

The hacker way

Jim Zemlin, The Linux Foundation

March 2012

Erlang and Linux have similar backgrounds

Early adoption driven by smart design decisions

Freely accessible code

Permissive licenses

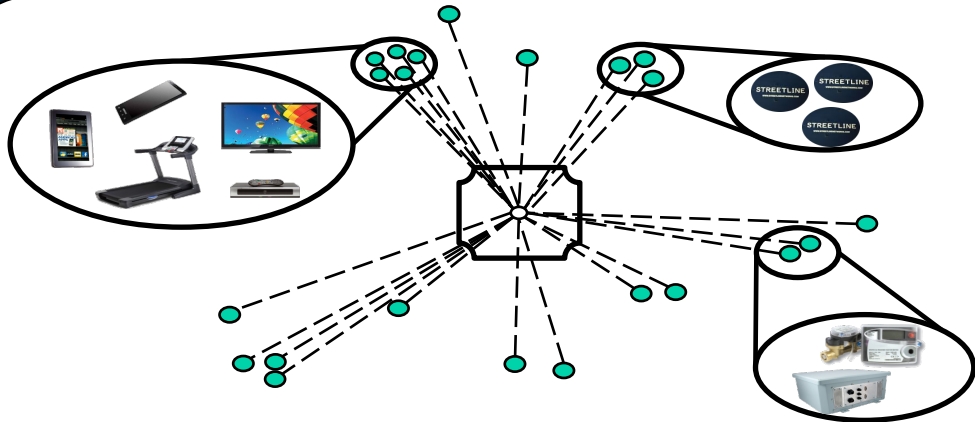
Inexpensive hardware

Architecture neutral design

Hackable

**Erlang and Linux are ideal
for embedded applications**

We're making a lot more connections in daily life, most are transparent and intermittent



Embedded growth brings new challenges...

More end points = {
More devices to build
More connections to manage
More failures to tolerate

...Challenges easily addressed by Erlang and Linux

More devices to build



Low cost
High flexibility
Universal skills

More connections to manage



Concurrency
Data isolation

More failures to tolerate



Isolate failures
Recover quickly

We are Proving the Hacker Way Works

**Erlang
&
Linux**

Are growing – quickly

Are solving problems in the highest-growth markets

Provide essential infrastructure at very low cost

Who said this?

“Code wins arguments.”

**“The best idea and implementation should
always win.”**

MATRIX REVELATIONS: THE TRUTH ABOUT THE WACHOWSKIS

WIRED

WIREDCOMM OPEN WIRE

LINUS TORVALDS >>

LEADER OF THE FREE WORLD

His open source software
is making Bill Gates sweat.
What's next: Open source
science, law, and design.

PLUS

JENNIFER ANISTON, NUDE?
ONE MAN'S CRUSADE
AGAINST FAKE CELEB PORN

MALCOLM JONES ON THE
NEW MUSIC UNDERGROUND

LEONARDO LEBESKO ON
THE FIRST NET ELECTION

DAVID CROSS ON 8 TOTALLY
UNBELIEVABLE GAMES

AOL'S DEATH MARCH

LINUS TORVALDS,
BACK ON THE
FRONT LINES OF
THE LINUX WARS

THE
LINUX
FOUNDATION



Why is the world turning to Linux and Open Source?



***Reason One: The Internet
is Changing***

The Internet of People is 1 Billion...



...headed toward 2 billion

The Internet of connected devices...



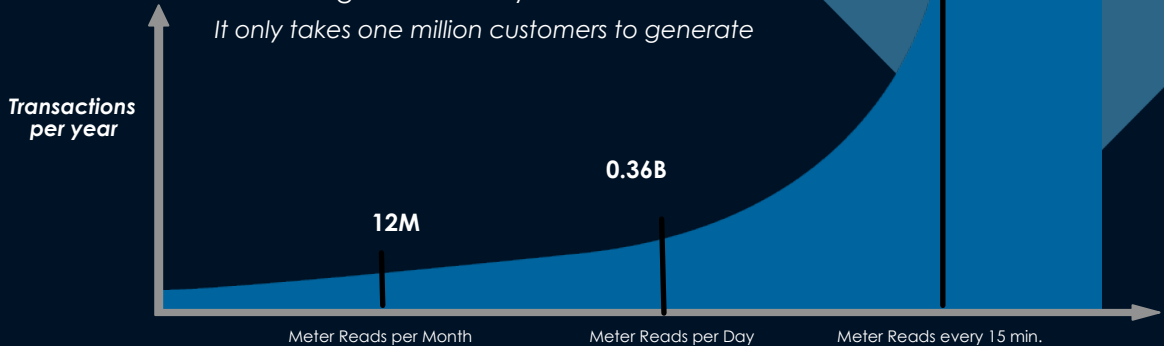
...is headed to 1 trillion.

Requirements are changing for a more instrumented, interconnected, intelligent world

Due to Changing Workloads

e.g. Real-time optimization of a Power Grid by reading meters every 15 minutes...

It only takes one million customers to generate



What do you need to deal with this future?

