

Integrating the Internet Into the Classroom

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Teaching Today

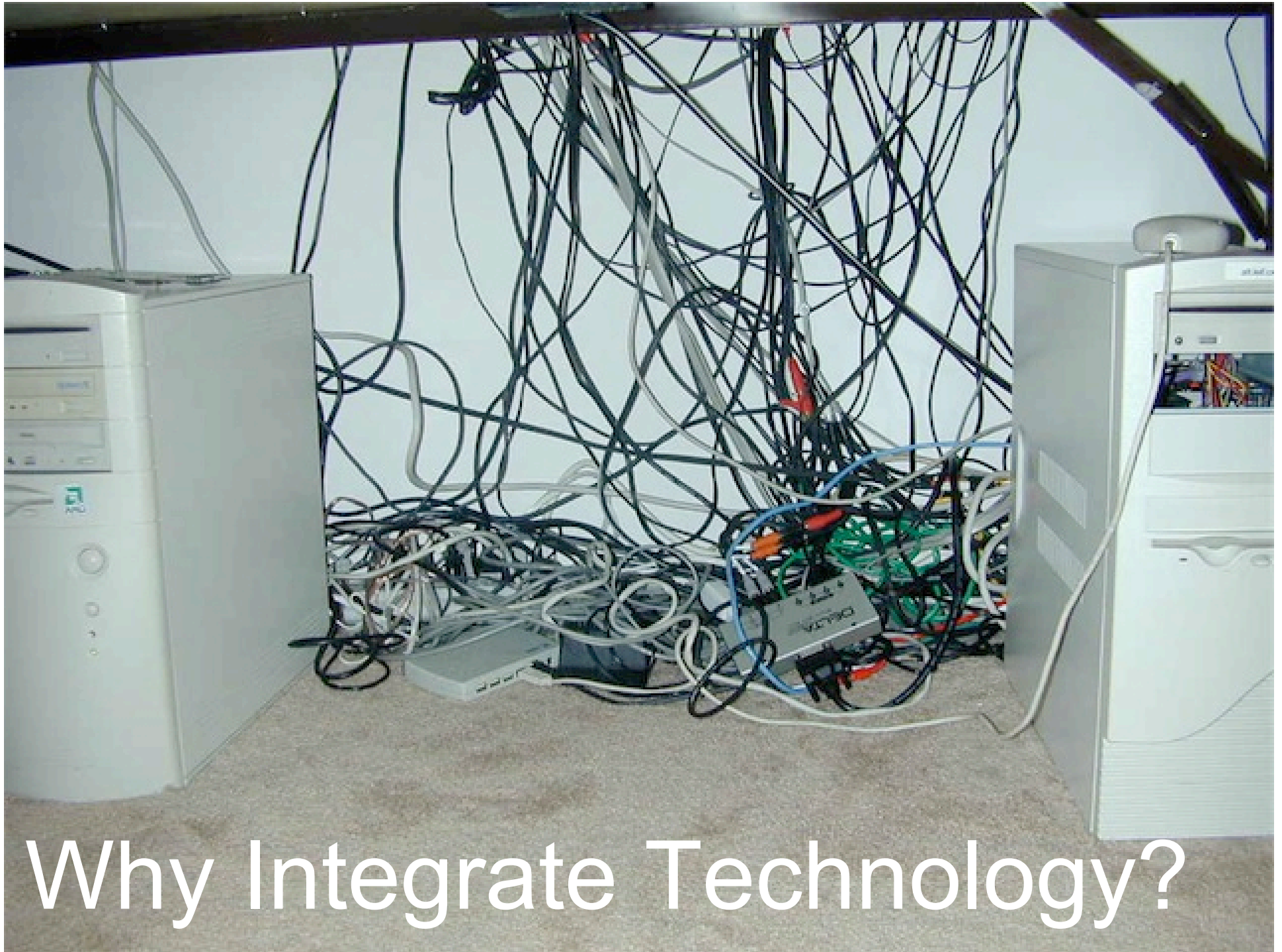
A man with long, wavy, light-colored hair and glasses is wearing a large, over-ear headset with a microphone. He is looking down and to the right, possibly at a computer screen. He is wearing a dark, long-sleeved shirt. The background shows a room with bookshelves filled with books and a wooden chair. The lighting is warm and indoor.

