Access to Seeds Index

Bridging the gap between the seed industry and the smallholder farmer

FAO, 3 June 2016

Kingdom of the Netherlands

Bill & Melinda Gates foundation

Access to Seeds Index

FROM MDGs TO SDGs

UNLOCKING THE POTENTIAL OF THE PRIVATE SECTOR

SUSTAINABLE DEVELOPMENT GOALS

1 NO POVERTY

2 ZERO HUNGER

3 GOOD HEALTH AND WELL-BEING

4 QUALITY EDUCATION

5 GENDER EQUALITY

6 CLEAN WATER AND SANITATION

7 AFFORDABLE AND CLEAN ENERGY

8 DECENT WORK AND ECONOMIC GROWTH

9 INDUSTRY, INNOVATION AND INFRASTRUCTURE

10 REDUCED INEQUALITIES

11 SUSTAINABLE CITIES AND COMMUNITIES

12 RESPONSIBLE CONSUMPTION AND PRODUCTION

13 CLIMATE ACTION

14 LIFE BELOW WATER

15 LIFE ON LAND

16 PEACE, JUSTICE AND STRONG INSTITUTIONS

17 PARTNERSHIPS FOR THE GOALS

SUSTAINABLE DEVELOPMENT GOALS

Objectives of the Access to Seeds Index

- **Create transparency** on current activities to clarify and understand the role of the seed industry
- **Provide an evidence base** to the conversation where and how the seed industry can step up its efforts
- **Encourage seed companies** to enlarge their role and responsibility
- **Help identify private sector partners** based on insights in strengths, portfolio, presence

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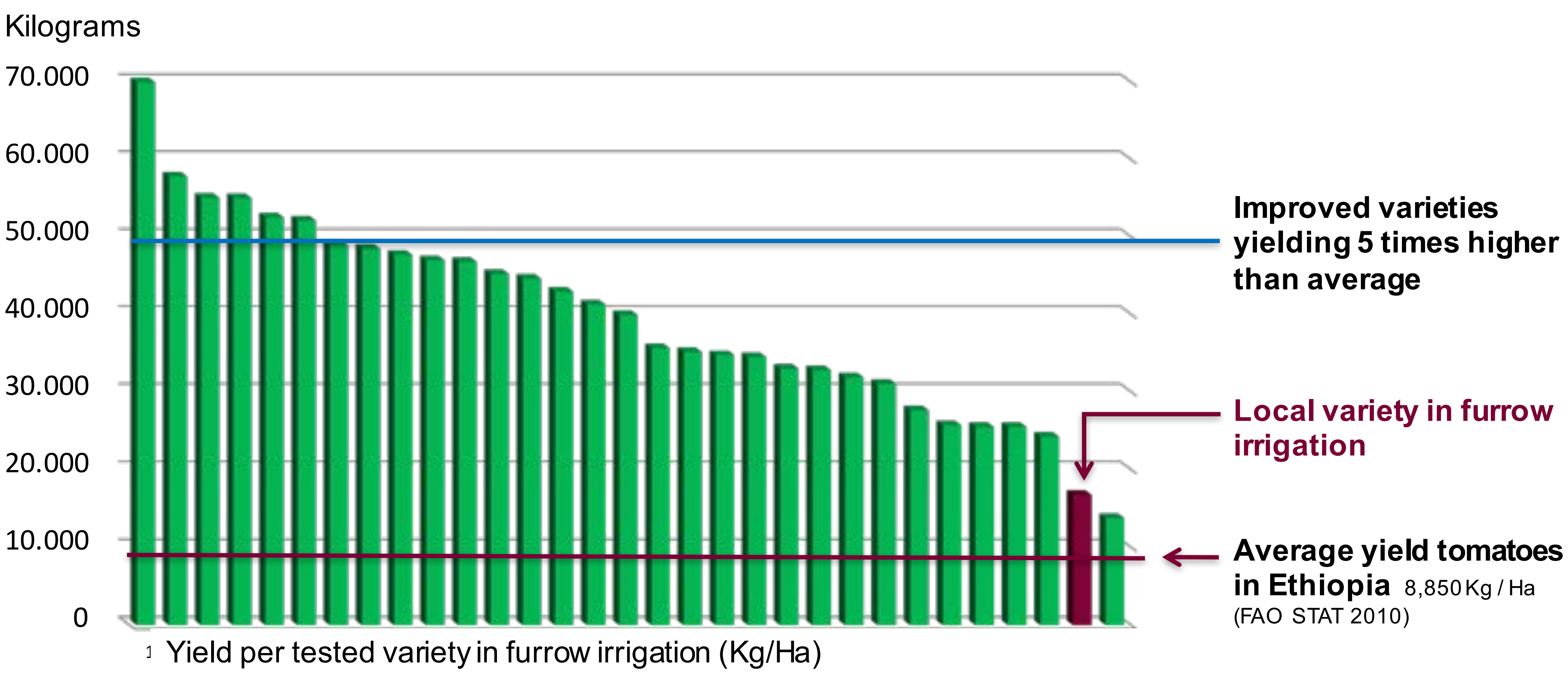
Smallholder farmers use a mixed bowl of seeds

