa and Asia and other regional research efforts to understand the scalability of integrated agriculture-nutrition interventions. He is the research leader for Nutritious Foods and Value Addition of the CGIAR research program on Roots, Tubers, and Bananas. Prior to joining CIP, Simon worked as a Research Scientist at the WorldFish Center and the World Conservation Union—IUCN, and as a Livelihoods Adviser at the UK Department for International Development (DFID). Simon holds a PhD in Social Anthropology from Boston University, where he was a University Lecturer, and an MSc from the University of Mainz, Germany.



Brian Heese

Director, Investor Relations — One Acre Fund

Brian Heese is Director, Investor Relations at One Acre Fund, a dynamic social enterprise that sells seed, fertilizer and solar lights to

750,000 smallholder farmers in Africa. As head of investor relations, Brian raises debt to finance One Acre Fund's working capital needs. Brian has spent the last 10 years working with organizations that enable people to lift themselves out of poverty. Brian previously worked 12 years in investment banking with Merrill Lynch and 8 years as an auditor with Price Waterhouse where he led audits of IFC, a member of the World Bank Group. He has an MBA from the Wharton School at the University of Pennsylvania and a BBA from Loyola University in New Orleans.



David Hong

Global Policy Manager, One Acre Fund

David Hong leads global policy strategy and engagement at One Acre Fund, a nonprofit social enterprise that supplies smallholder

farmers with the tools and financing they need to grow their way out of hunger and

poverty. Previously, David analyzed donor agricultural policies at the ONE Campaign and consulted on private sector agriculture investments at Oxfam America. He holds a master's degree in international development and policy analysis from New York University and a bachelor's degree in business administration and economics from the University of Delaware.

Julie Howard Non-resident Senior Adviser Center for Strategic and International Studies

Julie Howard is an independent consultant on international development issues with a focus on agricultural development, youth employment, and sub-Saharan Africa. She is Senior Adviser (non-resident) at the Center on Strategic and International Studies, serves on the Board of Directors for the World Vegetable Center and the Somali Agriculture Technical Group, and is a member of the Initiative for Global Development's Council of Advisers. From 2015 to 2018, she was senior adviser to the associate provost and dean for international studies and programs at Michigan State University. From 2011 to 2014, Dr. Howard was the first chief scientist in the Bureau for Food Security at USAID and a senior adviser to the USAID administrator on agricultural research, extension, and education. At USAID, Dr. Howard directed the research, policy, and human and institutional capacity development programs of Feed the Future. She holds a BA from George Washington University and a PhD in agricultural economics from Michigan State.

Mark Huisenga Senior Program Manager, Bureau for Food Security, Market & Partnership Innovations Office — USAID

Mark Huisenga is an agricultural specialist with more than 20 years of experience in grain, fertilizer and seed value chains in Africa, Asia, Europe and the Americas. At USAID he is responsible for commercialization and scaling of new technologies as well as managing the Partnership for Inclusive Agricultural Transformation in Africa, a Global Development Alliance between the Bill & Melinda Gates Foundation, the Rockefeller Foundation, and the Alliance for a Green Revolution in Africa (AGRA). He manages the Partnerships for Africa Seed Technology Transfer Activity with Syngenta Foundation for Sustainable Development. He was a Director at Millennium Challenge Corp., a private consultant and business unit manager for Cargill Technical Services. He focused on due diligence for agricultural investments. He serves on several boards and advisory committees with the objective of agricultural development.

Floortje Jacobs
Public-Private Partnerships Advisor
SNV Netherlands Development Organization/PPPLab

As a Public-Private Partnerships Advisor for SNV Netherlands Development Organization, Floortje has since 2014 been part of the knowledge initiative PPPLab, which researches the relevance, effectiveness and quality of public-private partnerships (PPPs) for development. One of its key topics focuses on the role and contribution of partnerships (and individual partners) in scaling. Recently, she co-developed a practical tool called the Scaling Scan, which helps partnerships and projects to sharpen their scaling strategy. The tool was developed on the basis of ongoing research of both PPPLab and the International Maize and Wheat Improvement Center (CIMMYT) on how development initiatives scale in practice. Several test runs with the tool have been carried out with project teams

in the Netherlands, Mexico, India, Nepal and Kenya, and it is now available online. Current PPPLab research focuses on success factors, challenges and key trajectories of scaling. A next publication is expected in August.

Richard KohlLead Consultant and Vice President for Scaling and Strategy,
Strategy and Scale LLC

Dr. Richard Kohl is an international thought leader and practitioner in the scaling up of innovative programs and technologies. For the last five years he has worked with USAID's Bureau of Food Security, country missions, and implementing partners in integrating scaling up of agricultural innovations into Feed the Future. He worked with FTF country missions to identify the most scalable innovations in their projects and support scaling strategies for those innovations. He is currently designing and testing an Agricultural Scalability Assessment tool for BFS to apply to its investments in agricultural research. He has worked with or for IFAD, the World Bank, UNICEF, UNFPA, DFID, foundations including Ford, Nike, MacArthur, Packard and Rockefeller, and implementing partners such as iDE, Abt Associates, and MEASURE evaluation. Richard holds a PhD in Economics from the University of California-Berkeley and a BA in Social Sciences from Swarthmore College.

Matieyedou (Abdou) Konlambigue
Managing Director, Aflasafe Technology Transfer and Commercialization,
International Institute of Tropical Agriculture (IITA)

Mr. Konlambigue, a citizen of Togo, joined IITA in 2016 as the Managing Director of the Aflasafe Technology Transfer and Commercialization Program. He manages a diverse team of 15 researchers, business and marketing professionals within the Business Incubation Platform to bring Aflasafe products to market. He leads the development of strategic partnerships between public and private sector players to invest in the manufacturing and the distribution of agricultural technologies to farmers through technology transfer and licensing. Matiéyédou has more than 15 years' experience in private sector development, rural finance, structured trade financing, and agricultural value chain development. He joined IITA from the Alliance for a Green Revolution in Africa (AGRA). Mr. Konlambigue holds a master's degree in Rural Economics from the Catholic University of Louvain, Belgium, and Engineer degree in Agronomy (Major: Agricultural Economics) from the University of Lomés School of Agronomy.

Holger KrayLead Economist and Head of Africa Agriculture Policy Unit
World Bank Group

Holger A. Kray is Lead Agricultural Economist for Africa in the World Bank's Agriculture Global Practice and Head of the World Bank's Africa Agricultural Policy Unit, a unit that carries out and oversees economic and other policy work related to agriculture for development in the region. Holger has expertise in agricultural policy and rural strategy reform, climate-smart and sustainable agriculture and public sector management. He has working experience in Africa, Europe, Central Asia, Latin America and the Caribbean and has worked extensively on EU Enlargement and Common Agriculture Policy matters. Before joining the World Bank, he worked as Senior Financial Sector Consultant for an international management consulting firm, and he led a consulting firm working with international organizations such as the World Bank, Food and Agriculture Organization of the United Nations, European Commission and the Black Sea Economic Cooperation. He holds a PhD in Agricultural Economics from Kiel University, Germany.