Instrumentation: *in embedded systems to collect data*

Network Servers: *to gather and store data*

Super computers: *to analyze this data explosion*

Devices: *to display, communicate and interact with data*

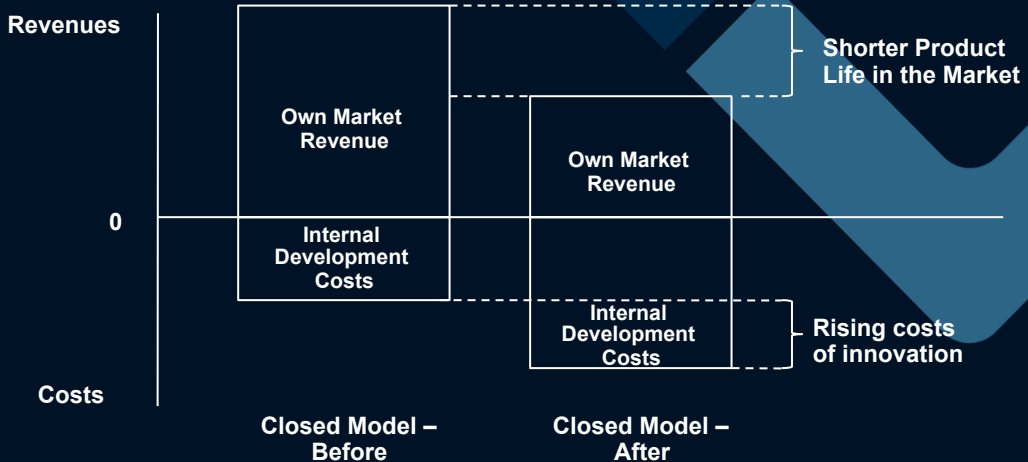
Sound familiar?



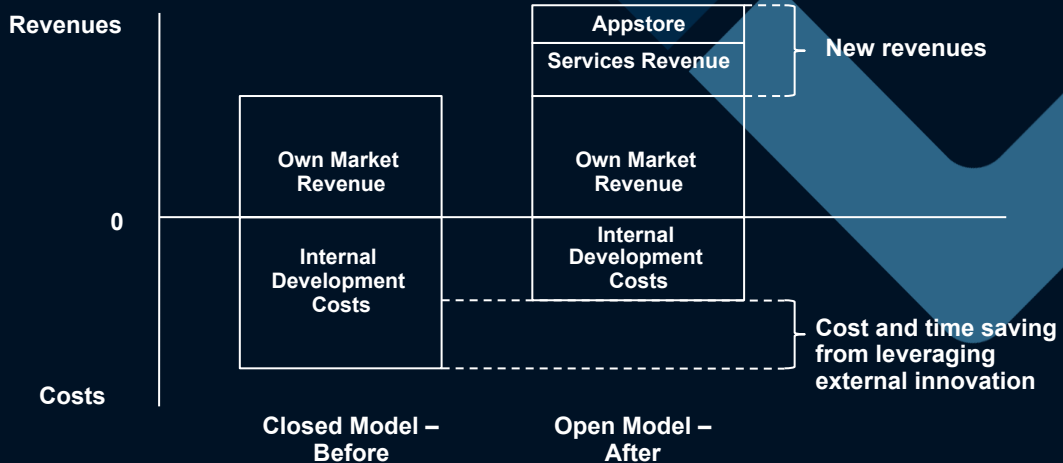


Reason Two: It's saves money

The price pressure of innovation



Open innovation enables new revenue streams, faster time to market, and lower costs



The background features several overlapping, semi-transparent blue geometric shapes, including triangles and polygons, creating a modern, abstract design. The text is centered horizontally and rendered in a clean, white, sans-serif font.

Reason three: the move to services

FREE

The background features several overlapping, semi-transparent blue geometric shapes. These shapes are composed of various polygons, including triangles and quadrilaterals, arranged in a way that creates a sense of depth and movement. The colors range from a dark navy blue to a lighter, medium blue.

“We don’t think of the Kindle Fire as a tablet. We think of it as a service.”

Jeff Bezos, September 2011

The move towards a services economy for consumers



Google
AdWords

ovi NOKIA



 Rhapsody™

The move towards a services economy for enterprise

appzero

cloudservers



Zenoss

salesforce.com



Success On Demand

Linux is de facto winner as a services platform



Could Google, Amazon or Facebook be the companies they are today if they were written on Microsoft .NET?

Linux is the center of all major computing trends

Move to
Services



The
internet of
things

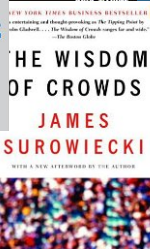
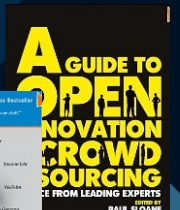
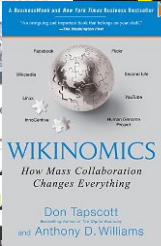
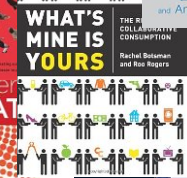
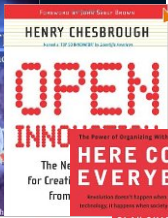
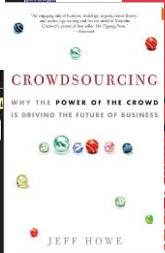
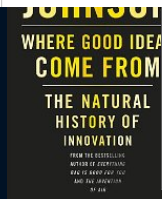
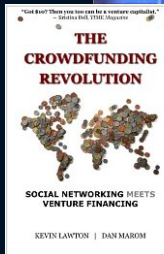
Economic
Efficiency



***The Importance of Being
on the Right Side of
History***

*In 20 years we have seen it all.
Predictions of Linux demise for
technical reasons, for usability
reasons, for profitability reasons,
and for legal reasons.*

5,547 10,923
\$10,800,000,000
2,700,000





Thank you.