

New User? Sign Up | Sign In | Help

Get Yahoo! Toolbar

Yahoo! Mail

YAHOO! NEWS

Search

Web Search

HOME U.S. BUSINESS WORLD ENTERTAINMENT SPORTS TECH POLITICS SCIENCE HEALTH TRAVEL MOST POPULAR

World Video Middle East Europe Latin America Africa Asia Canada Australia/Antarctica Kevin Sites

POPULAR SEARCHES: somali pirates michael jackson alicia keys somalia pirates

News Search

Advanced Search



VIDEO Are more US troops needed in Afghan war?

How a 'Miracle' Biofuel Plant Ruined Kenyan Farmers

Buzz up! Send Share Print

By NICK WADHAMS / KIBWEZI – Sun Oct 4, 5:50 pm ET

Everyone in Kibwezi, a village in southeastern Kenya parched by four years of drought, remembers the promises. It all started in 2000, when the government started preaching the word about a plant called *jatropha curcas*. That surprised people in Kibwezi because everyone already knew about *Jatropha* - it's a weed. Sometimes people planted it to fence off their farms, but usually they just ignored it.

The government told the farmers, however, that *jatropha* seeds can be pressed to make biofuel and that scientists believed the plant's seeds contained more oil than other biofuel crops. Even better, the

government said, *jatropha* needed little tending. All you had to do was stick it in the ground and watch it grow. Best of all for Kibwezi, a place that's frequently stricken by drought, scientists believed that the plant thrived on arid land. Convinced they could reap large profits from the plant in the global craze for alternative energy sources, hundreds of farmers turned over acres of their small farms to *jatropha*. But it didn't take them long to realize what scientists have come to realize in recent months: what was once touted as a miracle plant that needed almost no water has turned out to be anything but that. ([See pictures of a global food crisis.](#))

Peter Munyao, a village elder, is one of the farmers who experimented with the new crop. He planted *jatropha* in 2006 and encouraged other farmers to follow his lead. But today, the plants on his farm have all dried up and lost their seeds and leaves. "The people who did the promotion for *jatropha* had not done [their] research ... because we have realized that the crop is getting moisture stress just like any other crop," he says. A study published in June in the Proceedings of the National Academy of Sciences, a Washington-based scientific journal, found that *jatropha* actually requires more water per liter of biofuel produced than most other biofuel plants. That's bad news in Kenya, a country in the middle of a full-blown food crisis due to the lengthy drought. The World Food Program said in August that 3.8 million Kenyans had been affected by the drought and that malnutrition was on the rise.

Kenya isn't the only country that's gotten caught up in the excitement over *jatropha*. Last December, an Air New Zealand jet powered by a *jatropha*/kerosene blend made a successful test flight. China, Brazil and even Myanmar have promoted it heavily, sometimes forcing farmers to plant it. In India, *jatropha* has been planted on hundreds of thousands of acres of land. But, like the farmers in Kibwezi, farmers in these other countries have also experienced problems growing the plant. In India, for example, a test project at several agricultural colleges produced seed yields of only 200 grams per plant - a fifth the expected output of one kilogram of seeds per plant. ([Read: "Biofuel Gone Bad: Burma's Atrophying *Jatropha*."](#))

David Newman, who runs the Nairobi-based biofuels consultancy Endelevu Energy, says there have been isolated examples of success growing *jatropha*. "Occasionally a tree has survived in a marginal area and produces quite a bit of seed with no [agricultural] inputs whatsoever. But there's a difference between that one tree and replicating it thousands of times in the field," he says. The problem with *jatropha*, scientists say, is that there is no proven, widely disseminated method for growing it properly.

In the absence of reliable information, the farmers in Kenya were fed mistrusts about the plant and its biofuel potential by nongovernmental organizations and the government, which got much of their information from the Internet. The farmers said they were persuaded to buy so-called "certified" *jatropha* seeds, which were said to grow in tough conditions. They were also told they would be given advice on how to plant their fields and that once the plants began to produce seeds, agricultural officials would buy them at prices upwards of 1,000 shillings (\$13) per kilogram. Farmers were also told that demand would increase steadily for the oil produced by the seeds. ([See pictures of oil.](#))

Top Stories

Retailers see sales begin to recover in September
Herta Mueller wins 2009 Nobel literature prize
Taliban suicide attack kills 17 in Afghan capital
Relatives question why officials took Tenn. baby
Obama loan relief plan hits goal early
Mr. Geithner, Wall Street is on Line 1 (again)
Webber moves 'Phantom' setting to Coney Island

[More Top Stories »](#)

sponsored links

Refinance and Save \$1,000's

\$200K Mortgage for \$917/month. No Obligation. Refinance Requests Only.
www.pickAmortgage.com

Obama Urges to Refinance Now

\$90,000 Refinance under \$499/mo. See Rates-No Credit Check Req.
SeeRefinanceRates.com

Obama Gives \$31 Billion for Student Aid

Get Your Degree Now. Financial Aid & Scholarships are available.
www.ClassesUSA.com

Featured



'Founding of a Republic'

Film about China's revolution blurs the past to validate the present.
[» More from Time](#)



The Week in Photos

Children dress up like Gandhi to celebrate his 140th birthday.

Updates

[My Connections](#) [Everyone](#)

The problem is, none of those promises came to be. "It was a combination of international hype and local organizations who were ... selling seeds at very high prices claiming that they were special certified seeds when really they were just seeds collected from old trees in the wild," Newman says. The plants also did not do well in arid conditions. "[The plant] was more fragile, especially in its initial establishment phase, than we thought," says Jan Van den Abeele, executive director for Better Globe Forestry, a Nairobi-based group that studies optimal conditions for planting trees in dry areas. And many farmers had no buyers for their seeds. Some began giving them away to neighbors.

