

## Introducing Natural and Social Capital Analysis

An initial environmental and social return on investment for the REEL cotton programme has been measured using a natural capital methodology.



In collaboration with natural capital valuation experts Trucost, part of S&P Dow Jones Indices, CottonConnect has quantified how financial investments in the REEL Cotton Programme are benefiting society and the environment, and facilitating sustainable resource management.

- On average, REEL cotton farms create **\$98** more natural capital value than non-REEL farms per tonne of cotton produced thanks to **reduced water use** and **higher cotton yields**.
- A social return on investment (sROI) of between **\$50 and \$170** is generated for every dollar invested.
- Total social return is **\$2,700-\$6,600** per farmer per year due to improved gender equality and economic growth.

### Natural Capital and REEL Cotton

Natural and social metrics provide a tool to compare the costs and benefits of potential projects, and how we can help to achieve commitments towards United Nations' Sustainable Development Goals (SDGs).

#### In line with SDG #12: Responsible consumption and production



The REEL Cotton Programme advocates minimising the natural resources and toxic materials used when growing cotton, lowering the waste and pollutants generated at the same time.

Our analysis found that the negative impacts of pesticide use are 4% higher on non-REEL farms than REEL farms, land use impacts are 5% higher, and the impact of water use 16% higher than REEL farms. When considering the overall impact of growing cotton this is significant.

#### In line with SDG #15: Life on land



Cotton yields are 6% higher per acre for REEL cotton farmers than non-REEL farmers. This could lead to less land area being converted for growing cotton and leaves more for conservation and other sustainable uses.

**“Quantifying the impact of our farm programmes in terms of profit and loss helps business understand more fully the return on their investments; and this supports our goal of developing initiatives in line with both the SDGs and commercial agendas.”**

Alison Ward, CEO CottonConnect

### Social benefits

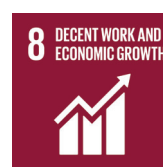
#### In line with SDG #5: Gender equality



Women in the REEL Cotton Programme report a rise in confidence levels due to the extra knowledge they gain. This strengthens their role in decision-making and means they are more likely to seek health care, potentially reducing child mortality rates.

The social benefit estimate of this impact is between \$2,100 and \$5,900 per participant per year.

#### In line with SDG #8: Economic growth



Greater yields generate higher net profits for REEL cotton farmers and encourages economic growth. This allows their children, especially girls, to stay in school and potentially generate an equivalent social impact income of \$30,000 per child over their lifetime.

**“The apparel sector is leading the way on the use of natural and social capital accounting. This robust methodology enables companies to assess the costs and benefits of actions to improve sustainability in monetary terms to inform optimal decision making.”** Dr Richard Mattison, CEO, Trucost, part of S&P Dow Jones Indices

## About Natural & Social Capital Analysis

Natural and social capital accounting is a tool that enables companies to measure and assess the impacts of their operations and to communicate how initiatives can offer environmental and social return on investment.

Natural and social capital metrics place a monetary value on the environment, helping to inform decision-making and drive improvements across the supply chain.

The benefits valued in this document are estimated using independently reviewed data collected by CottonConnect, as well as data and assumptions informed by scientific literature and publically available datasets.



### Natural Capital Performance - comparison data

	REEL	Non-REEL	
<b>Pesticide Use (in kg/acre) - application of chemicals</b>	\$0.36 per tonne	\$0.38 per tonne	Non-REEL 4% higher than REEL
<b>Land use (acre) - conversion of land to grow cotton</b>	\$860 per tonne	\$910 per tonne	Non-REEL 5% higher than REEL
<b>Water use (cubic metres per acre) - for irrigation</b>	\$258 per tonne	\$308 per tonne	Non-REEL 16% higher than REEL

### Social Capital Performance - comparison data

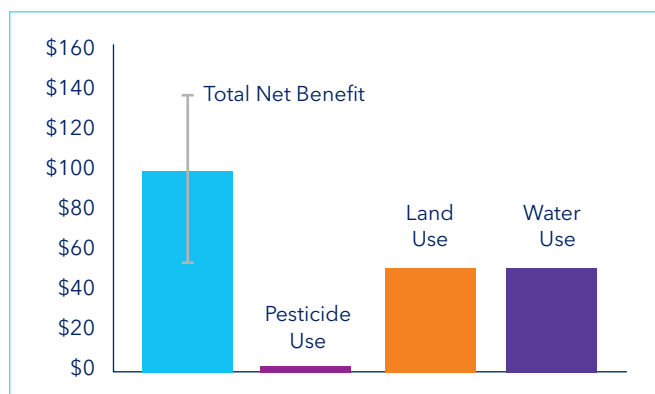
#### Gender Equality - increase in female participation in household decision-making

- REEL \$2,100-5,900 per participant
- Non-REEL \$0

#### Economic Growth - children remain in school for secondary education and participate in economic growth

- REEL \$660 per participant
- Non-REEL \$0

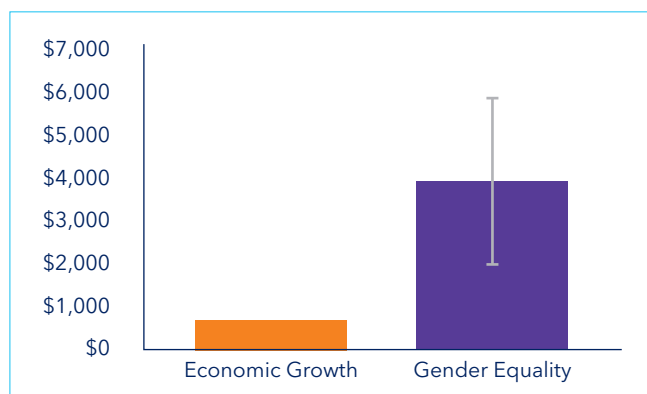
### Average net benefit (2016 USD per tonne of cotton per year)



CottonConnect and Trucost data, 2015-2016

This analysis uses data from a pilot study in two areas of Gujarat, India, to compare the environmental impacts of practices adopted by REEL cotton farming practices versus a control group of non-REEL farmers.

### Estimated Social Benefit per Participant per Year



Data and analysis by Trucost, part of S&P Dow Jones Indices



### Natural Capital and REEL Cotton

REEL Cotton is a three-year agriculture programme run by CottonConnect in partnership with leading brands and retailers, providing farmers with training on sustainable cotton farming practices.

The accompanying REEL Code is internationally recognised and verified by FLOCERT. It verifies that farmers in the REEL Cotton Programme are using sustainable practices, with added elements that ensure traceability and decent work.

CottonConnect is committed to increasing transparency and measurable natural and social benefits in cotton supply chains. This pilot analysis of REEL Cotton proves that natural and social capital accounting can help companies put a monetary value on their services and improve sustainability across the supply chain.

Find out more at:  
[www.cottonconnect.org](http://www.cottonconnect.org)  
[www.trucost.com](http://www.trucost.com)