- It used to be, you got in, you got out...
- No evidence... but now:
- Recording devices everywhere

When You're Recording...



- You're always speaking to more than one audience
 - Live audience
 - Recorded audience
 - Back-Channel
 - Multiple Things Happening at Once



Why Integrate Technology?

1. The school library only has 12 books from this century



- Books are expensive, and getting more expensive
- If we want to get learning material into the hands of students (at a price we can afford) the internet is the only way to go
- We can put *all of knowledge* into the hands of students for the price of two or three textbooks

- Open Educational Resources:
 - Government of Canada -- <http://www.downes.ca/cgi-bin/wiki.cgi?OpenEducationalResources>
 - OER Commons - <http://www.oercommons.org/>
 - Internet Archive - <http://www.archive.org/details/education>
 - UNESCO - http://oerwiki.iiep-unesco.org/index.php?title=Main_Page

2. Czechoslovakia is no longer a country



- Events change faster than books and offline materials can be updated
- Wiki-Based sites stay current
 - Wikipedia - <http://www.wikipedia.org/>
 - Wiki Educator - <http://www.wikieducator.org>
 - Curriki - <http://www.curriki.org>
 - Wikiversity - <http://en.wikiversity.org>
 - Wikispaces - <http://www.wikispaces.com>

3. Not everybody can tour Mongolia



- Students can see things from around the world much more clearly
- Students need the internet to see these things
- It's good for them to see these things
- Tie direct knowledge of places with current events - let them see what it *feels like* to be here

- Google maps - <http://maps.google.com>
- Mongolia in Flickr - <http://www.flickr.com/search/?q=mongolia&w=all>
- Mongolia - Wikipedia - <http://en.wikipedia.org/wiki/Mongolia>
- Mongolia - YouTube - http://www.youtube.com/results?search_query=mongolia&search_type=&aq=f

4. Nobody here speaks Khazak

بورونقى اوتكان دامانده بىر دانشمند كىشى بغداد شەرى نىڭ بىر
اولكان قاضى سى نىڭ اويونى كىلىپ قونوبتى قاضى بىرلان
سويلاپ قاضى نى سوزكا جىنكا بروبتى سوندا قاضى قورقوب بول
مغان كىلكان بىر پلە ايكان مىنك قاضى لىغومنى تارتوب آلە كىراك
تە دە بولسە بوغان جالئوب سى بىروب اورنومدە قلايونىپ
خانونىنە آقباداسوبتى .

Бурунقى өткөн заманда бiр даныспан кiсi Бағдат сiрi-
нiң бiр үлкөн казысының үжүнө келiп конупту. Казы—мiнiн
сөйлөсүп, казыны сөзгө җеңä-берiптi. Сонда казы коркуп, „бул
маған келгән бiр бälä: менiң казылыңымны тартыб—алса,
керäк! не-дä болса, буған җалынып, сый берiп, орвумда кала-
йып!“ деп, катышына акылдасыпты.

- Authentic language training
 - Vs people with very thick English accents
 - No opportunity to immerse oneself
 - Nobody here *teaches* Khazak either
 - » SpanishPod, ChinesePod
 - » <http://spanishpod.com/>
 - » Italki
 - » <http://www.italki.com/>
 - » [More...](#)

5. Nobody Else on the Football Team is into Macrame



- You can look at subjects that aren't wildly interesting around here
 - » Clare Brooks, Australia
 - » Manitoba, World Politics
 - » The Only Goth in Minnedosa
- You can find your niche group online...
 - Yahoo Groups - <http://groups.yahoo.com/>
 - Google Groups - <http://groups.google.com>

6. Anyone can be Napoleon



- Videogaming & simulations
 - Immersion
 - Allows you to see from different perspectives
 - Puts you in the context of different events
 - » Pilot training
 - » The helicopter simulation
 - » Second Life in Education (SLEd), Jokaydia
 - » Civilization in the Classroom

- Second Life - <http://www.secondlife.com/>
- OpenSim, Croquet - <http://chris.superuser.com.au/tag/opensim>
- Civ III in the classroom - <http://www.nku.edu/~weirk/civ/civ.html>
- Apolyton - <http://apolyton.net/>

7. Speaking in front of an audience is motivating



- (Not just for you, also for your students)
 - » Educational Blogging...
 - <http://connect.educause.edu/Library/EDUCAUSE+Review/EducationalBlogging/40493>
 - » Clarence Fisher, Manitoba
 - <http://remoteaccess.typepad.com/>
 - » Students at Ecole St Joseph
 - » Class of Web 2.0
 - <http://www.solutionwatch.com/519/back-to-school-with-the-class-of-web-20-part-3/>

8. Collaboration on the test is no longer cheating



- Collaboration and teamwork skills are the new math
- These can be practiced in class but you've known these people your whole life
- It's much better to learn to negotiate collaboration with people you don't know - different objectives, different values, different background

- Collaboration using...

