

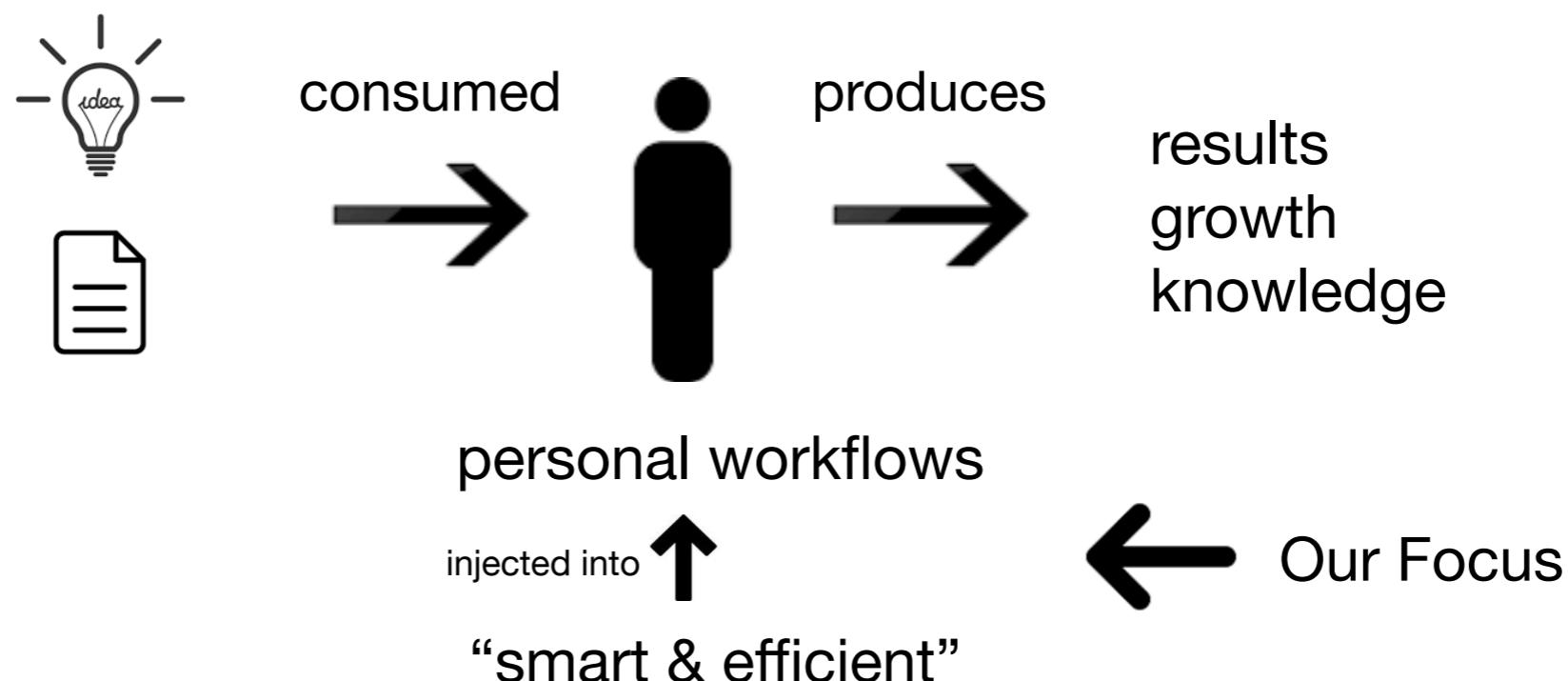
Productivity

Getting More Done with Less

This is about getting and being organized.

Organization is the process of clearing and supporting paths for the development of things we find meaningful.

A **workflow** consists of an orchestrated and repeatable pattern of activity enabled by the **systematic** organization of **resources** into processes that transform materials, provide services, or process information.



Why is this important? Who cares?

“Knowledge workers” — anyone engaged in acquiring new skills, learning for the sake of learning

The younger generations are living in this New World.
The ability to actively manage and navigate the information available today is a critical job and life skill.

And for me personally, this was the world I grew to live in during my 30+ years as a software developer. These kinds of skills were crucial to being able to function in that detailed-oriented, ever-changing world. And all this is still actively employed in my current day-to-day.

Why is this important?

The importance of “saving state”

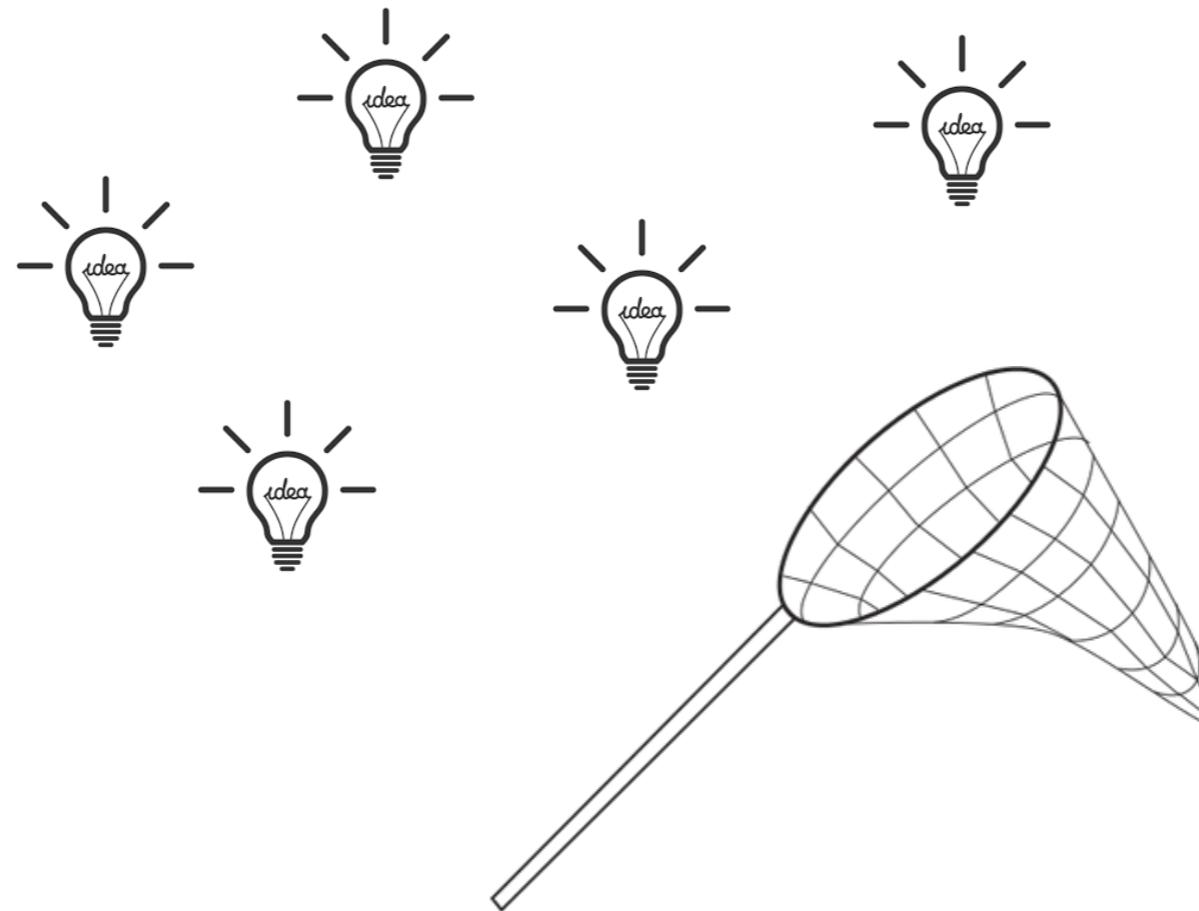
Interruptions and loss of focus are huge time wasters!

What can we do to help minimize those problems?

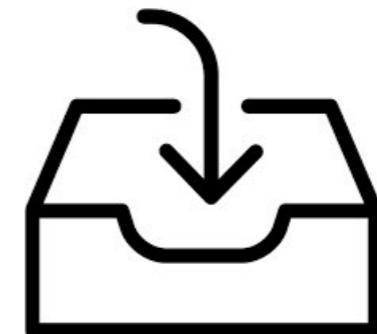
- Managing the state of incomplete projects or work sessions
- Managing distractions that are ever present
- Being able to come back to previous work and pickup where you left off
- Minimizing the need to rethink things or remember details

The Inbox

Capture those fleeting thoughts



You have “inboxes”
everywhere...



“Your mind is for having ideas, not holding them.”

...but manage **when** you
will act on those ideas

Managing the InBox

Capturing the hum of your mental engine

A **session** is some dedicated block of time in which you will focus on some task. And during that task-focused period, you will think of other things you need to do.

Using an inbox in the context of a session is not just about throwing everything that comes to mind but is not immediately applicable in a big box. Rather, it is about capturing the hum of your mental engine which is being triggered by something during the session.

The inbox is an excellent capturing mechanism for any ideas or questions, whether they would take 2 minutes or less to answer or would take days, without necessarily leading to a fundamental interruption of the session flow.

Distraction-free ==> Flow State

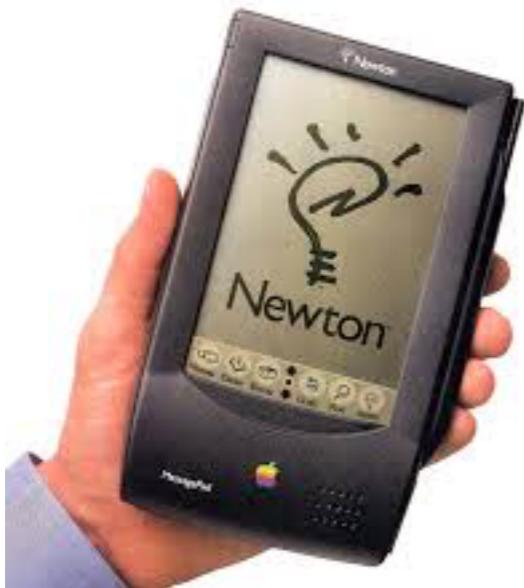
Minimizing distractions helps us stay in “flow”

- We do our best work when we can focus, which is a state contrary to distraction. And distracted we are, most of the time. When distracted, our tools control us. When focused, we use our tools to our advantage as they assist us in doing the work.
- To get to that focus, we need to find the flow state, to be in the moment. A good way to reach that is through play, as all kids do. This is something we have abandoned, or forgotten, but we can still access that state.
- We do it by building an environment that allows play to occur ==> Tools, Workflows, “life hacks”, ...

