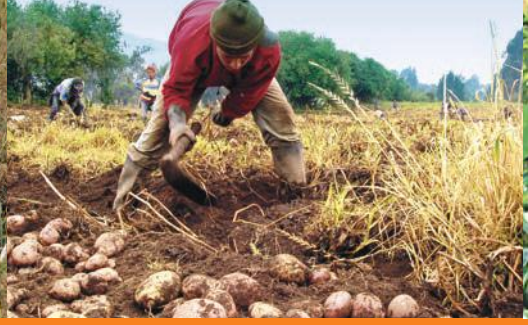

the good growth plan
One planet.
Six commitments.
syngenta®


We can’t go on like this

Humanity is facing its toughest challenge

Every day, our planet wakes with 200,000 more mouths to feed.[1] Every night, more than 870 million people go to bed hungry.[1]

The need to produce more food is already acute, and the world’s land, water and energy resources are under unprecedented strain. Nearly 17 million acres of farmland are lost to soil erosion every year.[1] Many people who produce the world’s food are living in poverty. Biodiversity is disappearing fast. And the challenge won’t get any easier: by 2050, for example, 4 billion people will be living in countries with water scarcity.[2]

Something needs to change

We only have one planet, and we’re using its resources 50 percent faster than it can take. What we’re asking it to provide is simply not sustainable.

1 Food and Agricultural Organization of the United Nations
2 United Nations Environment Programme

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So we're going to go forward like this

Six commitments to make a difference

Our future – everyone's future – depends on finding solutions to these global challenges. Humanity has to grow more, while preserving natural resources. And it must ensure that rural communities are healthy, vibrant and viable.

The Good Growth Plan is Syngenta's commitment to make a measurable contribution by 2020. We are setting ourselves six specific targets related to improving resource efficiency, rejuvenating ecosystems and revitalizing rural communities.

Six commitments

- Make crops more efficient
- Empower smallholders
- Rescue more farmland
- Help people stay safe
- Help biodiversity flourish
- Look after every worker

Make crops more efficient

Increase the average productivity of the world's major crops by 20 percent without using more land, water or inputs.

Why does this matter?

To feed its growing population, the world will have to grow more food in the next 50 years than it has produced in the past 10,000. And to be sustainable, this huge increase in production needs to be achieved while using resources far more efficiently. The challenge will be even greater if climate change continues to disrupt temperature and weather patterns.

How are we going to do it?

By applying our unique breadth of technologies and integrated strategy, augmented by collaborations with partners. We will focus efforts not only on the world's 8 million large-scale farmers, but also on the 450 million smallholder farmers, whose productivity often lags behind their developed market counterparts.

How are we going to measure it?

By quantifying "input use per unit of output produced" on reference farms for each crop in every region. In developing countries, where current input use per unit of land is often very low, we will tailor the best solutions available to ensure from the outset the same resource efficiency we achieve in more developed growing systems. We have developed specific measurements for land productivity, nutrient efficiency, pesticide efficiency, application efficiency, water efficiency and energy efficiency.

What are the priorities?

First, we're building a network of reference farms across geographies and crops. Then, we can measure and publish baseline benchmarks for each crop and region, and start working with external partners to collect data and audit the progress we make.

10–20% higher yields

Growing more corn with less water

Corn is particularly sensitive to water shortage – and in 2012, U.S. corn farmers faced the worst drought in over 50 years. With irrigation equipment manufacturer Lindsay we developed an integrated solution combining our drought-resistant seeds with tailored crop protection and automated irrigation. Even under drought conditions, yields were 10–20 percent higher compared to traditionally-farmed plots.

Rescue more farmland

Improve the fertility of more than 24 million acres of farmland on the brink of degradation.

Why does this matter?

Every second, the world loses a soccer field of farmland to soil erosion, desertification and urban expansion.[3] Every year, it loses enough land to produce 20 million tons of grain.[3] Poor farming practices expose soil to wind and rain erosion, leaving millions of acres infertile each year. Some 40 percent of existing farmland is seriously degraded, and an area large enough to feed Europe is too depleted to produce food. Action is needed urgently; nature takes 500 years to replace one inch of lost soil.[4]

How are we going to do it?