Only 2% from the private seed sector

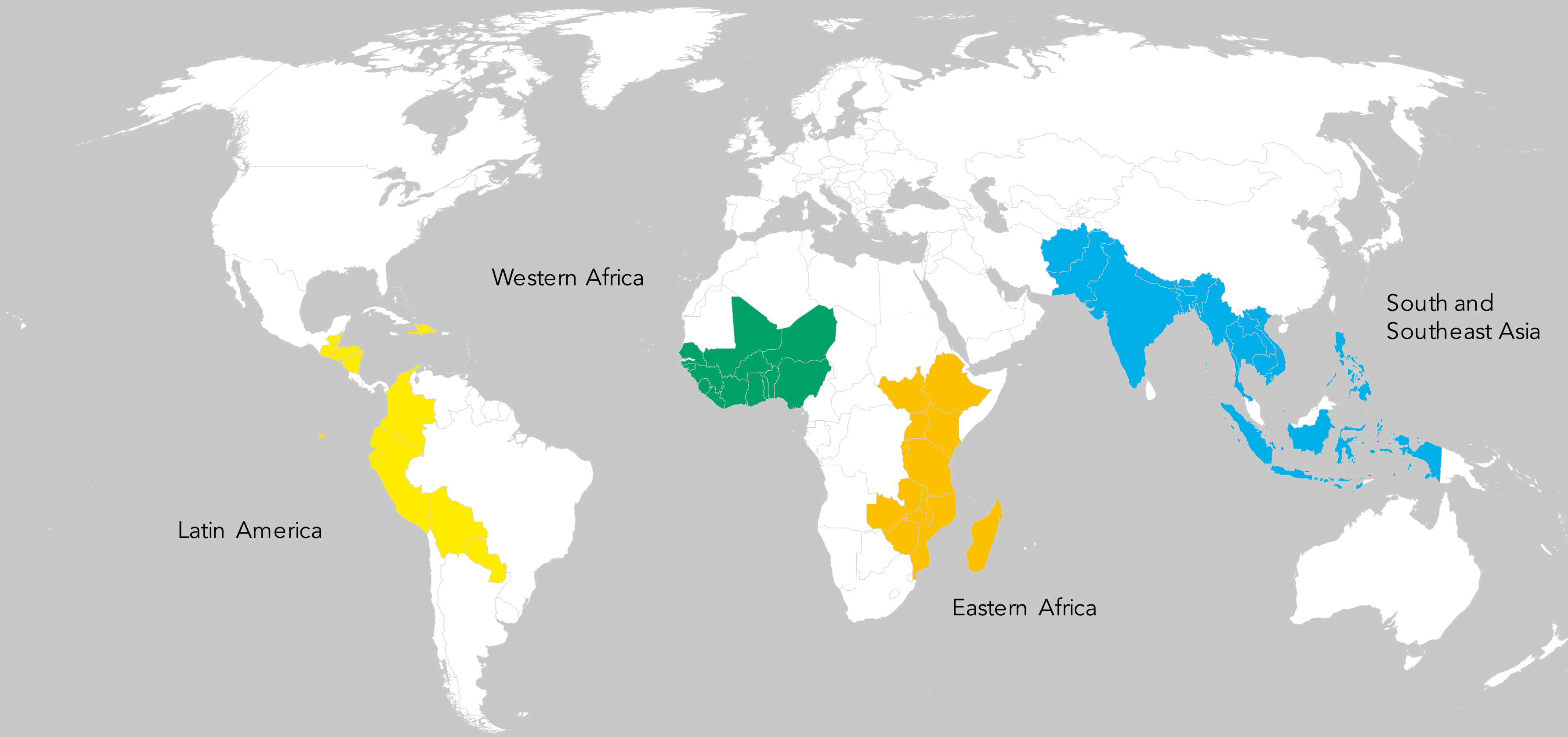
Source: CRS
Averages for sub-Saharan Africa