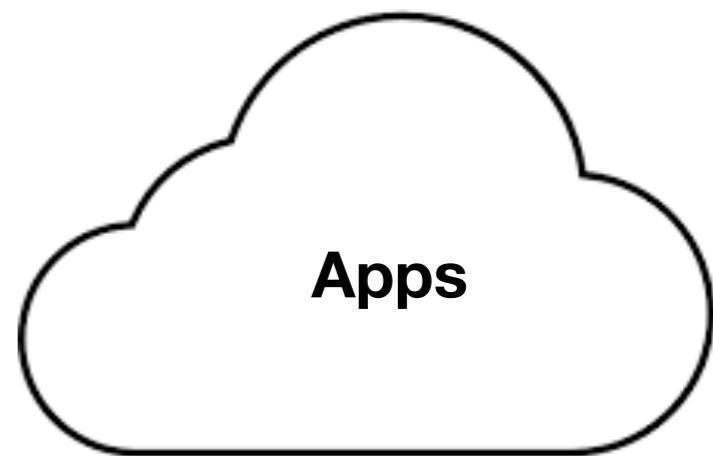
Butterfly Nets

Devices I've used to capture ideas

Then...



Now...



Siri Alexa

The Sanctity of the “Session”

Protect those productive moments

Entering a session takes an effort. Getting to that point expends a certain amount of energy, and wasting that energy by giving in to disruptions is a suboptimal approach to work.

The inbox is a tool that helps us to respect the sanctity of the session. Defer any processing of “other thoughts” by dumping them into the inbox.

Tools and Workflows help us stay in the zone!

Three Principles

**Some “Best Practices” toward creating
and maintaining productive work flow.**

1. Capture your state
2. Use self-describing naming conventions
3. Automate where/if possible

Three Principles

1) Capture your state

- Perhaps the most important thing is to do your work in a way that **leaves a coherent record of your actions.** ... Instead of copying out some archival material without much context, file the source properly, or at least a precise reference to it. (Pocket)
- Why should you bother to do any of this? Because when you inevitably return to your table or figure or quotation nine months down the line, **your future self** will have been saved hours spent wondering what it was you thought you were doing and where you got that result from. (Journals)

“Where am I on this project?”

“Where did I leave off before I got distracted?”

Three Principles

2) Use self-describing naming conventions

- A second principle is that a document, file or folder should always be able to tell you what it is. Beyond making your work reproducible, you will also need some method for organizing and documenting your draft papers, code, photos, field notes, datasets, output files or whatever it is you're working with.
- Anything you can do that keeps you from having to rethink something is a win! Let the previous thinking **tell you!**
- Teach your **previous self** to talk to you **current self!** (or vice versa)
You will thank them! :)

Three Principles

3) Automate where/if possible

A third principle is that repetitive and error-prone processes should be automated if possible. (Software developers call this “DRY”, or Don’t Repeat Yourself.) It makes it easier to check for and correct mistakes.

- Rather than copying and pasting code over and over to do basically the same thing to different parts of your data, write a general function that can be called whenever it’s needed.
- Instead of retyping and reformatting the bibliography for each of your papers as you send it out to a journal, use software that can manage this for you automatically.
- Employ tools that can **automate recurring mundane tasks**.
- Employ tools that can help you find things (again) that you thought would be useful when you discovered them initially.

The Master Workflow - GTD

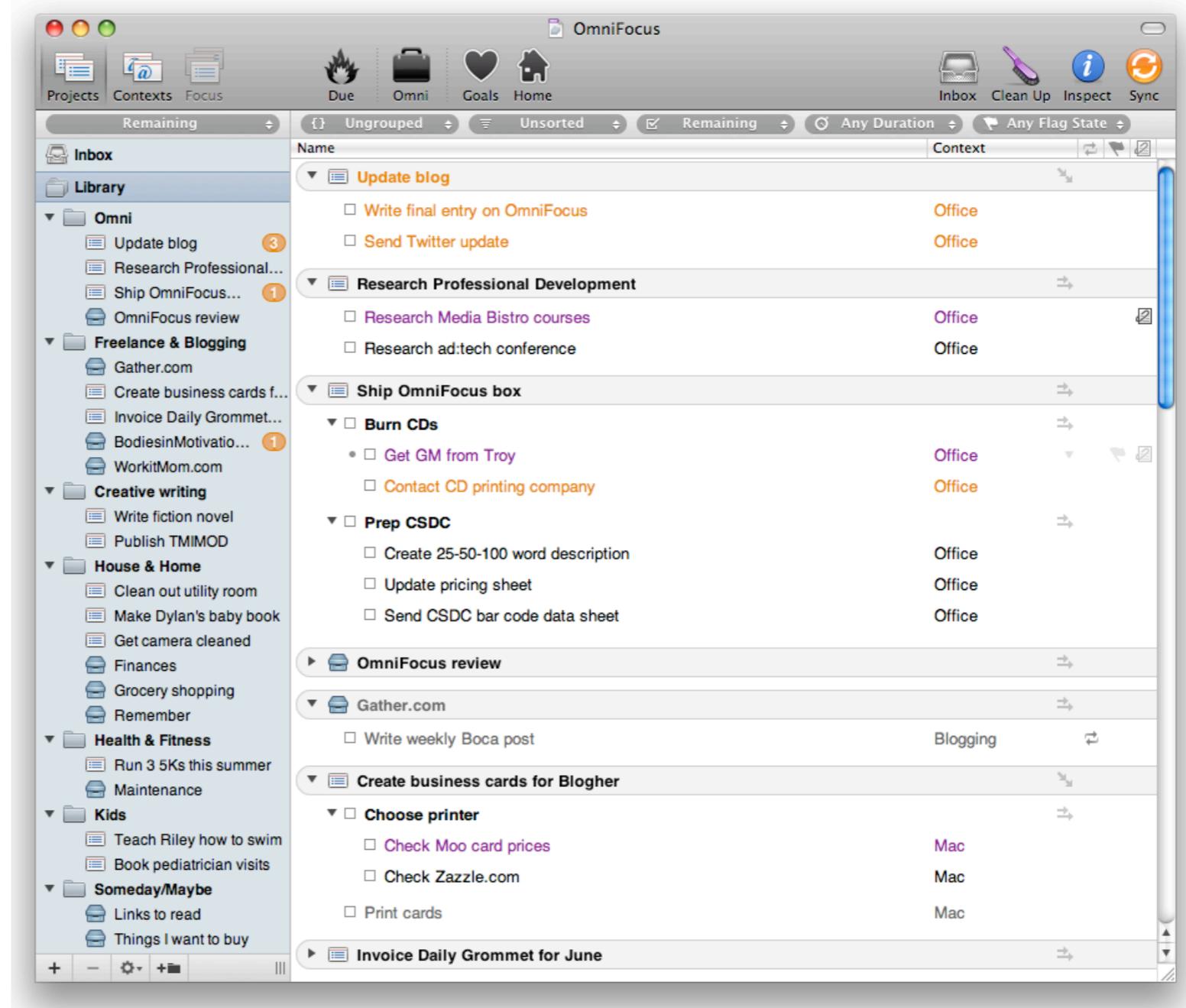
Getting Things Done

<http://gettingthingsdone.com>

“If you are not doing it right now, put it in a trusted system”

Aside: Personally, everything in this presentation is something I do. And my “control panel” for all these things — for my personal productivity workflows, for helping manage all the things I’m doing or want to do — is an app named “OmniFocus”. All my various other “inboxes” ultimately dump into this Master Inbox in OmniFocus. And then the actions get organized from there.

But GTD isn’t an app! It’s a simple methodology. It can be implemented via an app (Mac or Windows) or it can just be done on paper. It’s a mindset.



Automation

“Automate where/if possible”

We have “computers”, in our pockets and on our desks, that are programmable and configurable. Learn to use that capability to remove mundane and repetitive tasks where possible; use it to help you remember the details of whatever you are pursuing.

Free your mind for the important stuff!

IFTTT If This Then That

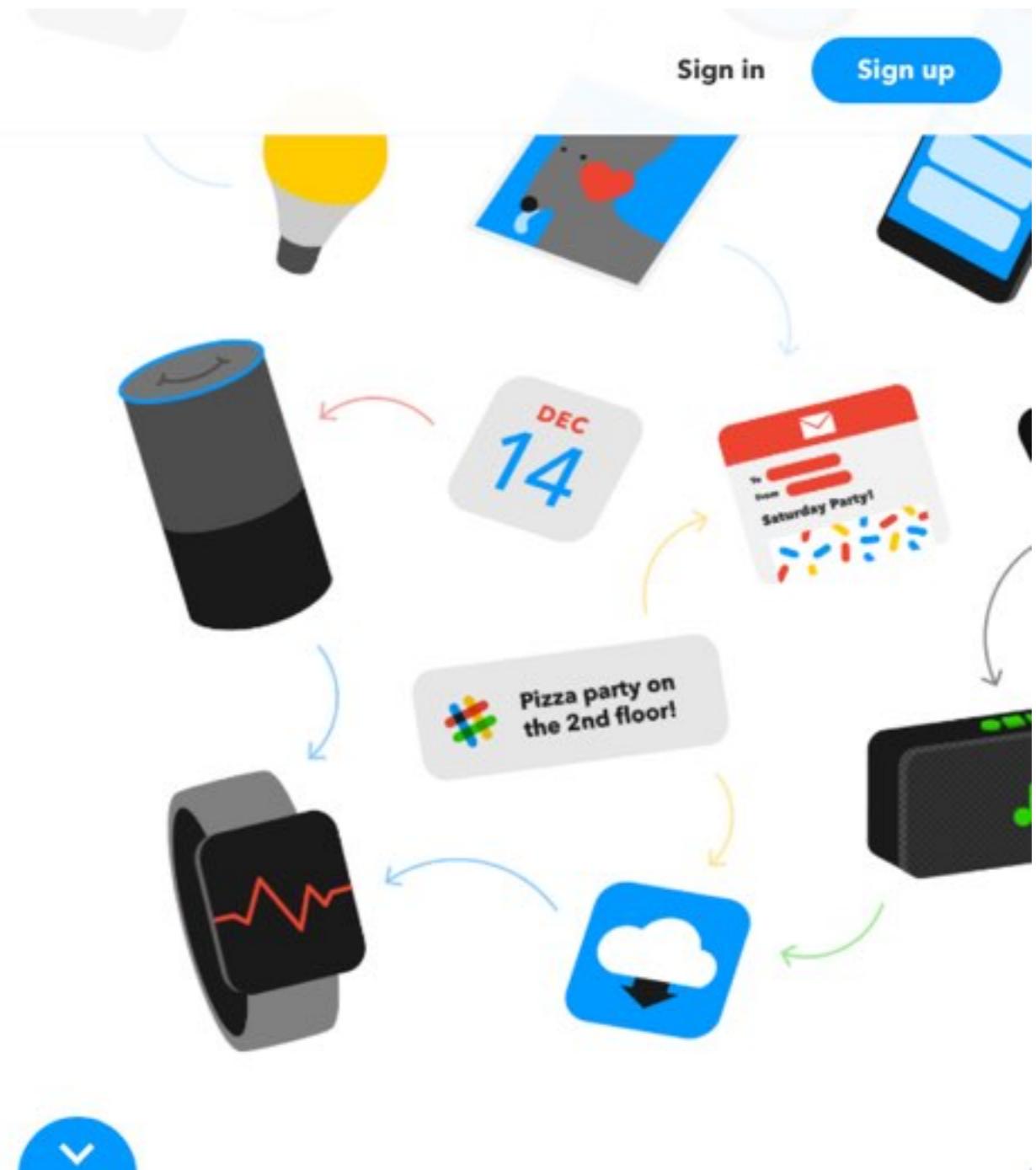
IFTTT

A world that works for you

IFTTT is the free way to get all your apps and devices talking to each other. Not everything on the internet plays nice, so we're on a mission to build a more connected world.

