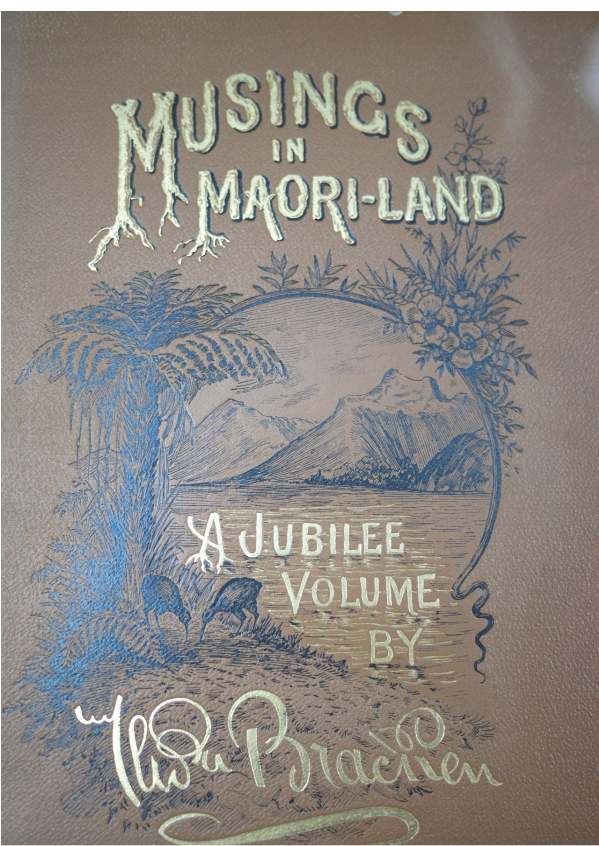
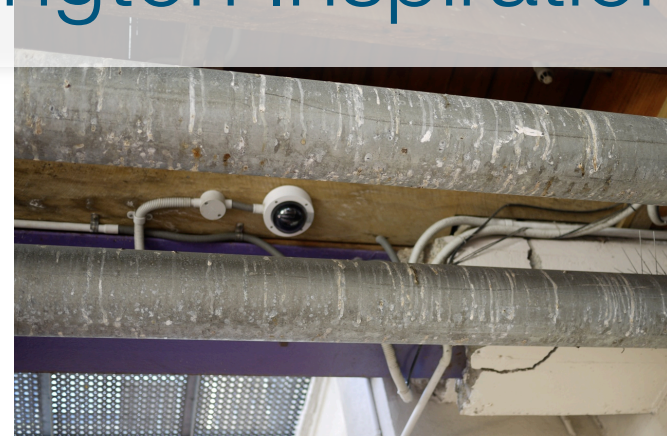
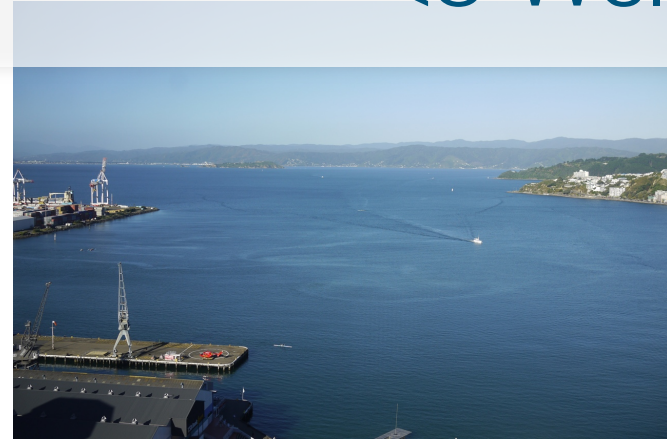


Workbook Greer Mitchell





<3 Wellington Inspiration Photos



Oliver Byrne 1847
 Euclid's Geometry
 "The first six books of the elements of Euclid in which coloured diagrams & symbols are used instead of letters for the greater ease of learners"

Kandinsky (1826)
 "Paint of line to plane"
 - about colour & geometric shapes.
 "Concerning the Spiritual in Art" 1912

Colour!
 "Cartographic Relief Presentation" by Edward Imhof
 - describes design practices of swiss maps.

Paul Note
 "To p
 this
 right
 right
 Tje-6

day shirky TedTalks
 "what matters isn't technological capital, its social capital"
 re: citizen reporting on voter suppression @ booths
 upload 2 site - Nigeria had the idea bt USA 2007

Trust pictures more than people
 P173
 Bk Left 2 Right by David Crow

Rudolf Arnheim
 "Art & Visual Perception"
 → significant advancement of the psychology of aesthetics.
 * Most imp writer of 20th to apply Gestalt psychology to the arts

Colour
 - to label (colour as noun)
 - to measure (colour as quantity)
 - to represent or imitate reality (colour as representation)
 - to enliven or decorate (colour as beauty)
 P81 Tute - Envisaging Info

rise awareness of enviro issues & INSPIRE ACTION

"The purpose of a serious essay, movie, or piece of art is to educate & inform, not to amuse"
 P96 Emotional Design
 Don Norman

Make the Inside visible
 eg devices that show you how much power house uses etc
 makes peeps more AWARE!

Post-it Idea Wall

Types of Navigation
 - Step
 - Paging
 - Breadcrumb Trail
 - Tree
 - Site Maps
 - Directories
 - Tag Clouds
 - A-Z indexes

Vertical Menu
 Dynamic Menus
 Drop Down Menus

Designing Web Navigation
 by James Kalbach

Web Navigation
 Four Categories of Site Maps
 1. The overall structure
 2. Hierarchical structure
 3. Flowchart structure
 4. Process or Content structure

Semiotics & Globalisation
 research has found that, as branches grow & become more international their logos became more symbolic & less iconic. The iconicity & symbolism of a sign depends on the cultural convention and on that ground in relation to each other.

Quote
 "Pessimism is a luxury of good times... In difficult times, pessimism is a self fulfilling, self-inflicted death sentence"
 Social Scientist
 Norwegian - Evelyn Lindner

Practical Application
 bks - "Designing the Moment"
 - Designing the Obvious
 by Robert Heekman

skill level of users
 Robert Heekman
 bk Designing the Obvious - P110
 largest group is "immediate users" - but design for future intermediate users
 less time spend = better app

Nav
 = info

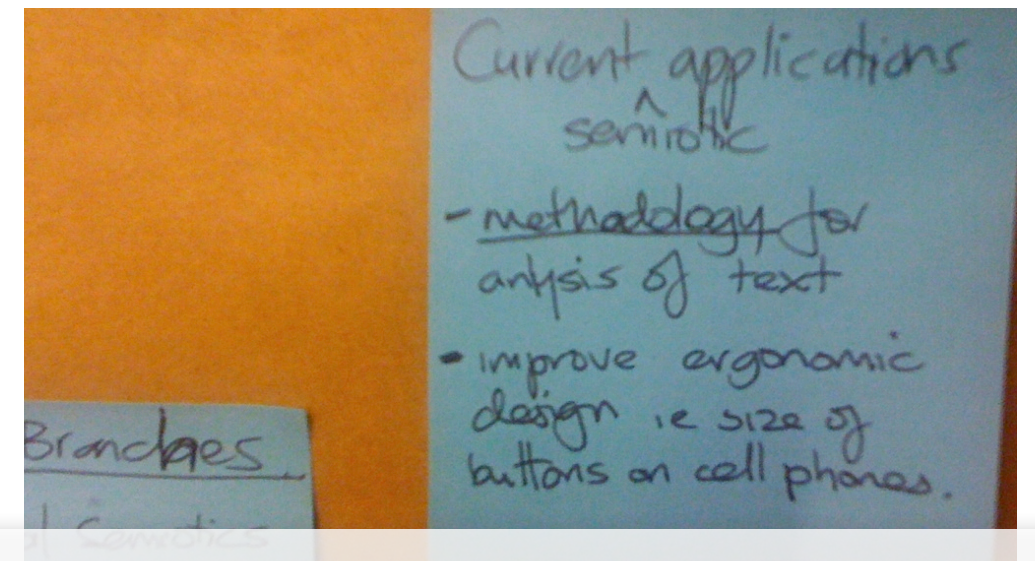
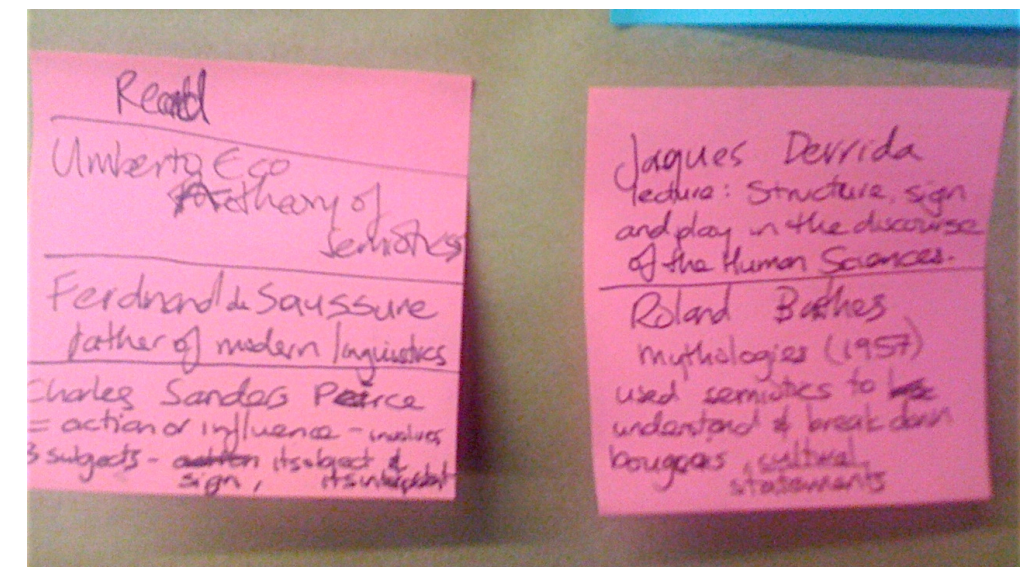
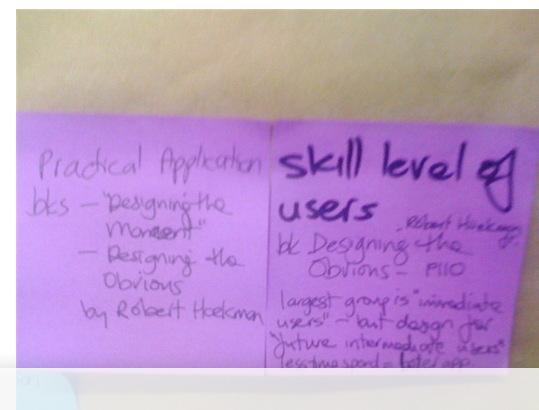
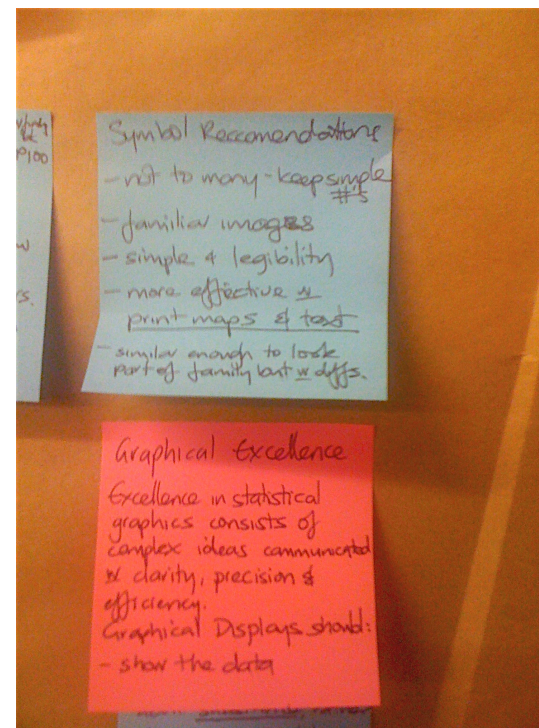
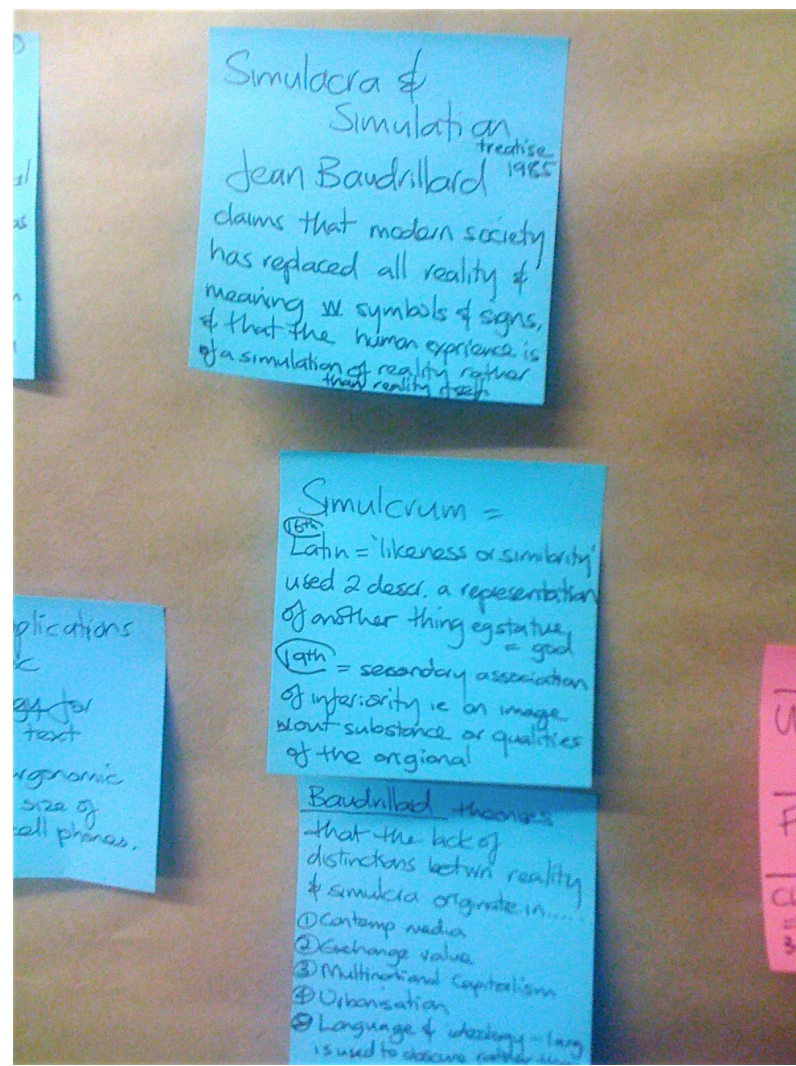
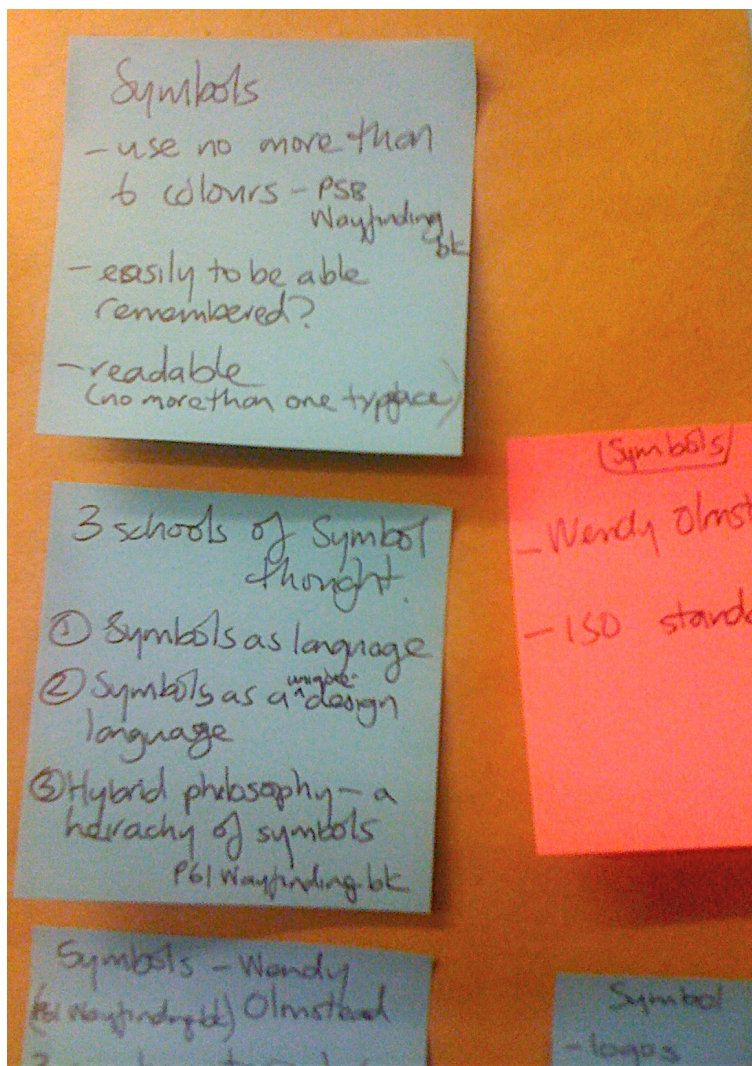
Infographics Intro
 - visualise the day 2 day activities & quick assimilation of hopefully instigate positive green change/achieve

"Earth Witness"
 (Jason Cascio Ideas)
 use mobile to interact report on the earth's largest inf

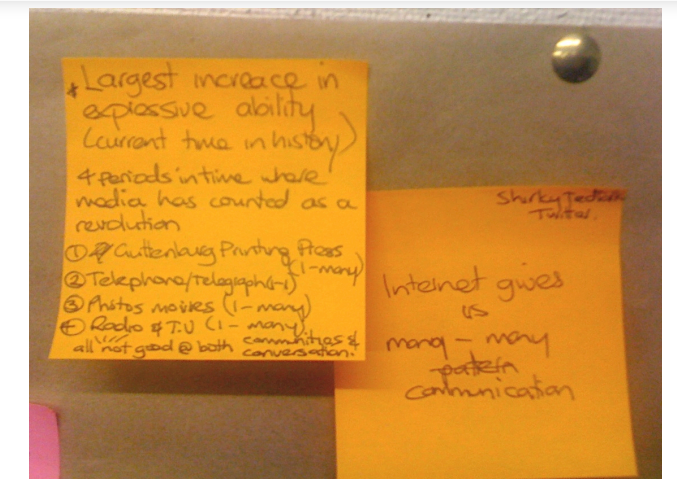
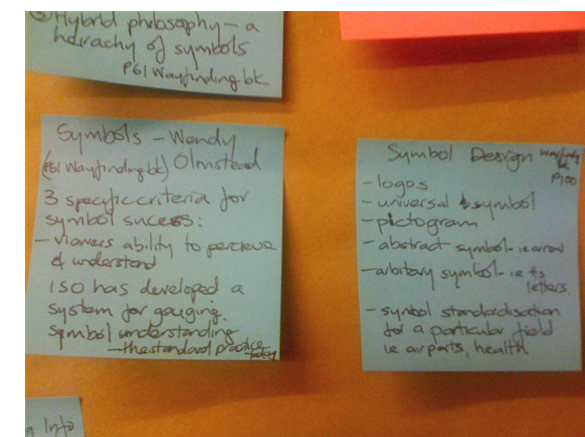
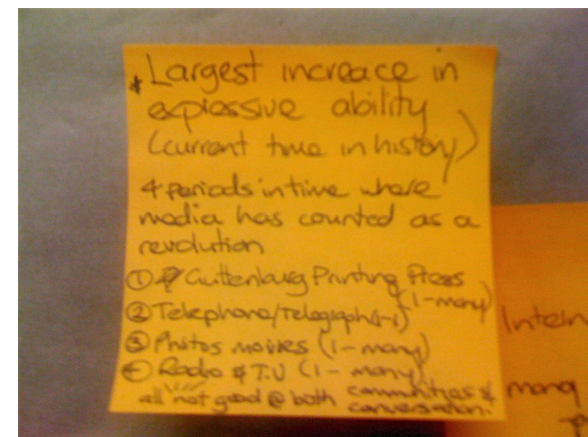
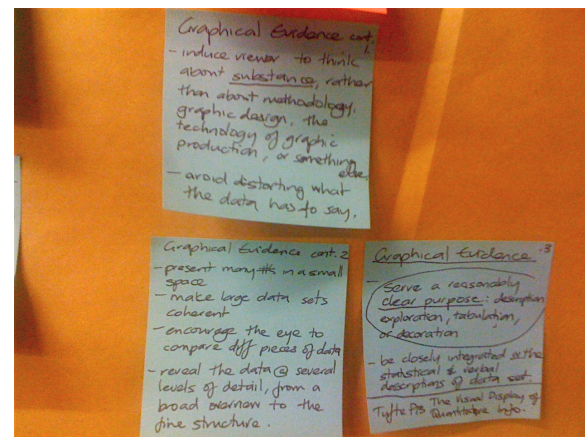
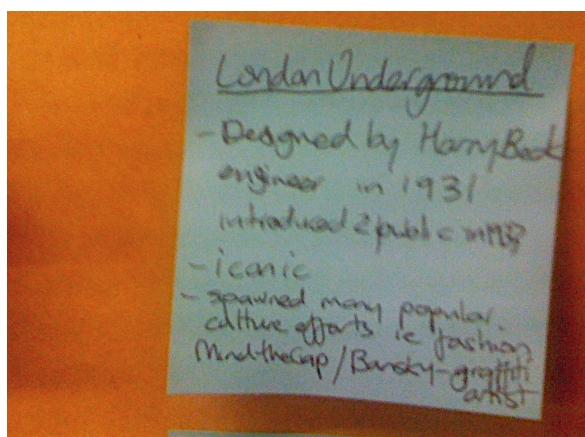
Jamie Cascio
 co-founded Worldchanging
 global future strategist
 jalcaw@institute.earthis.com
 and emerging technologies

