

# Food, Price and Conflict: Earth Observations-based Agricultural Production forecasting to assess potential impacts on grain markets and civil unrest

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Interdisciplinary approach to develop a remotely sensed-based method to forecast wheat production in the dominant export countries and to provide insight on the potential societal benefit of such information in terms of global wheat markets and civil unrest.

Croplands account for approximately 11 percent of global land cover, the majority used for cereal production, with wheat as a primary crop

- wheat shortfalls due to severe droughts in the principle export countries were major factors in the recent global grain price surges: shortages have

### Three Components

- (EO) based approach to timely wheat production forecasting at the national scale;
- assessment of potential price sensitivity to forecast errors and their impacts on market stability;
- examination of the relationship between the availability and quality of agricultural production information, price fluctuations and civil unrest.



### Short of Money, Egypt Sees Crisis on Fuel and Food



Independent analysts say that the growing shortage of fuel and the fear about wheat imports now pose the gravest threats to Egypt's fragile stability. "It has the potential to make things very, very bad," said Yasser el-Shimy, an analyst for the International Crisis Group.

Egyptians in a gas line on Saturday in the city of Luxor. Fuel shortages are plaguing the nation.

By DAVID D. KIRKPATRICK  
Published: March 30, 2013

QALYUBEYA, Egypt — A fuel shortage has helped send [food prices](#) soaring. Electricity is blacking out even before the summer. And gas-line gunfights have killed at least five people and wounded dozens over the past two weeks.

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New York Times

Food Crisis

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10, 2011

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15 October 2009

More than 1 billion hungry, UN a

By Tom Eley

Thursday, Oct 15, 2009

More than 1 billion people, one sixth of human

undernourishment by the end of 2009, two UN

reported on Wednesday. The ranks of the hun

100 million people in one year, a result of the r

since the Great Depression.

"The State of Food Insecurity," produced by th

Organization (FAO) and the World Food Progr

the sharp increase in global hunger is not the r

natural disasters, but the man-made causes of

unemployment, and declining incomes.

BBC NEWS

ONE-MINUTE

Bangladesh bans m

Bangladesh has banned exports of nearly all the rice it

it produces to prevent shortages

and keep food costs down.

The government said the ban

began on Tuesday and will last six

months.

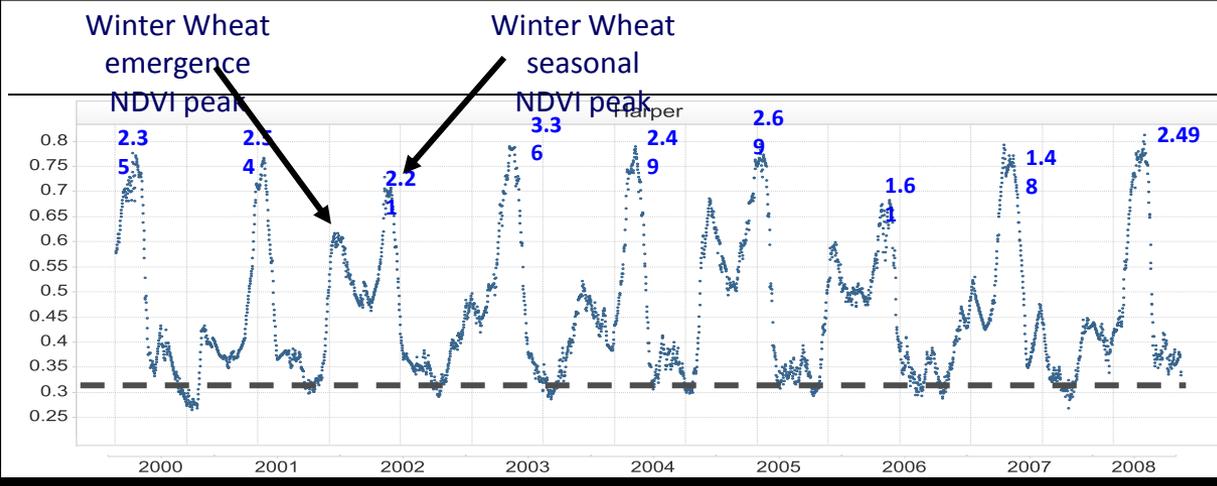
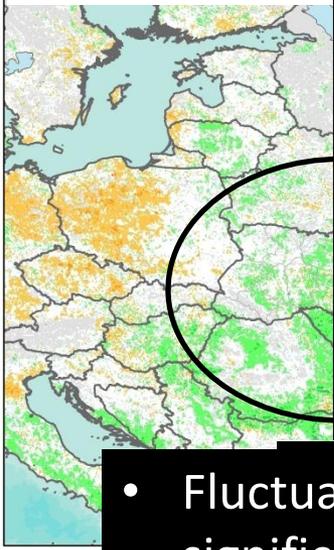
REUTERS

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Food crisis in Africa

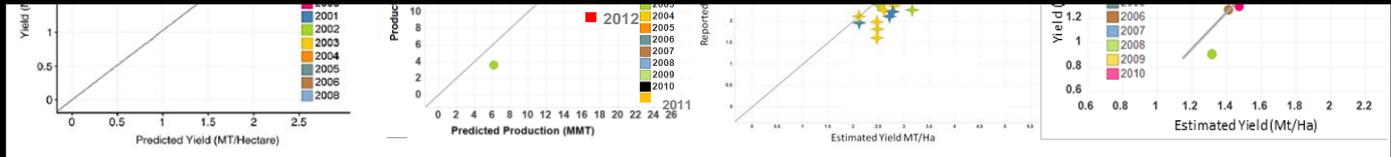
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 ice wheat

- Fluctuations in production- primarily driven by weather events- have a significant impact on market fluctuations
- EO-based methods can make a contribution- especially over the large producer regions which dominate price markets and are increasingly prone to production fluctuations



2009	226.00
2008	212.00
2007	197.00
2010	183.00