Enter your email Get started

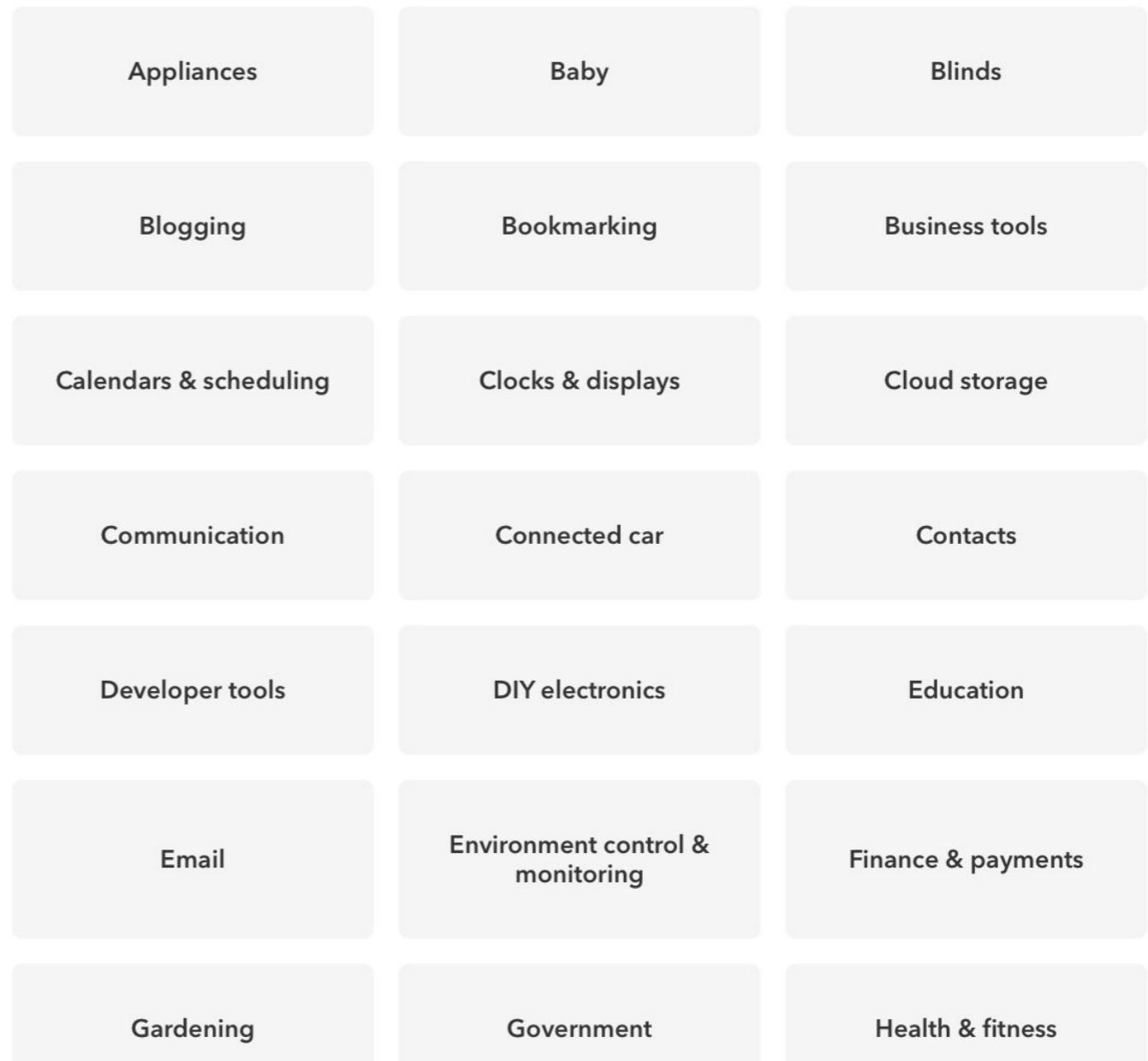
 Continue with Google  Continue with Facebook



IFTTT

If This Then That

Examples of the categories of things IFTTT can do. All this is community driven. All the time people are implementing new ways to get things to talk to together. IFTTT allows you to find and customize existing solutions in new ways, to help **you solve your** problems



IFTTT Use Case: eBay Search Notifications

Example: “I have an eBay search for some product. Send me an email when someone posts a new listing.”

Yes, there are many ways to do this besides IFTTT. I’m just using this as an example of a general “Notify me when...”



eBay via IFTTT

Inbox - BHerbertAZ Yesterday at 7:00 AM

E

Daily Digest: New item from search for "VCS100R" (1 item)

To: Brant Herbert,

Reply-To: Do not reply

TWO -Niles High Power Stereo Volume Control Model VCS100R >



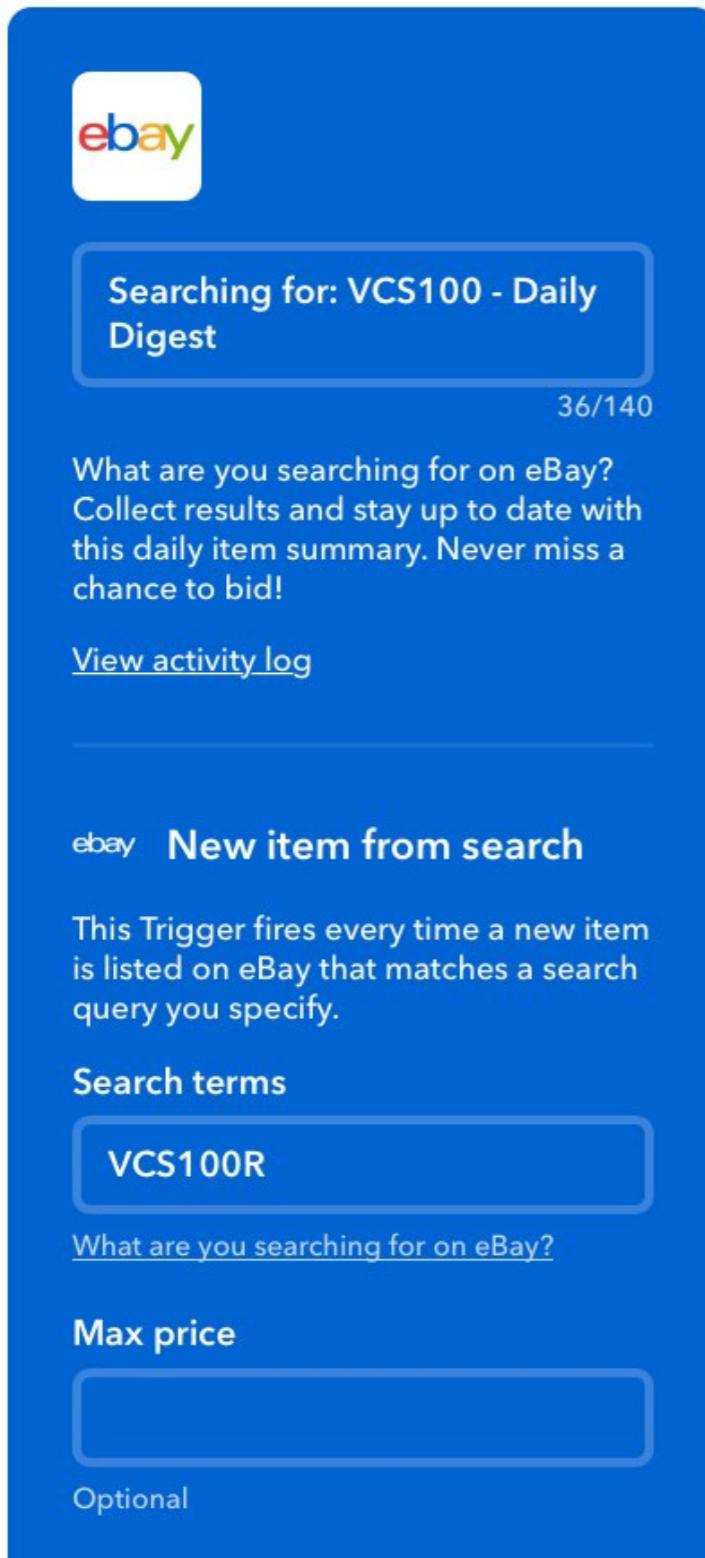
TWO -Niles High Power Stereo Volume Control Model VCS100R
ID: 162785758429

Auction price: \$20.00
Bid count:
Time left: 2d 23h

Buy it now: \$20.00

IFTTT Use Case: eBay Search Notifications

Configure



The screenshot shows an IFTTT recipe for "ebay New item from search". The trigger is set to search for "VCS100R" on eBay. The action is to add the item to a daily email digest at 7AM. The message template includes the item's title, ID, auction price, bid count, time left, buy it now price, listed at, and eBay URL.

Trigger:

- ebay New item from search
- Search terms: VCS100R
- What are you searching for on eBay?
- Max price: Optional

Action:

Add to daily email digest

Time of day: 7AM

Title: Title

Message (optional):

```

<br>
<br>
<b>Title</b><br>
ID: ID<br>
<br>
Auction price: AuctionPrice<br>
Bid count: BidCount<br>
Time left: TimeLeft<br>
<br>
Buy it now: BuyItNowPrice<br>
<br>
ListedAt<br>
via eBay URL
```



The screenshot shows the configuration for the "Add to daily email digest" action. It specifies the time of day as 7AM and the title as "Title". The message template is defined in the "Message (optional)" field.