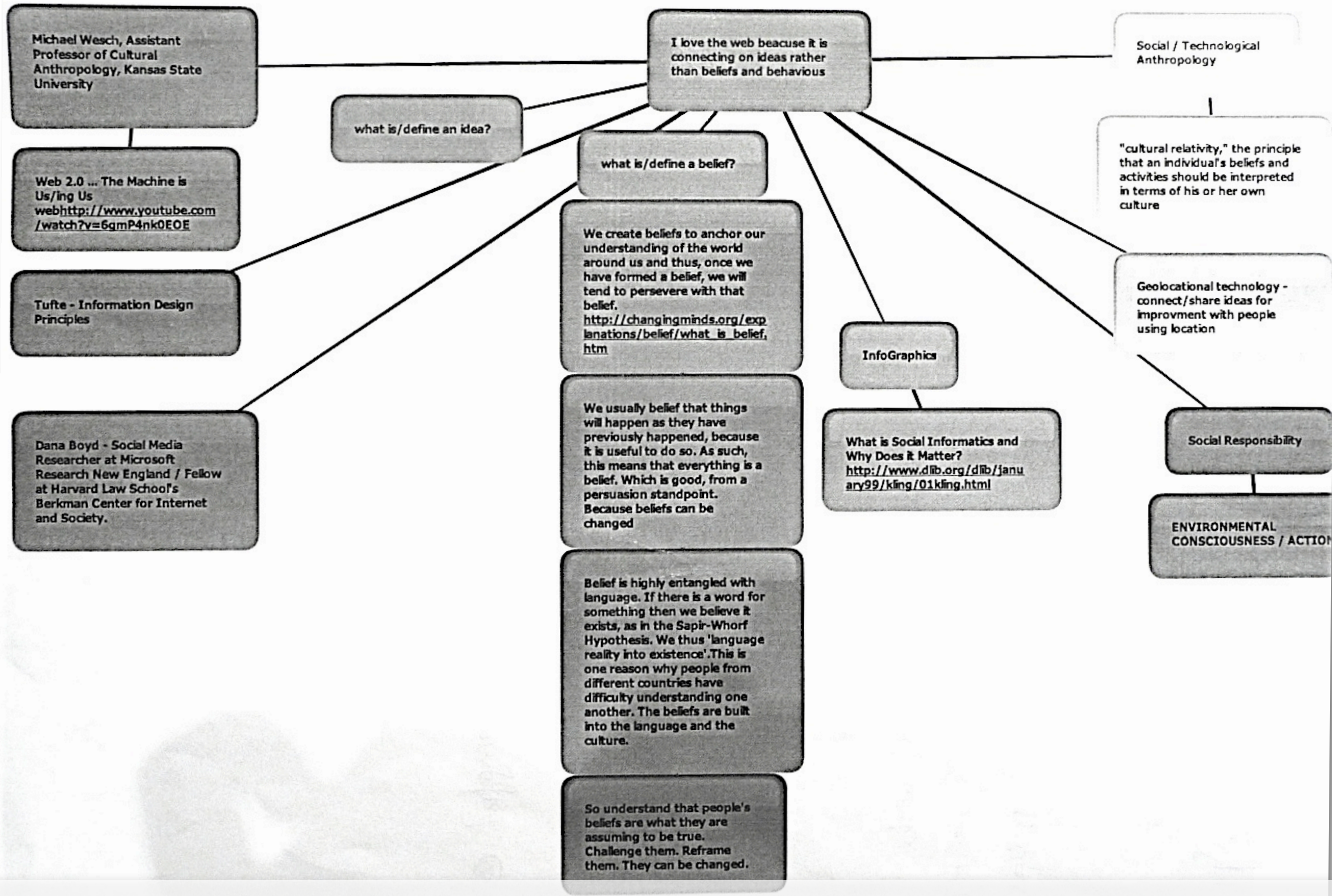
A future that's more equitable desirable & sustainable
 Jamie Cascio - TedTalks

Can lo

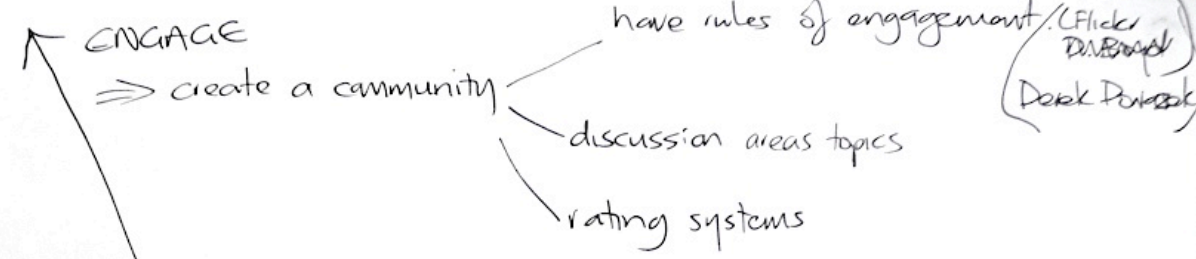


Post-it Idea Wall





Belief / Infographics / Social Responsibility



what technologies enable me to create? ... ie what technological combinations/possibilities are available.
 ⇒ NWA - national climate database

How can I connect people to their surrounding environment using their mobile phone?

How can I connect/inform/educate/activate people to their surrounding environment through their mobile phone?

② Photography
 ⇒ success of flickr ⇒ community
 its all about the conversation
 ⇒ rules of site ⇒ respect ethics barrier 2 entry: create a healthier community.

Notes / Goals / Intention of App

Geolocal Tagging

⇒ live data / streaming
 ⇒ ability to ~~be~~ be involved in a community which is locational based.

organic template

pics - intelligent interaction animated? ... how do visually interpret.
 - can order in diff ways. whitney.org

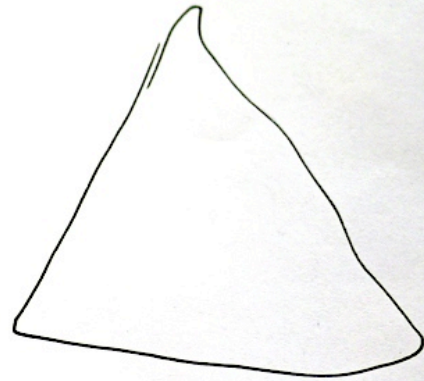
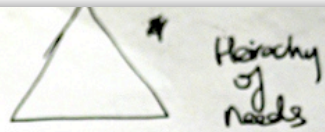
- City Tours
- Gates
- Public Art Graffiti
- Colour tour ie the colour green
- Weather representation

what does a mobile phone have that a website/paper et doesn't?

- ① txt alerts (sms capability) ⇒ 2 way simple 140 char communication.
- ② Photography ⇒ upload/download pictures images
- ③ geolocal tagging

my wellington.

travels GPS locate pic
map a walk. - connect ^{pics w flicker} w Doc Walks
have icons to drop onto 'your map'
send info through to council/
urban planning
ie rubbish bin
tree/shrub



← tag your city.

→ virtual graffiti

game → Space Invader
virtual street

Functionality

Air Quality
/water qual.

— overlaid on maps

— transport routes

— upload sensor data (individual)

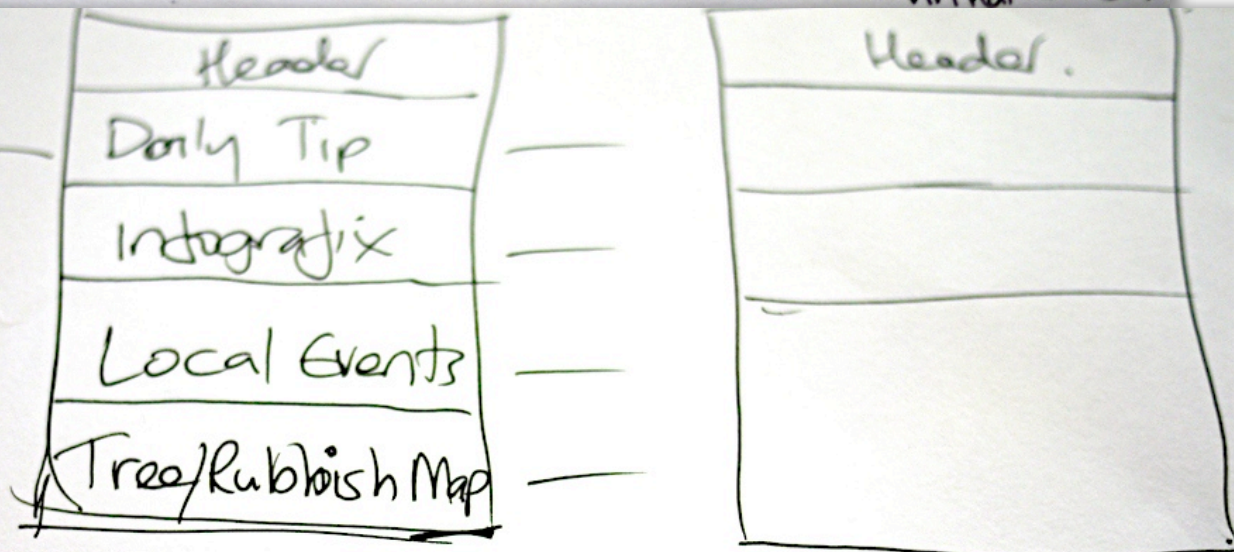
Photos —

interconnect w Flickr - storage re
map & pictures & geolocate/tag on
welly map (& use welly) - can make
your welly share w friends, etc

Twitter —
RSS

scrape twitter 4 local green env
• put out call to twitter to use
#greenwelly #mywelly
merge w RSS feeds localise
eg Council Events / Public meetin
films.

slide
daily
tip
back to
gain
access
to info



local tree/walsh bin map

local recycling

aggregate local/national scientific data

→ tree plotting

people could upload a pic of diff trees to build up a local database of diff types of foliage around

What will this app do?

Functionality

geotagged photo of a why-when on walks can use closest bin - council could aggregate info for public planning

Daily Tip

where there should be a bin or a tree

can choose to have daily/weekly tip

option of tx:

local enviro never

- protests
- films
- talks

Earth

- Biodynamics - apple core infographic
↳ link 2 vid.
- backyard projects - worm farm

Water

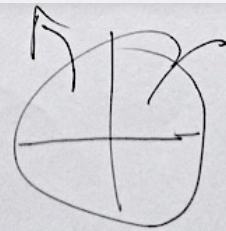
- links 2 - vids / white papers
- can people share videos
- Forest & Bird - fish list.

Air

- Birds - birdcall - link 2 app?
- map your local birds.
- Air Quality - RSS feed - daily updates.

Aeroplane travel

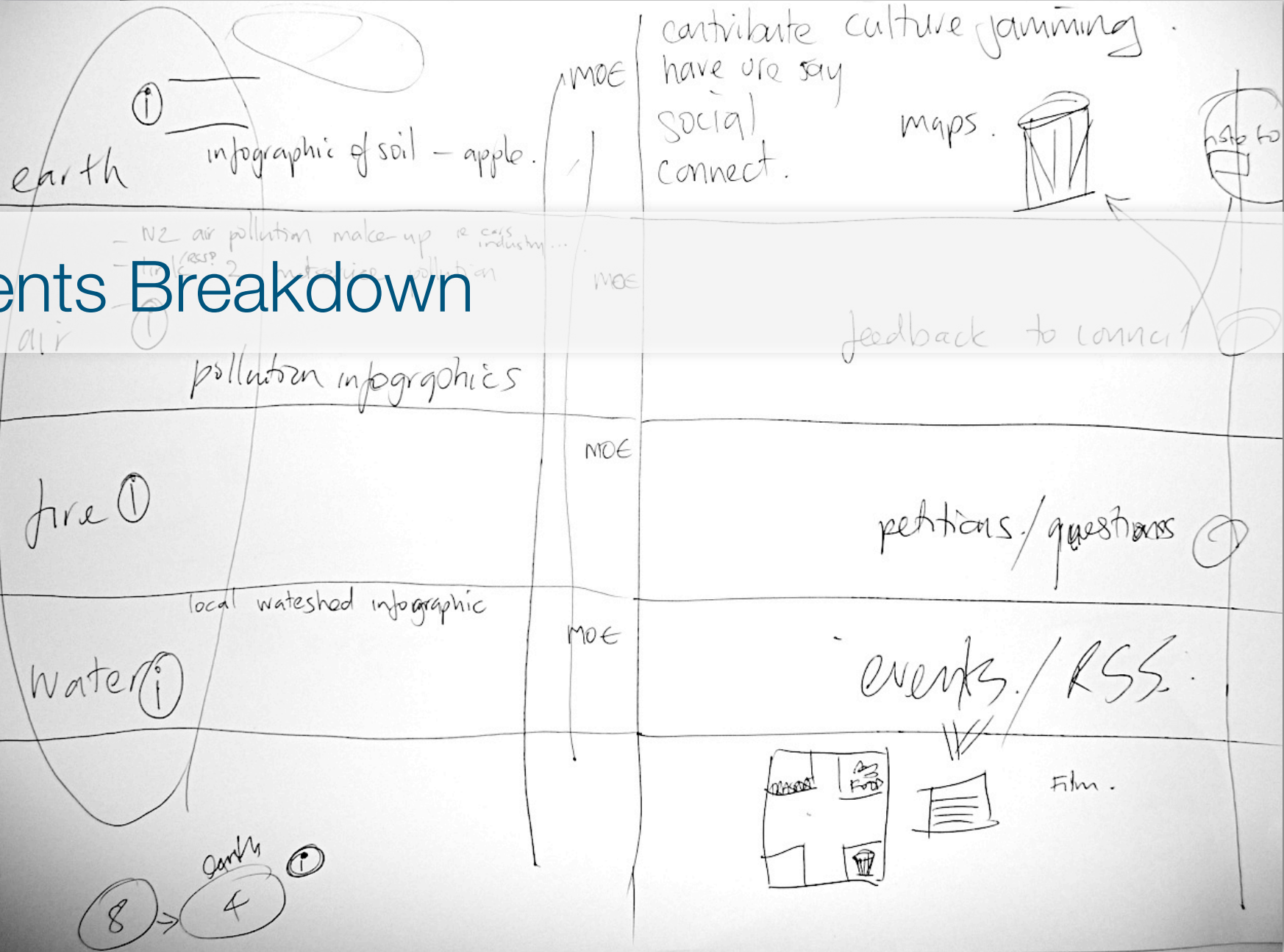
Breathing air heavy with particulates is responsible for about 1100 premature deaths in urban areas each year.



Fire/Tx

Green Technology

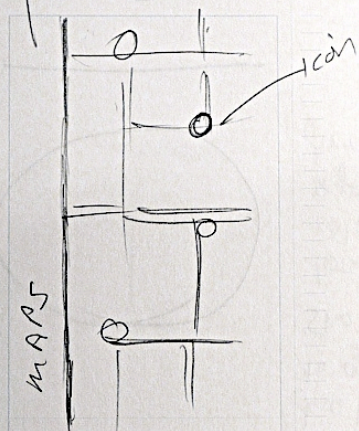
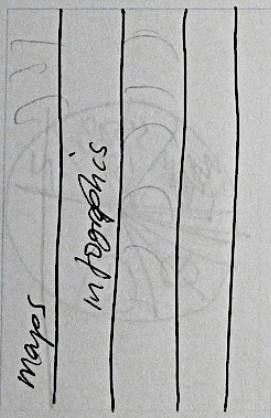
Four Elements Breakdown



Primary Activity/Goal:

① connecting wellington citizens with ~~the~~ ~~local~~ ~~government~~.
local environmental governance

- slide left → R



double tap 2 bring back menu

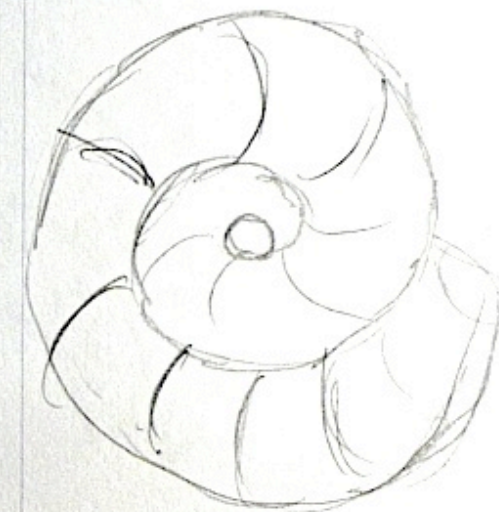
Elemental Wellington - Title - App. Focus?

Aristoles 5 Elements, but with human action as Aether or...

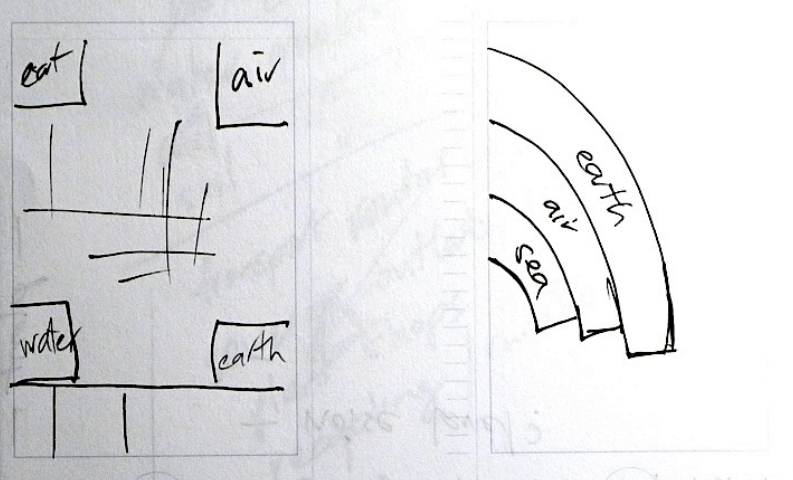
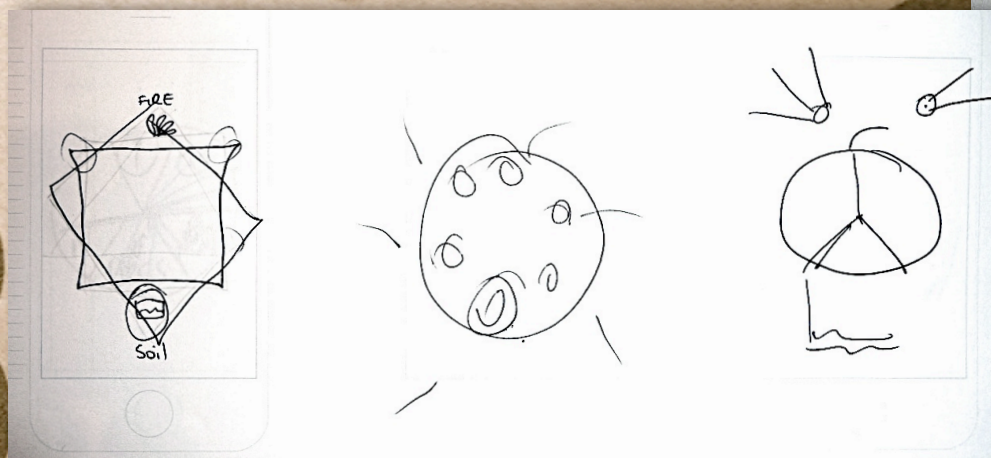
5 Elements:

- I. Earth
- II. Wind
- III. Air
- IV. Water
- V. Social? Maslows = Self actualisation

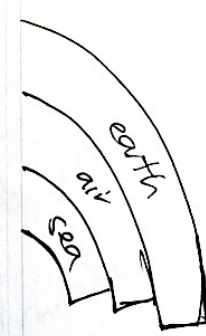
five lines to give shell
look / colour separates function



Five Elements Exploration



SHELL/FIBONACCI
SPIRAL
separate by colour
each segment
shell 4 nav



pollution alerts - bluetooth - gift +ve not-ve

the edgobreakers group

opengovt.co.nz

~~stats.govt.nz~~

stats.govt.nz/environment

aggregates ^{dry} govt statistical data into absorbable visually interesting/entertaining information chunks

entertainment mobile

post pics / geolocational

① Shame page? pics of litterers or companies not having recycling ~~etc~~ looking after their waste

results could be sent through to related govt watchdog agency.

Notes

② Pics of locals who are looking after their local enviro — links through to more info re tree-type — local/native — how to care 4 etc

⇒ Thumbs up - rating system
Thumbs down

~~send out~~ send out txt alerts 4

1. ~~weather~~ beach pollution alerts in summer.
2. cancellation/reminders for environmental events/action.
3. Upcoming green/movies

4. people who operate their links thru techno logy. PT

Audience
people interested in greening their enviro
peeps " in participating in community events
peeps " in educating themselves on enviro.

Features

- air feed-quality feed
 - water quality
 - plant mapping
 - my wally
 - events / twitter
- 1 transport ~~etc~~
2 personal ~~etc~~
3 butyl/hydro ~~etc~~
4 oxidative-spore ~~etc~~ / bar graph
- upload own data
 - data overlaid on map - layer 4 each contaminant.
 - data overlaid on map - pollution graph/sparklines. holes / water temp.
 - take pics of plants/trees upload to green wally flicker set.
 - drop icons/recommendations on to map to be sent thru to council
 - rss feed of twitter hashtags of local council of green events

* not relevant based on mapping

Media report example (below) of increasing Toxic Sea Slug Reports on Auckland and Wellington Beaches (can kill or make ill small animals or children)

Public Health notification - could add to PUSH notifications.

Toxic Sea Slugs On City Beach - Aug 17, 2010

<http://www.aucklandtrains.co.nz/2010/08/17/toxic-sea-slugs-on-city-beach/>

The toxic sea slug has appeared on an Auckland city beach – Kohi beach.

3 specimens have been discovered on the beach. They have been confirmed as the species *Pleurobranchaca maculate*, which is known to contain the poison tetrodotoxin and had been found on North Shore beaches.

Auckland City Council has erected warning signs and will monitor the beach for further sightings.

Darcy Law - precursor to Darwin

{ from n - dimensions to 3 or less
sculpture in possibility space.
inhabitable information.

TENDING THE GARDEN

Michael A...

boredom

FLOW

cultivation: cultural participation

joke wisdom ie site; reddit - results, google

agriculture & biology


the almanac - my an agricultural relationship calc based on cultivation

a society of programmers - gardeners

communicate via information organisms

ben@stamen.com.



Icons / Functionality / Notes

geolocation 

home / personal 

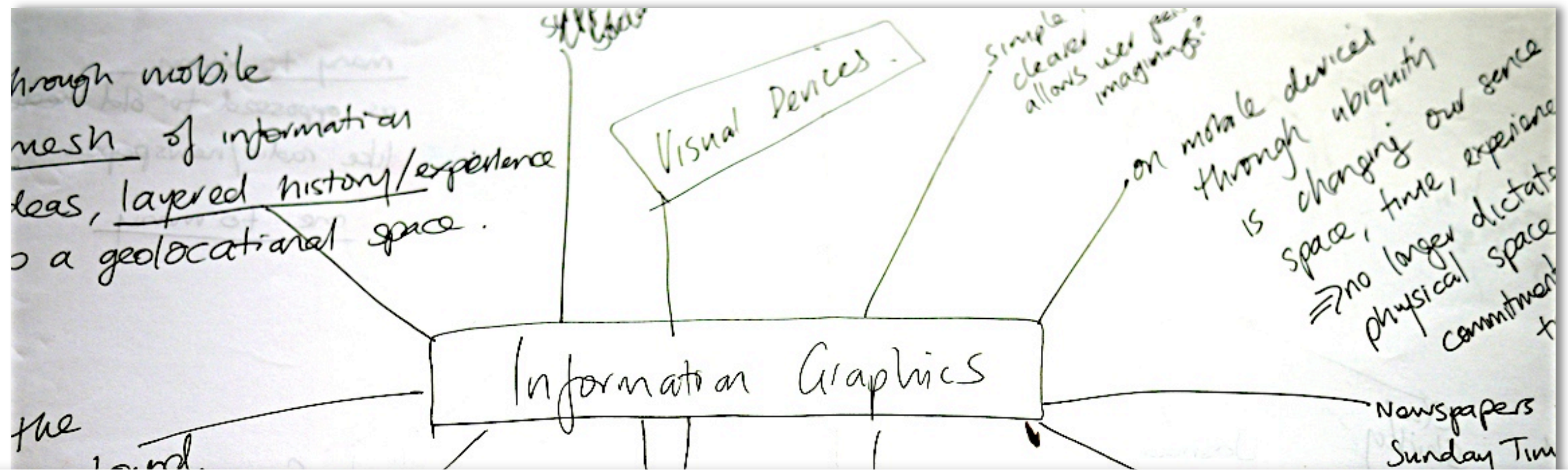
favourite sites  

upload data  

my/welly / customised map icon.  