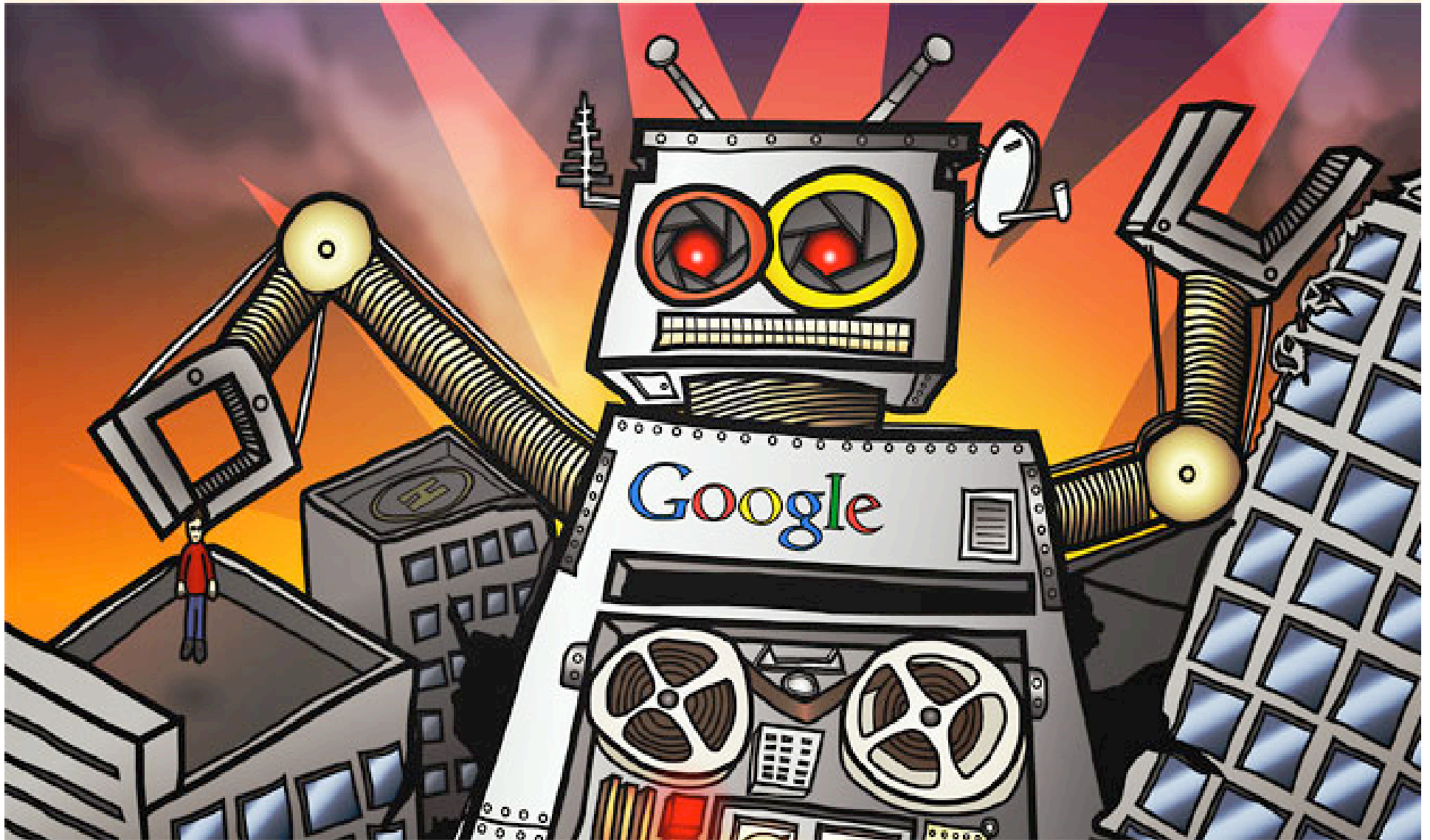
- Skype - <http://www.skype.com>
- Google Docs - <http://docs.google.com>
- Collaboration Engines: Elluminate, Adobe Connect, etc.