Farmers in Kibwezi quickly realized that they would have to throw out the rulebook to make their crops grow. Boniface Muoki's jatropha plants look like they're doing well - they're covered with thick green leaves and fruit. But Muoki says he did almost nothing the government experts told him to Do - instead, he planted the seedlings in meter-deep holes so that they would collect more rainwater and he tends the plants fastidiously. "It's the farmer who knows best," Muoki says. "At this point, I know more about jatropha than most anyone because it's me who experienced jatropha every day, who has seen how the plant behaves in varied conditions." (Read: "Can Airplanes Fly on Biofuel?")

The problems haven't discouraged other jatropha proponents, either. For several years, Titus Kisavi traveled the region encouraging farmers to grow the plant, earning a commission from development groups for the seeds he sold. These days, however, he doesn't have a job and he spends his afternoons at a bar near Kibwezi. Still, he hasn't given up on the plant. "I have a very big passion for jatropha," Kisavi said. "I visit farmers and tell them to plant it in the hope that one day ... somebody will come to the farms and sign contracts for the seed. We know one day that jatropha will be in very high demand."

See TIME's Pictures of the Week.

See the Cartoons of the Week.

View this article on Time.com

Related Searches: [seed yields](#) [planting trees](#) [arid land](#) [moisture stress](#) [alternative energy sources](#)

Buzz up! | Send | Share | Print

More on Alternative Energy

- [Executives urge lawmakers to pass climate bill](#) AP
- [Colo. company looks to salvage Neb. ethanol plants](#) AP
- [How a 'Miracle' Biofuel Plant Ruined Kenyan Farmers](#) Time.com

[More »](#)

More...

- Video: [Mohamud gave contradictory statements in Kenya: Ottawa](#) CBC.ca
- Video: [Classic car show in Kenya](#) Reuters
- World Video: [Sex tourism book comes back to haunt French minister](#) AFP

[Sign In](#)
to see what your Connections are up to on Yahoo! News.
New User? [Sign Up](#)

Education



[Recession Proof Jobs](#)
Even in this economy there are industries still hiring. See Top Growing Careers in 2009.



[Flexible Jobs Paying \\$70K](#)
Make great money on your schedule and find the right balance in your career.



The Army's 'Super Bowl'
24 soldiers compete for distinction of Army's best warrior.
[See today's talked about videos](#)



Most Viewed - World

- [Somali pirates attack French military flagship](#) AFP
 - [Taliban suicide attack kills 17 in Afghan capital](#) AP
 - [Israeli foreign minister: No peace deal now](#) AP
 - [Amid the global economic crisis, China rises](#) AP
 - [Typhoon Melor buffets Japan, disrupts industry](#) Reuters
- [All Most Viewed »](#)

Most Blogged - World

- [Afghan War Debate Now Leans to Focus on Al Qaeda](#) International Herald Tribune - World News, Analysis, and Global Opinions - Wed Oct 7, 6:11 pm
[Blogs About This Story](#) (20) EDT
- [The Day In Israel: Thurs Oct 8th, 2009](#) - Wed Oct 7, 3:52 pm EDT
[Blogs About This Story](#) (6)
- [Iran accuses U.S. of making nuke scientist disappear](#) Dhimmi Watch - Thu Oct 8, 6:36 am EDT
[Blogs About This Story](#) (2)

More From



- [Senate Health Bill Gets Strong Score, but Weaker Mandate Could Pose Problems](#)
- [Scandal-Hit Berlusconi Must Face Criminal Charges](#)
- [German Writer Herta Müller: Another Nobel Surprise](#)
- [Afghanistan Controversy: Less Than Meets the Eye](#)
- [Calling 'Em Out: The White House Takes on the Press](#)

Photo Highlight

Subscribe

Add headlines to your personalized My Yahoo! page ([About My Yahoo!](#) and [RSS](#))

World - Time
[Add to My Yahoo!](#) | [RSS](#)

Alternative Energy
[Add to My Yahoo!](#) | [RSS](#)

[More News Feeds »](#)

Alerts

Get an alert when there are new stories about:

- seed yields
- planting trees
- arid land
- moisture stress
- alternative energy sources

[View More Alerts »](#)

Also on Yahoo! News

- [Today in History](#)
- [Obituaries](#)
- [Corrections](#)
- [News by Region \(Yahoo! Directory\)](#)
- [Yahoo! News & Media Sites](#)

Daily Features

[All Comics »](#)

Opinions & Editorials: Diverse views on news from the right, left, and center.

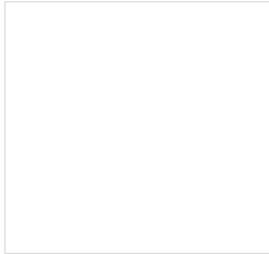
[All Opinion »](#)



[Photo Highlight Slideshow](#)

A man walks by a giant photograph on a wall of the bank of the River Seine.
AFP/Martin Bureau

[More Photos and Slideshow »](#)



[Home](#) | [U.S.](#) | [Business](#) | [World](#) | [Entertainment](#) | [Sports](#) | [Tech](#) | [Politics](#) | [Science](#) | [Health](#) | [Travel](#) | [Most Popular](#) | [Odd News](#) | [Opinion](#)
[NEWS SERVICES](#) | [RSS](#) | [News Alerts](#) | [Weather Alerts](#) | [Add Yahoo! Headlines to Your Site](#) | [Site Map](#) | [Help](#) | [Feedback](#)

Copyright © 2009 Time Inc

Copyright © 2009 Yahoo! Inc. All rights reserved. [Questions or Comments](#) | [Privacy Policy](#) | [Terms of Service](#) | [Copyright/IP Policy](#)