Ideas for drag and drop icons and information displayed on application. Ended up simplifying greatly due to testing/informal discussions feedback - for clarity of purpose.app.

toilet
seat public
tree
shrub
mothersroom
polluting building
fruit & veggie
organic eco/cafes
water fountain.
rubbish bin - recycling options.



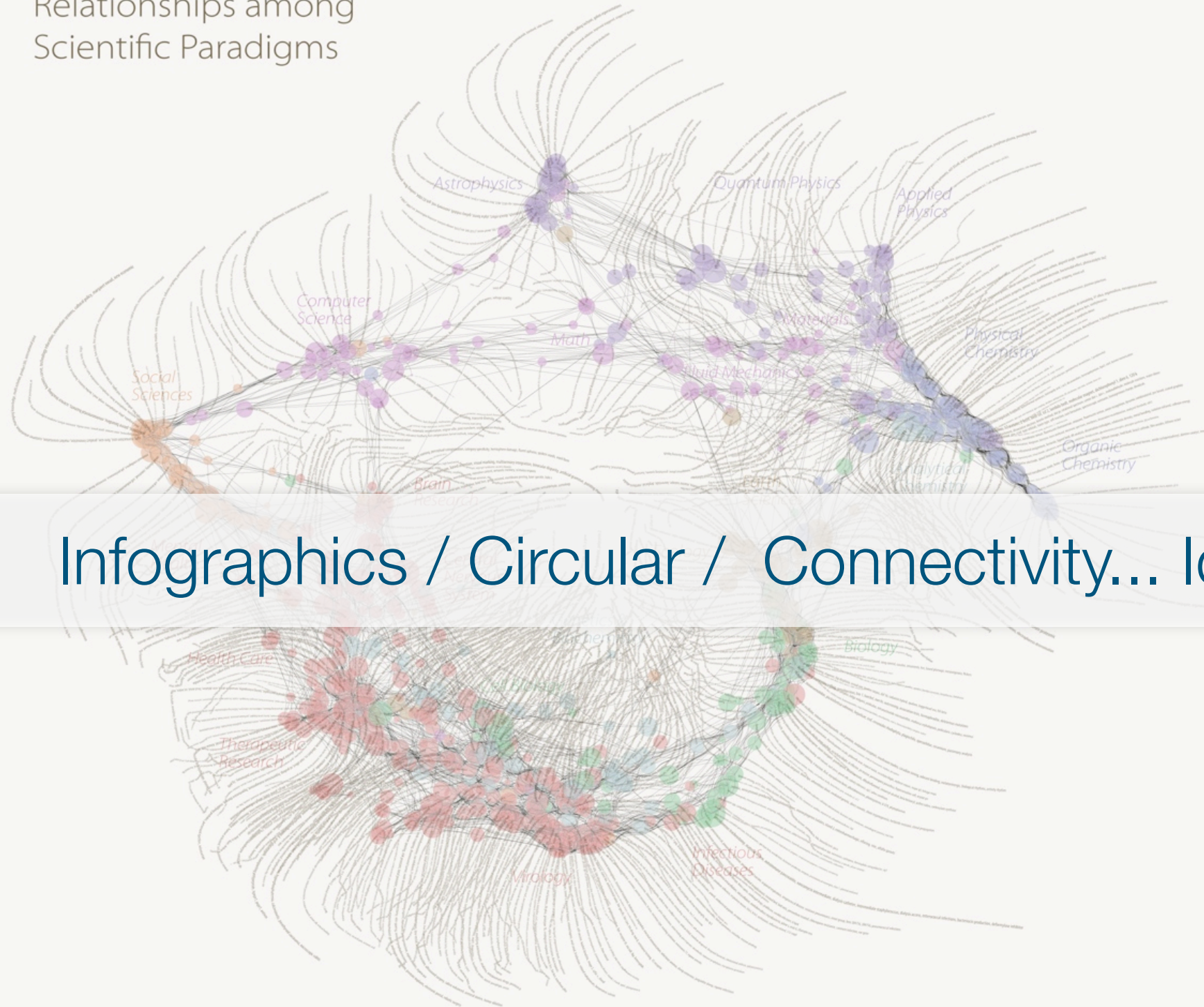
Infographics

- Elements of Info Graphics
- data
 - information
 - knowledge
 - scale
 - labels

- Interpreting info graphics
- the required graphicacy involves skills that are learned not innate.
 - decoding signs & symbols.

choose text wisely (tags)

Relationships among Scientific Paradigms



Infographics / Circular / Connectivity... Ideas, Health, Food... Everything

This map was constructed by sorting roughly 100,000 published papers into 200 different scientific paradigms (shown as pale circular nodes) based on how often the papers were cited together by authors of other papers. Lines (or nodes) that link paradigms that shared papers, then treated as rubber bands, holding similar paradigms near one another when a physical simulation forced every paradigm to repel every other. Thus the layout derives directly from the data. Larger paradigms have more papers, more citations and darker blue indicate how many papers are shared between two paradigms. Thicker lines to connect nodes unique to each paradigm. Large black general areas of scientific inquiry. This work was initially commissioned by Katy Borner (now a Professor of Information Science, Indiana University) for the journal publication 'Flow & Space: Complexity of the Physical and the Abstract'. Research and made later by Kevin Burt (now a member of faculty at MIT, Santa Monica Laboratory) and Chris Moore (President, iStock Strategies, Inc.) data from Thomson ISI graphs & typography by W. Bradford Huie (Adjunct Associate Professor, Columbia University, Director, Information Graphics). This piece is a variation of that printed in Nature, volume 406, number 7000, page 461 in the feature space (July 2003). The data is from 2000 and the information visualization and type layout techniques are those early ones, with progress on all fronts. Copyright 2003, used by W. Bradford Huie, all rights reserved.

THE POTATO LIFECYCLE

A Comprehensive Guide To Planning, Planting And Monitoring Your Own Crop Of The World's Most Important Tuber.



Interface Design.

Doppler + is highly saturated logo
 + simple map based layout.
 + pop-up design = light clear design/layout.
 = multi-function
 ie don't have to open up multiple boxes to achieve same function.
 + location aware
 - popup request box on first open of app.
 - ves icons - IMHO slightly underdesigned budget looking.

Roambi + ves - highly saturated colours.
 - slight 3D effect.
 - multiple viewing options of same data
 - side panel (+) button adds more functions + interactivity.
 - colour accentuates function/imp info
 - high contrast - gd & outdoors

Everyblock - functional - but not enough colour looks like a bank app. / boring.
 - light grey txt (detailed) had to read - too small not enough contrast.

Saturation - automatic landscape portrait on open.
 jumps into visualiser " "
 + ve simple nav.
 - ve too simple nav - kept looking for back button.

Tube Map - beautiful L/V maps (copy)
 great idea 4 scrolling horizontal menu @ base of page
 - does it need arrows to show there is more options?

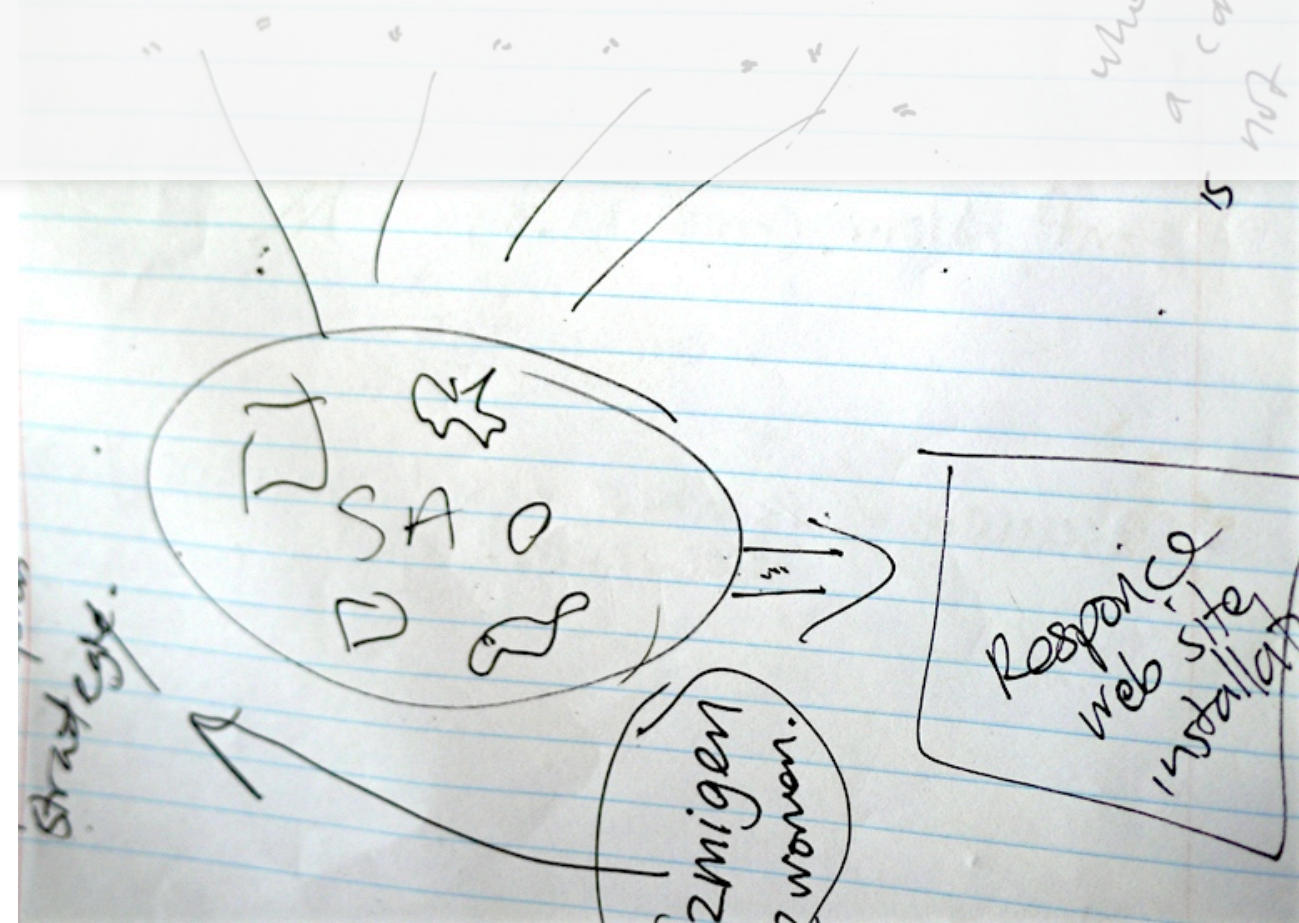
Looking back on the orange post it note... --> this is an idealistic statement.
 Yet ironically being a designer and constantly analysing visual things, I find connecting with people online over ideas, far more mind expanding.

Handwritten notes on lined paper. An orange sticky note is pasted in the center with the text: "I love the web because it is connecting on ideas, rather than beliefs & behaviours".

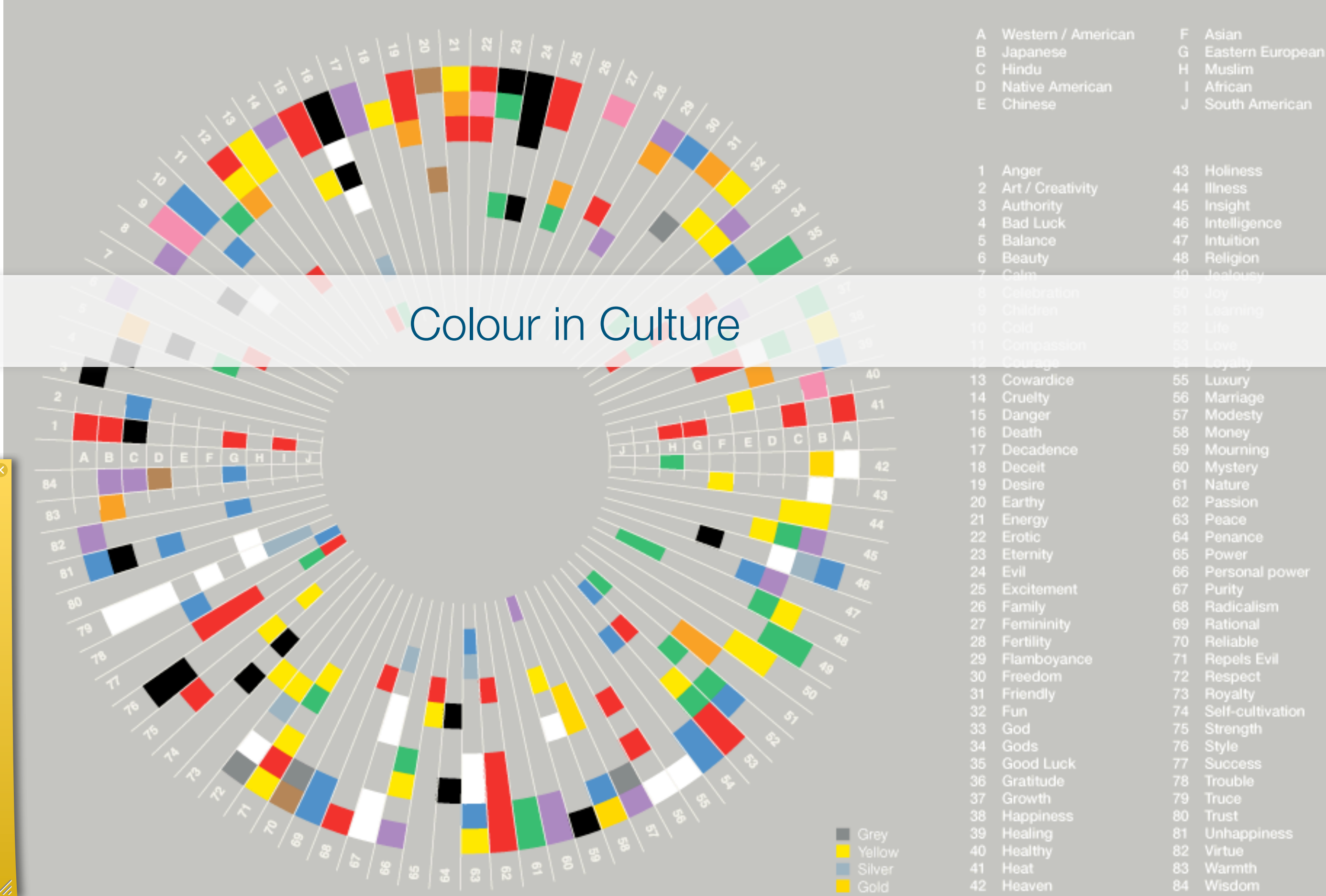
Surrounding notes include: "Thesis", "vs on mob", "New can / ideas", "And ideas on for people to act in RL", "change rhetoric", "Panah", "Tuffe!", "People inspire", "who are we a community is not".

App Review / Notes

<-- Interface Design analysis of: Doppler, Roambi, Everyblock, Saturation, TubeMap



Briefly looked into colour theory and colour in culture. With the intension to make my app visually beautiful for New Zealanders, and at the very least not offensive to visitors. The multitude of contradictions meant that it was hard to design something that did not have a cultural significance or connotations to someone.



- Grey
- Yellow
- Silver
- Gold



full colourblindness 0,005% of population

normal colour vision

Colour Blindness Testing and Experimentation



Map Exploration

Visually

What colours stand out / contrast various light situations / most effective in full daylight mode?

Colour contrasts - what are the most important features to display?

How many map views are necessary for purpose of application i.e. satellite, terrain, contrast? How does diff icons perceived on map background /clarity

Technically

What is a lightweight open source mapping system?

Initially looked at having layers could turn on and off dependant on viewers needs - decided against due to need to simplify add focus to application.

Mapping Platforms Explored - both desktop and mobile

Bing (<http://www.bing.com>)

Google Maps (<http://maps.google.com>) American centric first view

Cartogen (<http://cartagen.org>)

Koordinates.com (<http://koordinates.com>)

Yahoo.com (<http://maps.yahoo.com>)

Open Street Map (<http://www.openstreetmap.org>)



Cartagen

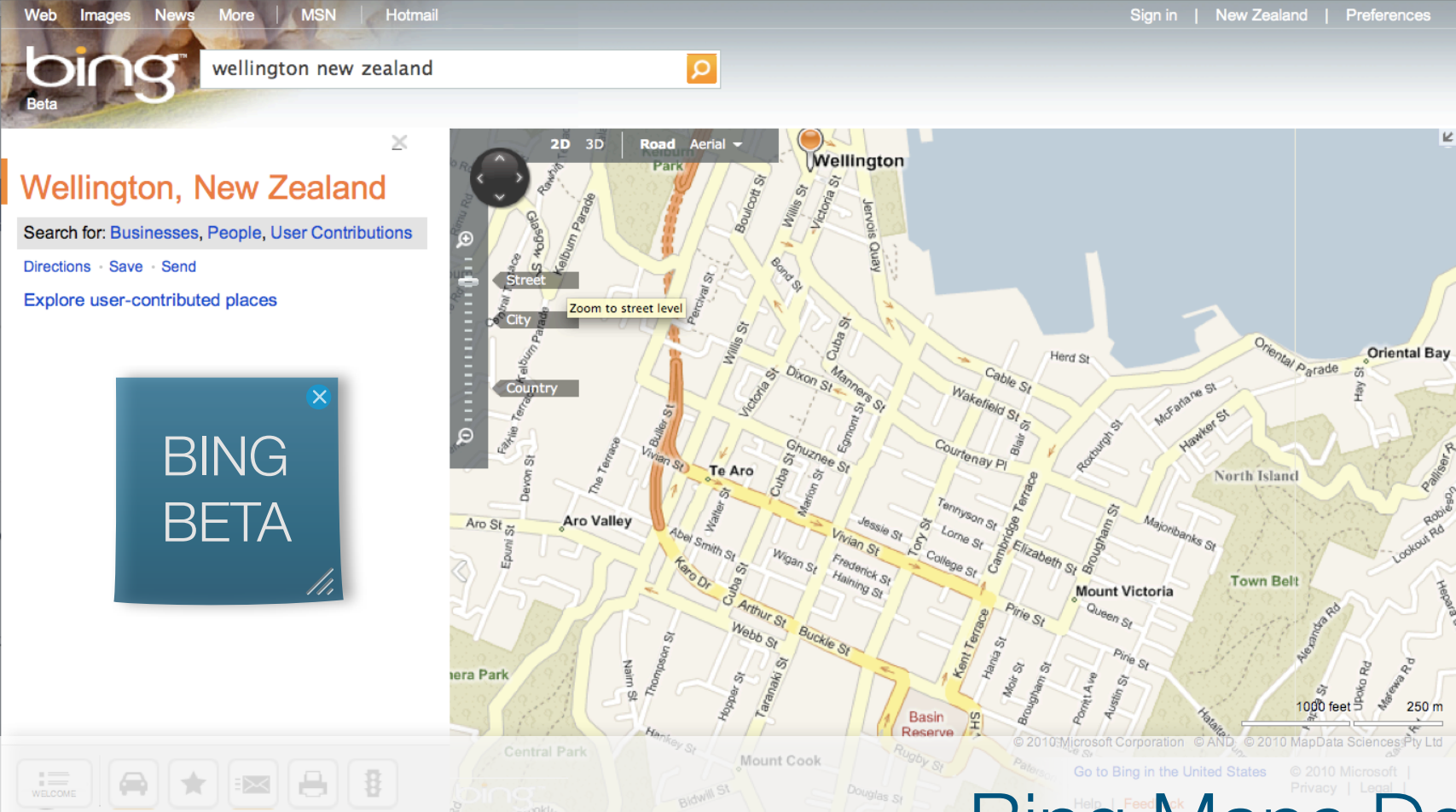
(<http://cartagen.org/>)

Layering experimentation:

- I. Colour visibility on iPhone screen.
- II. Transparency - data overlap - result icons on map work better.

Benefits

- I. Draws maps dynamically on client side.
- II. Flexible data platform - move, adapt, & redraw. Can include as many layers of data as needed.
- III. Vector mapping in native HTML 5.
- IV. Runs on iPhone & the Android platforms, & uses less bandwidth overall.



- I. Topographical map - tested in beta - decided against because platform not final more room for error / or to change for app. platform use = less stable / predictable. Upon return web visits, the focus seems to be more as a search engine, than mapping platform (Search now: aggregates local mapping info / local sites / advertising).
- II. Quick load time for desktop web / slower on iphone.
- III. When typed in Wellington address Bing Beta automatically knew where I was - was given a map of the whole of new Zealand (auto geo-location <- helpful feature to build in to app.). Bing Later was less successful.
- IV. Low figure foreground distinction - Bland pastel colours are fine for a medium to low lit room but not good for clarity, especially when outside on phone.
- V. Bing Later added colour to iconography in lower L.H.Side.
- VI. Street / city / country hover option beside the scale slider is a clever idea not seen anywhere else on web maps but may be an impractical idea for the screen size of phone maps.