Plowing for weed control is a major cause of soil loss, leaving fertile earth more vulnerable to wind and rain erosion. We will help farmers increase fertility and productivity sustainably by improving soil structure and adding organic matter through appropriate use of fertilizers, crop rotation and techniques to avoid needless plowing. We can't rescue over 24 million acres – the size of Iceland – on our own. So we're working with partners, including the United Nations Convention to Combat Desertification (UNCCD), to share soil management knowledge.

How are we going to measure it?

We'll measure our contribution to the conservation practices listed above through third-party surveys. These will monitor the number of acres of farmland with minimum tillage, crop rotation and other sustainable soil management practices. Impact evaluations, run jointly with third parties, will check that these practices are improving soil fertility.

What are the priorities?

We have provided initial funding to support the creation of the UNCCD Soil Leadership Academy. This initiative aims to strengthen international policy, decision making and frameworks for effective implementation of soil conservation and sustainable land management.

3 United Nations Convention to Combat Desertification

4 Pimentel D, Pimentel M; American Journal of Clinical Nutrition; Vol. 78, Issue 3, p. 660S–663S; September 2003

Keeping soil fit for farming

The Soil Leadership Academy became operational in early 2014. It aims to fight desertification and land degradation by accelerating land restoration worldwide. It is building a network linking research institutes, universities and key decision makers, and will offer information and training opportunities to policy makers and land users worldwide.

40% of farmland is seriously degraded

Help biodiversity flourish

Enhance biodiversity on more than 12 million acres of farmland.

Why does this matter?

The sustainability of agriculture depends on biodiversity – for plant breeding, for pollination and for the diversity of our diet. More than a third of the world's agricultural crops depend on pollination, but pollinator populations have been falling in many countries. Changing agricultural practices have altered rural landscapes and natural habitats. Expanding the use of land for crops can reduce forests, meadows and shelterbelts that provide food and protection for plants and animals that make a sustainable agricultural landscape.

How are we going to do it?

We will help farmers to create diverse, rich habitats through methods ranging from reforestation to buffer strips and field margins. To preserve crop diversity, we are working with conservation groups to secure the seeds of trees, crop wild relatives and other valuable plant species.

How are we going to measure it?

We will collect data through on-farm surveys by third parties. These will monitor the number of acres of farmland with field margins, buffer strips and other species protection programs. Impact evaluations, run jointly with third parties, will check that these practices are improving biodiversity.

What are the priorities?

Biodiversity programs need to be tailored to local conditions. So we are working with partners across the world to identify priority programs, agree on specific targets for these programs and define protocols to measure progress over the years ahead.

Boosting bee population up to 300-fold

Keeping diversity alive

Since 2001, through Operation Pollinator we have been planting field margins with local wildflower seeds across the U.S. and Europe – boosting bee populations up to 300-fold. We're also helping to secure the variety of seeds that breeders need for the future. Syngenta was a founder sponsor of the Global Crop Diversity Trust, one of the largest institutions supporting seed banks worldwide.

www.operationpollinator-us.com
www.beehealth.org

Empower smallholders

Reach 20 million smallholders and enable them to increase productivity by 50 percent.

Why does this matter?

Over 2.5 billion people depend on agriculture for their livelihoods. Smallholder farmers are critical to the world's food security, yet they often face high financial risks and low returns. Every day, 180,000 people leave rural communities to live in cities. Ensuring that farming is a viable and attractive occupation will help to create vibrant, productive rural communities.

How are we going to do it?

By providing tools and training that make agriculture more productive, efficient and profitable. Partnering with organizations such as USAID, we can bring farmers the products and know-how to raise productivity by 50 percent while preserving the long-term potential of their land. We will also help them finance higher-yielding products and enable them to reach markets to sell their crops.

How are we going to measure it?

We will measure the number of smallholders reached by estimating sales of specially-designed solutions, and by assessing projects and initiatives developed specifically to reach smallholder farmers. These include training, market access, financial solutions and mobile phone-based solutions.

We will share our information and processes with third party auditors and our partners for verification.

What are the priorities?

We already have strategies for reaching more smallholders in all regions, and committed to a major smallholder-focused investment program in Africa. We partner with the World Economic Forum's Grow Africa and Grow Asia platforms. We are also seeking out new partnerships and opportunities to reach smaller growers worldwide. And we are developing new smallholder solutions in our R&D portfolio.