Johannes F. Linn Nonresident Senior Fellow — Brookings Institution

Johannes F. Linn is a non-resident Senior Fellow at the Brookings Institution, a Distinguished Resident Scholar at the Emerging

Markets Forum in Washington, D.C., and a Senior Fellow at the Results for Development Institute. In 2011, 2014 and 2017, he served as the chair for the 9th, 10th and 11th Replenishment Consultation of the International Fund for Agricultural Development. From 2005-2010 he was Director of the Wolfensohn Center for Development at Brookings. Prior to joining Brookings in 2003, he worked for three decades at the World Bank. Johannes Linn has published extensively on development and global governance issues, including co-editing "Getting to Scale: How to Bring Development Solutions to Millions of Poor People" (Brookings Press 2013). His current research interests are in the areas of development effectiveness, global governance reform, urbanization, and regional cooperation. He holds a bachelor's degree from Oxford University and a doctorate in economics from Cornell University.



Kola Masha Managing Director — Babban Gona

Kola is the Managing Director of Babban Gona, an award-winning, high-impact, financially sustainable and highly scalable social

enterprise, part-owned by the farmers it serves. Babban Gona was created to specifically attract youth to agriculture and away from the looming instability of extremist groups. It franchises thousands of mini maize and rice farmer cooperatives across northern Nigeria, increasing the profitability of the smallholder members 2.8 to 3.5 times above the national average. This increase in net income is accomplished by delivering an integrated holistic package of training, farm inputs and marketing services, on credit. Babban Gona has been able to deliver this credit while maintaining high repayment rates. Prior to Babban Gona, Kola was a Managing Director and CEO of a major subsidiary in the Notore Group, one of Nigeria's leading agricultural conglomerates. Kola holds an MBA (Honors) from Harvard and a master's in Mechanical Engineering from Massachusetts Institute of Technology.



Charlene McKoin

Independent Consultant — McKoin International Development

Charlene McKoin is an Independent Development Consultant with affiliations to Aq-Connectors, a Dutch-based development

consulting firm focused on empowerment of women, girls and youth, and to RogersMacJohn, a consulting firm focused on fostering public/private partnerships and providing access to markets for smallholder farmers. She was a Senior Program Officer at the Bill & Melinda Gates Foundation, where she worked on integrated value chain development and post-harvest loss mitigation. Before joining the Gates Foundation in 2012, Ms. McKoin spent more than eight years working as Chief of Party, managing a variety of USAID-funded agribusiness, financial, nutrition and HIV/AIDS projects for Abt Associates, Cardno Emerging Markets and AFRICARE. Prior to her years in international development, Ms. McKoin spent 20 years in corporate, international structured trade and project finance working for Bank of America, JP Morgan and Wells Fargo. She has lived and worked in Africa and Latin America with specific expertise in Lusophone countries.



Robert McLean

Senior Program Specialist, Evaluation International Development Research Center (IDRC)

Robert McLean is Senior Program Specialist in evaluation at Canada's International Development Research Center. He has led IDRC's organization-wide study on scaling research impact. The results of this study will be published as an Open Access book and e-book by Routledge Publishing in late 2018. Rob has worked in evaluation and knowledge translation programs for the Canadian Institutes of Health Research and prior to this as an evaluation consultant. He is currently Research Fellow in the Integrated Knowledge Translation Research Network at the University of Ottawa, Canada, where he leads a program investigating the role of the research funder in moving knowledge into impact at scale. Rob holds an MSc in Development Economics from the University of Manchester, UK, and is a PhD candidate in the Faculty of Medicine and Health Sciences at Stellenbosch University, South Africa.



Brian Milder Chief Innovation Officer — Root Capital; Director — Council on Smallholder Agricultural Finance (CSAF)

Brian Milder is Director of the Council on Smallholder Agricultural Finance (CSAF), an alliance of 12 lenders that seek to promote industry standards and best practices and to grow the financial market for small and medium enterprises (SMEs). CSAF members deploy \$700 million in credit annually to SMEs that facilitate market access and improve livelihoods for 2.3M smallholder farm households. For 11 years he has served in various capacities, most recently as Chief Innovation Officer, at Root Capital, a founding member of CSAF and pioneering impact investor in agricultural finance. He previously served on the leadership team for Health Leads, an industry leader in addressing the social factors affecting health outcomes in the United States, and helped launch a venture fund to incubate social enterprises for the Nonprofit Enterprise and Self-sustainability Team (NESsT) in Santiago, Chile. He holds a BA in Social Studies from Harvard College and an MBA from Harvard Business School.



Lois Muraguri

Director of Operational Support & External Affairs — GALVmed

Lois Muraguri is Director of Operational Support & External Affairs for GALVmed. She received her law degree from Warwick University,

UK, and a PhD from Queen Mary University of London, UK, specializing in intellectual property in product development and public-private partnerships in the context of development. Lois was a research fellow in life sciences and development at the Innogen ESRC Center for Social and Economic Research on innovation in genomics at the Open University, UK. She consulted for the International Crop Research Institute for Semi-Arid Tropics (ICRISAT), the International Livestock Research Institute (ILRI), and the World Intellectual Property Organisation (WIPO). She has consulted for London law firms on intellectual property matters and commercialization of technology. Her interests include the dynamics of public-private partnerships in the context of technology transfer, and the innovation process in health and agriculture and models for creating an enabling policy environment for translating research into viable marketable products in the pro-poor context.



Mezuo Nwuneli

Managing Partner — Sahel Capital Agribusiness Managers Ltd.

Mezuo has a 22-year career in a broad spectrum of finance-related roles in private equity, investment banking, and corporate finance.

Over the past seven years, Mezuo has worked extensively within the agribusiness sector in West Africa and across a broad range of crop value chains. Mezuo started his career with the Sabre Group in Dallas in 1995, and then worked in J.P. Morgan & Co's mergers and acquisitions group in New York. He was previously a Partner at AFIG, a private equity firm covering 28 countries in Africa, and he worked in leadership positions at SecTrust (now Afrinvest), Ocean & Oil Holdings, and MTS First Wireless. He resigned from AFIG to co-found Sahel Capital in 2010. Mezuo holds an MBA from Harvard Business School, and received a B.Sc. in Industrial Management, with a minor in Information Systems, from Carnegie Mellon University. He is a 2007 Archbishop Desmond Tutu Fellow and a 2015 Eisenhower Fellow.