Bing Maps Desktop Review

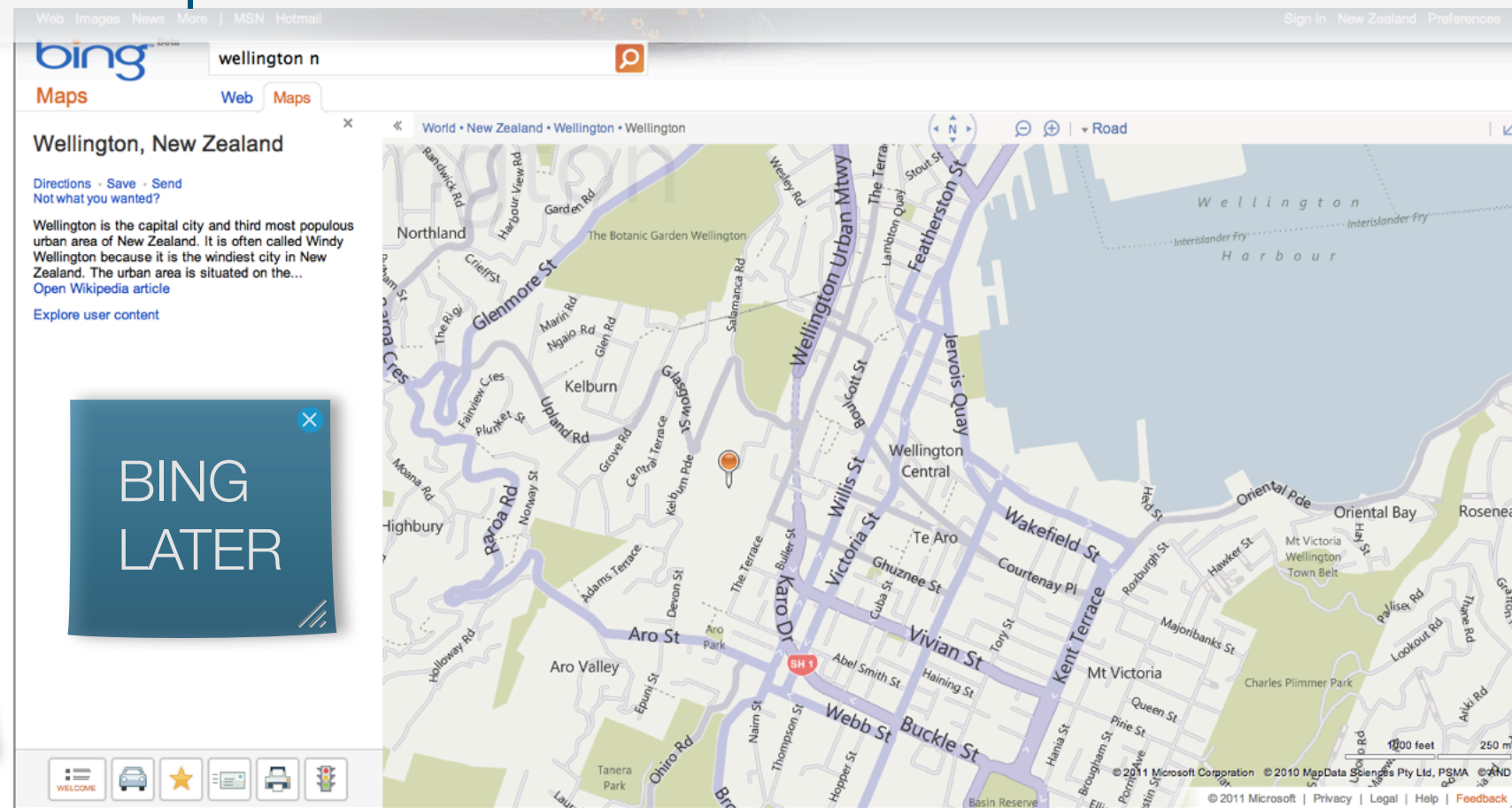
VII. The street city country hover option beside the scale slider is a clever idea - not seen anywhere else on web maps / may be an impractical idea for the screen size of phone maps however.

VIII. Lower right hand side: trademarking and should be included in top left navigation freeing up more screen space for the majority of viewers intention to view maps.

IX. Trademark details and links in lower R.H.S corner - cannot be removed hindering a larger, cleaner map view. American centric map links - Bing/M\$ should make the most of technology (ie geolocation) to satisfy a map centred to viewer.

XI. Map line detail and colour changes - Bing Later is more blue based (looks less like the yellow based map colours of Google and more definition by colour alone ie less line detail).

XIII. Bing Later - removed excess navigation cruft. Bing Beta - street city country zoom marker good idea for desktop space but not enough screen space on mobile.



GET MAP AND DIRECTIONS Clear

A

B

Reverse Directions | Round-Trip Go

FIND A BUSINESS ON THE MAP Clear

Search

Print Send Save Live Traffic Language Help/Policies

Map Hybrid Satellite

Wellington, New Zealand

©2010 Yahoo! Inc.

Yahoo.com Maps Desktop

SPONSOR RESULTS

[Wellington Wellington Boots](#)
100s of wellington wellington boots. Top Brands at Low Prices.
[www.Gifts.com](#)

[We Found Wellington Wellington](#)
Current Phone, Address, Age & More. Instant & Accurate Data.
[www.Intelius.com](#)

Quick load time on the web / slower on the phone.

Only site that views Wellington as one would on a world map orientation. All others view from the opposite direction.

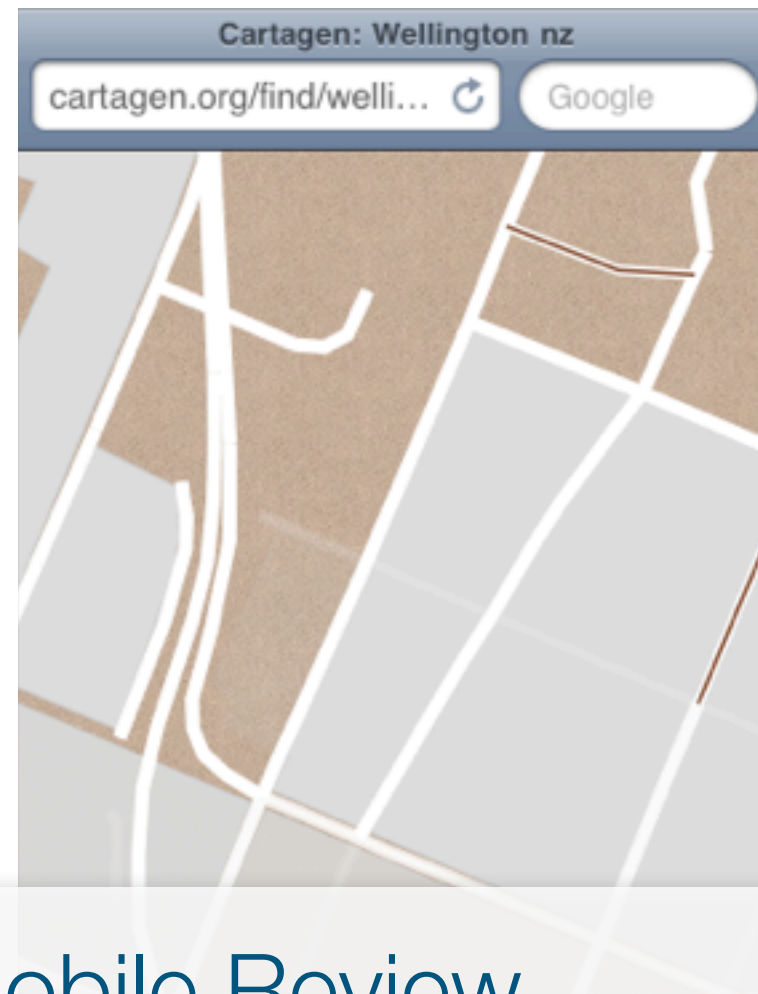
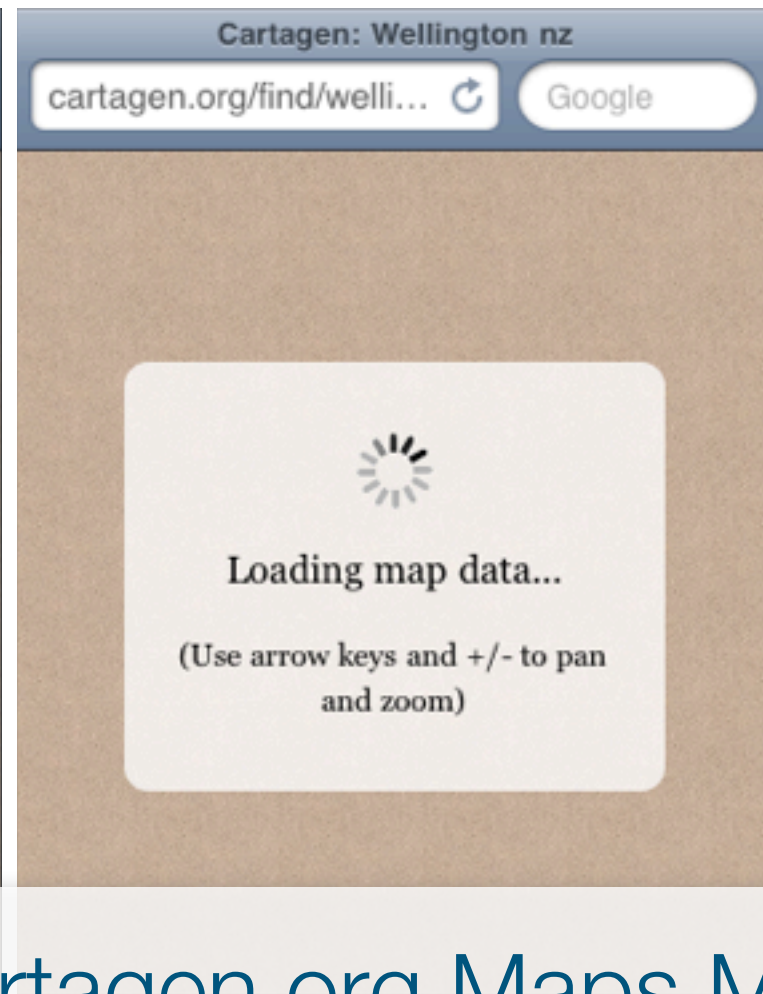
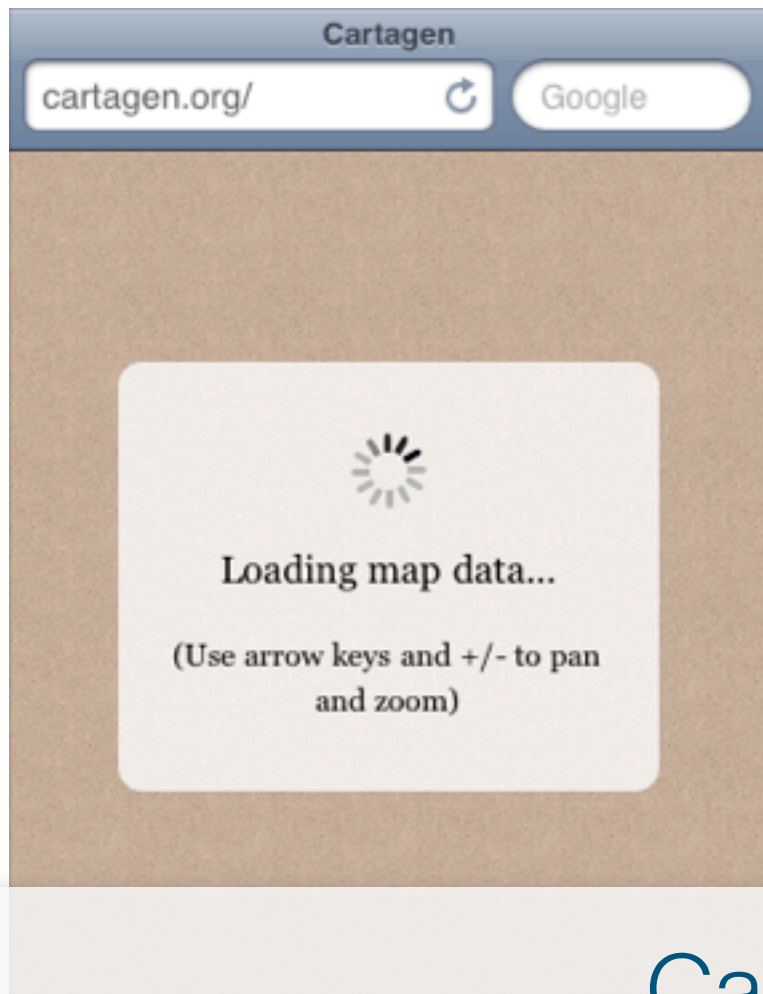
Contains my most favourite colour combinations of the big three mapping giants - bright, clear, good contrast, text definition, main arterial routes well defined.

Slightly unclear where to search for 'Wellington NZ'. Other search options are either A -> B directions, find a business or search the web.

Simple and straightforward zoom function.

Uncluttered page, yet has great features like a live web view.

Contains my most favourite colour combinations of the big three mapping giants (Google Yahoo and Bing). It's bright, clear, good contrast, text definition, main arterial routes.



Cartagen.org Maps Mobile Review

Cartagen - GSS Style Sheets

Like CSS for styling web pages.

Adapted for dynamic data sources.

Can display multiple datasets - good for layers.

Draws maps dynamically on client side.

Vector mapping in HTML5.

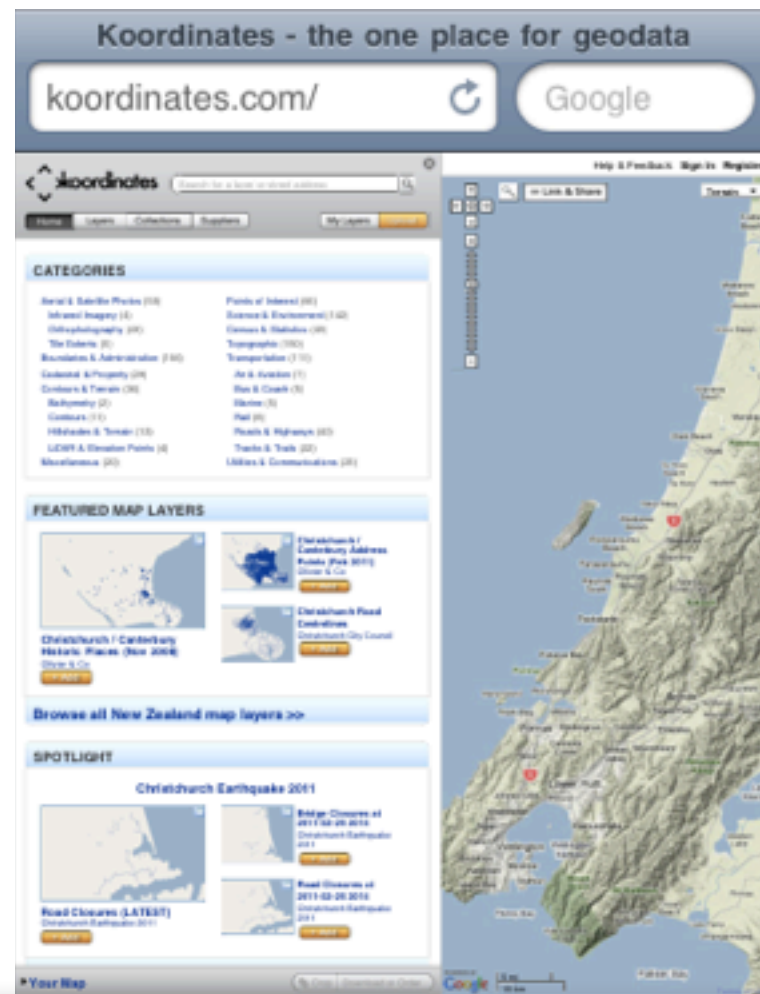
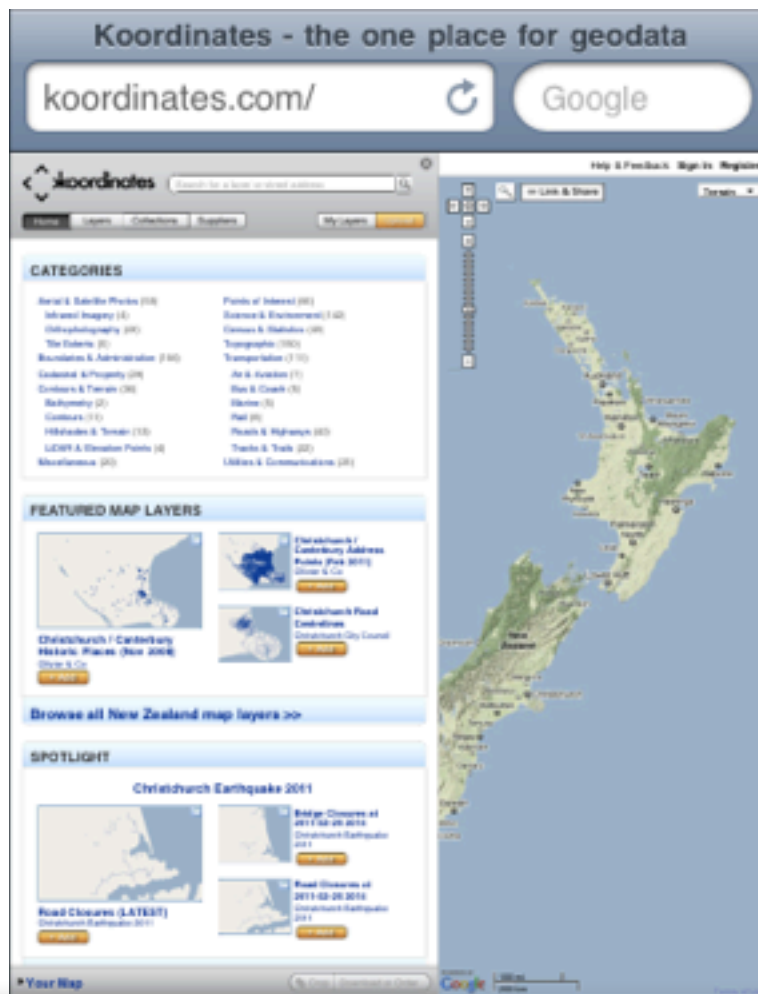
MIT started.

Takes a long time to load on iPhone; tho think this could be overcome with more direct application.

Simplified graphics work well with small mobile screen.

Customizable Maps. Crisp visibility on multi-level zooming.

Preferable to Google. As there's less local info and less integration possibilities had to go w Google as final choice.



Koordinates.com Maps Mobile Review

A NZ based start-up so was keen to support local tech.

Excellent display of one of the most comprehensive libraries of local data sets out now (2011).

Uses google maps. Easy to find wellington after search entry.

Difficult to read or navigate on mobile.

Better display for desktop.

L.H.S pop out w customisable add-ons (some free some pay)-great feature.

Quick and easy to find Wellington after search entry.

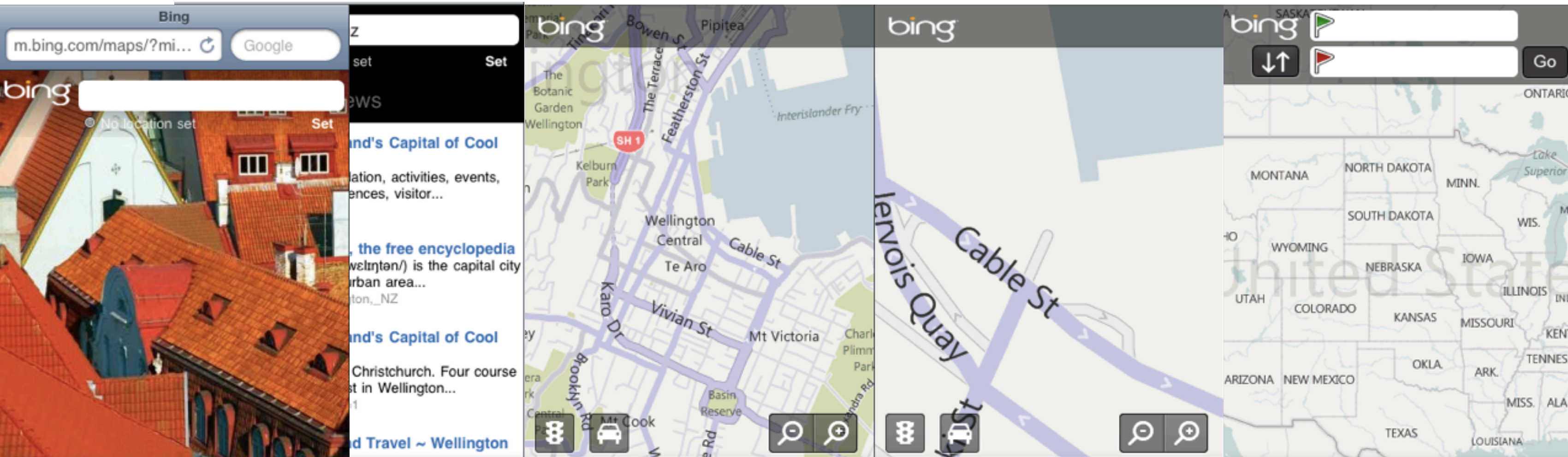
Map manipulation tools not designed for mobile - far too small.

When L.H.S box removed top advertising reduces to

This is as close as I could get on a mobile phone and mobile simulator.

Not close enough for Tune In Share Out app.

Four Map views optimally placed in top R.H. corner-Terrain, Hybrid, Satellite & Hybrid - excellent option.



Bing.com Maps Mobile Review

Page 1: Main Page result searching for 'Bing Maps'.

Direct access to Bing Maps only available after scroll down to Maps link (not visible in above screen shot). No indication (pop up visual cue etc) to scroll down for first time user.

Page 2: When typed in 'wellington new zealand' search results for wellington based websites were results not the intention of a wellington map.

Needed to go back to main screen and scroll down to 'Maps' button

Page 5: After a few pages of frustration, get to the 'wellington map' that I was searching for.

Wellington new blue based map.

Colours moved away from Google Yellow based map.

The closest zoom I could get on Wellington map - clear test visuals - sparse enough to have my icons visible.