Action:

Add to daily email digest

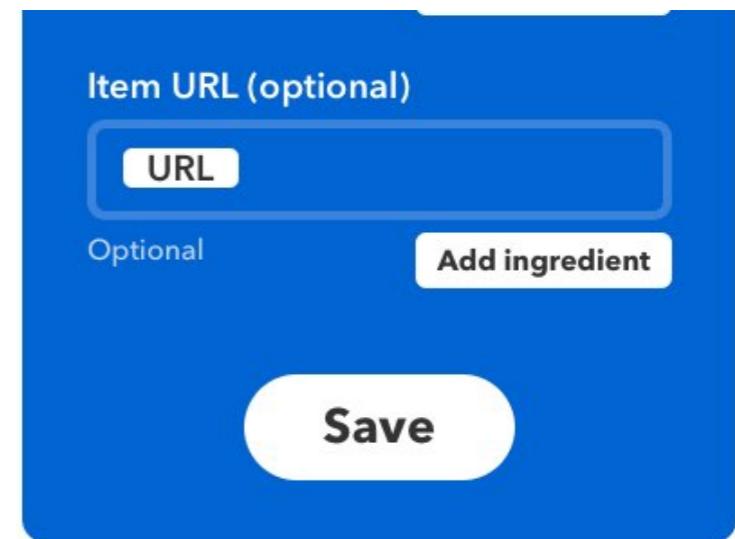
Time of day: 7AM

Title: Title

Message (optional):

```

<br>
<br>
<b>Title</b><br>
ID: ID<br>
<br>
Auction price: AuctionPrice<br>
Bid count: BidCount<br>
Time left: TimeLeft<br>
<br>
Buy it now: BuyItNowPrice<br>
<br>
ListedAt<br>
via eBay URL
```



The screenshot shows an optional step for adding an item URL. It includes a URL input field labeled "Item URL (optional)", a "Save" button, and an "Add ingredient" button.

Optional:

Item URL (optional)

URL

Add ingredient

Save

How it's done: There's a recipe that defines the default behavior. Just edit that recipe to your liking (like, giving it **your** email address) or customizing the message that gets sent.

IFTTT Use Case: Keep Google Voice # Active

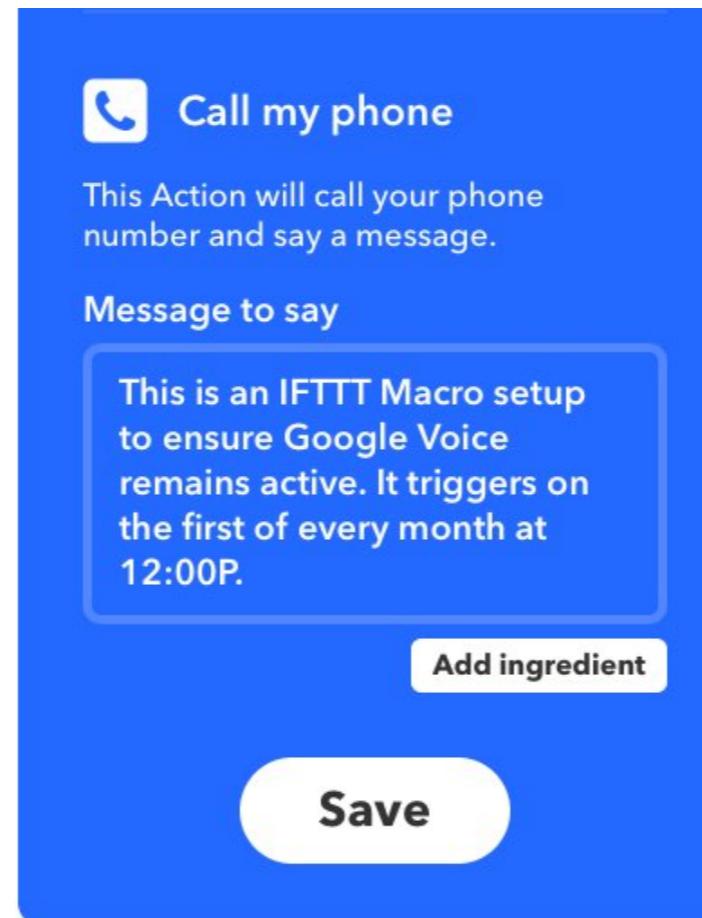
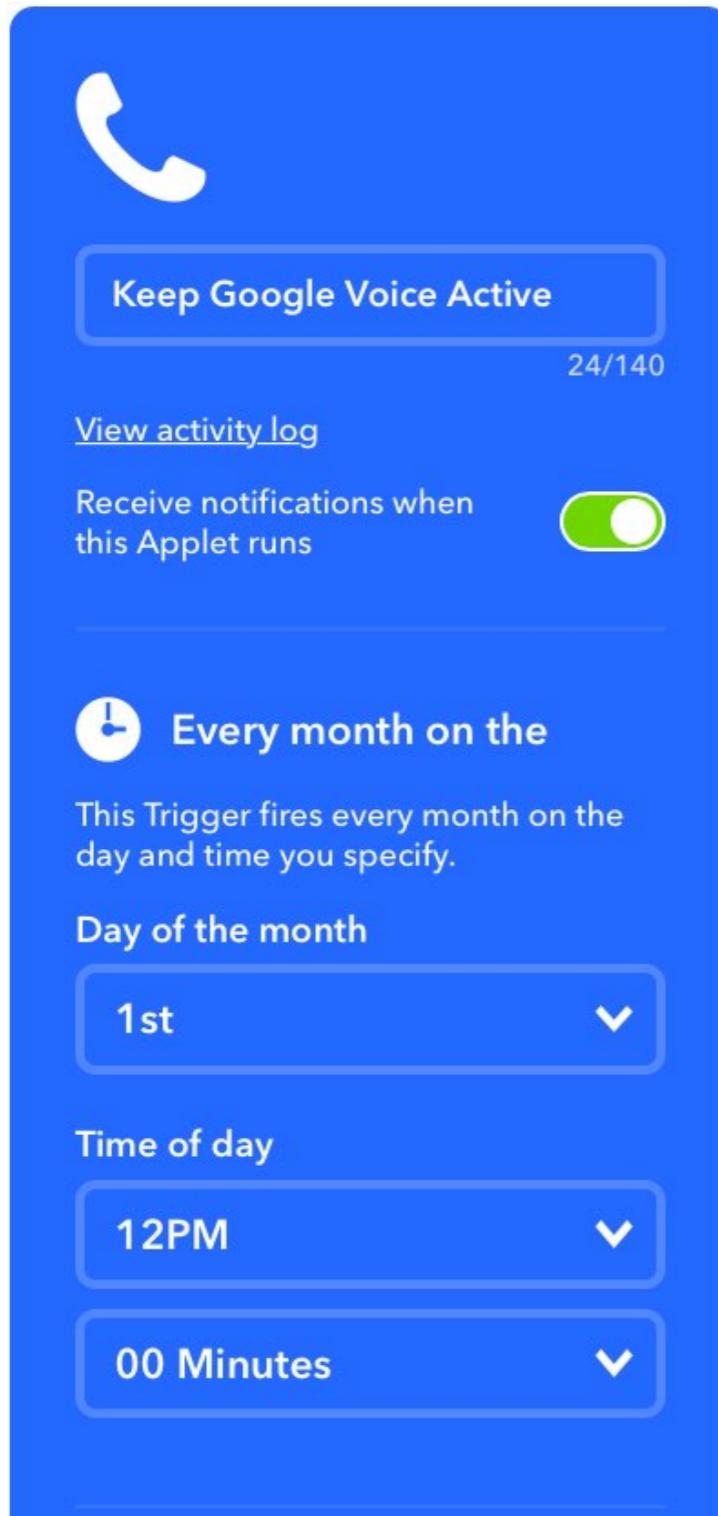
Example: “I have a Google Voice phone number that I use on my personal ‘business cards’ (so I don’t have to give my real phone number). Make sure my Google Voice number doesn’t get disabled if the number isn’t called in a while” (as Google will do).

This recipe will call my Google Voice number once a month so the number doesn’t “expire”.