Tim Peoples

Managing Director, Purdue Foundry — Purdue University

Tim Peoples is the Managing Director for the Purdue Foundry. His expertise includes regulatory affairs, startup companies,

entrepreneurship and life sciences. At the Foundry, he facilitated services and programs to support startups. Previously, he was the Director of Purdue Technology Centers in West Lafayette and Director of the Purdue Research Park Entrepreneurship Academy. He has been involved in the formation of three startup companies and was an executive for a large multinational corporation. Peoples earned master's and PhD degrees (plant science and plant biochemistry) from the University of New Hampshire and a bachelor's degree in biology from Defiance College. He is a member of the National Business Incubation Association and the International Commercialization Alliance.



Kevin Pixley

Director, Genetic Resources Program — CIMMYT

Kevin joined CIMMYT as a postdoctoral fellow and later worked as a maize breeder. In 1993, he moved to the research station in Harare,

Zimbabwe, and was team leader there. After 11 years in Africa, he returned to CIMMYT headquarters in Mexico to serve in directing positions in the Global Maize Program. He currently is director of CIMMYT's Genetic Resources Program and leads the Seeds of Discovery project, which is developing an open-access platform of genomic and phenotypic databases along with informatics tools to facilitate the use of maize and wheat biodiversity in applied research and breeding programs. His accomplishments include the development of disease-resistant and nutritionally enhanced maize varieties. He earned a bachelor's degree in agronomy at Purdue University, a master's in crop physiology from the University of Florida, and a PhD in plant breeding from Iowa State University in 1990.



Tim Prewitt

Chief Executive Officer — International Development Enterprises (iDE)

Tim Prewitt is the CEO of International Development Enterprises (iDE), a global organization committed to leveraging the power of

business to fight poverty. With a global team of 1,200 staff in 14 countries, iDE aims to reach 20 million people with a tangible impact on their lives. For 25 years, Tim has brought private sector strategies to raising income, creating jobs, and having impact on the rural poor through business-led strategies. Prior to joining iDE, Tim worked in Nigeria, China, Afghanistan, Romania, and East Timor, working with farmers,

agriculture and food production companies, and governments to increase farmer income and farm yields. He has also worked in venture capital and national level strategies for economic growth. Tim is a Fulbright Scholar with an MA in Economics and Sociology and an M.BA in Finance.



Bob Rabatsky

Senior Vice President, Director of Feed the Future Partnering — Fintrac

Bob Rabatsky is Fintrac Senior Vice President, currently seconded to be the Director of the Feed the Future Partnering for Innovation

program, where he leads a team in identifying and commercializing innovative agricultural technologies to base-of-the-pyramid consumers. He has supervised agricultural projects in Africa, Asia, Latin America, Russia, the Balkans, and Eastern Europe; managed large USAID agricultural, governance, and micro-enterprise contracts; and was Chief of Party on a global food aid analysis project and Deputy Chief on a public administration project in Poland. He frequently contributes to World Bank, $USAID, and \ various \ development \ practitioners' round table \ discussions \ and \ workshops$ on issues ranging from food safety to procurement, and long-range food security planning and goals. Bob joined Fintrac in 2002, and prior to that held management positions with other consulting firms and the Peace Corps. He has an MBA in finance, a BS in agriculture, and is fluent in French.



F. Conor Riggs

Director of Market Systems and Entrepreneurship International Development Enterprises (iDE)

F. Conor Riggs is Global Director of Market Systems and Entrepreneurship at iDE, leading the organization's Global Agriculture Initiative and market systems development methodologies, including commercialization of resource-smart technologies, market access, and last-mile delivery. With over 15 years of expertise in market systems development, inclusive business facilitation and human-centered design, he has assumed leadership roles spanning a diverse spectrum of initiatives, including agricultural mechanization, women-led SME development, multi-sectoral food and nutrition security, WASH, livestock, micro-irrigation/solar pumping, and solar micro-grids. Conor holds a BBA in Business Economics and Public Policy from George Washington University and an MA in International Economics and International Affairs from The Paul H. Nitze School of Advanced International Studies at Johns Hopkins University.



Timothy J. Runnalls Senior Director of Real Assets Ascension Investment Management

Timothy J. Runnalls, CFA, is the Senior Director of Real Assets. He has oversight of the public and private securities making up the real asset and commodity strategies. His primary responsibilities include manager selection and ongoing portfolio management, and he has 17 years of investment industry experience. Prior to joining Ascension Investment Management in 2011, Mr. Runnalls was a Senior Research Analyst at Summit Strategies Group, where he was responsible for analyzing, monitoring and recommending real asset and commodity investments. Prior to joining Summit Strategies Group in 2007, he was Assistant Vice President at Tortoise Capital Advisors, where he was responsible for analyzing public (MLPs) and private energy infrastructurerelated investments. Previously he was Assistant Vice President at Stifel Nicolaus, where he worked in the Energy Investment Banking Group. Mr. Runnalls earned his BSBA and MBA from Washington University in St. Louis and is a CFA charter holder.



William N. Ryerson Founder and President — Population Media Center

William N. Ryerson is Founder and President of Population Media Center, an organization that improves the health and wellbeing of

people through entertainment-education strategies. He also is Chair and CEO of the Population Institute, which works in partnership with Population Media Center. PMC creates long-running serialized dramas on radio and television, in which characters evolve into role models for the audience on such issues as family size decisions and use of family planning. Mr. Ryerson has a 47-year history of working in the field of reproductive health, including 30 years of experience in use of social change communications in various cultural settings worldwide. Ryerson received a BA in Biology from Amherst College and an MPhil in Biology from Yale University.



Pepijn Schreinemachers is Flagship Program Leader — Enabling Impact at the World Vegetable Center (WorldVeg) and is based in Thailand. He coordinates the work of the World Vegetable Center with regard to scaling approaches, monitoring tools, knowledge management, and impact evaluation. In his position as Lead Scientist — Impact Evaluation, he studies the impact of the Center's interventions and technologies, such as improved varieties, off-season production methods, and home and school gardens. Study results are used to improve the Center's intervention designs and promote sustainable impact at scale. Pepijn holds a PhD in Agricultural Economics from the Center for Development Research (ZEF), University of Bonn, Germany, and an MSc in Development Studies from Wageningen University, the Netherlands. Before joining WorldVeg in 2012, he was project coordinator at the University of Hohenheim (Germany) and was stationed in Thailand.