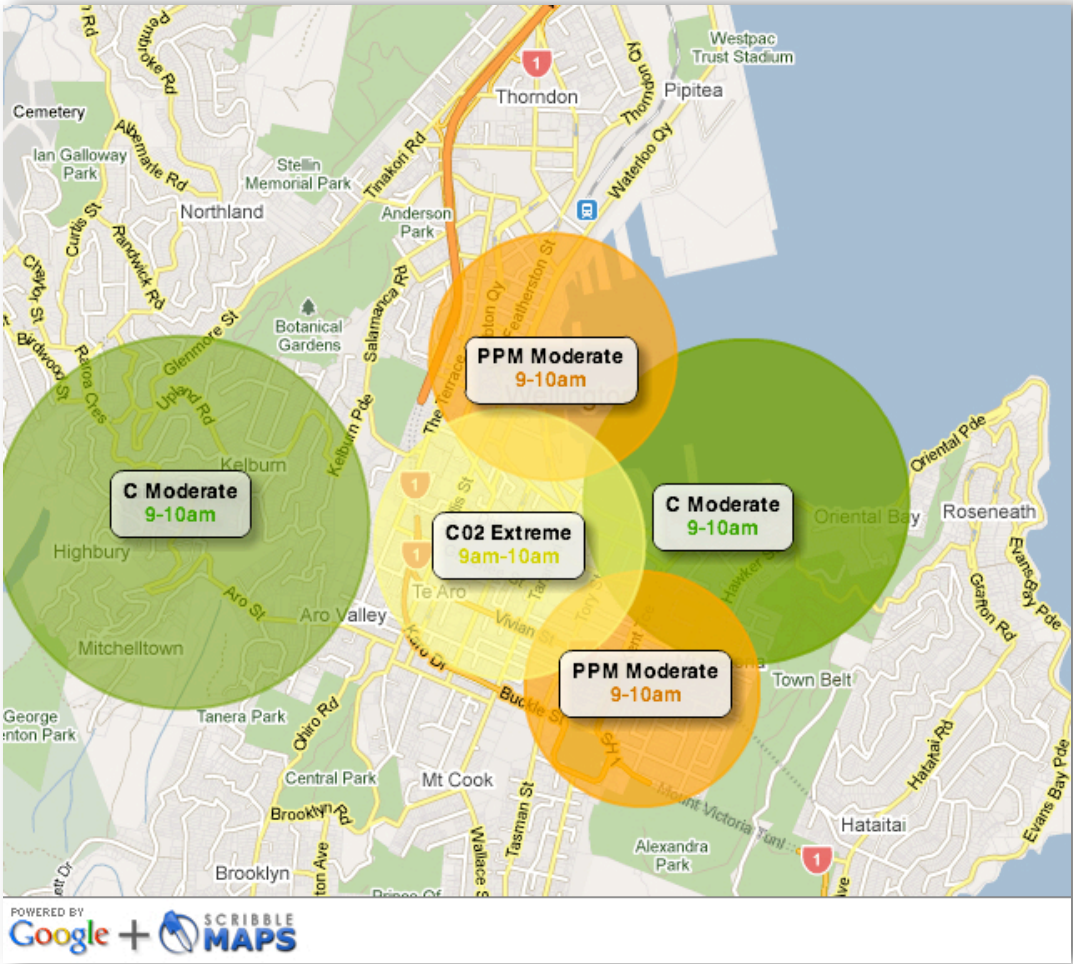
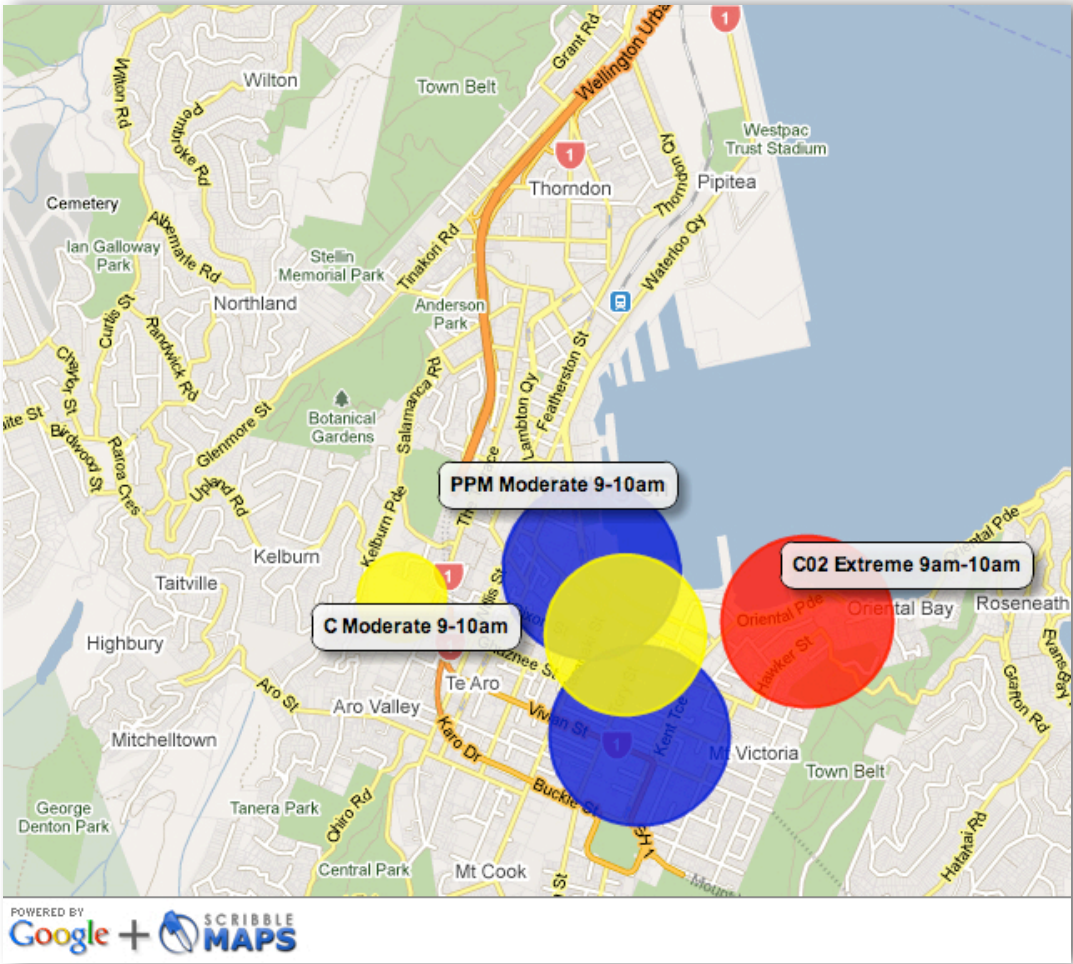
Important to consider if app is having detailed multiple iconography like the 'share your visions' page.

Car icon - sent me to planning a start and end point in America - not helpful.

Lights icon - had no change on NZ map.

Zoom + and - button good size - sensitivity to touch / effective.

Google Maps Experimentation via Scribble Maps





© The Hebrew University of Jerusalem & The Jewish National & University Library

Mapping has long been a method of understanding the world - whether it be a precise map navigation a city or mapping public contributions



<-- The maps to the left are beautiful but do not have enough clarity and simplicity of purpose for the minimised mobile screen.
Cartagen example to the right --> takes simplicity to the extreme.

Map Exploration



Environmental Health Clinic:
Amphibious Architecture



Map Exploration



Parma, Italy 1840



Love the simplicity /
monochrome aspect of
this map

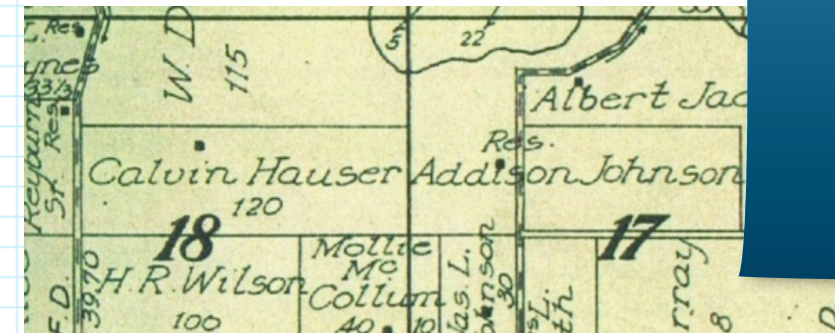
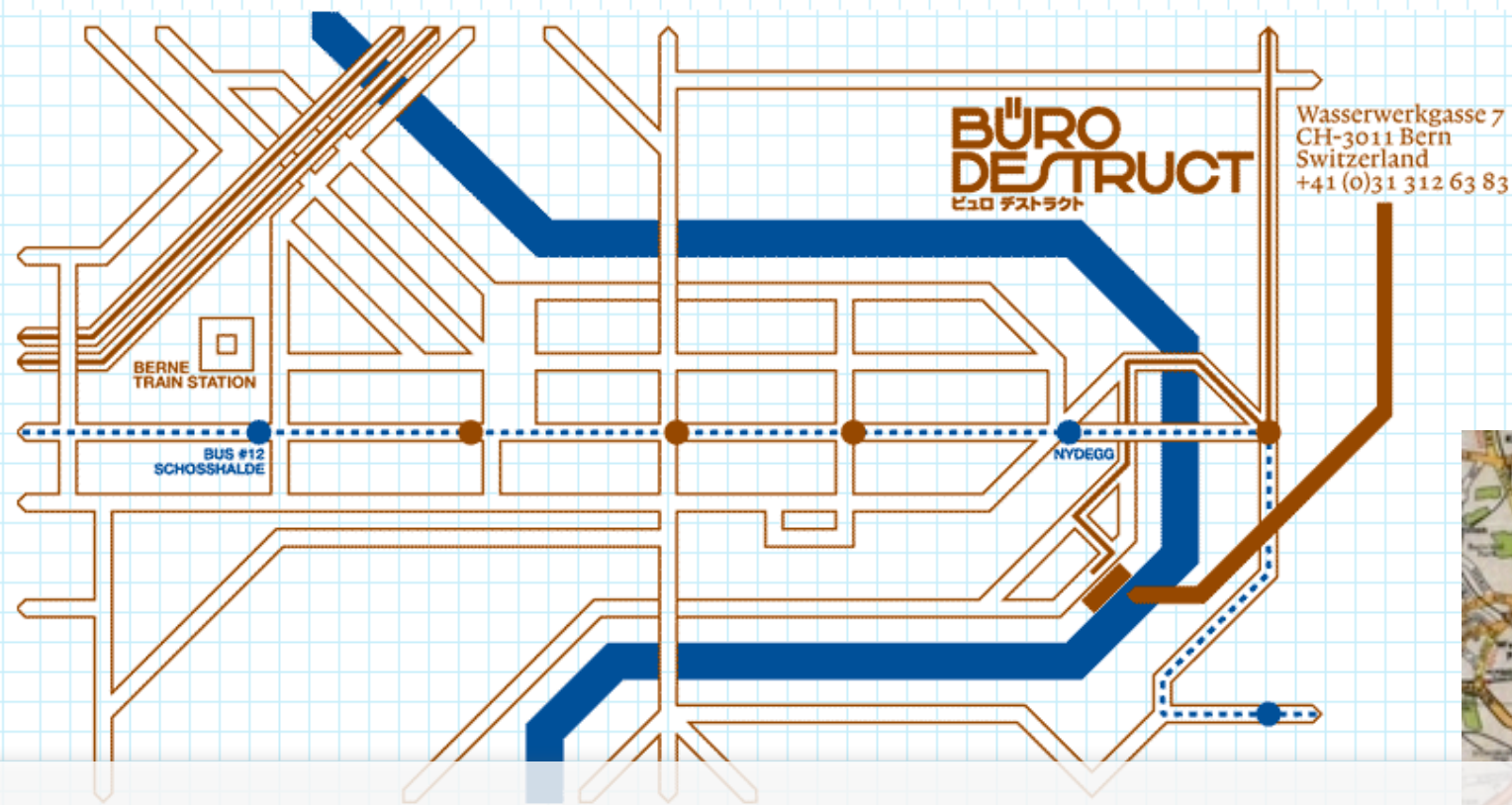
Would make icons more
visible -

Similar to Rem Koolhaas
book 'Mutations' Rome
Agora imagery.

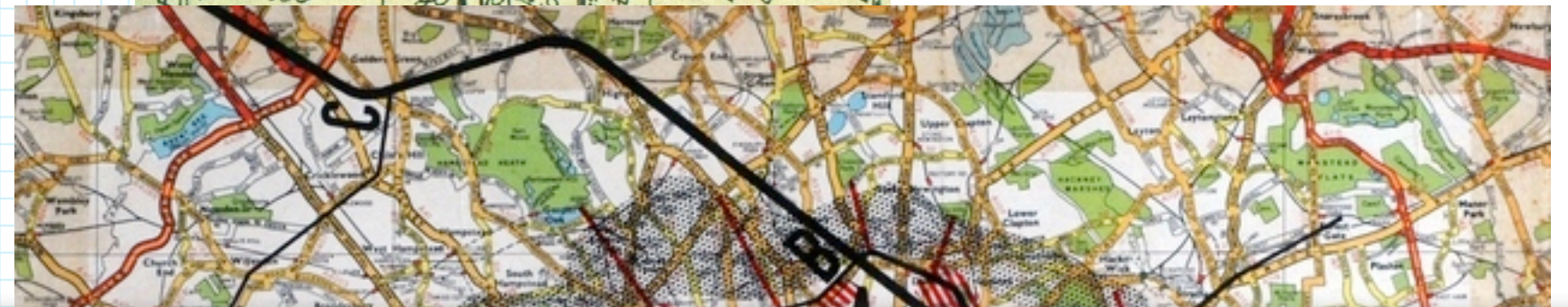
Pic from: The Geneology of
Maps (Book)

ref: [http://smogr.com/alert/
images/ep_09/Parma_IT_1840](http://smogr.com/alert/images/ep_09/Parma_IT_1840)

How To Find BD



Map from Archigram's Plug-In City 1964 Explorations (below)

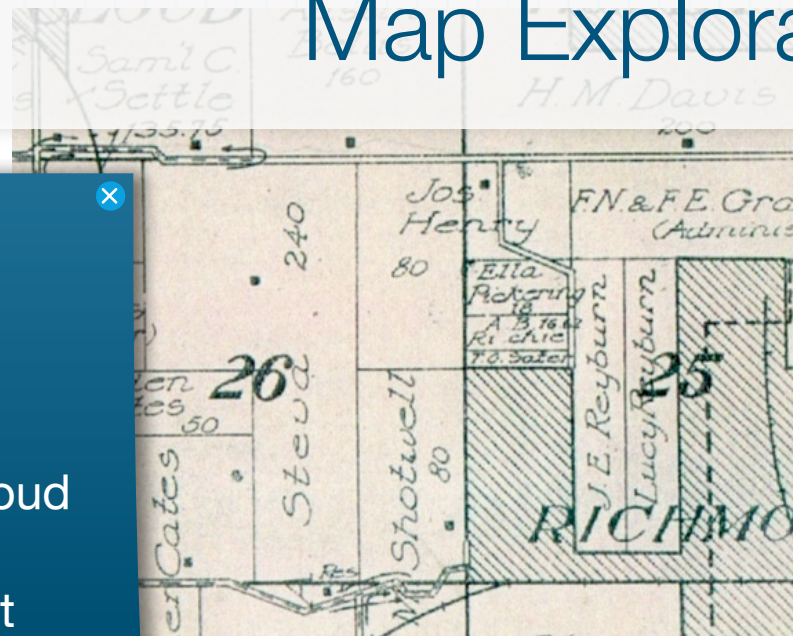


Map Exploration / Inspiration

Streamlined

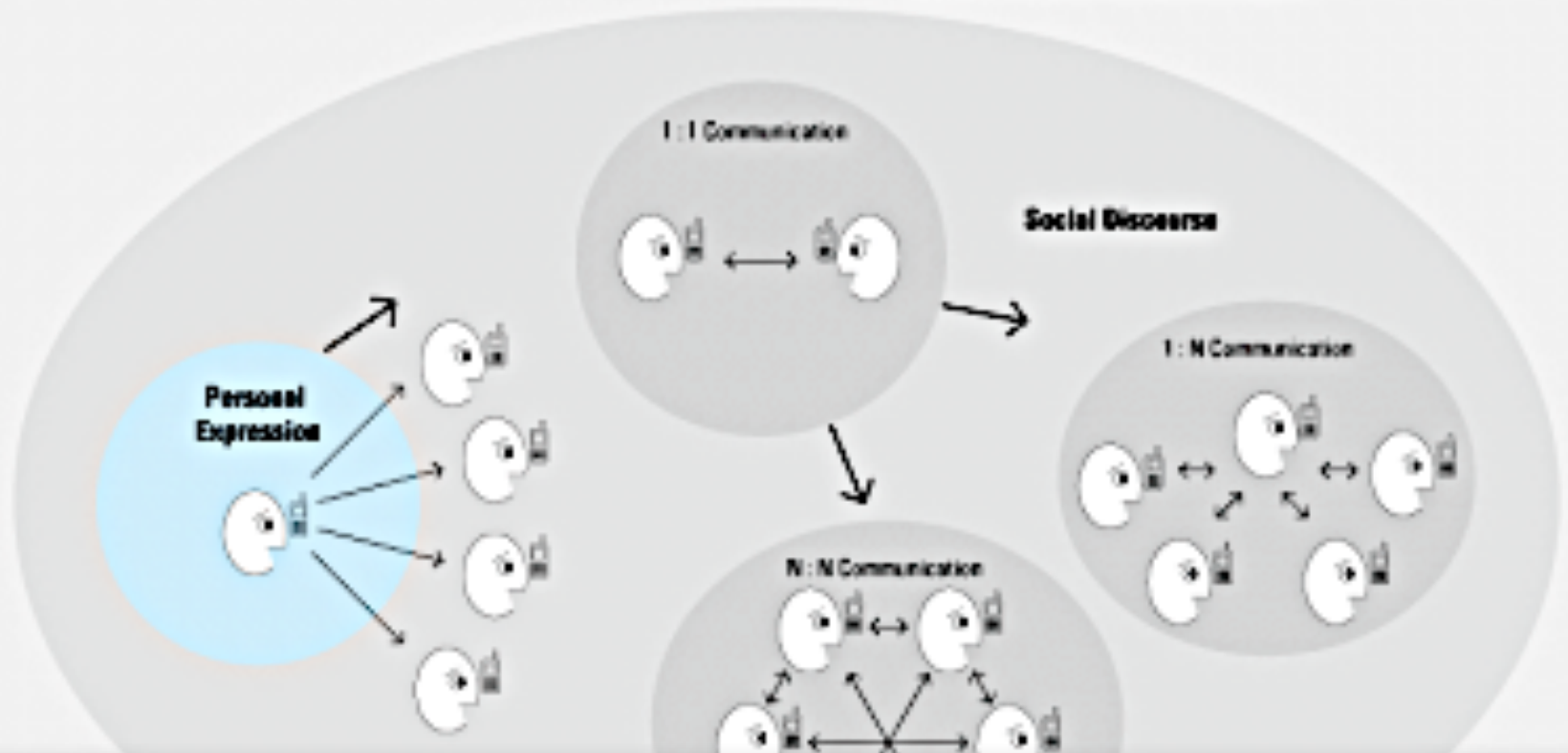
London Underground Maps
Walking City /
Plug-In City - Tag / Plug in Cloud

Archigram - graphic quirky yet still looks trustworthy (not strictly following Captology principles).



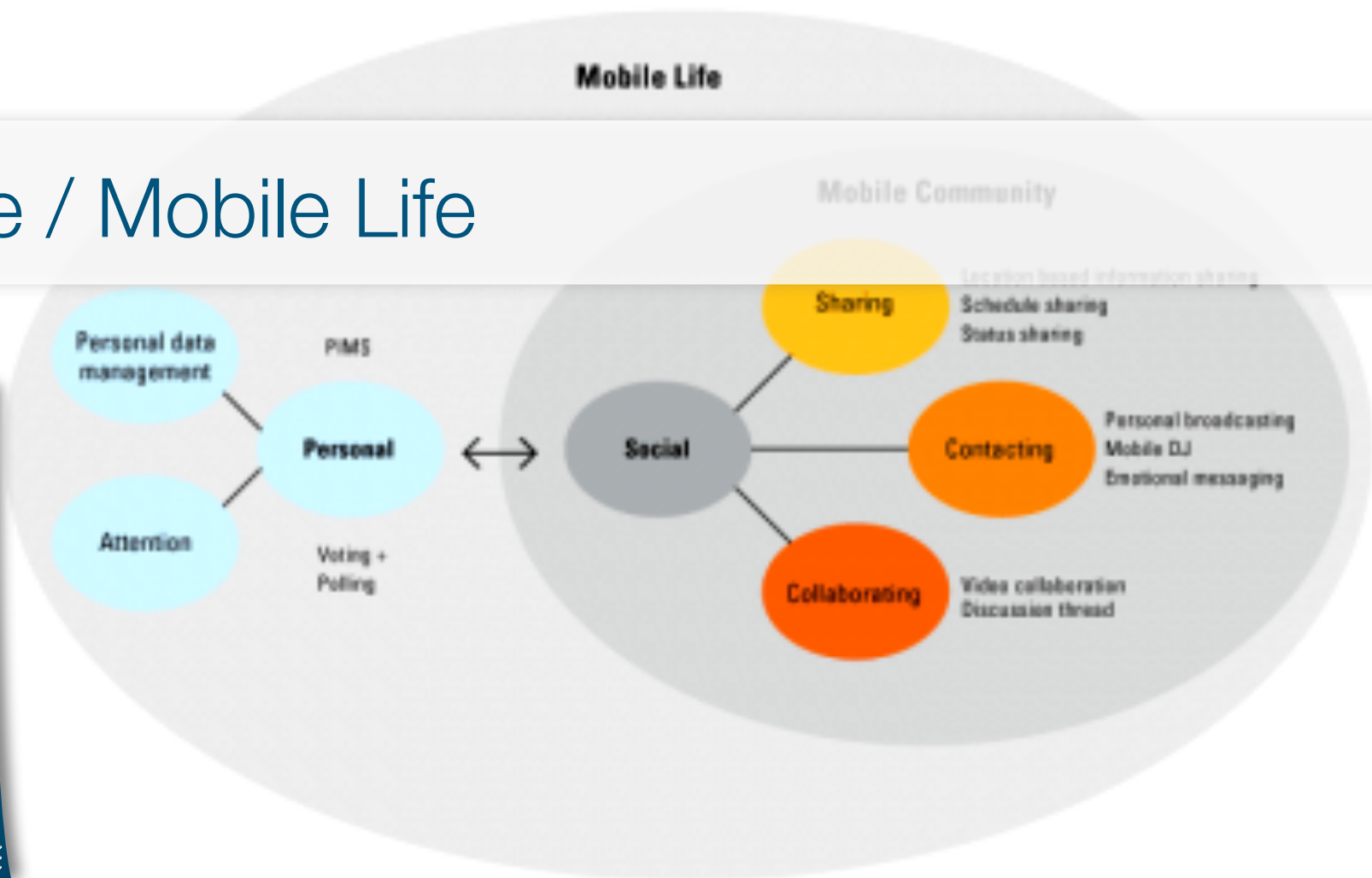
Personal Expression → Social Discourse

One to One, 1 : 1 Communication → One to many, 1 : N Communication
 → Many to many, N : N Communication



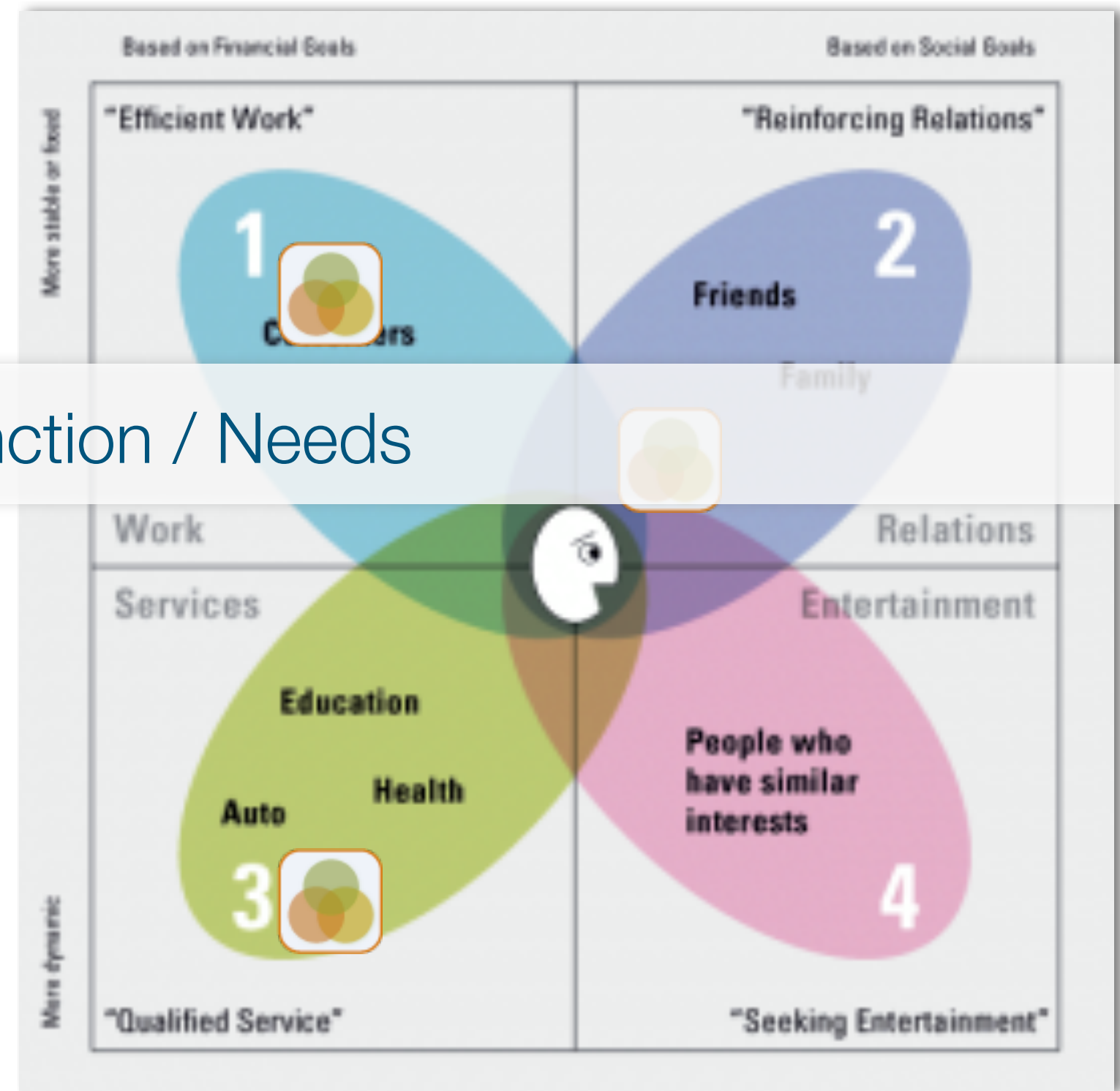
<--- Tune In Share out app enables:
 Personal Governance - control over personal health / direct action.
 Social Discourse - being able to see friends on map / Many to Many
 Many to one via FB, Twitter, etc.