9. Instant Messaging is cheaper than SMS



- Students are physically attached to their cell phones...
- On the internet, they can use communications tools that are integrated with their learning tools

10. You Google them - they Google you



- It gives students models - good and bad
- of how to do things - research

- » How to use Wikipedia in Research

- <http://www.msoe.edu/library/resources/tutorials/wikipedia/research.shtml>

- » Exploratorium - Evidence (how do we know what we know) -

- <http://www.exploratorium.edu/evidence/>

11. You should learn *something* about Facebook

The image shows a screenshot of a Facebook profile page for a user named Caroline. The page layout includes a top navigation bar with the Facebook logo and links for Profile, Friends, Networks, and Inbox. On the right side of the top bar are links for home, account, privacy, and logout. The left sidebar contains a search bar and a list of applications: Photos, Groups, Events, Marketplace, and Trips. The main content area features a profile picture of Caroline, a young woman with long blonde hair, wearing a blue tank top and sitting at a desk. Below the photo are links to view photos, send a message, poke her, and add her as a friend. To the right of the photo is a summary of Caroline's profile information, including her networks (Trinity School '07, Harvard '11, New York, NY), sex (Female), interested in (Men), relationship status (Single), looking for (Friendship, Random play, Whatever I can get), birthday, and political views (Liberal). Below this is a mini-feed section displaying 10 stories, with two visible: one from August 1st where Caroline left a group, and another from August 2nd where she became friends with another user.

facebook Profile edit Friends Networks Inbox home account privacy logout

Search find friends

Applications edit

- Photos
- Groups
- Events
- Marketplace
- Trips
- more

Caroline Profile

Networks: Trinity School '07
Harvard '11
New York, NY

Sex: Female

Interested In: Men

Relationship Status: Single

Looking For: Friendship
Random play
Whatever I can get

Birthday: [Redacted]

Political Views: Liberal

▼ Mini-Feed

Displaying 10 stories. See All

Today

Caroline left the group Barack Obama (One Million Strong for Barack). 6:01am

August 2

Caroline and [Redacted] are now friends. 1:51pm

View Photos of Caroline (207)

Send Caroline a Message

Poke Her!

Add Caroline as a Friend

- Students are using social networks
- But they don't always use them appropriately
- It's a very complex environment
- Right now they're out there on their own
- The need advice, suggestions and supervision
- The internet is the medium for communication in the future

- List of social networking websites

http://en.wikipedia.org/wiki/List_of_social_networking_websites

- Social networks in education -

<http://socialnetworksined.wikispaces.com/>

- Ning <http://www.ning.com>

- Elgg <http://elgg.org/>

12. Nobody uses trigonometry on the bus



- “Why should we learn trigonometry?”
- In the everyday life of a student there is no use for trig - it just doesn't come up
- But on the internet, you can be involved in projects that draw you deep into technology
 - » Squeak, Smalltalk <http://www.squeak.org/>
 - » The perfect Star Trek game - rotate cube

13. Learning to code could save the world

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the green pages

Inventions to save the world

The new generation of eco-products are often quirky, sometimes life-changing. **Graham Hill** of treehugger.com picks his favourite 'green' designs of 2005



→ Three-way convertible bicycle
The bike-like survival device that can convert into a pedal-powered cargo truck that could also safely transport two children to a maximum weight of 50kg. But separate pedals and you still have a functional bike and a city-style push-car. So you can load her children in the front carrier and head home to school or take care their snacks the better and ease it at the school. You can then remove the child's front wheel, install under the carrier, and ride to work.
Not only does the bike-like provide the option to log heavy stuff around town, it also retains all the environmental benefits of bikes. It tracks weight, has a 'batter' factor and will make people notice their own carbon footprint for when buying. 1999 euros from around £500 for bike and carrier combined. It is remarkably affordable for all its clever design and detailing.
Graham says: "Eco-friendly on trend and it's a multi-functional." www.3waybike.com