<https://voice.google.com>

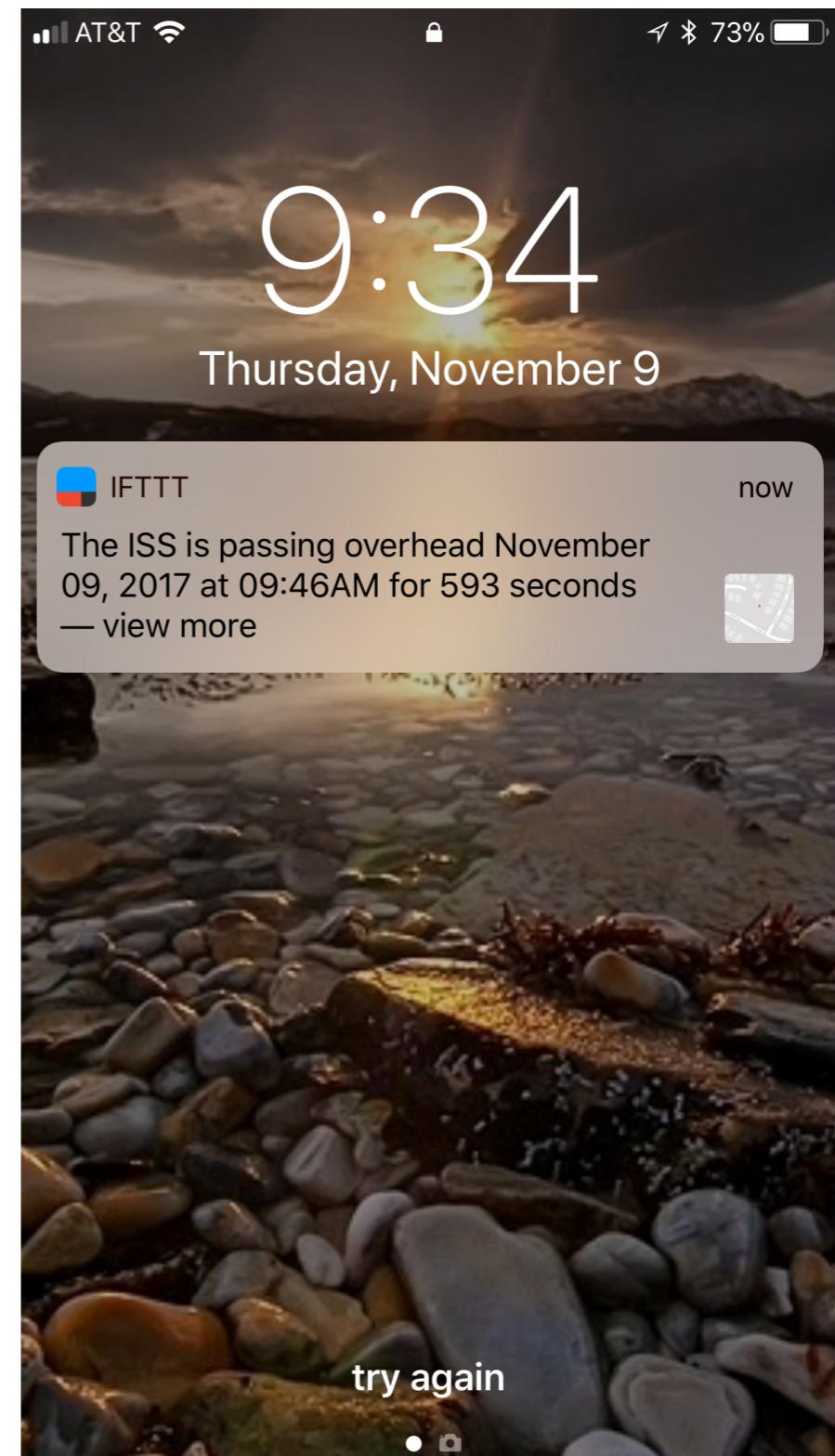
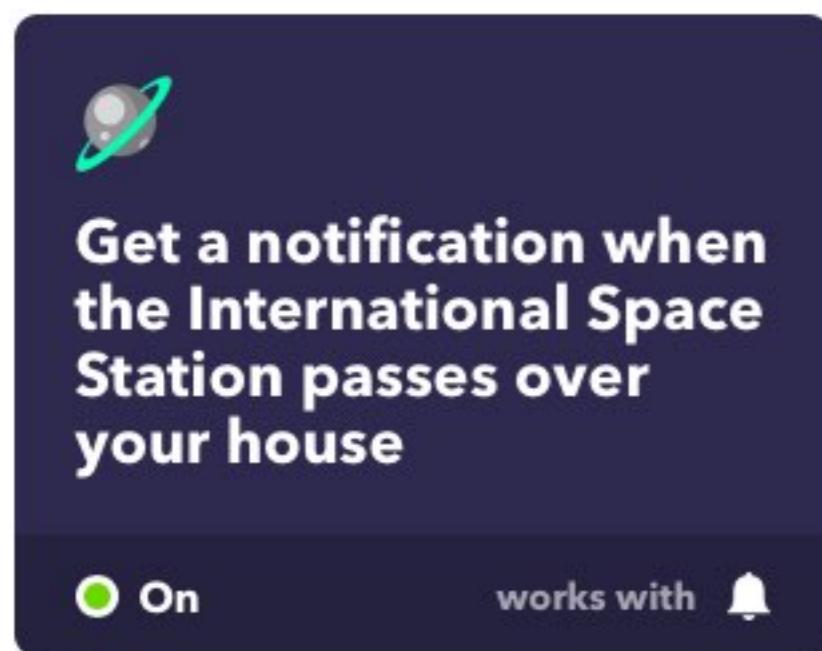
IFTTT Use Case: Keep Google Voice # Active



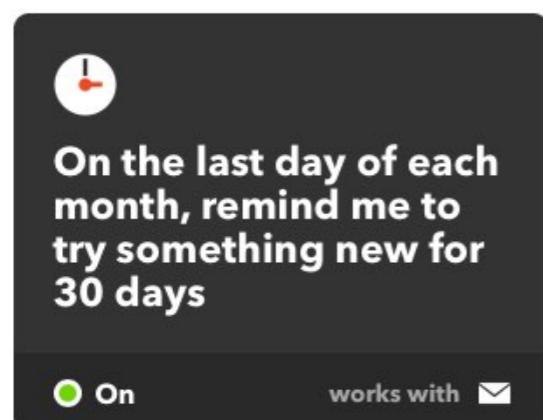
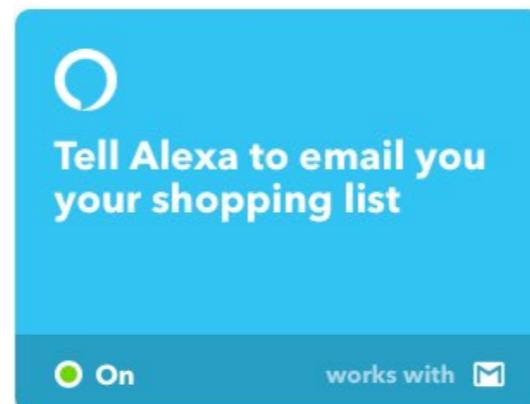
How it's done: I set the call schedule — “every month” — and give it the phone number it should call. The recipe does the rest.

IFTTT Use Case: International Space Station Overhead?

Example: “I like to sit on my patio at night and watch the stars. I wonder if I can see the International Space Station when it passes overhead?”



IFTTT Examples



Voice Assistive Technologies

Siri

Google

Amazon Alexa

There are other ways to get ideas into our “systems”
or to enable various kinds of automations.

Deeper Automations



Hazel

Automated Organization for Your Mac.

<https://www.noodlesoft.com>

Example: “*I want my Mac do to more of the mundane house-keeping tasks I’ve been doing manually*”

- MacOS has the notion of “folder actions”
- A kind of local IFTTT

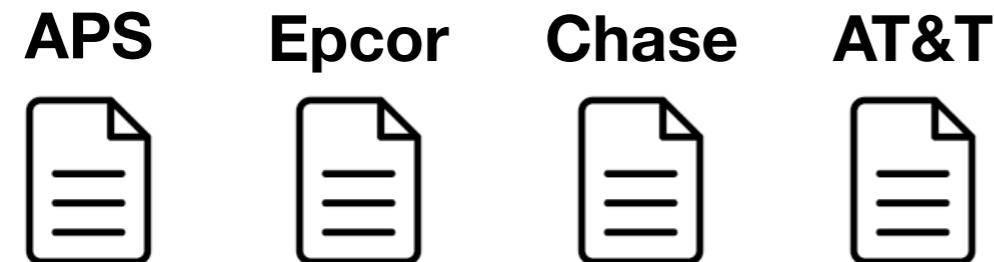
“*If the contents of a folder changes, do X*”

Note: there are similar apps available on Windows

Deeper Automations

Hazel Example

“When I download my monthly account statements, rename them and automatically file them”

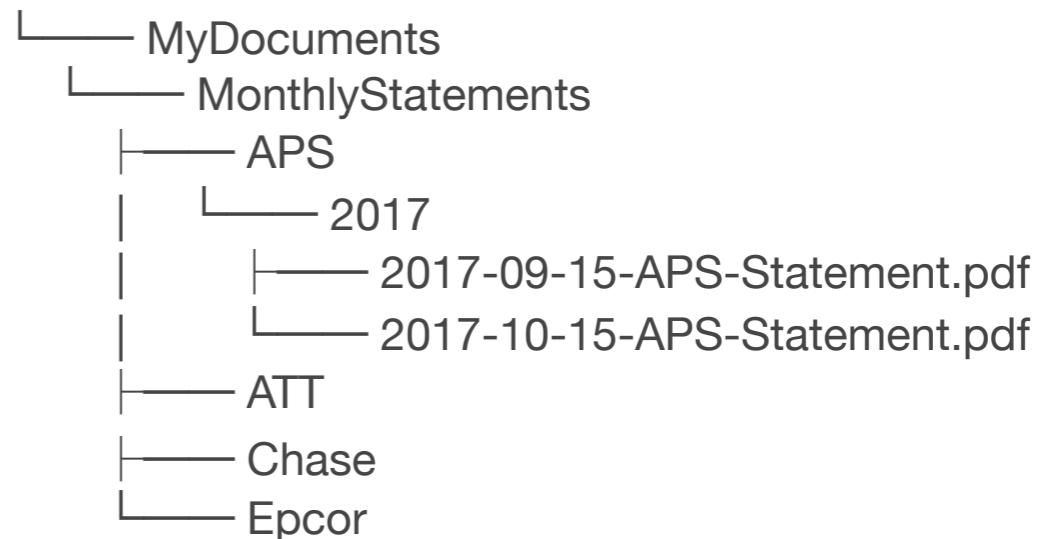
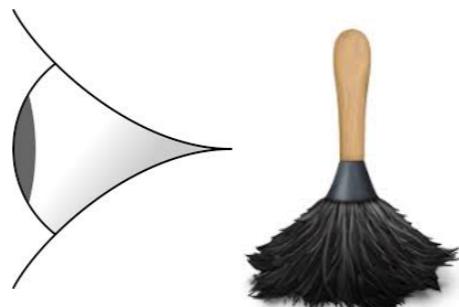


“Use self-describing naming conventions”
“Automate where/if possible”

monthly statement PDF

Hazel can look inside a PDF and extract information like statement date and account info, then can use that data to rename the downloaded file. Then, Hazel can move the result into the proper folder in my digital filing system.