Social Discourse / Mobile Life



Tune In Share out app enables: <---
 Personal Data management through geotagging able to be switched on or off.
 Location based sharing --> to a collective map = collaborative health
 fits few levels in Maslows Heirachy

	People Actor Subject	Goal Action Verb	Content Material Object	
Sharing	People	share	content	
Contacting	People	connect	with others	
Collaborating	People	create	content	



Actor / Action / Function / Needs

Tune In Share Out Application sits comfortably in:

- I. Services,
- II. Reinforcing Relations
- III. Efficient Work categories.



= where Tune In Share Out sits

Based on Financial Goals

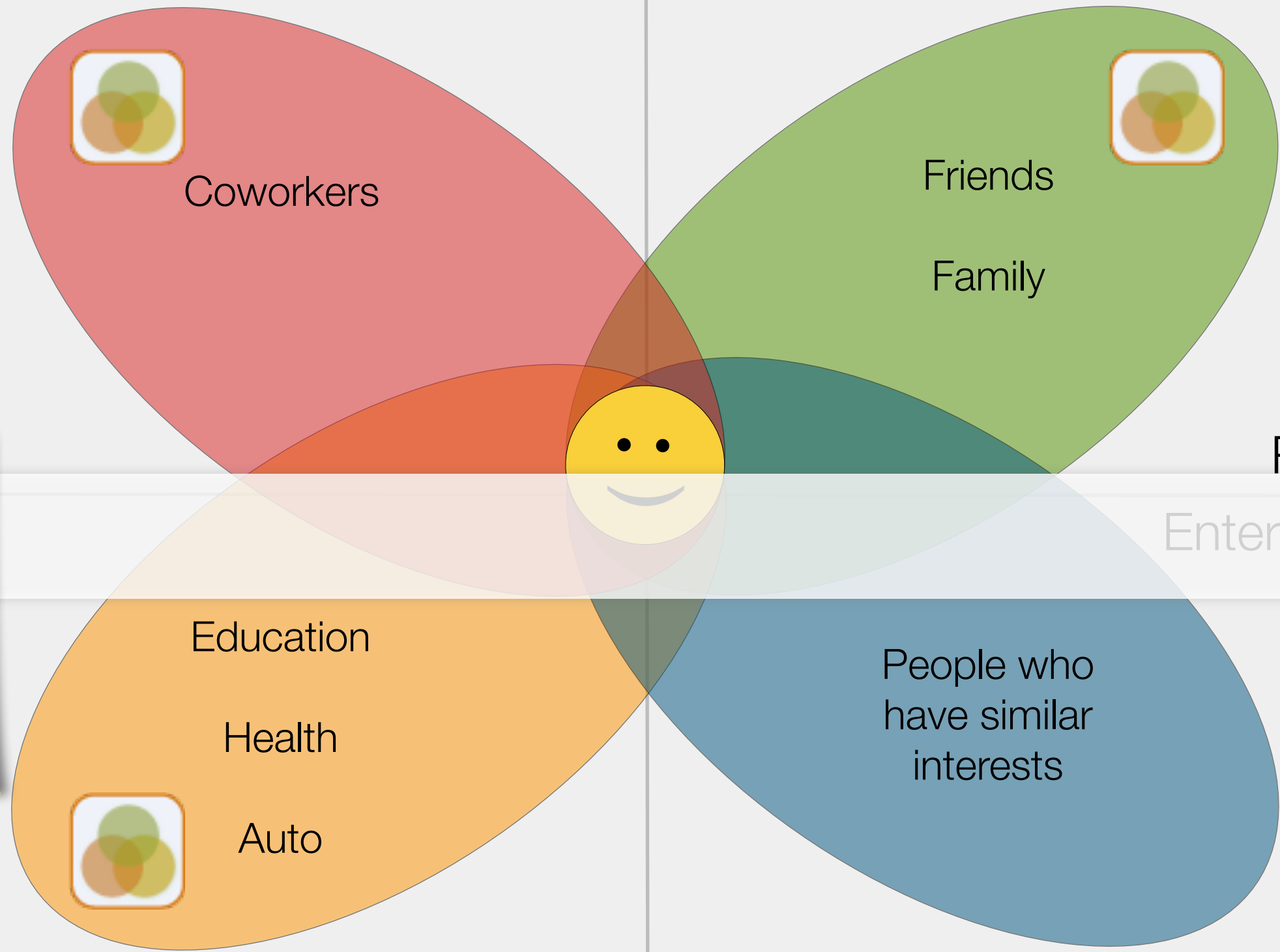
Based on Social Goals

Tune In Share Out
Application sits
comfortably in:

- I. Services,
- II. Reinforcing
Relations
- III. and Efficient Work
categories.

“Efficient Work”

“Reinforcing Relations”

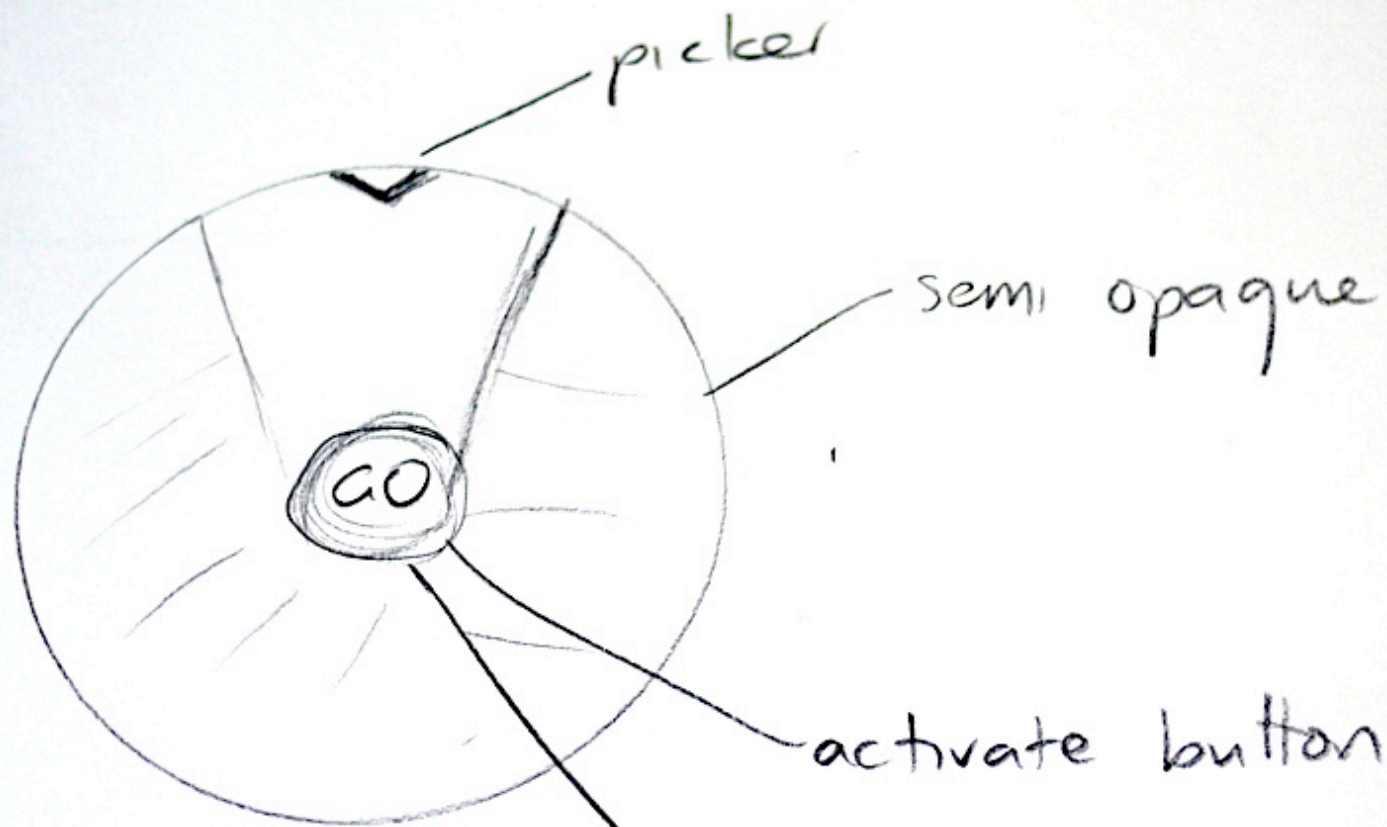


“Qualified Service”

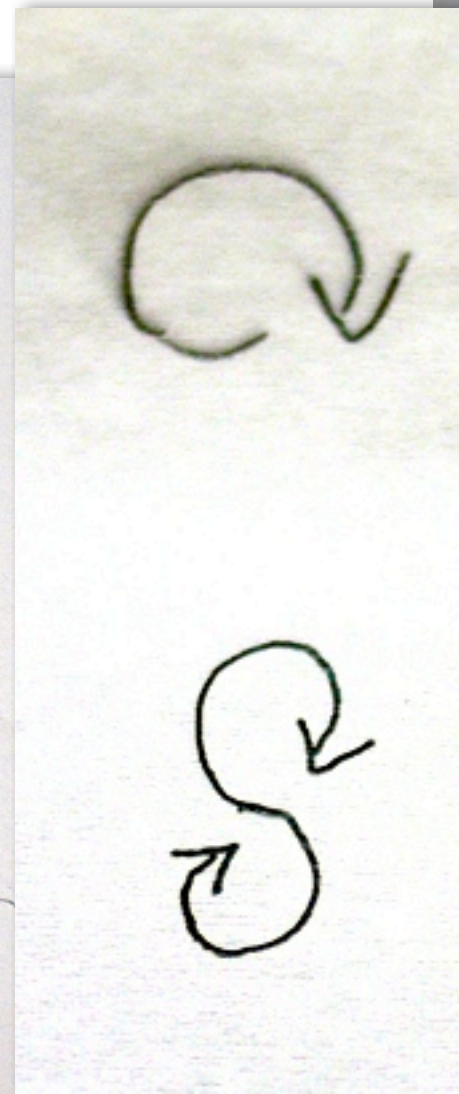
“Seeking Entertainment”

**My Version of
previous
diagram-keep?**

Relations
Entertainment



make sure theres no popup
like in astrology app



Circle of Life

Gaia Theory

We are all connected
(whether / weather we like it or not!)
Nuclear / Volcanoes / Acid Rain / Pollution... -
we share it all.

Hence the interest and exploration in circular
navigation.

Also a clever way to display multiple navigation
choices without overwhelming the viewer.

Progressive Disclosure = Circular Wheel Interface

Circular Navigation Exploration

Sonic Circular Sound
<http://www.whitevinyl.design.com/solarbeat>

dynamics are complex
 - players represent settlers establishing colonies.
 - trade victory cards (icons)? pts.
 'Cities & Knights' alt names.
 'Trades & Barbarians'

Japanese me (kana)
 hiragana ㇰ
 katakana ㇱ

postcode 6011 me
 6011 molcu

degrees of the gods
 foundational to those societies
 institutions, religious practices, technologies, behaviours, mores & human conditions that make civilisation, (Sumerians) possible.
 Fundamental to the Sumerian understanding of the relationship btw humanity & the gods
 me environment

me wii
 remote play / active participant.

NLG

My Welly
 Brainstorm

What does a name convey?

Maori word for you
 you = korua
 koutou
 outou

connect me

'Te Upoko-o-te-lka'
 Head of the fish
 Maori name + NLG

Wikipedia: me
 The object form of I (pronoun)
 Sci & Comp
 Me - keyword in programming languages.
 MoE - Ministry of Education
 Master of Engineering
 Mechanical Engineering
 Mix/Effects - vision

maori word 4 me
 to me = ahaku
 me = ahau
 my of me = aku
 for me = moku

winner simple reminds me of moku chin tattoo - marking

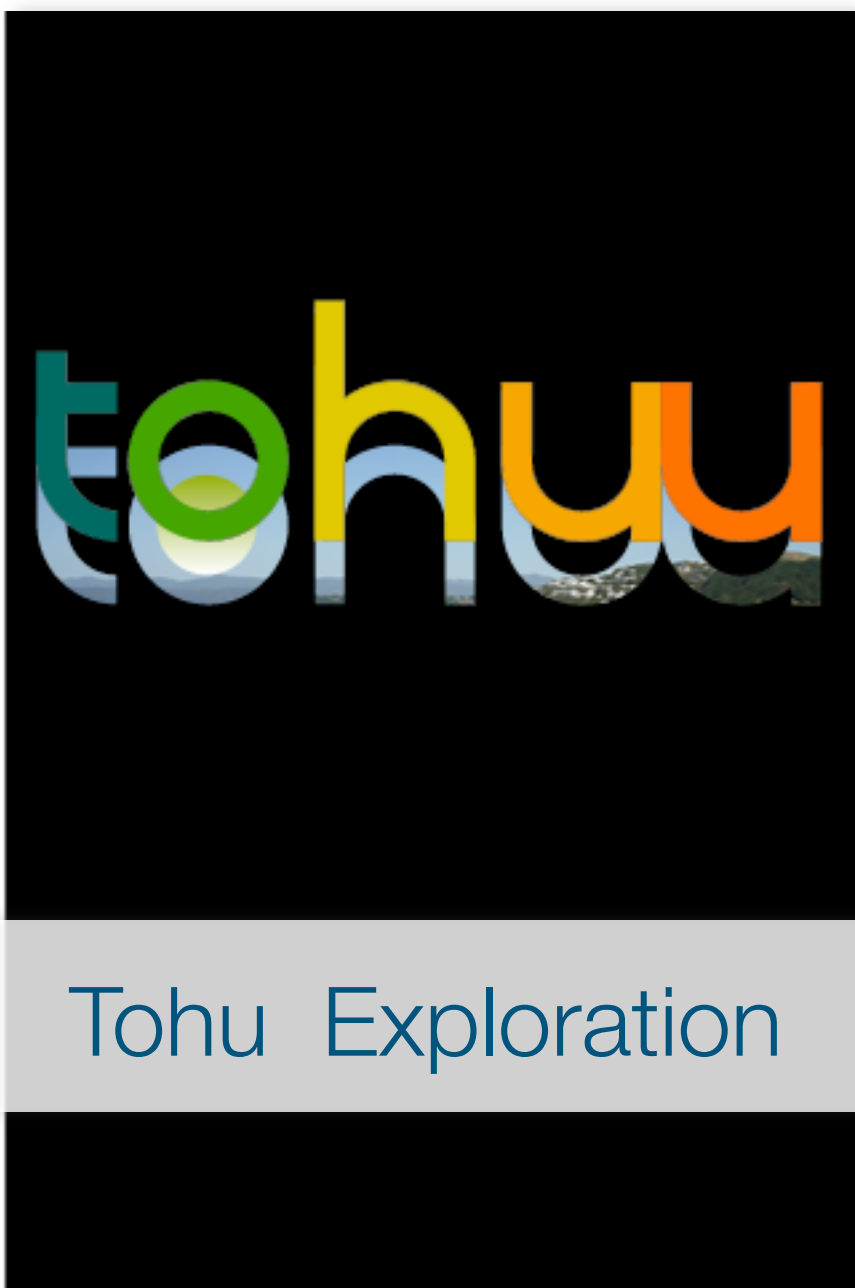
- green blueprint? - too long.
- welly mood - moodboard of your own version of welly. - flicker images. / colour code emotional maps interface personalise
- relationship / map. system
journey. personal story / track changes over time.

design your city / smartstreets. street. → intellicity → info feedback loop to council? city speculation



MyWelly Exploration

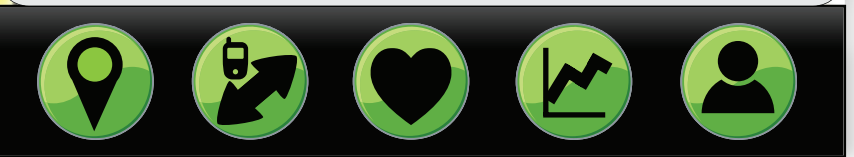
- users feel connected to own city.
- uses design to ^{re}imagine/speculate on city.
- become part of the social network of the streets / 'cultural probes' Gaver et al 1999

no longer is speculation just franc

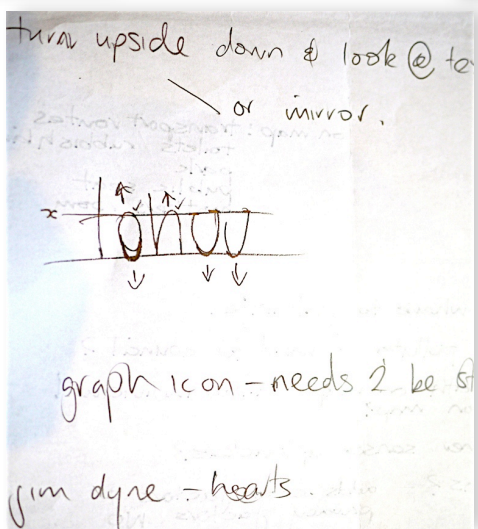


MY FAVOURITE SITES

Add favourite site locations to this list by tapping the location  pin once (which will then change colour) then tap the favourites  button on the main tab below to automatically add to your favourites list automatically.

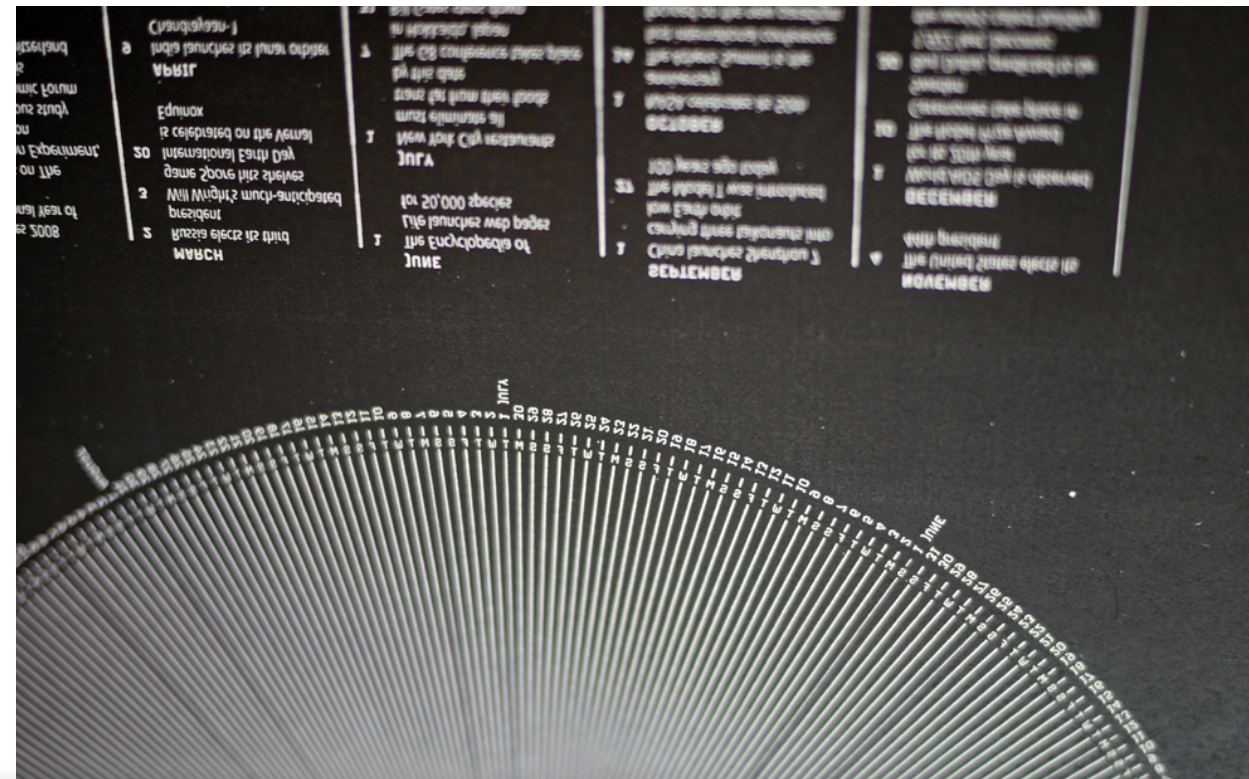
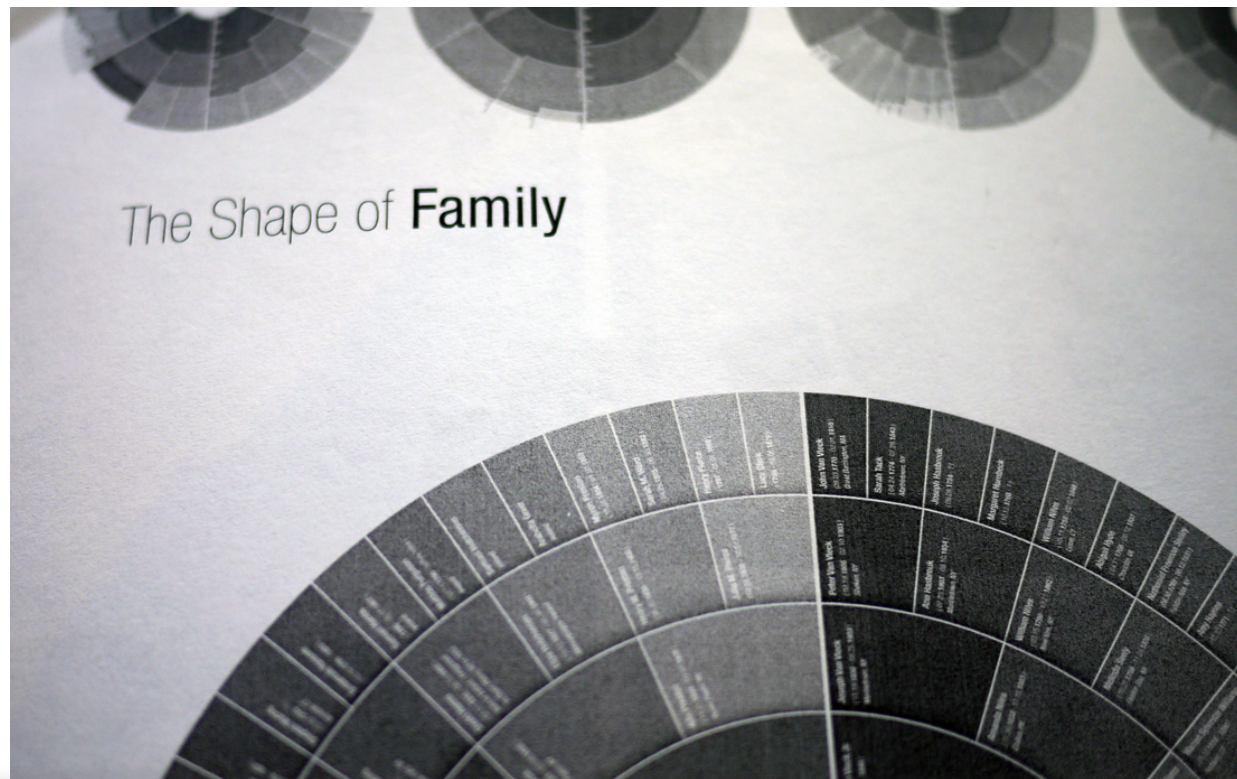


One early front screen idea - connecting above and below / sky (air) & water (earth). App details fades through fronds.