Mark Schut Senior Scientist, Country Representative for Rwanda International Institute of Tropical Agriculture (IITA)

Marc Schut is a senior scientist working with the International Institute of Tropical Agriculture (IITA) and the Knowledge, Technology and

Innovation group of Wageningen University. Marc is leading the flagship "Improved Livelihoods at Scale" under the CGIAR Research Program on Roots, Tubers and Bananas. Marc is also Principal Investigator of several large donor-funded research for development projects that focus on the use of ICT and digital innovation for scaling of innovation, and on improving food, income and nutrition security in banana and cassava production systems. His ambition is to conduct action research that enhances innovation and scaling capacities of public and private sector partners and that shape government, development and business policy agendas.

Louise Sperling Senior Technical Advisor, Agriculture and Livelihoods Catholic Relief Services (CRS)

Louise Sperling is a Senior Technical Advisor at Catholic Relief Services, focusing on more vulnerable populations. She has managed and technically backstopped programs in 30+ countries in Africa, Asia and Latin America. In terms of seed systems, per se, Sperling's work encompasses "normal" smallholder farmer systems as well as high-stress ones: e.g., she led assessment missions after the 1994 Rwandan genocide, post-earthquake in Haiti, and prereferendum in South Sudan. She has co-authored more than 100 articles, inter alia:

Seed systems farmers use (Food Security 2016); Making seed systems more resilient (Global Environmental Change 2013); Understanding and strengthening informal seed markets (Experimental Agriculture 2010: Sperling and McGuire); and Moving towards more effective seed aid (Journal of Development Studies 2008). A new website, *seedsystem.org*, shares practical and policy advice for those supporting smallholder farmer seed systems in crisis, chronic stress and developmental periods.

David J. Spielman Senior Research Fellow International Food Policy Research Institute (IFPRI)

David J. Spielman is a senior research fellow at the International Food Policy Research Institute. He joined IFPRI in 2004 and is based in Washington, D.C., with the Environment and Production Technology Division. He leads the institute's program on science, technology, and innovation policy. David's research agenda includes agricultural R&D, plant genetic resource policy and seed systems, agricultural extension and advisory services, and communitydriven rural development. Previously, David was based in Addis Ababa, Ethiopia with IFPRI's Knowledge, Innovation, and Capacity Division and its International Service for National Agricultural Research division. Earlier, David worked on agriculture and rural development issues for the World Bank and the Aga Khan Development Network (Pakistan). David received a PhD in Economics from American University in 2003, an MSc in Development Studies from the London School of Economics in 1993, and a BA in International Relations from Tufts University in 1992.

Thavy Staal Sustainability and Project Manager, Crop Protection Africa & Middle

Thavy Staal has almost 20 years of experience at BASF in the agricultural industry, but her current role as the sustainability manager for BASF Crop Protection in Africa & Middle East is her most rewarding job yet. She is based in Limburgerhof, Germany, and manages smallholder projects in the AME region. These projects include exploring innovative business models to evaluate digital tools, not only to increase reach but to improve farmer productivity and awareness on product stewardship and safety topics. She is eager to build multi-stakeholder partnerships (SDG 17) in these projects for greater impact. She understands that forging effective alliances is critical for long-term success and that stakeholders have an important role to play to sustainably improve the livelihoods of smallholder farmers. She has a bachelor's degree in Chemical Engineering from Texas A&M University.



Stephanus (Fanus) Swart General Manager — Curativo

Fanus Swart is General Manager of Curativo, leading the teams responsible for conducting registration trials on behalf of VillaCrop

and Winfield United USA. He has multiple degrees in Plant Pathology, all from South African universities, including BSc (1982) and MSc (1989) degrees from the University of Pretoria, and a PhD (1998) from the University of the Orange Free State. He began his career (1984-1989) as an agricultural researcher at the Agricultural Research Counsel, Potchefstroom, where he conducted research on controlling soil-borne diseases of peanuts, dry beans, and other oilseed crops. His work at Letaba Citrus Estates (1989-1998) focused on control of pathological and nematode-related problems on citrus. In 1998-2012, he was Founder and Managing Director of QMS Agri Science. Swart joined Syngenta South Africa in 2009. He joined SGS South Africa as Seed and Crop Manager in Agricultural Services in 2015, then became General Manager of Curativo in 2017.



Jelle Van Loon is the Mechanization Specialist, Latin America, at the International Maize and Wheat Research Center (CIMMYT). He is an agricultural engineering graduate of the Catholic University of Leuven, Belgium. Specializing in agriculture for tropical and subtropical regions, he has worked in remote regions in Peru, focusing on the optimization of supply chains management for local smallholder farmers. For his doctoral studies he did research on crop growth modeling, linked with on-farm nitrogen fertilization recommendations schemes. He joined CIMMYT as part of the MasAgro team in 2013, and has been in charge of the machinery innovation and mechanization efforts integrated within CIMMYT's Sustainable Intensification Progam. He has led regional projects in Latin America, Africa and South Asia and focuses on the R&D&I side, ranging from low-tech mechanization to precision agriculture applications, evaluation protocols and rapid prototyping issues, seeking to increase access to and availability of tailor-made farm equipment.

Seerp Wigboldus

Senior Advisor/Researcher, Wageningen Center for Development (CDI) — Wageningen University & Research

Seerp Wigboldus graduated from Wageningen University, the Netherlands (1964), and then worked for 10 years in Nepal and Tibet (China) in rural development projects. Over the past 15 years, he has worked as advisor, trainer, and researcher with Wageningen Center for Development Innovation (CDI) in the field of interdisciplinary and transdisciplinary collaboration, capacity development for strategic planning, monitoring and evaluation, and multi-stakeholder processes. This work focused on countries in Africa and Asia. He is scheduled to defend his PhD thesis on "rethinking the idea and practice of scaling innovations for development and progress" in September 2018. His key interest is in working on the interface of science, philosophy, and societal goals and concerns.

Tricia WindSenior Program Specialist, Evaluation International Development Research Center (IDRC)

Tricia Wind is a Senior Program Specialist in evaluation in Canada's International Development Research Center. She has led a number of broad evaluations on the results of IDRC's research for development programming in the Global South. These have focused on evaluating leadership, research networks, and devolving programming from a Northern funder to Southern research organizations. She provides technical assistance to IDRC programs, including the Agriculture and Food Security program, whose current work focuses on scaling up research-based solutions for agriculture and nutrition. She will be starting an organization-wide evaluation of IDRC's strategies to achieve results at scale.