\Downloads



Deeper Automations



Automator

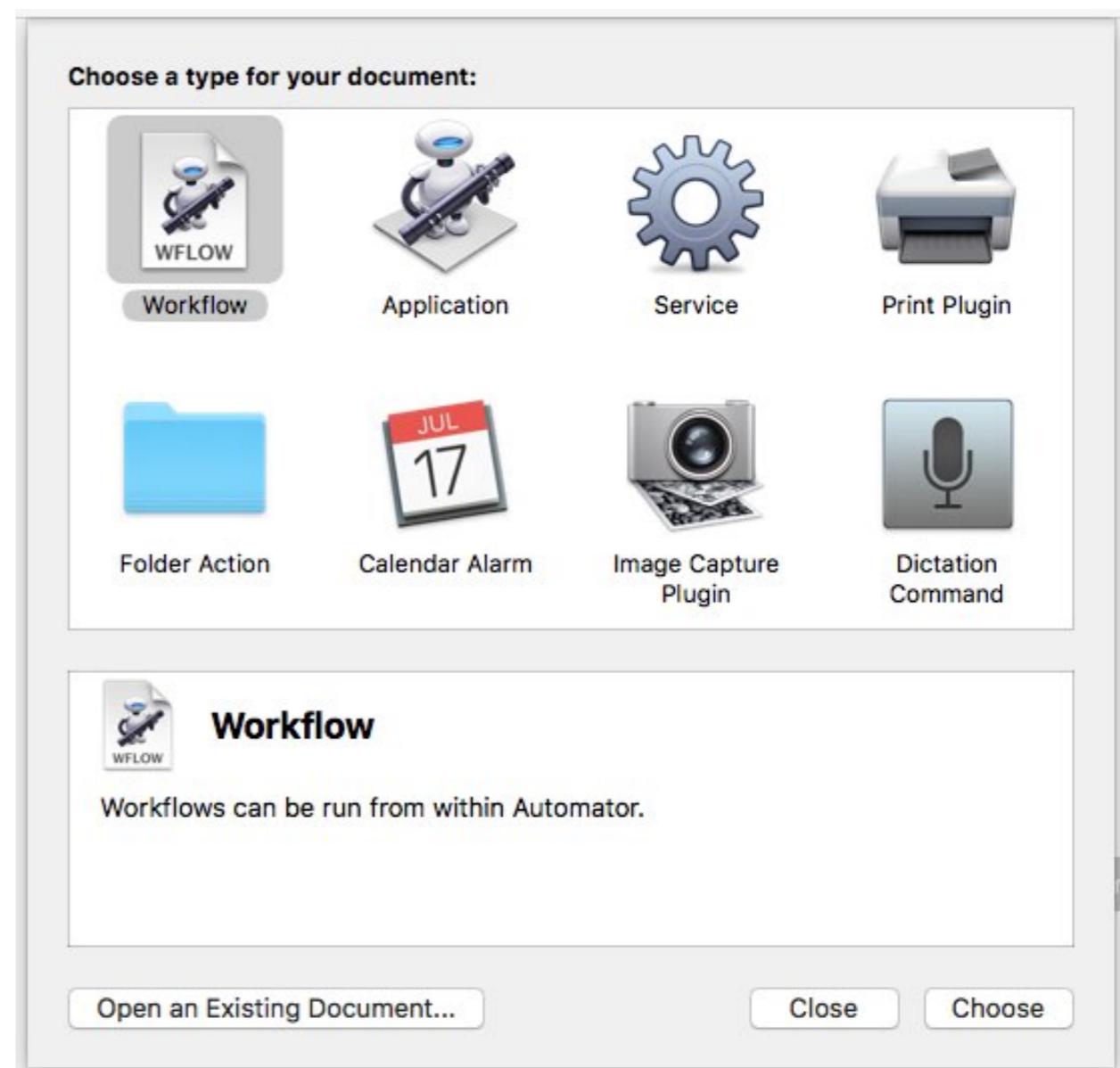
Your Personal Automation Assistant

<https://macosxautomation.com/automator/index.html>

Mac only

- Apps on MacOS are designed to be “scriptable”
- Users can create custom solutions to help improve their personal workflows
- Automator lets one create many types of new solutions or services

One app can talk to another app!



Ideas Capture

Where are your resources and your inspiration coming from?

How are you processing and turning that data into something useful?

Drinking from the Firehose

There is so much information available!

Some web apps that can help you manage what you read and what you do with that information.

Feedly – getting information to come to you

Pocket – filing away the useful bits so you can find it again

Feedly

Have the news come to you!



A reader for RSS - Real Simple Syndication

Two Models

- “Poll” — visit your favorite sites each day and scan for new articles
- “Push” — have your favorite sites send new articles to you directly

Features

- Feedly implements the Push model
- Is like getting custom magazines delivered to you daily
- You “subscribe” (free) to the “feed” of a website, and new content becomes available in Feedly as soon as new articles are published
- Feedly maintains “I’ve read it already” state on all articles
- Can read full articles in Feedly or quickly jump to the hosting website.
- Intuitive keyboard navigation => fast scanning and reading == better time utilization!

(RSS is the technology behind podcasts and music sites like iTunes)

Feedly

Welcome to Feedly

The content you need to accelerate your research, marketing, and sales

[GET STARTED FOR FREE](#)
[IMPORT OPML](#)

Subscriptions on the left.
Articles on the right

feedly.com

The screenshot shows the Feedly web interface. On the left, there's a sidebar titled "Home" with options like "Saved For Later", "Shared Collections" (marked as "NEW"), and "Add Content". Below these are sections for "All" (734 items), "Tech" (484 items), "Decoration" (15 items), "Food" (61 items), and "Competition" (2 items). Each section lists feeds with their names and counts. At the bottom of the sidebar, there's an email link "edwin@feedly.com via Google / Logout" and a "Team" button. The main area is titled "Home 50x faster polling (Team Edition)". It features a grid of article cards. The first card is about "Apple TV Gains Updated NFL Channel With Game Pass Integration". The second card is about "Tep Is An Adorable Fitness Tracking App That Works Like A Tamagotchi". The third card is about "Apple Seeds Eighth Beta of OS X El Capitan to Developers, Sixth Beta to Public Testers". The fourth card is about "Are you still using Apple Music?". The fifth card is about "Eatsa, A Futuristic Restaurant Where Robot Cubbies Serve Quinoa". Each card includes a thumbnail image, the article title, the source, and the author.

Feedly

What can Feedly do for you?

POWERFUL INTEGRATIONS

Put content to work



Organize

Let the web work for you by arranging the content you rely on into easy-to-read collections.



Read

Feedly offers a clean, minimalist reading experience optimized for productivity.



Search

Delve into the specific articles that interest you within your Feedly or within a specific publication.



Read Later

Save articles and easily get back to them. Tag with Feedly or use favorite web services like Evernote, Pocket, and Instapaper.



Share

Easily share articles to Facebook, Twitter, LinkedIn, Pinterest, email, and more. Schedule posts with Hootsuite or Buffer.



Discover

Discover fresh, authoritative voices on niche and broad topics alike. Channel the mainstream or pull from the diamonds in the rough.

Numbers indicate unread articles

Articles showing in “card view” give quick synopsis: *Is this something I want to read?*

Unpin

- Today
- Read later
- Filters
- Feedly Pro

FEEDS

- All 1K+
- Favorites 2
- > Local
- > Maker 779
- > Future 537
 - X Blog of the Long Now 1
 - E ExtremeTechExtreme ... 8
 - F Futurism 441
 - K KurzweilAI 22
 - K KurzweilAI » News 15
 - S Singularity Hub 50
 - 5 more feeds
- > IoT 157
- > Productivity 885
 - B BrettTerpstra.com 1
 - D Devonian Times 1
 - Exploring The Black Box 1
 - G Getting Things Done®... 1
 - J Joe Buhlig 1
 - l lifehack.orgx 151
 - L Lifehacker 723
 - M Mac Power Users 1
 - O OmniFocus - Google ... 2
 - U Unclutterer 2
 - Using OmniFocus 1
 - 5 more feeds
- > Technology 1K+
- > Robotics 79

KurzweilAI

6K followers / 5 articles per week / #tech #science #ai

LATEST

QUANTUM SPY A THRILLER DAVID

The Quantum Spy: A Thriller
31 2d

From the best-selling author of The Director and Body of Lies comes a thrilling tale of global espionage, state-of-the-art

Using light instead of electrons promises faster, smaller, more-efficient computers and smartphones
82 2d

Trapped light for optical computation (credit: Imperial College London) By forcing light to go through a smaller gap than ever

Dawn of the New Everything: Encounters with Reality and Virtual Reality
13 6d

The father of virtual reality explains its dazzling possibilities by reflecting on his own lifelong relationship with technology

show I Ray Kurzweil featured on Dream Big Podcast
7 8d

show: Dream Big Podcast | link episode title: Inventor Ray Kurzweil gazes into the future | link episode: no. 59 date: November 20,

aser stimulus (challenge)
y

Optical res

New nanomaterial, quantum encryption system could be ultimate defenses against hackers
57 4d

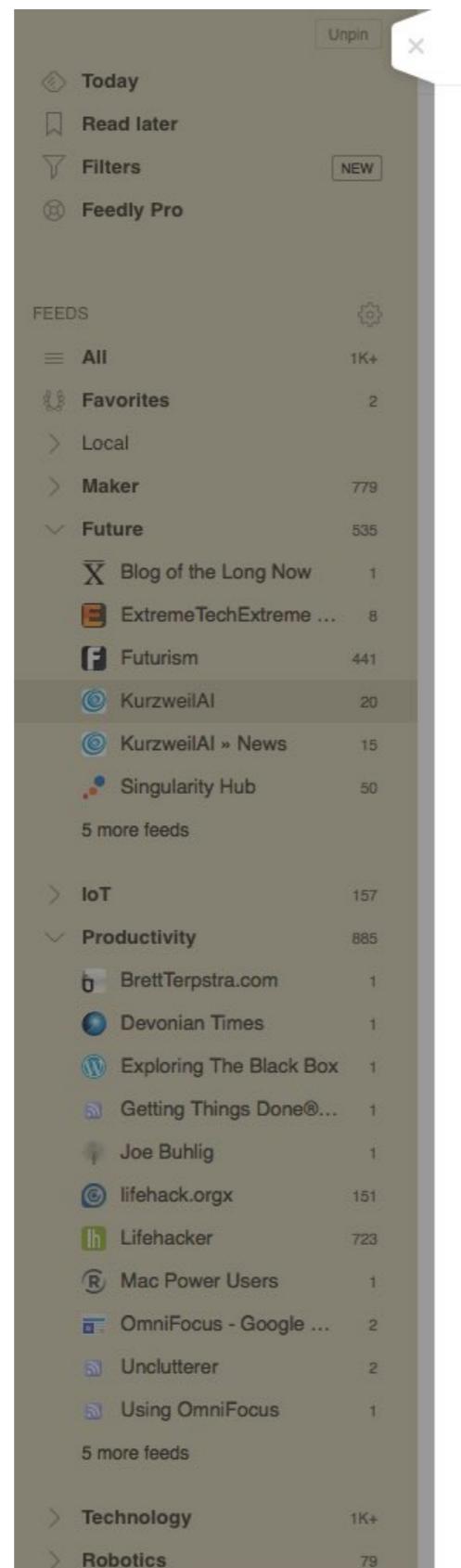
New physically unclonable nanomaterial (credit: Abdullah Alharbi et al./ACS Nano) Recent advances in quantum computers

Space dust may transport life between worlds
300+ 8d

Imagine what this amazingly resilient microscopic (0.2 to 0.7 millimeter) milnesium tardigradum animal could evolve

Feedly

Internal reader shows article in-full. Easy to jump to the original site to read it in original context.

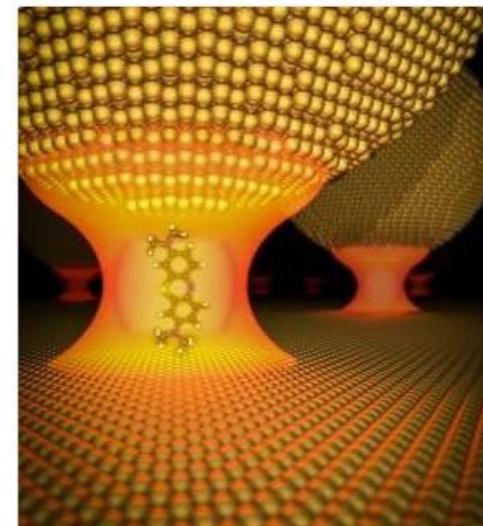


Using light instead of electrons promises faster, smaller, more-efficient computers and smartphones

82 KurzweilAI 2d // keep unread // hide

NOTES

Add note



Trapped light for optical computation (credit: Imperial College London)

By forcing light to go through a smaller gap than ever before, a research team at [Imperial College London](#) has taken a step toward computers based on light instead of electrons.