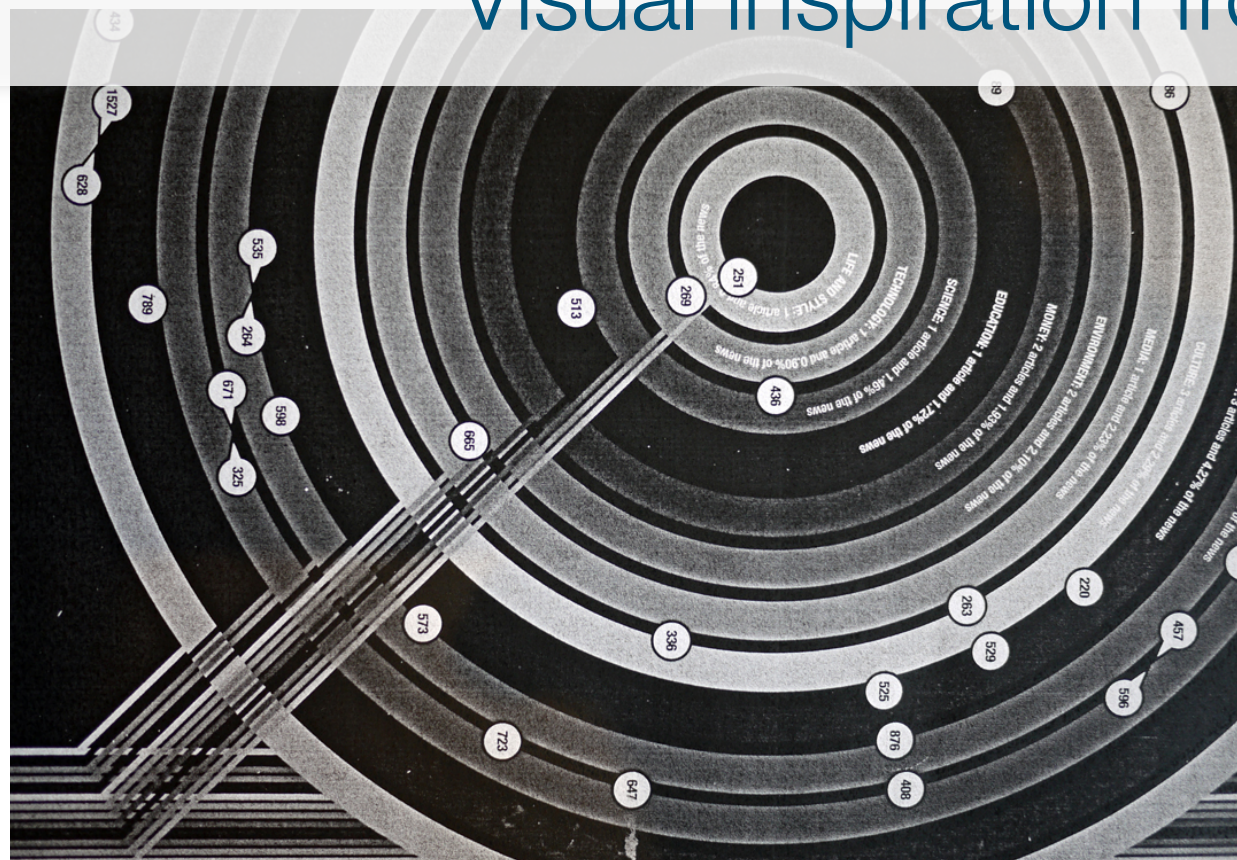


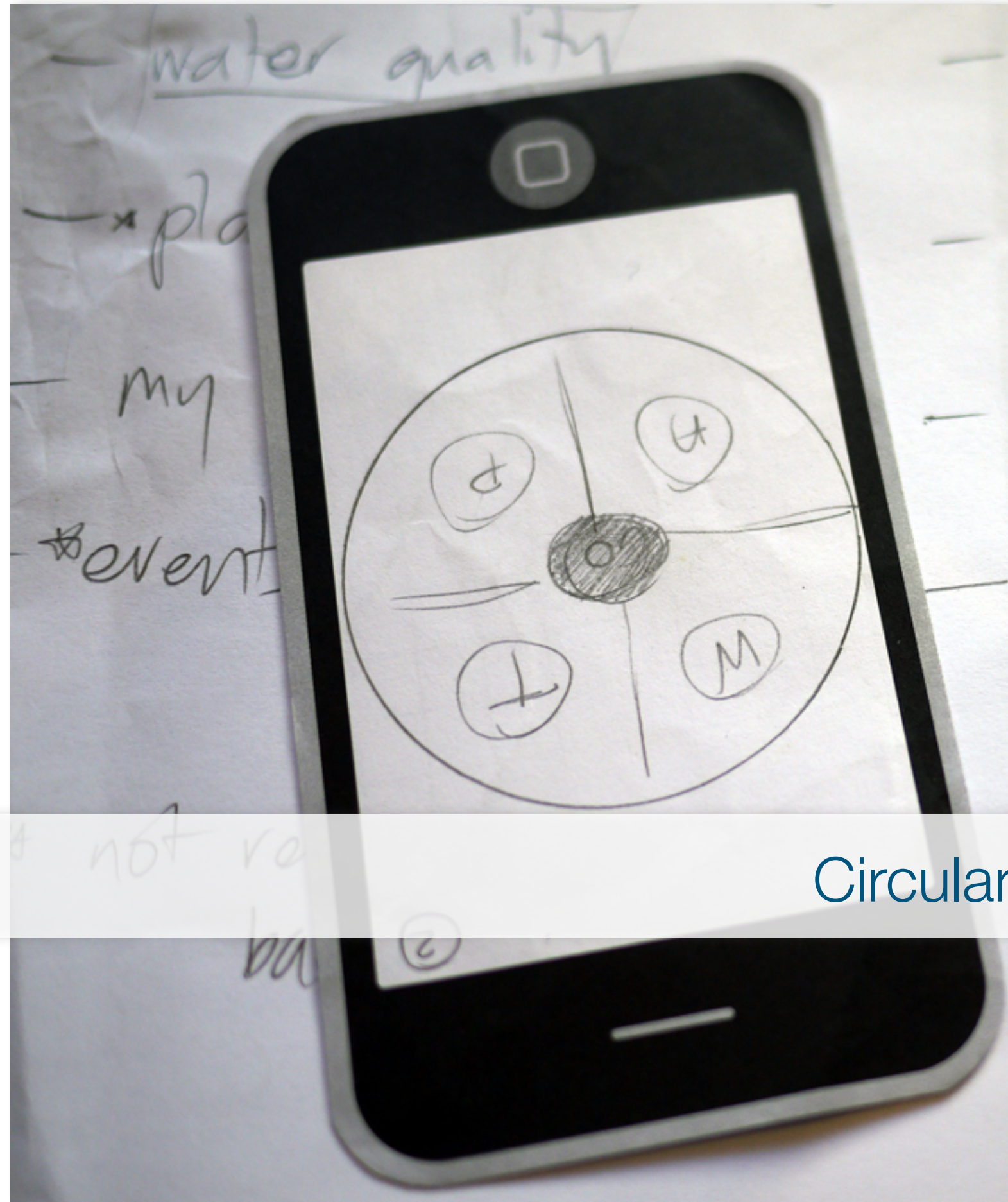
Front page idea - let the individual personalise parts of the app. Include fav. photo under app main text. An extension of contributing ideas to the city's wellbeing / needs.

This page is too explanatory. The learning curve for touch screen mobile use (eg. iPhone) owners is quick and steep. Could have a pop on first use but not necessary for long term.

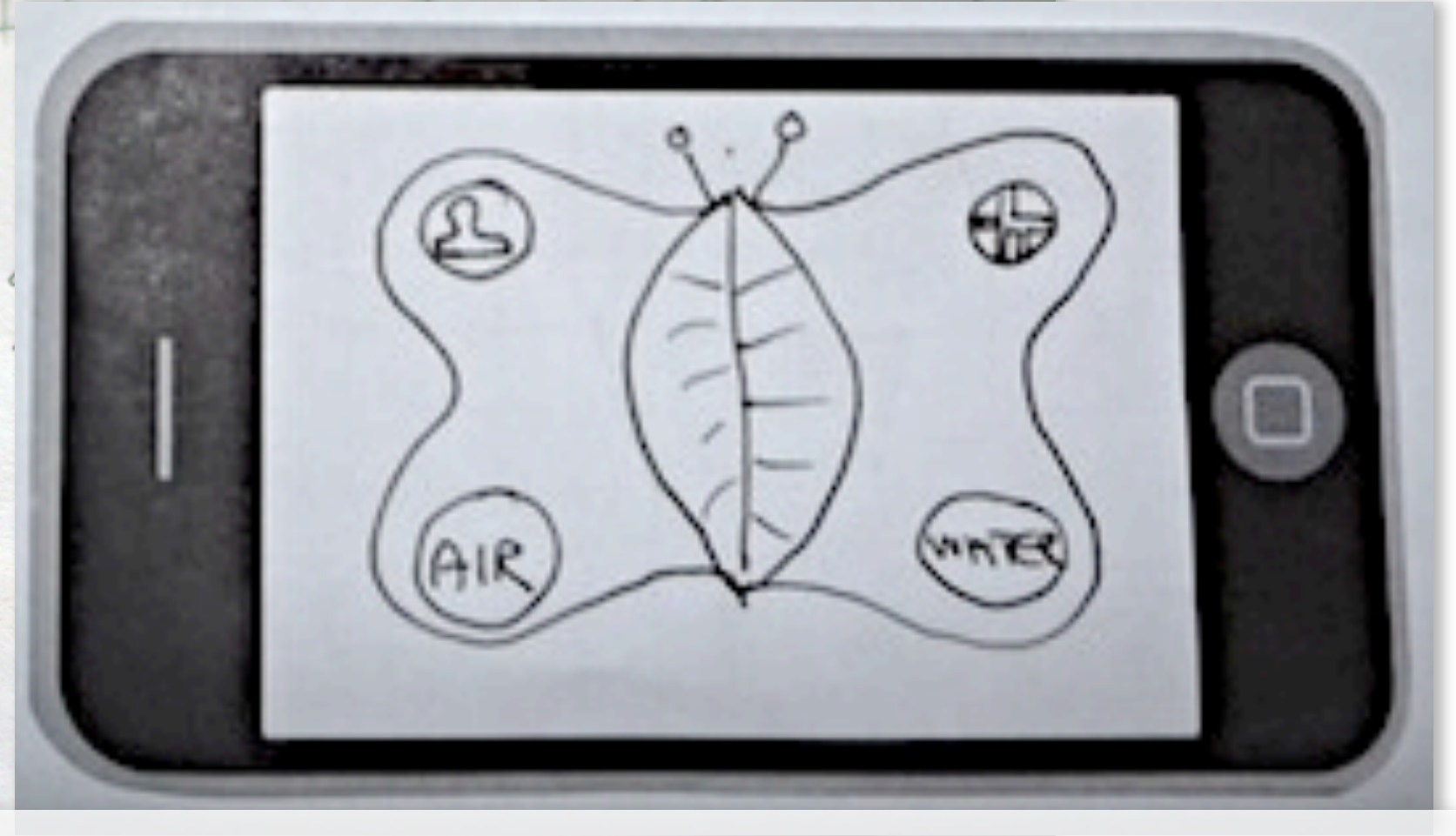


Visual inspiration from 'Data Flow' book





data overlaid on map - po
tides / water temp

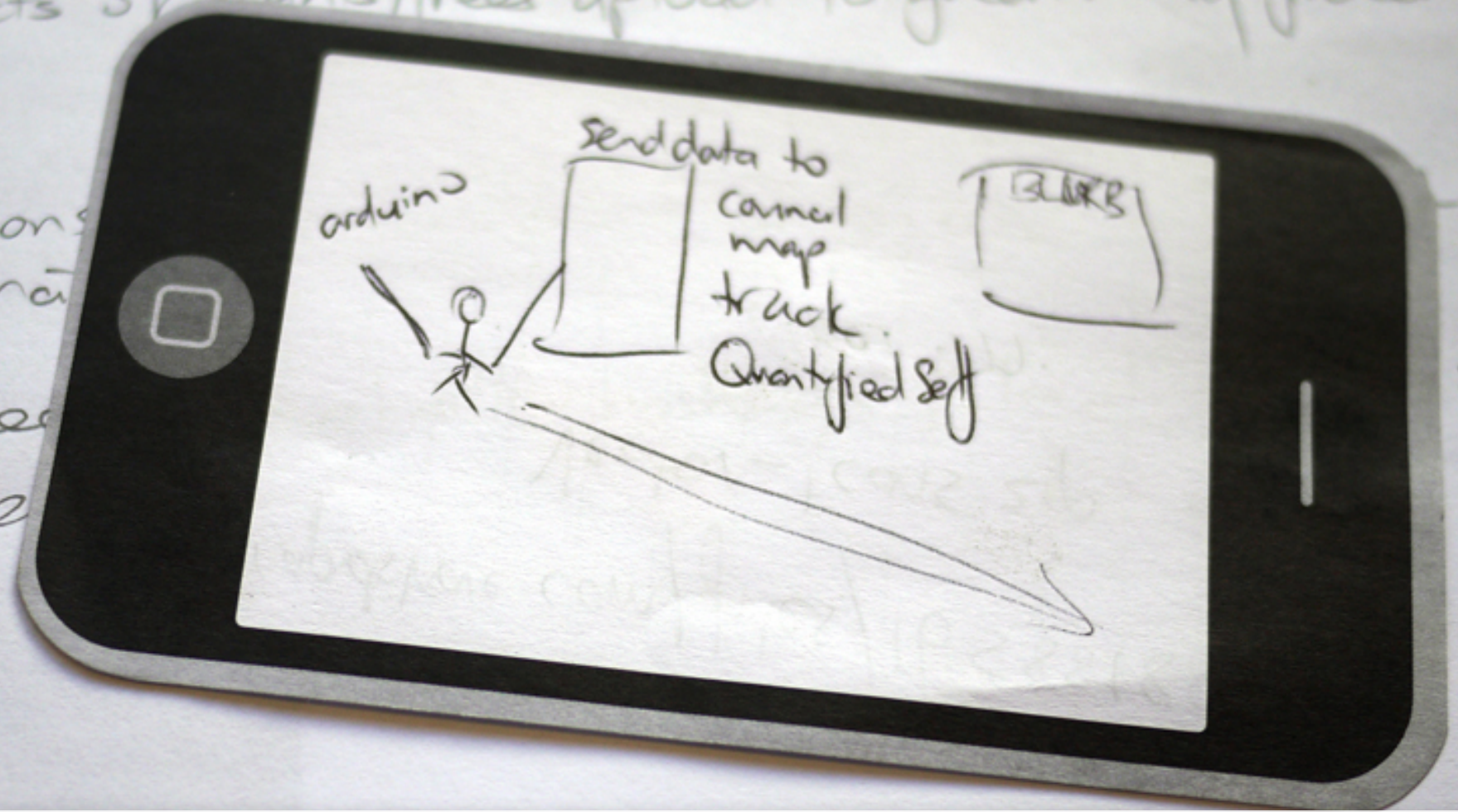


Circular Navigation

- data overlaid on map - pollution graph/sparklines
tides / water temp

- take pics of plants/trees upload to green wally flicker set.

- drop icons
to connect
RSS feed
green e



- through
of

Human ->Arduino ->Local Governance <-> Public

- ① Map of Welly
- Rubbish
 - Eco Restaurants
 - Farmers Markets.
 -

→ have standard map w all page featured & click (like doppl) page + more specific / page

② Photos

- You welly - upload personal photos of welly today.
- can click through & narrow down to see ~~to~~ what has changed over history from same spot.

③ Infographics

- Climate Basics / story.
- ~~the~~ user can choose

Uncluttering / Deleting Functionality



- colour coded according to mood?
Daily Tip



How many segments do I need?



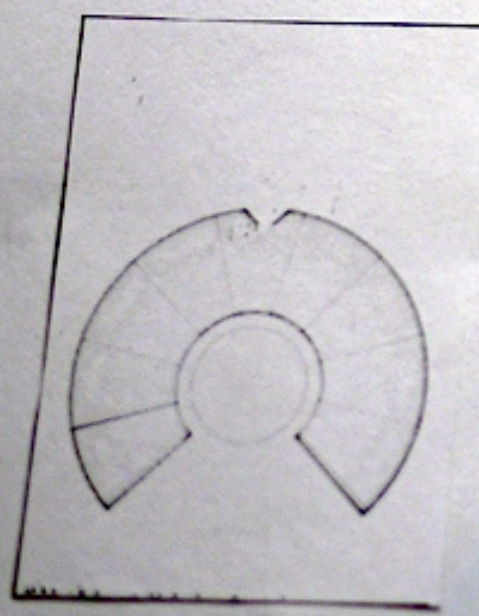
- change background tint according to mood



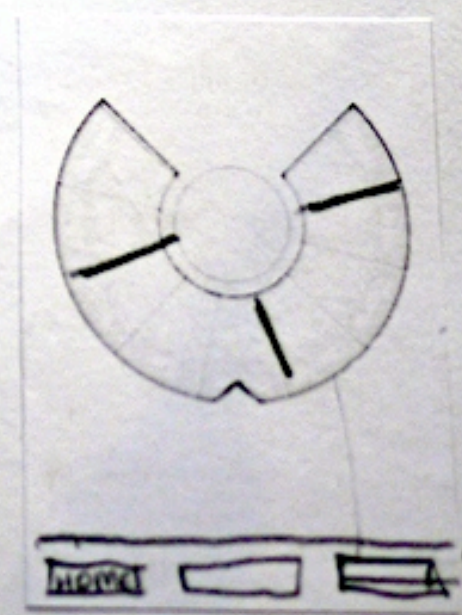
Integration

arranged / ordered by date / topic

If Colour Affects Mood - Change App Colours To Enhance Health



mood
Tired = soothing vs intense colours?
Happy - yellow & (blue)?
Sad - pink? tones.



IDEAS
- Print Page @ bottom
Email Image
Subscriptions?
4 Art

Circles Cir

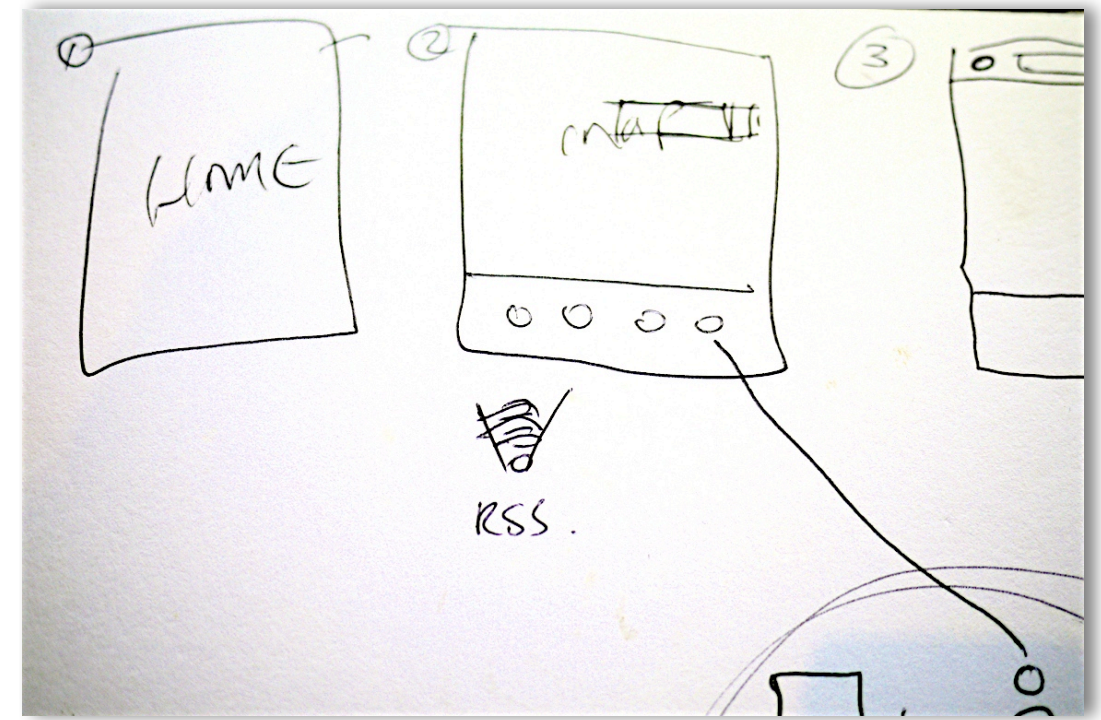
"Climate Cycles are much longer than human cycles"

Earth Air Fire Water - humanistic studies p.32 of the Environment Bk.

Hoki - lives 4 over 100 yrs.

Age of Fishes / Fishing / overfishing

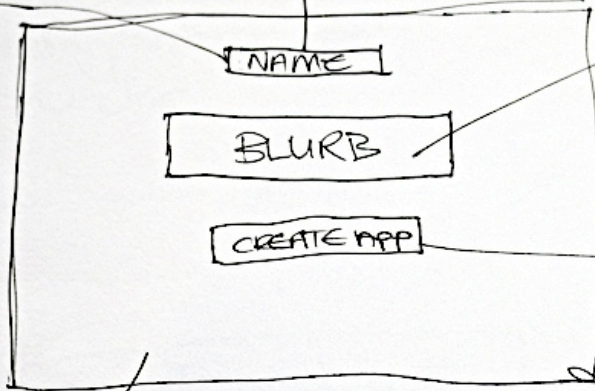
- BOOKINGS ①
- HISTORY ②
- CONSERVATION ③
- CONTACT . f
- SPONSORS S
- TEAM 0



my eco? personalise.