Simon Winter *Executive Director Syngenta Foundation for Sustainable Agriculture*

Simon Winter became Executive Director of the Syngenta Foundation in September 2017. Previously, he was at TechnoServe as Senior Vice President, Development, in Washington, D.C., and previously led regional operations in sub-Saharan Africa. From 2015 to 2017, Simon was a Senior Fellow of the Mossavar-Rahmani Center at the Harvard Kennedy School of Government. He chairs the board of ACRE, and is a board member of Root Capital. Simon holds

advisory positions with the World Economic Forum, Tulaa and the Initiative for Smallholder Finance. Earlier career steps included management positions at McKinsey, independent development consultancy, economic planning for a Ministry in Botswana, and roles on three continents at Barclay's Bank. The UK citizen holds a PhD in Economics from the School of Oriental and African Studies, London.



Paul Winters

Associate Vice-President, Strategy and Knowledge Dept. Director, Research and Impact Assessment Division International Fund for Agricultural Development (IFAD)

Paul Winters is the Associate Vice President, a.i., Strategy and Knowledge Department and Director, Research and Impact Assessment Division at the International Fund for Agricultural Development. From 2004 to 2015, he was a Professor of Economics at American University in Washington, D.C. Previously he worked at the Inter-American Development Bank, the University of New England and the International Potato Center. He has published numerous articles in the areas of impact evaluation, migration, cash transfer programs, rural development and smallholder agriculture. He holds a PhD in Agricultural and Resource Economics from the University of California at Berkeley.

Lennart Woltering

Scaling Advisor — International Maize and Wheat Research Center (CIMMYT)

Lennart Woltering works as a Scaling Advisor for the International Maize and Wheat Research Center (CIMMYT), based in Mexico City. Under the Sustainable Intensification Program, he advises teams in Mexico, Nepal, Bangladesh and India about agricultural mechanization and conservation agriculture practices. Lennart is working with partners in the Netherlands to develop and test a "Scaling Scan." It considers the strength of 10 critical "ingredients" required for scaling to improve project design, implementation and evaluation. It proved useful in building capacity around scaling of CIMMYT staff and partners. Furthermore, Lennart leads a CIMMYT-internal working group on scaling, and he is involved in multiple Communities of Practice. Lastly, Lennart has a shared position with GIZ, and he is a member of the GIZ Task Force on Scaling, which is set up to think anew about scaling impact from agricultural research.



Carolyn Woo

Emeritus President & CEO — Catholic Relief Services Distinguished President's Fellow for Global Development — Purdue University

From 2012 to 2016, Dr. Carolyn Yauyan Woo was President & CEO of Catholic Relief Services, the official international humanitarian agency of the Catholic community in the United States. She currently serves in an advisory capacity as the Distinguished President's Fellow for Global Development at Purdue University. Before coming to CRS, Carolyn served from 1997 to 2011 as dean of the University of Notre Dame's Mendoza College of Business. She was one of 40 Young Leaders of American Academe by Change Magazine, the journal of the American Association for Higher Education; distinguished alumna and honorary alumna by Purdue University and University of Notre Dame, as well as the conferral of honorary doctorates from over 30 universities. Carolyn was featured in the May/June 2013 issue of Foreign Policy as one of the 500 most powerful people on the planet and one of only 33 in the category of "a force for good."

Note

Conference attendees are encouraged to view the posters listed in this section (P1-P30) in **Stewart Center Room 218** during the breakfast hours, on Wednesday evening, or during breaks. Poster authors are asked to be available at/near their poster during at least part of the breakfast hours.



POSTERS

	Lead Author – <i>Affiliation</i> <i>Email Address</i> All Authors	POSTER ABSTRACT TITLE	KEYWORDS
P-1	Larry Cooley — Management Systems Interantional (MSI) lcooley@msi-inc.com	A tool for assessing and improving the scaling potential of agricultural technologies	Scaling assessment tool
P-2	Floortje Jacobs — SNV Netherlands Development Organization/PPPLab fjacobs@snv.org Floortje Jacobs and Lennart Woltering	Scaling Scan: a practical tool to determine the potential to scale	Scaling assessment tool
P-3	Helena Shilomboleni — International Development Research Center (IDRC) hshilomboleni@idrc.ca Renaud De Plaen and Helena Shilomboleni	Scaling up food security innovations: lessons from the Canadian International Food Security Research Fund	Scaling innovations; Lessons learned
P-4	S. Assefa — International Center for Agricultural Research in the Dry Areas (ICARDA) s.assefa@cgiar.org S. Assefa, T. Wuletaw, Z. Bishaw, K.Shideed, M. Baum, I. Tahir, T. Debele, I. U. Abubakar, O. Olabanji, D. Kutywayo, R. Mogi, O. Goita and C. Akem	Scaling up proven wheat technologies and innovations for achieving a wheat self-sufficiency in Africa	Wheat; Production, TAAT Wheat Initiative
P-5	Mpoko Bokanga — IITA - TAAT mp.bokanga@cgiar.org	The TAAT Clearinghouse: Coordinating technology delivery at scale	TAAT Clearinghouse Production; Value chains
P-6	Adebayo Abass — IITA - TAAT <u>a.abass@cgiar.org</u>	Establishing cassava as an agro-industrial crop through the scaling-out of proven technologies and innovations for the production, processing, and marketing of value-added products in Africa	Cassava; TAAT Cassava Compact; Production; Processing
P-7	Brian Diers — University Illinois, University Missouri, IITA (Zambia) (FTF Soybean Innovation Lab) bdiers@illinois.edu	Pan-African trials: Fast-tracking the delivery of new soybean varieties	Public-private partnerships; Soybeans; Production
P-8	Brian Diers, Randy Nelson, Godfree Chigeza Mark Jung — Corteva Agriscience™ jim.gaffney@pioneer.com Mark Jung, Alyssa DeLeon, Victor Llaca, Kevin Fengler, Bob Meeley, Kevin Simcox, Jan Schulze, Michael Olsen, Ann Murithi, Kanwarpal Dhugga, Kevin Pixley, and Jim Gaffney	New tools for maize lethal necrosis virus in Africa: CIMMYT and Corteva Agriscience collaborate on plant breeding innovations	Maize; Whole-genome sequencing
P-9	Gospel Omanya — TAAT Maize Initiative; African Agricultural Technology Foundation (AATF) g.omanya@aatf-africa.org	Scale up of climate smart maize technology package for transformation of the maize value chain and livelihoods in Africa	Maize; Production; Technology package
P-10	Joshua Minai — Purdue University (Agronomy) jminai@purdue.edu Joshua Minai, Darrell Schulze, Mercy Ngunjiri	Renewal and delivery of spatially explicit soils information in Western Kenya	Digital soil mapping
P-11	Heather Pasley — Purdue University (Agronomy) hrpasl@purdue.edu	P-solubilizing inoculants	Phosphorus deficiency; Microbial inoculants
P-12	A. Chaldia Odette Agossou — Seed Services services.seed@gmail.com A. Chaldia Odette Agossou, Lys Amanvi Aglinglo, Aristide C. Houdegbe, Dedeou A. Tchokponhouse	Production and marketing of horticultural seeds and seedlings of African indigenous vegetables and fruits in Benin	Seed systems; Indigenous vegetables; Fruits
P-13	Elizabeth Onwubuya — University of Nigeria, Nsukka, Enugu State, Nigeria elizabeth.onwubuya@unn.edu.ng Elizabeth Onwubuya, Ifeoma Anugway C. Edeh	What factors constrain the efficient scaling up of cocoa value chain technologies among cocoa farmers under the Commercial Agriculture Development Project? Insights from Cross River State, Nigeria	Cocoa value chain
P-14	Bhola Shrestha — Heifer International Nepal; University Florida (FTF Livestock Innovation Lab) bhola.shrestha@heifer.org	Mobile-phone based dairy feeding support tool	Dairy; Milk yield; ICT