Fair Planet Seeds Trials

Over 5 times higher yields with improved varieties



Focus on four regions with (1) smallholder presence (2) food security challenge (3) agricultural potential



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Company scope

In total 26 leading seed companies on global and regional level

Global Index of Field Crop Seed Companies

1. Bayer
2. DuPont Pioneer
3. Dow AgroSciences
4. Groupe Limagrain
5. KWS SAAT
6. Monsanto
7. Syngenta

Global Index of Vegetable Seed Companies

1. Bayer
2. Bejo
3. East-West Seed
4. Enza Zaden
5. Groupe Limagrain
6. Monsanto
7. Rijk Zwaan
8. Sakata
9. Syngenta
10. Takii

Regional Index for Eastern Africa

1. Demeter Seed
2. DuPont Pioneer
3. East African Seed
4. East-West Seed
5. Ethiopian Seed Enterprise
6. FICA
7. Hygrotech
8. Kenya Highland Seed
9. Kenya Seed Company
10. Monsanto
11. NASECO
12. Pop Vriend
13. Seed Co
14. Syngenta
15. Technisem
16. Victoria Seed
17. ZAMseed

Input for the methodology

What do we expect from seed companies?

June 2013: Ministers' conference FAO

Oct 2013: Farmers' Round Table Addis Ababa

Nov 2013: Industry Round Table Wash. DC

Farmers - Uganda

Seed company - Ethiopia

Government - Ghana

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Smallholder farmers' perspective on access to seeds

Six dimensions of access

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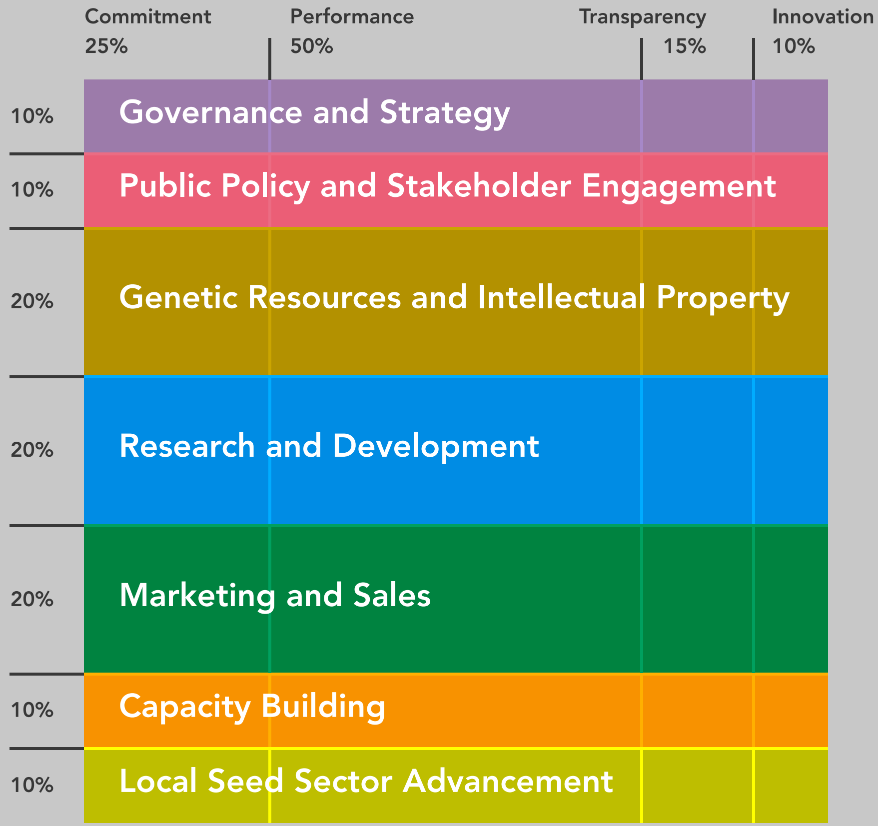
Methodology of the Access to Seeds Index