Light would be preferable for computing because it can carry much-higher-density information, it's much faster, and more efficient (generates little to no heat). But light beams don't easily interact with one other. So information on high-speed fiber-optic cables (provided by your cable TV company, for example) currently has to be converted (via a modem or other device) into slower signals (electrons on wires or wireless signals) to allow

Feedly

Reading a “topic”

 Sources  Keyword alerts

What sources do you want to follow?

 Search by title, URL, or #topic

English 

Topic-based reading finds articles sharing a common theme (topic) across all your feeds.

Discover new things!

EXPLORE THE WEB

#programming

Featuring
Android Developers Blog

#cryptocurrency

 Featuring
CoinDesk

#ruby

 Featuring
Riding Rails

#politics

 Featuring
The Intercept

#future

 Featuring
Singularity Hub

#nyt

 Featuring
NYT > Science

#tech

 Featuring
The Verge

#science

 Featuring
TED Talks Daily (SD)

#environment

Featuring
INHABITAT

#fivethirtyeight

 Featuring
Sports - FiveThirtyEight

#productivity

 Featuring
Lifehack

#design

 Featuring
Dezeen

#huffington post

 Featuring
The Huffington Post

#wsj

 Featuring
WSJ.com: WSJD

#travel

 Featuring
The Points Guy

#apple

 Featuring
Mac Life

Capture

Feedly Into the InBox

Buttons along top provide quick access to outside services.

E.g. Find an article you want to keep? Drop it into Pocket!

The screenshot shows the Feedly mobile application. On the left is a sidebar with navigation links: Today, Read later, Filters, and Feedly Pro. Below these are sections for FEEDS: All (1K+), Favorites (2), Local, Maker (779), Future (534), IoT (157), Productivity (885), Technology (1K+), and a Technology section with 5 more feeds. The main content area displays an article titled "Music, Time and Long-Term Thinking: Brian Eno Expands the Vocabulary of Human Feeling" by Ahmed Kabil. The article has 1 unread notification. Below the title is a "NOTES" section with a button to "Add note". The main image of the article is a painting of Brian Eno's face surrounded by many smaller versions of his face, with the word "ENO" at the bottom. At the bottom of the screen, there is a footer with the text: "Brian Eno's creative activities defy categorization. Widely known as a musician and producer, Eno has expanded the frontiers of audio and visual art for decades, and posited".

Music, Time and Long-Term Thinking: Brian Eno Expands the Vocabulary of Human Feeling

1 Blog of the Long Now by Ahmed Kabil / 1h // keep unread // hide

NOTES

Add note

Brian Eno's creative activities defy categorization. Widely known as a musician and producer, Eno has expanded the frontiers of audio and visual art for decades, and posited

Pocket

An InBox for Web Resources

Bookmarks on Steroids

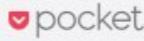
“I found a cool picture on a website last week. Where was that again?”

“Someday I want to build/learn X. Here’s an idea that will be useful later...”

getpocket.com

Pocket

Pocket is a digital filing cabinet for web pages you want to save and organize. More powerful than just “Save Bookmark” in your browser.

 pocket

Home Recommended Explore >    bherbertaz 

My List 

Favorites

Archive

Articles

Videos

Images

Tags >

My List

Head'n Home Handmade Hats

Welcome! You've found Head'n Home, makers of exceptional artisan hats. We deliver everything you expect in premium leather products - unsurpassed quality in construction and materials with a personal touch only available in handmade works.

 headnhome.com

IP65 Junction Box Terminal Connection Waterproof Enclosure Adaptable



 banggood.com

The North Face Dolomite Double 20 Sleeping Bag

We stand behind everything we sell. If you are not satisfied with your REI purchase, you can return it for a replacement or refund within one year of purchase. REI's guarantee doesn't cover ordinary wear and tear or damage caused by improper use or accidents.

 rei.com

wix SPONSORED



Here's How to Create a Killer Photography Website

wix.com

 Save 

10pcs DIY Plastic Project Housing Electronic Junction Case Power Supply Box



 banggood.com

3D Printing



 seedstudio.com

Tested: Hiker Trailer, the World's Most Affordable Teardrop Trailer



 outsideonline.com

With MESH, anything can become a smart device!

MESH Tags have variety of functions including motion sensor/LED/button/brightness sensor and many more. They are connected to the MESH App wirelessly and their compact shapes enable them to be easily attached or built into something. Unleash your creativity by combining them together!

 meshprj.com

WiFi Mesh Synchronized LED Bars

Each of the LED bars is running the same code. The basis of this project is the painlessMesh Library at <https://gitlab.com/BlackEdder/painlessMesh>. That library handles most of the low level work of establishing Access Points, Web Servers etc. Each bar is a mesh node.

 instructables.com

Careers at Pocket  Become a Sponsor

Pocket

Cross-referencing using Tags

In Pocket, saved links can be cross-referenced with your own taxonomy (organizational “language”). You can do that at time of link-capture, or you can come back later and add “tags” to links from your saved list.

The screenshot shows a list of five saved items in the Pocket app:

- Here's How to Create a Killer Photography Website** (wix.com) - Tags: wix, SPONSORED, Save, ...
Tags shown: box, diy, enclosures, project
- 10pcs DIY Plastic Project Housing Electronic Junction Case Po...** (banggood.com) - Tags: box, diy, enclosures, project
Tags shown: box, diy, enclosures, project
- 3D Printing** (seeedstudio.com) - Tags: 3dprint, pcb, seeed, service
- Tested: Hiker Trailer, the World's Most Affordable Teardrop Trai...** (outsideonline.com) - Tags: teardrop
- With MESH, anything can become a smart device!** (meshprj.com) - Tags: iot, mesh
- WiFi Mesh Synchronized LED Bars** (instructables.com) - Tags: esp8266, headspace, leds, mesh, ws2812
Tags shown: esp8266, headspace, leds, mesh, ws2812

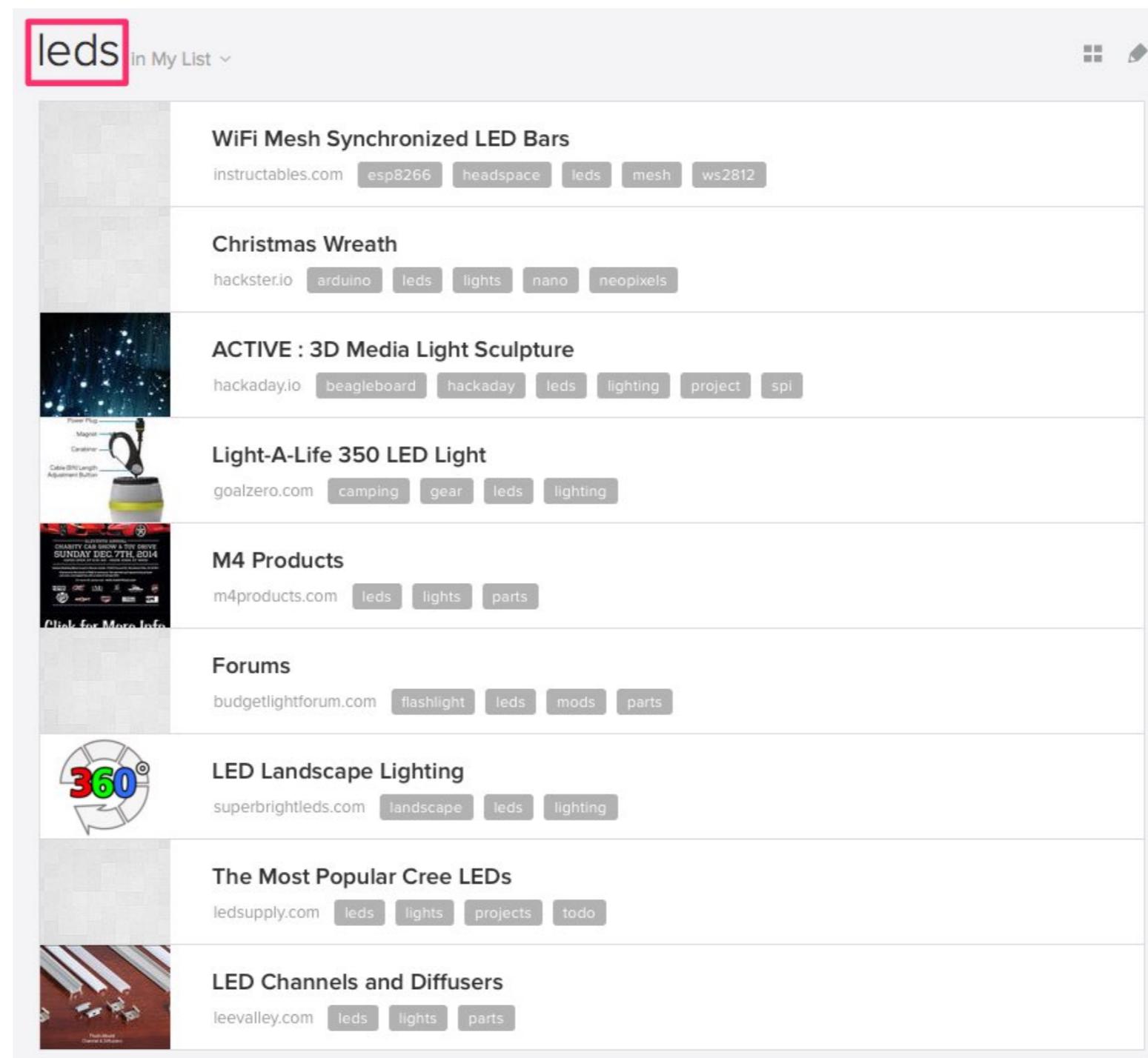
Pocket

Bookmarks tagged: leds

“How might I have filed that information?”
Search via tags used at time of capture

“Make things self-describing”

Here, I have a project involving some LED lighting. I've saved several web pages in Pocket, and those saved links all have the tag “leds”. So by searching Pocket for that tag, I see all my saved pages, and when I engage with that project, all the resources I found previously — while doing something else — become available to me to review and use.