P-15	T. O. Olorunfemi – North West University, South Africa; University of Ilorin, Nigeria oladeletemitope22@yahoo.com	Determinants of the involvement of Extension agents in the dissemination of climate smart agricultural initiatives: Implication to scaling up	Climate smart agriculture; Extension
	T.O. Olorunfemi, O.D. Olorunfemi, and O.I. Oladele	implication to scaling up	
P-16	Divine Ntiokam — Climate Smart Agriculture Youth Network (CSAYN) <u>ntiokam2@gmail.com</u> Divine Ntiokam, Jessica Rakotarisoa, Jessie Dodge	Youth mainstreaming in climate smart agriculture as a means to achieving zero hunger in African by 2025	Climate smart agriculture; Youth
P-17	Aboubakar Karim — INVESTIV <u>karimaboubacar.s@gmail.com</u>	Precision agriculture for African development	Precision agriculture; Remote monitoring
P-18	Lennart Woltering — CIMMYT <u>I.woltering@cgiar.org</u> Lennart Woltering, Tim Krupnik, Jelle van Loon, and Frederic Baudron	Scaling agricultural mechanization worldwide, the case of the 2-wheel tractor (2WT)	Mechanization; Tractor
P-19	David Wilson — Purdue University (FTF Food Processing Innovation Lab) wilsondd@purdue.edu David Wilson and John Lumkes	The Purdue Utility Project: Transportation and power solutions for Africa	Transportation; Utility vehicle; Mechanization
P-20	Anthony Phan — University of California - Davis (FTF Horticulture Innovation Lab) aynphan@ucdavis.edu	DryCard™	Postharvest; Moisture detection; DryCard™
P-21	Alexandra Spieldoch — Compatible Technology International (CTI) alexandra@compatibletechnology.org	Postharvest processing enterprises for African smallholders	Processing; Value added; Cereals
P-22	Kerry Clark — University Missouri (FTF Soybean Innovation Lab) clarkk@missouri.edu Kerry Clark and Gabriel Abdulia	A field-tested, low-cost, locally-produced, multi-crop thresher	Postharvest; Multi-crop thresher
P-23	Hira Channa — Purdue University (FTF Food Processing Innovation Lab) hchanna@purdue.edu; jrickerg@purdue.edu Hira Channa, Jacob Ricker-Gilbert, Hugo De Groote, Jonathan Bauchet	Willingness to pay for maize moisture detection devices in Kenya	Postharvest; Moisture detection; Hygrometer; DryCard; Willingness to pay
P-24	Stacy Prieto — Purdue University (FTF Food Processing Innvation Lab) mccoy20@purdue.edu; jrickerg@purdue.edu Stacy Prieto, Jonathan Bauchet, Jacob Ricker-Gilbert	How does improved post-harvest handling influence aflatoxins spread? Evidence from smallholder farming households in Senegal	Postharvest; Maize; Aflatoxin; Training
P-25	Miriam A. Ofoeze — National Root Crop Research Institute Umudike, Nigeria mimiofoeze@gmail.com	Processing of yam for export	Portharvest; Yam; Processing; Export
P-26	Sidi Sanyang — Africa Rice Center s.sanyang@cgiar.org Sidi Sanyang, Kamanda Josey, Fiamohe Rose Edwige, Ndindeng Sali Atanga, Attiogbevi-Somado A. Kafu-Ata, and Abdoulaye Abiba	GEM parboiled domestic rice in urban markets: A promising future in Nigeria	Parboiled rice; Parboiling technology; Income
P-27	I Okike— <i>IITA</i> i.okike@cgiar.org I Okike, P Kulakow, R Ofei and S Wigboldus	Transforming cassava peel into high quality animal feed ingredients	Cassava; Processing; Animal feed
P-28	Violet Mugalavai — University of Eldoret, Kenya (with FTF Food Processing Innovation Lab) violet.mugalavai@gmail.com	University of Eldoret Food Processing Training and Incubation Center	Value added; Processing; Training; Youth; Women; Enterpreneurs
P-29	Lilian Onyegbulam – Michael Okpara University of Agriculture, Nigeria oa.lilian@gmail.com	Orange-fleshed sweet potato drinks commercialization towards a healthy population, Nigeria	Sweet potato; Processing; Beverage; Vitamin A
	L.A. Onyegbulam and C. Aniedu		
P-30	Bernard Pelletier – Farm Radio International; Independent researcher; Farm Radio Trust (funded by IDRC) <u>bpelletier@farmradio.org</u>	The ICT4Scale initiative: Harnessing ICT to scale up agricultural solutions	ICT; Gender
	Bernard Pelletier, Berhane Gebru, Catherine Mloza-Banda, Stanley Khaila, George Vilili, Mark Leclair, and Rex Chapota		

Posters on the technologies and innovations to be evaluated in Session 7 will be displayed in **Stewart Center Room 214** on Wednesday and Thursday (Technologies I-VIII). Conference attendees are encouraged to view these posters during the breakfast hours, on Wednesday evening, or during breaks. Poster authors are asked to be at/near their poster during at least part of the breakfast hours.