- 7 measurement areas with 73 indicators
- Relative ranking: comparing companies with eachother
- Companies are scaled for size and portfolio

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Main findings

1. Many of the **global seed companies** are exploring possibilities to address the needs of smallholder farmers

2. Seed companies are making a **broad portfolio of seeds** available to smallholders farmers

3. The global seed industry is present in all regions with the exception of **Western Africa**: half of the countries not covered

4. **Regional seed companies** are filling in critical gaps largely neglected by global peers (breeding for local crops, reaching remote villages)

5. Limited findings on some relevant stakeholder expectations
   - Few address the needs of **women farmers**
   - Few have a clear **position on farm saved seed** or **informal seed systems**
   - Many see smallholders only as end-user, not as **partner in production, breeding**

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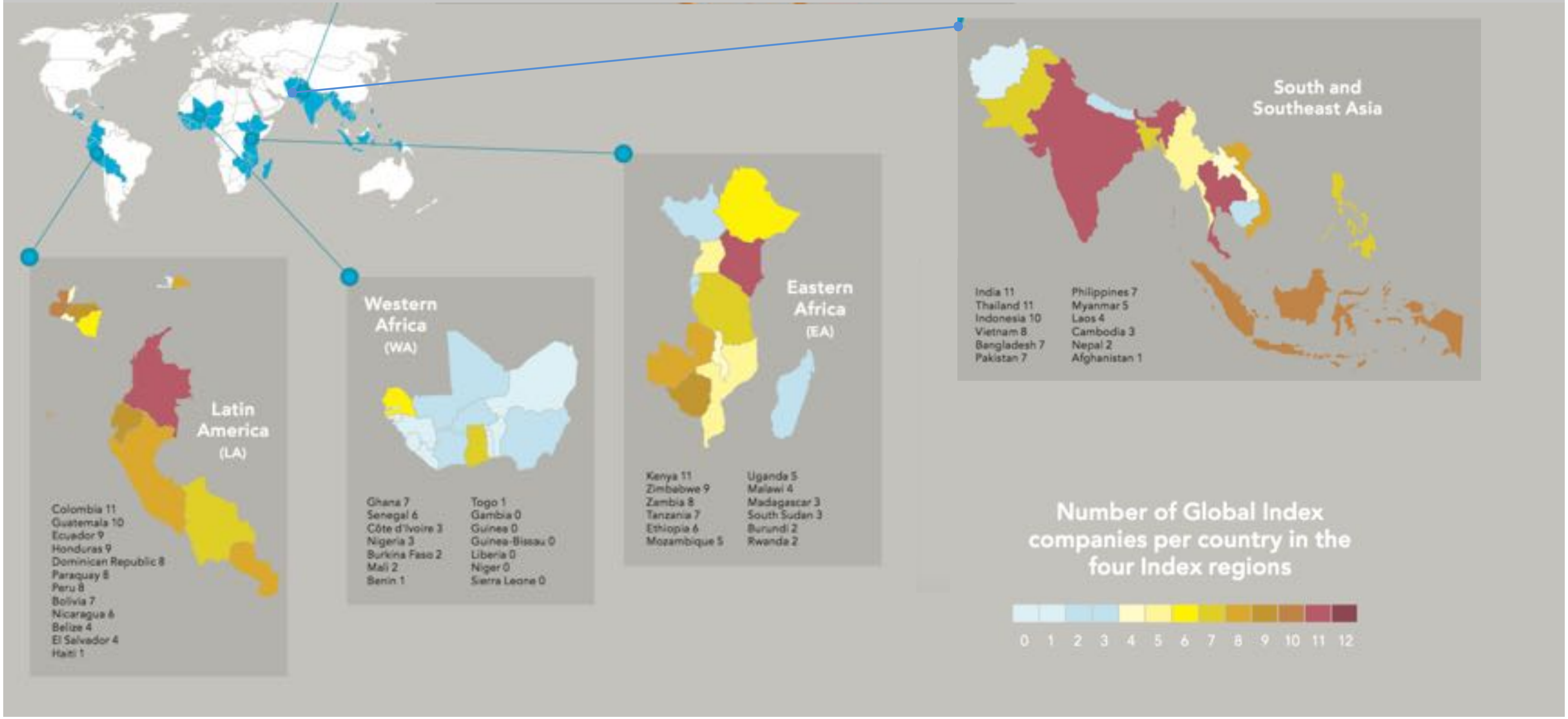
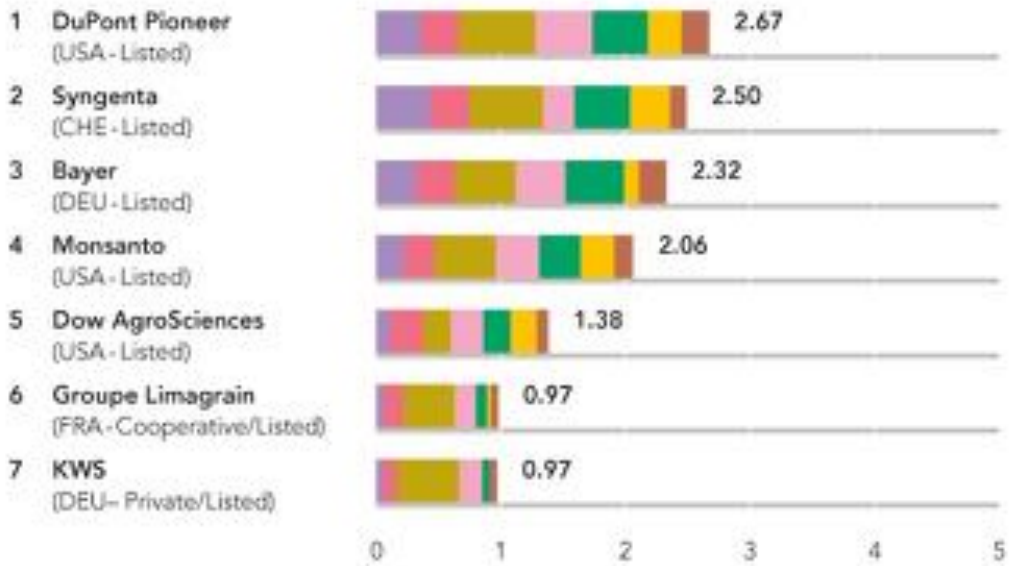
Limited private seed sector activity in Western Africa, highest density in Latin America and Asia