Grower insights lift yields

We developed Growmore™ specifically for smallholder rice farmers. It's an integrated solution combining our technologies into simple protocols to establish and protect the crop. And it delivers immediate yield increases of up to 30 percent. Protocols are tailored to local conditions: in Bangladesh, for example, we drew on our experience with more than 200 smallholders in 20 villages.

30% yield increase

Help people stay safe

Train 20 million farm workers on labor safety, especially in developing countries.

Why does this matter?

Agriculture is the world's second largest source of employment, often involving long hours and heavy work in challenging climates and harsh conditions. We have a responsibility to help improve occupational safety and health in agriculture.

How are we going to do it?

We aim to raise awareness of the risks associated with agricultural work, and share knowledge of how these can be effectively managed and prevented. Each year, we train as many farmers as possible through partnerships with local organizations and product retailers. To reach 20 million farm workers by 2020, we will partner with even more organizations. Training will be done by Syngenta employees or partners. We will ensure that training is high-quality and leads to measurable impacts on attitudes, knowledge and behavior.

How are we going to measure it?

Our data on numbers of people trained will be verified by external auditors. We will also collect data on our investment in training, farmers' adoption of occupational safety and health practices, and numbers of reported accidents and health incidents. Recognizing that training alone does not guarantee safety, we are introducing new monitoring systems to track the effectiveness and impacts of training programs, and to identify bottlenecks that prevent behavioral change.

What are the priorities?

In 2014, we established baseline data against which to measure our progress. Working with external partners, we are also refining our farmer training programs and adapting our training concepts to ensure that we can meet this new commitment.

9 million safely and effectively trained

Using chemicals safely and effectively

Over the past three years we've brought face-to-face training in using crop protection safely and effectively to some 9 million farmers worldwide. In China, we've done this in partnership with the Ministry of Agriculture since 2000 – delivering training to almost 26,000 farmers in 2013 alone.

Look after every worker

Strive for fair labor conditions throughout our entire supply chain network.

Why does this matter?

We recognize a responsibility to ensure that our supply chain meets internationally acceptable standards, especially in developing countries. We also recognize that, if the agricultural sector does not offer fair and attractive conditions for its workers, population drift from rural communities to cities will steadily undermine efforts to increase agricultural production.

How are we going to do it?

Labor standards are a priority concern for all our operations, both on farms and in production plants, and we expect the same of our suppliers.

We have strict contractual requirements – prohibiting the use of child labor, for example. We also encourage suppliers to meet our standards through intensive training and financial incentives. Since 2004, we have been working with the Fair Labor Association (FLA) to address labor standards on seed farms, including child labor, health and safety, awareness of workers' rights, wages and benefits, hours of work, harassment, abuse and discrimination. We have expanded this program from India to Eastern Europe and Latin America: it now includes more than 22,000 suppliers. Major chemical suppliers play a critical role in our ability to meet demand, and an important part of our relationship with them is to ensure they meet high standards on health, safety and labor conditions.

How are we going to measure it?

Our programs will be independently verified by the FLA using an agreed risk-based approach. Our procurement and supply chain professionals will work with suppliers to continuously improve their labor practices, and we will monitor and report on progress.

What are the priorities?

We are undertaking a risk assessment of our supply chain to identify priorities and review our chemical supplier assessment protocol for labor practice measures. In 2014, we also extended our seed supplier program to China, Vietnam and the Philippines and completed the assessment of our flowers suppliers.

Rural work must be fair

Working with the Fair Labor Association, we launched our Rural Work Must Be Fair initiative in Brazil in 2012. Designed to address issues such as working hours, wages, child labor and discrimination, it has been well received not only by fieldworkers and Syngenta employees but also by government and unions, who view it as a benchmark for the agricultural sector.

100% commitment to fair labor



We're ambitious – but realistic

The targets we've set are deliberately ambitious.

We'll put all our company's passion and skills behind meeting them, but we don't have all the answers.

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We can't do it all on our own…

The challenges of feeding the world sustainably are so big and far-reaching that they demand a concerted response from everyone concerned with the future of agriculture.

We want to work in partnership with governments, farmers, NGOs, international organizations and academics. This is already the way we work across our business – in research and development, in sales and marketing, in farmer training, and in environmental programs.

so we're developing new partnerships…

In support of The Good Growth Plan, we've already signed agreements with the Fair Labor Association – expanding our existing partnership, the U.S. Agency for International Development – to help us improve smallholder productivity, and the United Nations Convention to Combat Desertification – on action to combat soil degradation.