Smart Folders

Many apps have the notion of “Smart” collections (of whatever items they are managing)

E.g. your Mail app might have “Smart Folders”. A Smart Folder is a “virtual folder” whose content shows whatever email messages (stored in **other** folders) match some criteria, or “rules”. The rules can be quite complicated, and can be programmed to return things like:

“Show me all emails from Pete that I haven’t read that pertain to Project X that also CC:’d Sally”

Smart Folders are an automation “hack”. They assist in what might be a routine, manual process, and make the information more meaningful.

Journal Apps

Maintaining Project State

Write it down!

- Managing the state of incomplete projects or work sessions
- Being able to come back to previous work and pickup where you left off
- Minimizing the need to rethink things or remember details

Breadcrumbs

The notion of capturing enough information along the way to allow yourself to re-establish a **lost context** when switching to a new task.

Very often a project will be interrupted before it is completed (that's likely the norm). And when that happens, any "context" we have established, in our head, will get dumped to make room for "reloading" the context of the next project we undertake. And that "context switch" is costly, so anything we can do to make it easier to pickup again on this project — the one we are moving away from — can be time well spent.

"Bread-crumbing" creates a kind of "cheatsheet", or recipe, captured while working on this project, to help you to get your future head back to your current state again when you come back to the project later.

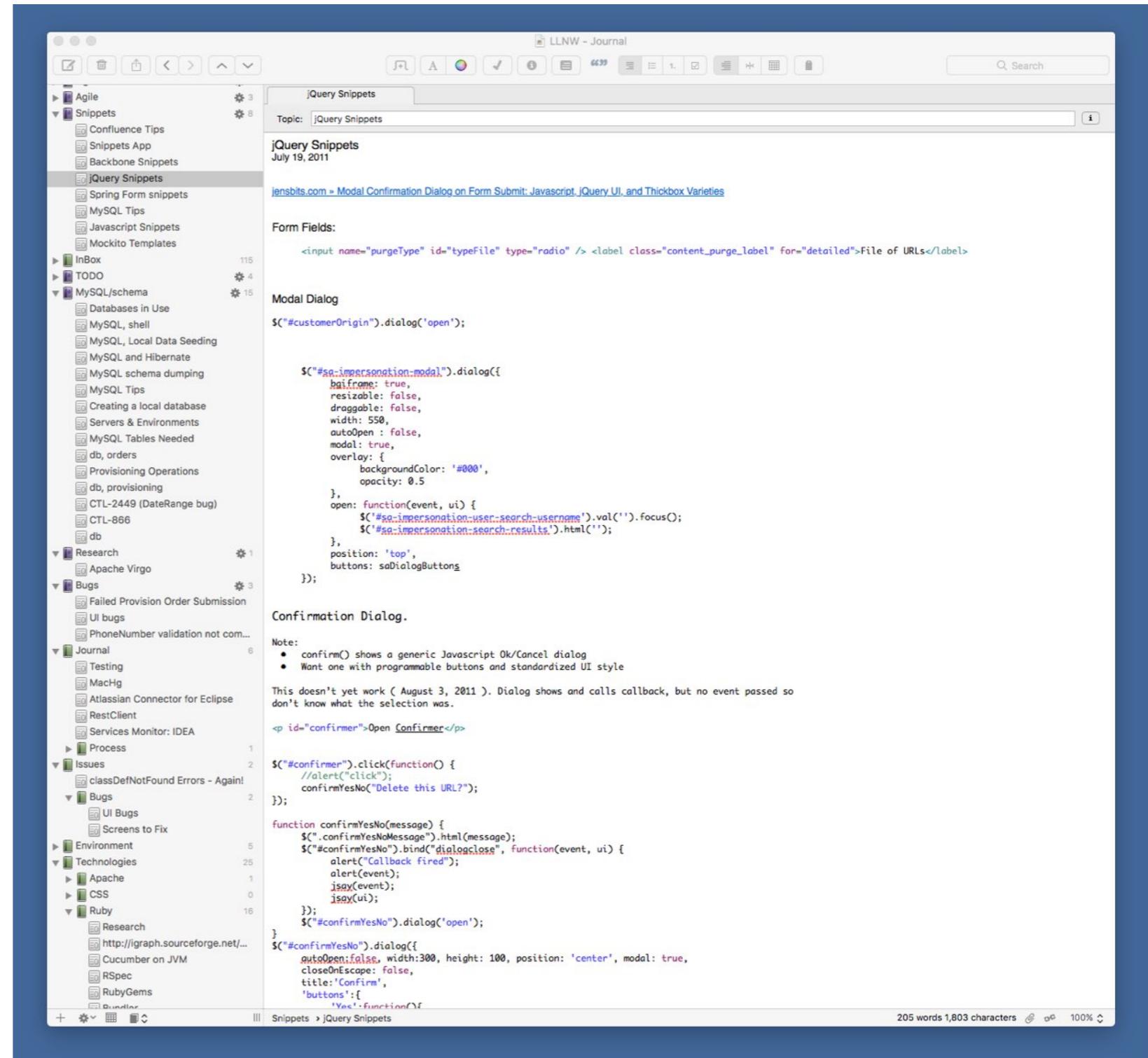
For me, project breadcrumbs exist in my journal entries.

Capture

An engineering journal

In both my personal and work lives I've employed a "journaling app" as the place where scraps of ideas and notes and pictures and any other kinds of "supplement information" related to projects I'm working on gets dumped. It's where I capture the state of projects, where I flesh out the details of projects, of my research, of "what worked" and what didn't. It's a searchable database that is a crucial component to my ability to remember details on a multitude of projects. It helps on all fronts to:

- 1) **capture my state** — I capture both the initial reason for why a project exists, and it's evolution toward a solution.
- 2) **not repeat myself** — I can look up (quickly search for) something I did in the past and not be forced into thinking through the details a second time.



Capture my thoughts, things I've tried,
"breadcrumbs" into the state of unfinished projects, ...
<http://marinersoftware.com/products/macjournal/>

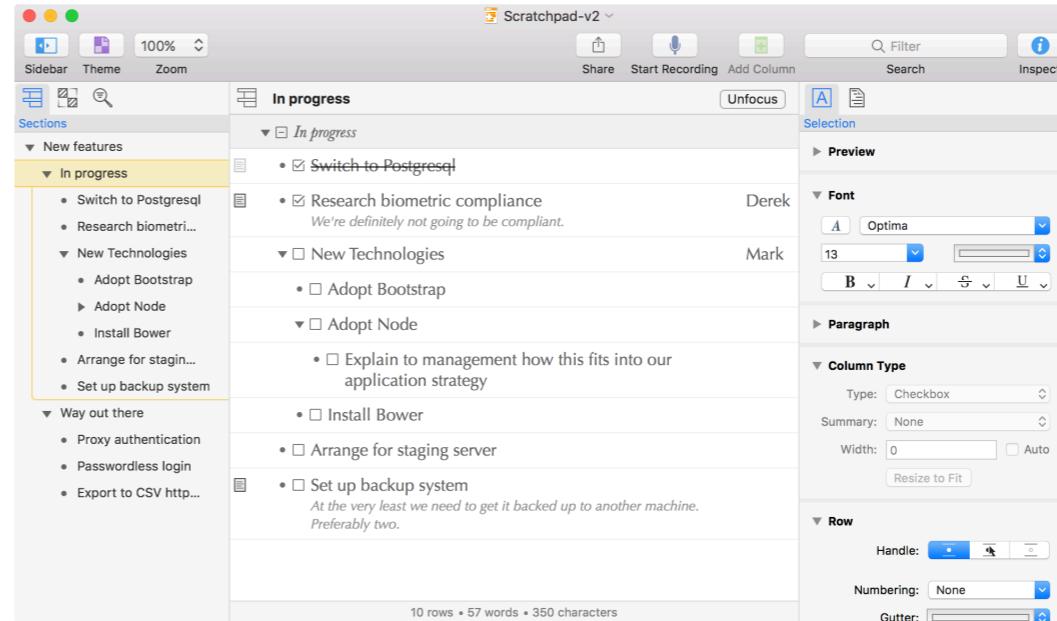
Other Apps Used

Other thinking and organizing tools I use

OmniOutliner

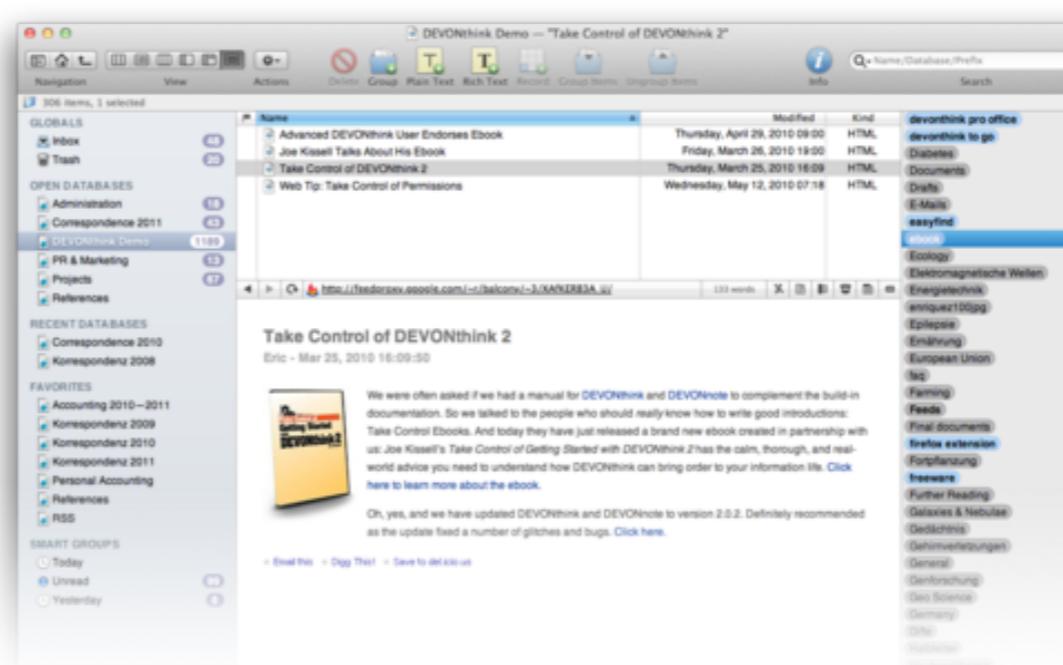
<https://www.omnigroup.com/omnioutliner>

Edit the structure, not the look!
I think in outlines. In breakdowns.



DEVONthink

Digital filing cabinet
with AI technology.
I have gone “paperless”



<http://www.devontechnologies.com/products/devonthink/devonthink-pro-office.html>