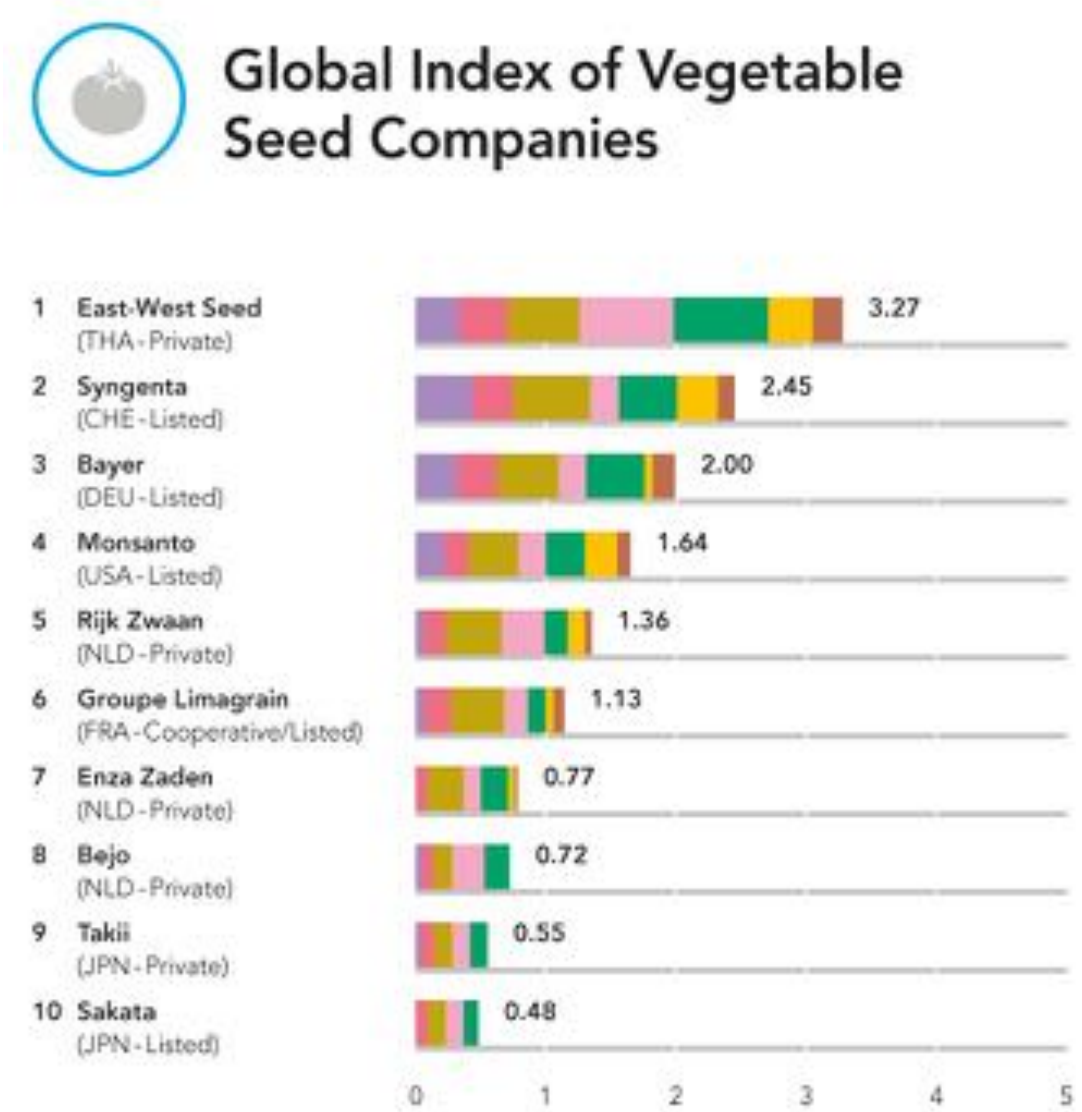
Global Index of Field Crop Seed Companies