We'd like to develop more partnerships for each of our six commitments. So we're talking with environmental and developmental NGOs about approaches to training, auditing our reference farms, implementing programs to preserve biodiversity, and advising us on how to achieve greater impact.

we're working with farming communities…

The Good Growth Plan commits us to continue working with farmers – large and small – to enhance productivity.

Large-scale farmers have traditionally had good access to new technologies and the knowledge to apply them. As a result, they now generate 75 percent[5] of the world's agricultural output.

But nearly 40 percent[6] of the world's arable land is farmed by small growers. And the step change in productivity that's needed will only be achieved if they, too, can use new technologies. That's why The Good Growth Plan has a particular focus on smallholders. Our people around the world are working ever more closely with them to understand their needs and develop tailored solutions. Our business strategy is to put the grower at the center of our solutions. This means pioneering new business models for access to markets and finance.

we're getting everyone in Syngenta on board…

Syngenta consists of 28,000 committed people. We work with farmers around the world to help them produce the world's food while managing their land and natural resources in the best way possible. That's our business.

So we're aiming to involve every Syngenta employee in some aspect of delivering The Good Growth Plan. This is led from the very top: the Syngenta Executive Committee has been directly involved in developing this program and takes ultimate responsibility for achieving the targets. But this is a commitment for the whole of Syngenta – and delivering it will be a personal achievement for every one of us.

5 IAASTAD 2008, Agriculture at a Crossroads
6 FAO ResourceSTAT, faostat.fao.org

we're listening to public opinion…

Will producing more food for a growing population be one of the next decade's most important global challenges? We asked this question to 7,500 people in cities in 13 countries across the world. And an overwhelming majority agreed that it will.

There's consensus that the challenge must be addressed, and in an environmentally sustainable way. But people aren't so clear about how that can be achieved, and about the likely impact of increased production on the environment and on the people who grow the food and work on the farms.

Technology: People are open to using technology in a general sense to grow more food. However, in all but a few countries, only a minority support the use of pesticides, fertilizers and genetically modified seeds.

Environment: People believe more water and land needs to be used to increase food production. But they underestimate the implications that this has on these limited resources.

Responsibility: Many people believe that farming today is not conducted responsibly. There's a preference for local, organic and urban farming, and a belief that governments and large-scale farming have the greatest potential to address the challenge of food security.

People: Most respondents believe that more human labor should be used to produce more food and that increased production will have a positive impact on rural communities.

Overall, our research suggests that people recognize the problems, but aren't clear on the way forward.

Find out more, read the full report:
www.goodgrowthplan.com

we'll share our progress openly

The Good Growth Plan adds new measurements to our strategy. Through open communications, we will seek to demonstrate the sustainability of our business. This applies to the way we manage and report The Good Growth Plan, as it does to every part of our business.

We will hold ourselves accountable through rigorous measurements for each one of the commitments, including third party assessments. And we'll report on our progress annually.

We've identified independent experts to measure and validate the results. They'll run on-farm measurement and training programs, and conduct impact assessments. Our progress reports will also be verified by external auditors as part of our annual assurance and corporate reporting process.

For our productivity measurements we will collect data from over 3,500 farms across all our key markets and crops to compare how our solutions perform versus the standard farming practice and yields in each region. Our partners and third-party auditors will have complete access to these reference farms.

We're currently establishing baselines for all of our commitments using reliable official agronomy reports from sources such as U.S. Department of Agriculture, agricultural market research companies and information from partner organizations. The data collected on these farms will count towards the measurements of each of our six commitments.

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Making an impact

With The Good Growth Plan we aim to make a deep, lasting and positive impact on the farmers and rural communities who ensure the world's food security. That way, we can contribute to the long-term sustainability of our planet.

We can't be certain that we'll meet all our ambitious targets by 2020. But we're putting the resources of our world-leading business behind making them. As we see it, there's no alternative.

And of course, it doesn't end in 2020. By then we'll have learned much more about making lasting improvements to the way farmers produce the world's food. We'll have new solutions. And we'll be able to keep improving the impact of agriculture on the environment and on people's lives.

the good growth plan

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