→ Wind-up remote control
A remote control that recharges by winding it up - eliminating the need for batteries. You can wind an off-the-shelf one with the remote, including your television, DVD player, CD, cable, satellite, and an auxiliary remote. The wind-up generator requires only 30 revolutions for a full charge, which will last seven days. It's only £20.
Graham says: "Can't these things power portable devices enough to want their own power?" www.antiapathy.com

→ Multi-charger
This eco multi-charger will charge 'non-exchangeable' batteries as well as flat and loose batteries, extending battery life by up to 10 times. The device takes all popular battery sizes and tells you how much strength is left within each. £10.99.
Graham says: "Pick up all those old school batteries you see on the street, insert the device and it'll handle 'em... and use them again. Saving all before a new wave of life." www.antiapathy.com

→ Recycled trainers
The trend of sustainable ways of living has entered the footwear market. From materials such as charity-store coats, ex-military parachutes and prison blankets the company Worn Again has fashioned these funky-looking trainers. As well as supporting an innovative green product, buy these and you'll be helping reuse some of the 900,000 tons of textiles discarded in the UK each year. Available in Terra Plana, 124 Bermondsey Street, London SE1, and in Schuh stores across the UK. For stockists contact: info@wornagain.co.uk.
Graham says: "Great shoes made from recycled materials." www.antiapathy.org/wornagain

↑ Flying wind turbine
This clear flying wind turbine developed by MagnumPower, is built up to feature an wind speed sensor, rotation, 30W and stability as well as speed. The Magnum's solar system can be used up to 1000m above ground level, including on higher winds without having to have a tower or poles for maintenance. The turbine is produced in spring 2009 from the Cambridge company. www.magnumpower.com

↑ Night reader
The glow-in-the-dark night reader is a small, portable, solar-powered device that can be used to read at night. It is made from recycled materials and is designed to be used in a variety of settings. www.antiapathy.com

→ Portable solar
The glow-in-the-dark night reader is a small, portable, solar-powered device that can be used to read at night. It is made from recycled materials and is designed to be used in a variety of settings. www.antiapathy.com

Electric scooter
The antiapathy scooter, invented by Dan Curran, is powered by a lithium-ion battery. It is made from recycled materials and is designed to be used in a variety of settings. www.antiapathy.com

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entertainment
There's a new way to look at the world. It's called the STOMP.

THE INDEPENDENT
NEWSPAPER OF THE YEAR
24 PAGES OF SPORT
MICHAEL OWEN TAKES ON HIS FORMER LIVERPOOL TEAM-MATES
One year on, and the cruel sea is calm
Survivors remember the dead on the anniversary of the devastating wave that killed 250,000 people

- Wargames - two kids start WW III
- Students can learn certain skills *only* from the internet - for example, internet programming
 - Very different from programming on your computer...
 - Users, web services, etc
 - Students who code see very quickly the need for math, English, art and design

14. Teachers Need *Somebody* To Talk To



- The internet is for the benefit of the teachers too
- Teaching can be the loneliest job in the world
- Engage with other teachers, other classrooms
 - » The Flat Classroom Project
 - » <http://flatclassroomproject.wikispaces.com/>
 - » OLDaily and CCK08
 - » <http://connect.downes.ca>

15. It gets students out of the class



- The School is the only place that *doesn't* have internet
- If we can have wireless internet on city buses, we should have internet access in schools
- Everything we do is infused by the internet
- It's our responsibility to ensure students are prepared

This was a talk about why... but also about how...

- Use it to access current materials
- Use it to integrate current events
- Use it to broaden students' experiences
- Support language training with online conversations
- Use the net to engage niche interests

- Find and plan simulations and immersions
- Have students present stuff online
- Build collaborative exercises
- Build communication into learning
- Use to find out about students

- Spent time in social networks
- Integrate class lesson in creative projects
- Support deep learning with deep projects
- Build your own personal learning network
- Integrate students into the community

<http://www.downes.ca/>

- * E-Learning 2.0
- * Things You Really Need to Learn
- * How to Be Heard
- * How to Write Articles and Essays Quickly and Expertly
- * Principles for Evaluating Websites
- * Nine Rules for Good Technology
- * Educational Blogging
- * Managing Your Blog Entry - 11 Better Tips
- * Seven Habits of Highly Connected People
- * Ten Futures