- Only top 4 companies have business activities in the regions, others limit themselves to CSR-projects
- Dupont Pioneer has the most extensive breeding programs
- Syngenta leads on innovative capacity building and adoption activities

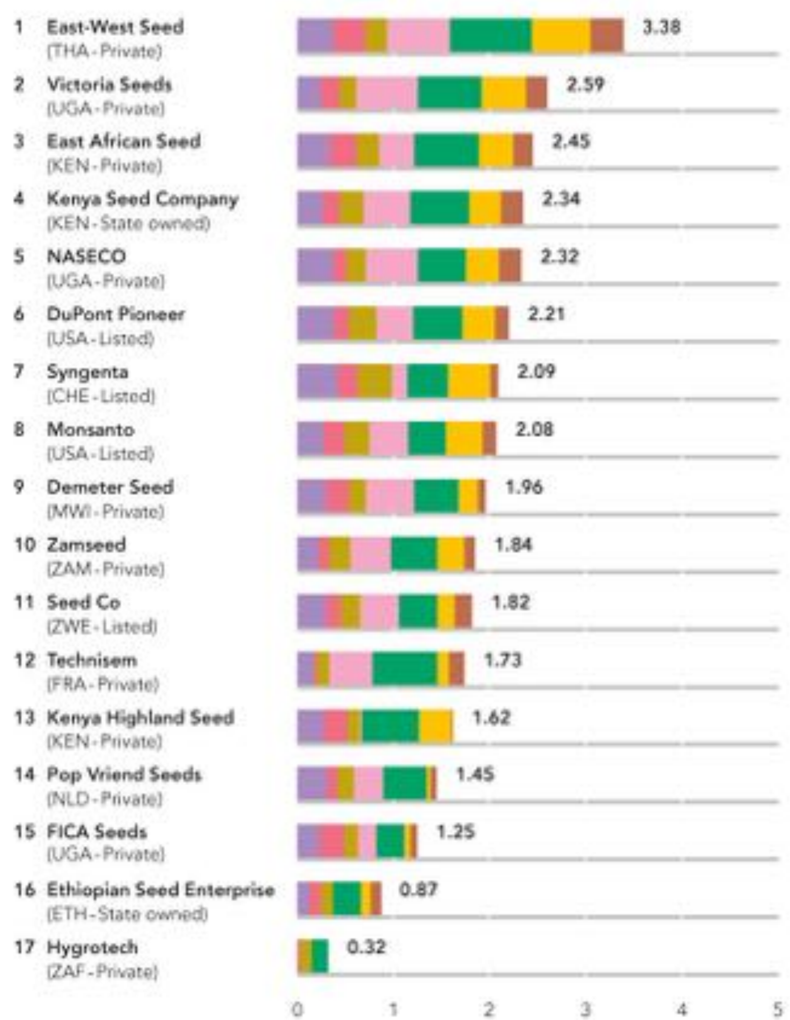
Measurement areas

- Governance & Strategy
- Public Policy & Stakeholder Engagement
- Genetic Resources & Intellectual Property
- Research & Development
- Marketing & Sales
- Capacity Building
- Local Seed Sector Advancement