#	Lead Author – <i>Affiliation</i> <i>Email Address</i> All Authors	Poster Abstract Title	Keywords
I	Jacob Ricker-Gilbert — Purdue University (FTF Food Processing Innovation Lab) hchanna@purdue.edu; jrickerg@purdue.edu; woloshuk@purdue.edu Hira Channa, Jacob Ricker-Gilbert, and Charles Woloshuk	Hygrometer	Postharvest; Moisture detection; Hygrometer
II	Donna Cohn — Hampshire College (Amherst, MA, USA) dcohn@hampshire.edu	Cyclone pearl millet thresher	Postharvest; Threshing; Pearl millet
III	Anthony Phan — University California - Davis (FTF Horticulture Innovation Lab) aynphan@ucdavis.edu; msreid@ucdavis.edu Michael Reid and Anthony Phan	Chimney solar dryer	Postharvest; Drying
IV	Efe Anthony Omudu — <i>Galaxy Integrated Aqua (Aluu, Rivers State, Nigeria)</i> <u>omuduefe@yahoo.co.uk</u>	Integrated mobile cassava peel processing device for animal feed	Postharvest; Cassava; Processing; Animal Feed
V	Keshav Sah — University Florida (FTF Livestock Innovation Lab) Keshav.Sah@heifer.org; livestock-lab@ufl.edu	Technology package for prevention and control of mastitis in dairy animals	Dairy; Mastitis
VI	Elyse Habumukiza — INGABEYACU (Entrepreneur in Busogo, Rwanda, being supported by AfDB to attend) ehabumukiza@gmail.com	Kero porridge flour (A gift of being)	Food processing; Entrepreneurs
VII	William Lanier — Neverldle Farms (Ghana) <u>NeverldleStorage@gmail.com</u>	Mobile utility grain storage	Postharvest; Grain storage
VIII	Bruce Hamaker — Purdue University (FTF Food Processing Innovation Lab) hamakerb@purdue.edu; mmoussa@purdue.edu; bbugusu@purdue.edu Bruce Hamaker, Moustapha Moussa, and Betty Bugusu	Hub-and-spoke food processing innovation system	Food processing; Entrepreneurs



NAME A. Chaldia AGOSSOU

ORGANIZATION Seed Services

NATIONALITY Benin

EMAIL <u>achaldia.aboegnonhou@gmail.com</u>

INTEREST Horticultural seeds; Indigenous vegetables



NAME Mazin ALAWAD

ORGANIZATION G-Harvesting
NATIONALITY Sudan

EMAIL mazinalawad07@gmail.com

INTEREST Ag engineer; Gum arabic harvesting device



NAME Elyse HABUMUKIZA

ORGANIZATION INGABEYACU
NATIONALITY Rwanda

EMAIL ehabumukiza@gmail.com

INTEREST Cereal-based porridge with vegetable added



Aboubakar KARIM

ORGANIZATION Precision Agriculture
NATIONALITY Cote d'Ivoire

NAME

EMAIL <u>karimaboubacar.s@gmail.com</u>

INTEREST Using drones to diagnose diseases and do mapping



NAME Ruramiso MASHUMBA

ORGANIZATION Chomwedzi Farm

NATIONALITY Zimbabwe

EMAIL <u>ruramiso@gmail.com</u>

INTEREST Farmer; Assistance to women farmers & processors



NAME Divine NTIOKAM

ORGANIZATION CSAYN
NATIONALITY Cameroon

NATIONALITY Cameroun

EMAIL <u>ntiokam2@gmail.com</u>

INTEREST CSAYN: Climate Smart Agriculture Youth Network



NAME Miriam Ahunna OFOEZE

ORGANIZATION NRC Institute

NATIONALITY Nigeria

EMAIL mimiofoeze@gmail.com

INTEREST Processing yams to reduce losses

CONFERENCE ATTENDANCE SPONSORED BY THE AFRICAN DEVELOPMENT BANK GROUP

VETWORKING

Wednesday

TABLE 1 - RESERVED

Jay Akridge — Purdue University

Robert Bertram — Bureau for Food Security USAID

Jennifer Blanke — African Development Bank
Simeon Ehui — World Bank Group

Mamou Ehui — World Bank Group

Suresh Garimella — Purdue University

Karen Plaut — Purdue University

TABLE 2

David Hong — One Acre Fund

David J. Spielman — International Food Policy
Research Institute (IFPRI)

TABLE 3

Alesha Black — The Chicago Council on Global Affairs Enock Chikava — Bill & Melinda Gates Foundation Kola Masha — Babban Gona

TABLE 4

Larry Cooley – Management Systems International (MSI) **Simon Winter** – Syngenta Foundation for

Sustainable Agriculture

TABLE 5

Julie Howard — Michigan State University Johannes F. Linn — Brookings Institution

TABLE 6

Pepijn Schreinemachers – World Vegetable Center Stephanus (Fanus) Swart – Curativo

TABLE 7

Brian Milder — Root Capital

Mezuo Nwuneli — Sahel Capital Agribusiness

Managers Ltd.

Carolyn Woo — Catholic Relief Services; Purdue Univ.

TABLE 8

Brian Heese – One Acre Fund Timothy J. Runnalls – Ascension Investment Management

TABLE 9

John Ellenberger – *Land O'Lakes Intl. Development* **Tim Peoples** – *Purdue University*

TABLE 10

Joseph D. DeVries — Alliance for a Green Revolution in Africa (AGRA) Mark Edge — Bayer Louise Sperling — Catholic Relief Services (CRS)

TABLE 11

Sriram Bharatam — Kuza Biashara Ltd. Andrew Bracken — Fintrac

TABLE 12

Howarth Bouis — HarvestPlus Simon Heck — International Potato Center (CIP) Bob Rabatsky — Fintrac

TABLE 13

Robert McLean — International Development Research Center (IDRC) Seerp Wigboldus — Wageningen Univ. & Research

TABLE 14

Mark Huisenga — USAID Floortje Jacobs — SNV Netherlands Development Organization/PPPLab

TABLE 15

Ranajit Bandyopadhyay — International Institute of Tropical Agriculture (IITA)
Matieyedou (Abdou) Konlambigue— IITA

TABLE 16

Dieudonné Baributsa — Purdue University Suraj Devani — Pee Pee Tanzania Ltd. (PPTL)

TABLE 17

Kevin Pixley – International Maize and Wheat Research Center (CIMMYT) Thavy Staal – BASF

TABLE 18

Tunji Arokoyo — Ahmadu Bello University William N. Ryerson — Population Media Center

TABLE 19

Parasto Hamed - Deloitte Tim Prewitt - iDE

TABLE 20

Richard Kohl – *Strategy and Scale LLC* Lennart Woltering - CIMMYT

TABLE 21

Patricia Dinneen – EMPEA Holger Kray — World Bank Group Charlene McKoin – McKoin International Development

TABLE 22

Shaun Ferris — Catholic Relief Services (CRS) Mark Schut -//TA **Paul Winters** — International Fund for Agricultural

Development (IFAD)

TABLE 23

Jelle Van Loon — CIMMYT Tricia Wind – IDRC

TABLE 24

Jennifer Billings — Corteva Agriscience **F. Conor Riggs** — *International Development* Enterprises (iDE)

Thursday

TABLE 1 – RESERVED

Tunji Arokoyo — Ahmadu Bello University Sriram Bharatam — Kuza Biashara Ltd. Suraj Devani — Pee Pee Tanzania Ltd. (PPTL) Brian Heese — One Acre Fund Tim Peoples — Purdue University Jacob Ricker-Gilbert — Purdue University **Carolyn Woo** — *Catholic Relief Services; Purdue Univ.*