- East-West Seed leads with a smallholder focused business model
- Smaller firms like Rijk Zwaan and Bejo focus contribution on breeding
- Japanese companies are active but lack transparency on activities

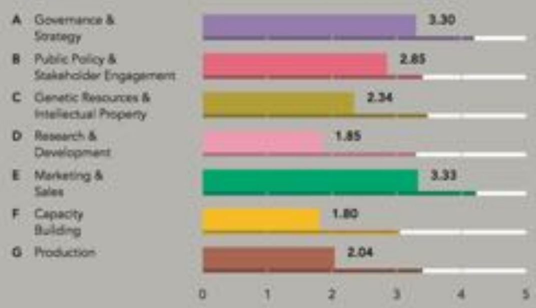
Regional Index for Eastern Africa



- Companies originating from the region outperform the bigger multinationals, filling in critical gaps
- Multinationals lead on transparency and commitment, regional companies on performance
- Many companies also lower on the ranking with specific strenghts, interesting for partnerships

East African Seed

3
rank out of 17
score 2.45



Operations in Scope

Index Crops in Portfolio

Global Field Crops	Sales: BDI	ETH	KEN	MDG	MWI	MOZ	RWD	SSD	TZA	UGA	ZMB	ZWE	Breeding Focus: Broad adaptation	High altitude	Mid altitude	Low altitude
Beans, dry			●							●						
Maize			●					●	●	●				♣	♣	♣
Rice, paddy										●						
Sorghum									●	●			♣			
Soybean										●						
Global Vegetable Crops																
Broccoli	●		●		●	●	●	●	●	●	●					
Cabbage	●		●		●	●	●	●	●	●	●					
Carrot	●		●		●	●	●	●	●	●	●					
Cauliflower	●		●		●	●	●	●	●	●	●					
Chili pepper	●		●		●	●	●	●	●	●	●					
Cucumber	●		●		●	●	●	●	●	●	●					
Eggplant	●		●		●	●	●	●	●	●	●					
Gourd			●		●	●	●	●	●	●	●					
Green pea			●						●	●	●					
Leek	●		●		●	●	●	●	●	●	●					
Lettuce	●		●		●	●	●		●	●	●					
Melon	●		●		●	●	●	●	●	●	●					
Okra	●		●		●	●	●	●	●	●	●					
Onion	●		●		●	●	●	●	●	●	●					
Pumpkin	●		●		●	●	●	●	●	●	●					
Spinach	●		●		●	●	●	●	●	●	●					
Squash	●		●		●	●	●	●	●	●	●					
Sweet pepper	●		●		●	●	●	●	●	●	●					
Tomato	●		●		●	●	●	●	●	●	●					
Turnip	●		●		●	●	●	●	●	●	●					
Watermelon	●		●		●	●	●	●	●	●	●					
Local Field Crops																
Cowpea			●							●						
Local Vegetable Crops																
Amaranth	●		●		●	●	●	●	●	●	●		♣			
Black nightshade	●		●		●	●	●	●	●	●	●		♣			
Crotalaria			●						●	●			♣			
Jew's mallow			●						●	●			♣			
Spider plant			●						●	●			♣			

Seed companies exploring a broad approach to access to seeds on various dimensions

Availability
Mobile seed shops to reach local markets
Victoria Seeds, Uganda

Affordability
Seed insurance against weather risks
Syngenta,
Kenya, Tanzania, Rwanda

Capability
School for next generation farmers
Bayer,
India

Suitability
Breeding station for local crops and varieties
RijkZwaan, East-West Seed
Tanzania

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What is next?

1. **Discuss findings** with farmers, industry, other stakeholders
2. **Review methodology** towards the second Index (2018)
3. **Explore coordination** with public sector / enabling environment monitors (World Bank, TASAI)

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For pdf of report and online data:
www.accesstoseeds.org