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TABLE 22

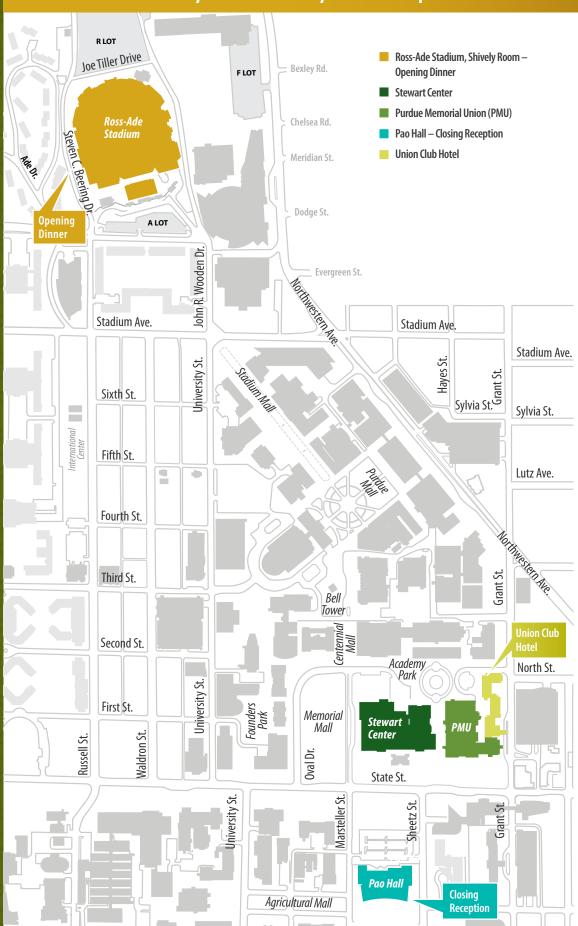
Mezuo Nwuneli — Sahel Capital Agribusiness Managers Ltd. Timothy J. Runnalls — Ascension Investment Management

TABLE 23

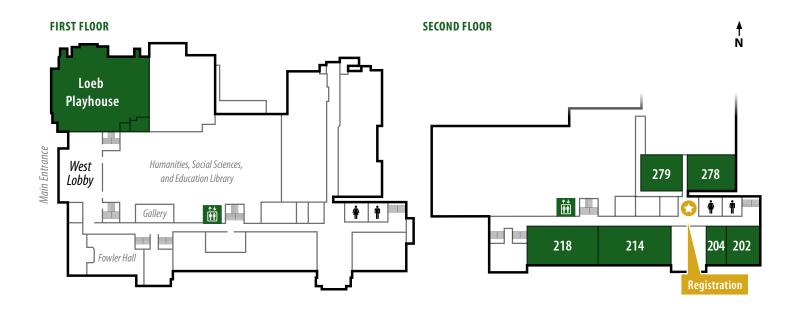
Richard Kohl – *Strategy and Scale LLC* Simon Heck — International Potato Center (CIP)

For full speaker bios see pages 16-24.

Purdue University – West Lafayette Campus



Stewart Center



Purdue Memorial Union (PMU)



WHAT'S NEXT

SCALE UP SOURCEBOOK:

Tools and Guidelines for Scaling Agricultural Innovations

Forthcoming in ~November 2018

Purdue University, in partnership with and through generous support from the African Development Bank, expects to publish, later this year, a short, easy-to-use guidebook on scaling agricultural innovation, informed by this conference. This Sourcebook is targeted to a broad audience (host governments, academia, international and national research institutions, businesses, policy and donor communities) concerned with leveraging agricultural innovation to meet the needs of the world's poor. Authored by Larry Cooley and Julie Howard, the ~30-page document will summarize key insights, tools, examples and references on topics including designing for scale, assessing scalability, financing the scaling process, and effective use of partnerships to support scaling. A copy of the Sourcebook will be made available to all conference participants.

INVITATION TO JOIN:

Community of Practice on Scaling
Up Development Outcomes –
Working Group on Agriculture and
Rural Development

The **Scaling Up Community of Practice (CoP)** was launched in February 2015 to:

- serve as a champion for "scaling up" as a priority concern within the development community,
- establish a peer network for sharing operational approaches, experience and lessons,
- develop and disseminate an effective M&E framework for scaling,
- contribute to thought leadership and case examples on scaling, and
- provide advice and networking on how to access resources and talent.

The CoP includes representative from 250 donor and implementing organizations. Its members come from a wide variety of sectors and backgrounds, drawn together by a common commitment to advancing and professionalizing the scaling of development interventions.

The CoP is member-run, member-supported, and free-of-charge, and includes working groups on:

- > Agriculture and Rural Development
- **>** Education
- > Health
- Monitoring and Evaluation
- > Scaling in Fragile States
- > Social Enterprise (to be established in late 2018)
 Those interested in joining the CoP can contact its curators, Larry Cooley (Icooley@msi-inc.com) or Johannes Linn (jlinn@brookings.edu). Enquiries about the CoP's Working Group on Agriculture and Rural Development should be directed to Maria Elena Mangiafico (m.mangiafico@ifad.org).

WORLD FOOD PRIZE MEETINGS:

Side Event – Scaling Up Impact in Agriculture

Thurs., Oct. 18, 2018 | 7:00-8:30am Davenport Room, Des Moines Marriott Downtown, Des Moines, IA

RSVP required by Oct. 12 – purdue.ag/rsvp-wfp

A "Side Event" focused on scale up in agriculture is scheduled as a breakfast session on Thursday, Oct. 18, during the 2018 World Food Prize meetings in Des Moines, Iowa. This is intended as a follow-up event to the Scale Up Conference held at Purdue University on Sept. 25-27, 2018. Lead Organization: Purdue University (with help from Julie Howard, Center for Strategic & International Studies).

Program:

- Welcome & Overview of Agenda: Carolyn Woo former President & CEO of Catholic Relief Services; Co-organizer of Scale Up Conference at Purdue University
- Opening Comments: Akinwumi Adesina President of African Development Bank; 2017 World Food Prize Laureate
- Davos-Style Interview: Featuring Larry Cooley President Emeritus of Management Systems International; Curator of Global Community of Practice on Scaling Up Development Outcome
- Panel with Case Studies & Key Issues/Challenges: Select case studies from Purdue Scale Up Conference; Moderator: Simon Winter — Executive Director, Syngenta Foundation
- Closing Comments: Robert Bertram USAID, Chief Scientist, Bureau for Food Security

IDEAS FESTIVAL

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