Notes

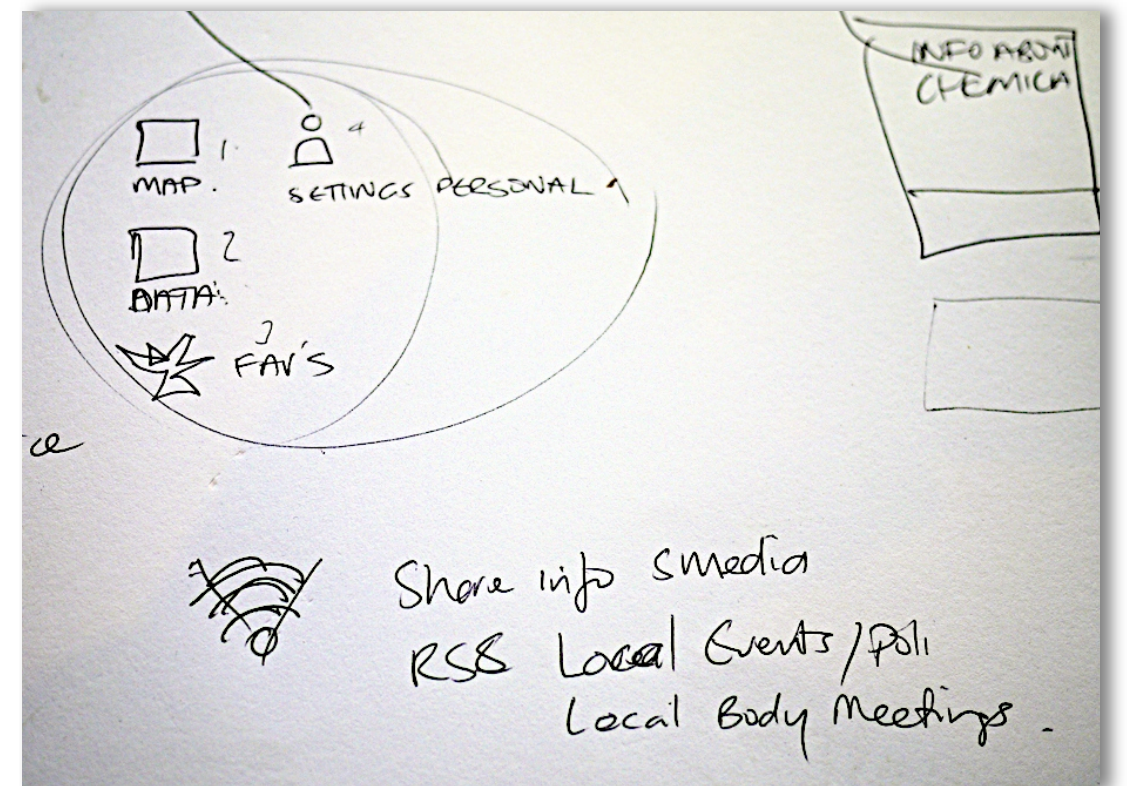
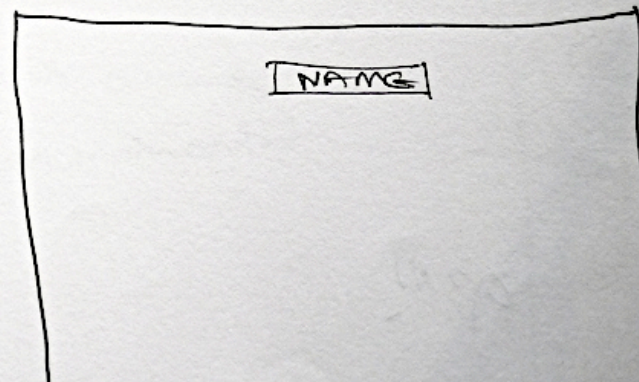
always brings back 2 home page.



Background info Intent / Purpose.

Create Personalised App.

Simple doesn't overwhelm straight to action from front page.



Tipping Points.

start of time history / plant growth / human life?



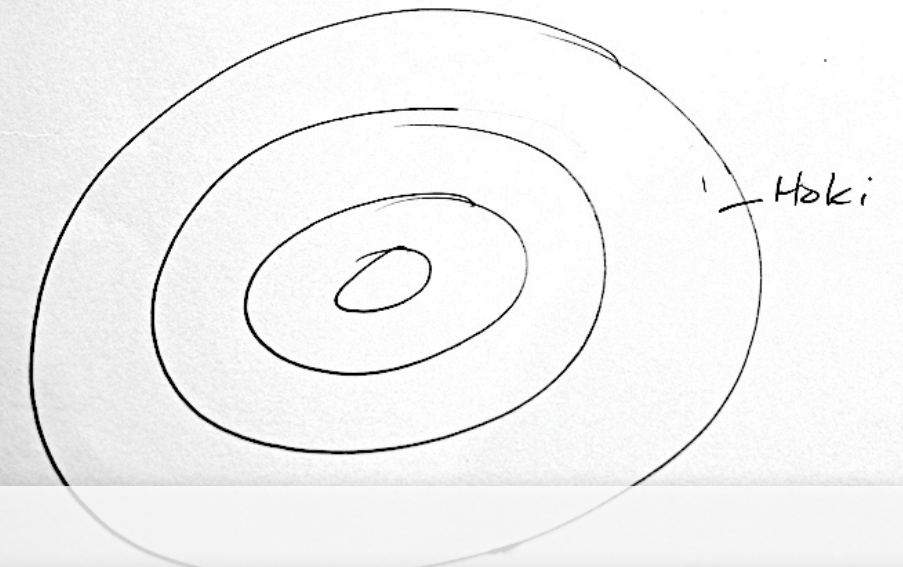
Infographic / Interface ideas

Layering of diff animals groups based on:
- their order in food chain
- critical placement in heirarchy i.e if bees disappear so to will plant life in four years.



Hoki - lives 4 over 100 yrs.

Age of Fishes / Fishing / overfishing



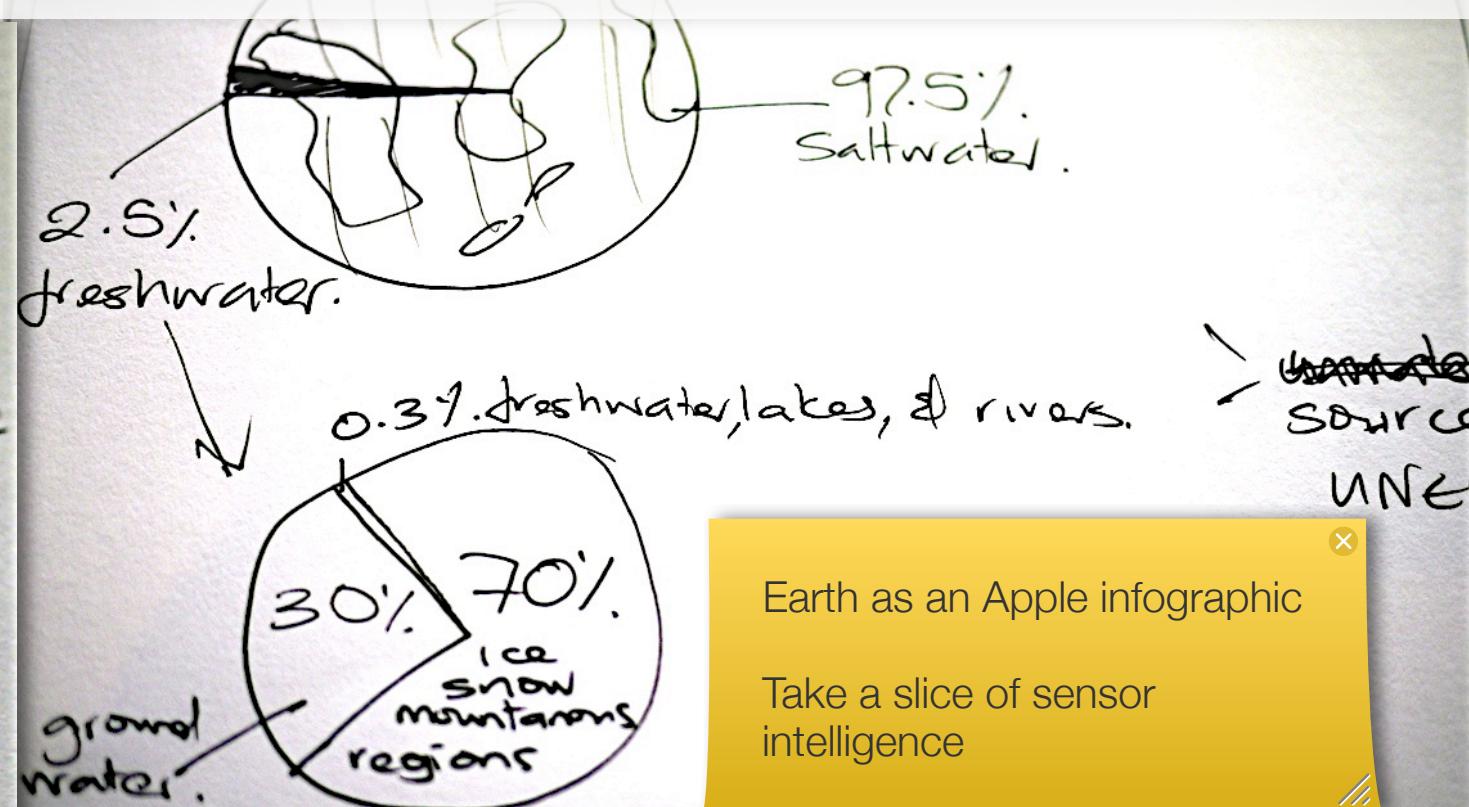
Water / Sea Health / Sustainability

Water Use.



Source (UNWAP)

Water scarcity affects 1/3 people of world.



Earth as an Apple infographic

Take a slice of sensor intelligence

Personas

Lab Research.
- perceived experiences.

Qualitative Analysis

Field Research
- observation.
- social networks (online & off)
- self image
- usage environment.
- intensity of use.
- motivations
- roadblocks.
- error tolerance.
- natural inquiry

ends Feature Debates
allows cross dept connecting/thinking

Bibliography / ~~Plan~~

Zeljko Fugaz Provoke/ClickSuite
Building High Performance Personas slideshare.

"The Persona Lifecycle" Pruitt, Adlin

"The Inmates are Running the Asylum" Alan Cooper

Generation Stereotypes

Generation C ^{content} - tech savvy - create own content/user profiles / ^{use of the} creative class /
(trendwatching.com/trends/GENERATION_C.htm)

2 main drivers fueling trend.

- 1) The creative urges each consumer possesses.
We are all artists but until now neither had the guts or the means to go all out.
- 2) Manufacturers of content creating tools:
- ever cheaper more powerful tools being pushed / offered 2 us. The race is on to get them 2 create, to produce & to participate

- * Marketing - Canon - telling customers that "professional digital photography is no longer just for the professionals"
- * mobile phone companies & telco's - encouraging them to go pic-crazy - upload 2 dedicated websites
- estimates by 2008 more than 380 million camera phones will have been sold worldwide.

- * Pew Internet & American Life Survey
- study showed 44% of US adult internet users (53 million aged 18 & over) have created online content - eg blogs, contributing 2 websites, sharing files
- 21% of internet users have posted photos on websites, & 20% say they have allowed others to download video or music files from their computers.
- 7% have webcams that let others see live pictures of themselves over the net.

Stereotypes

sub / inclusive / groups of Gen C.

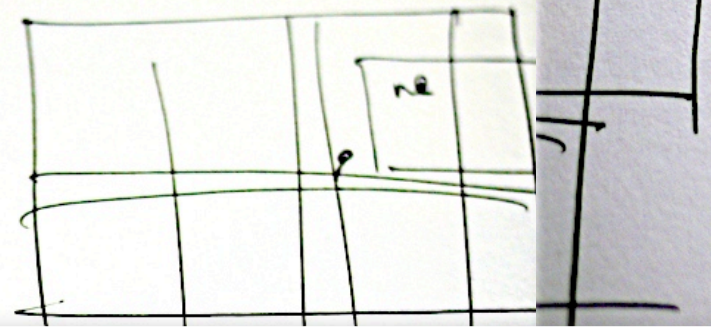
- ONLINE OXYGEN → 600 m users worldwide are considering online access (24/7) a necessity. ^{hotspots free wifi access increasing all the time}
Spain France & Netherlands leading the broadband access figures. ^{- new cars w/ inbuilt wifi + planes buses etc.}
- OLDBIES → hundreds of millions of consumers who after having net access for more than 3 yrs are becoming comfortable w/ digital creation.

Personas

	①	②	③	④	⑤	⑥
<u>Considerations</u>	Alexis.S	Barbara	James	Peter	Kirsty	Brenda
Occupation	Graphic Designer.	Mum	Bach of Science Student. Part-time	Hippy and Baby Boomer Retiree	Enviro Activists	Tech savvy early adopter
Education	Bachelor of Graphic Desi	High School	High School + bachelor current	5th Form Cert.	Bachelor of Environmental studies	Masters in Computer Science
Income Level	\$ 85,000	\$ 20,000 + husband salary	\$ 25,000	\$ 60,000	\$ 55,000	\$ 100,000
Age	49	35	21	65+	39	38
wants 2 do networking (1-10)	5/10	6/10	6/10	7/10	9/10	8/10
wants 2 do the right thing (1-10)	7/10	7/10	6/10	8/10	9/10	8/10
has access 2 info (scaled 1-10)	7/10	7/10	8/10	7/10	9/10	9/10
Comfort Level w/ Technology (1-10)	8/10	5/10	8/10	5/10	6/10	9/10
Goals	<ul style="list-style-type: none"> • Grow her business • Improve her knowledge about recyclable products • Buy a 'prius' 	<ul style="list-style-type: none"> • learn about enviro issues - so she can educate her children • occasionally meet people through like-minded activities • learn about local pollution & children's safety 	<ul style="list-style-type: none"> • document his surrounding life using his new phone • be aware of enviro events • uni research. 	<ul style="list-style-type: none"> • put something back into surrounding community • make new friends • keep the brain active w/ new data 	<ul style="list-style-type: none"> • be aware of enviro groups that are operating outside of her work • assist in groups wherever she can w/ knowledge & support. 	<ul style="list-style-type: none"> • to experiment w/ all types of gadget • learn about levels of pollution in local area so she can decide when to travel
Available Time	Time Poor.	Time medium.	Time Rich. medium	Time Rich	Time Rich	Time Poor.
how they plan to interact w/ the site	<ul style="list-style-type: none"> • on the go - in between meetings • evening desktop research. 	<ul style="list-style-type: none"> • mobile pics of walking children to & from school • desktop research for upcoming... 	<ul style="list-style-type: none"> • moblogging his daily enviro interactions • desktop research 	<ul style="list-style-type: none"> • desktop research 	<ul style="list-style-type: none"> • documenting enviro events w/ phone camera • desktop research. 	<ul style="list-style-type: none"> • documenting moblogging daily travels.

Personas

Geographic
links to people
population/ratio



easy tick box

Dear WCC
 need pin hole plz.

send message

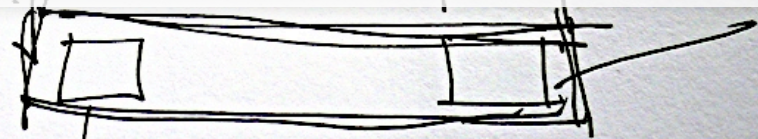
Democracy/F.

Pop up from

Good loc

Full / £
Comment

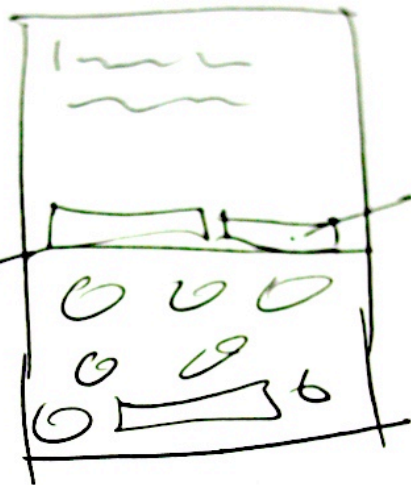
Interface Exploration



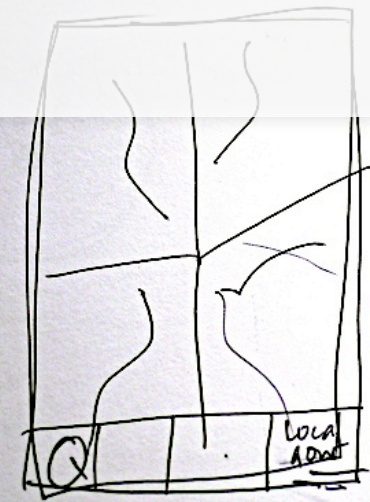
eng

post
note

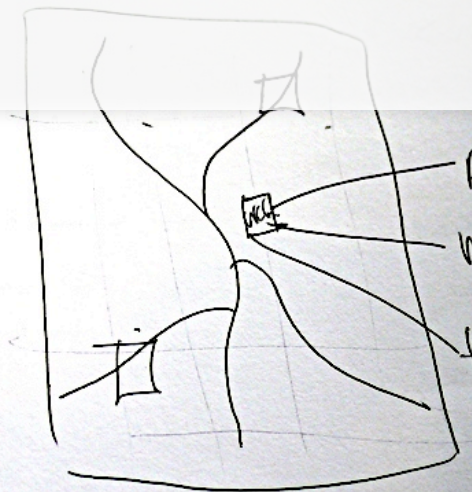
post to self
map



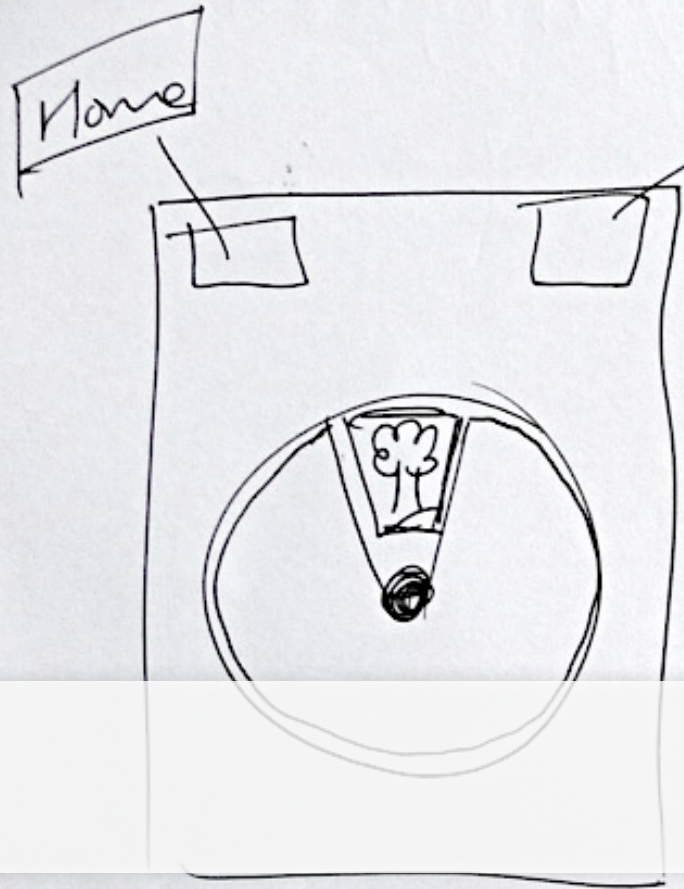
post to council
public map



publication.



Reports.
Waste feeds
prayer pot

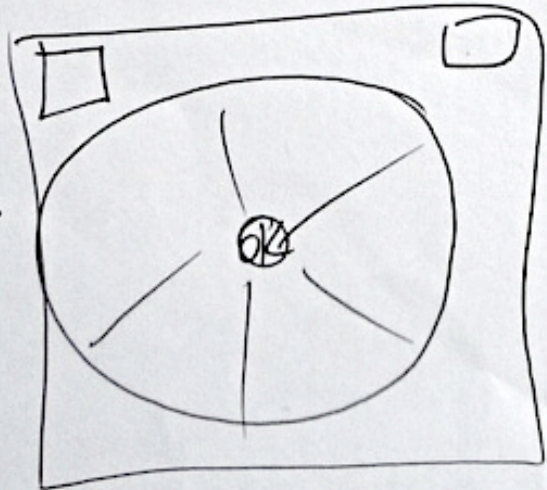
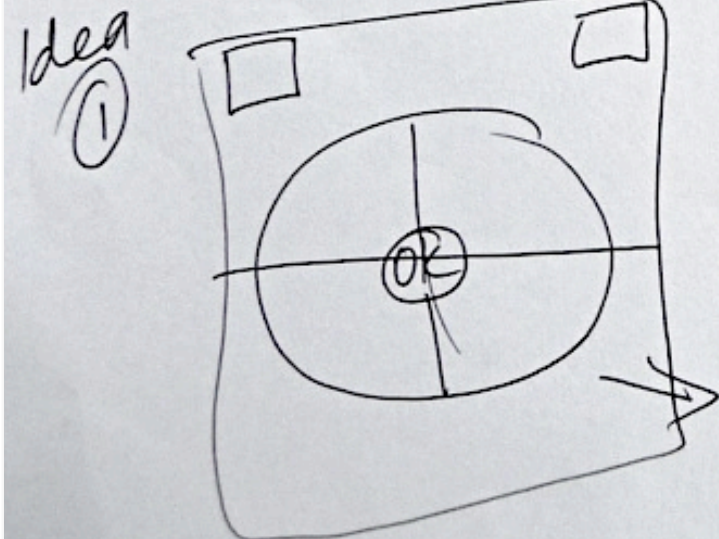


links through 2 camera @ all times for immediate access & time efficiency if see something in a split second.

Exploring Mobile App. Circular Navigation



Txt replaced w icons for ease of access
 ⑨ would people prefer in settings to choose other txt or icons depending on personal pref?



actual size

- convert bot uses 7.2 cm height
- this includes signal reception strength
- wif signal
- time
- battery strength

Trust pictures more than people
 P173
 Bk Left 2 Right
 by David Crow

Petitions (need 2 aggregate^{petition} sources 2 be effective)



(Voice)



Protests



shaking fist.

Films



projector



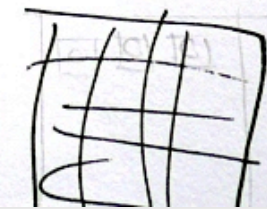
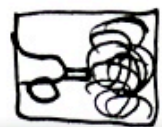
Icon Experimentation

Talks



lectern.

Pollution Updates



Daily Tip. -

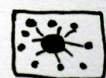


lightbulb.

Infographic



eye world



Local Events



local event



happenings



Tree Map
Rubbish



o = recycling station
[bin icon] = curbside rubbish bin.

Local Events.

occurrence, happening

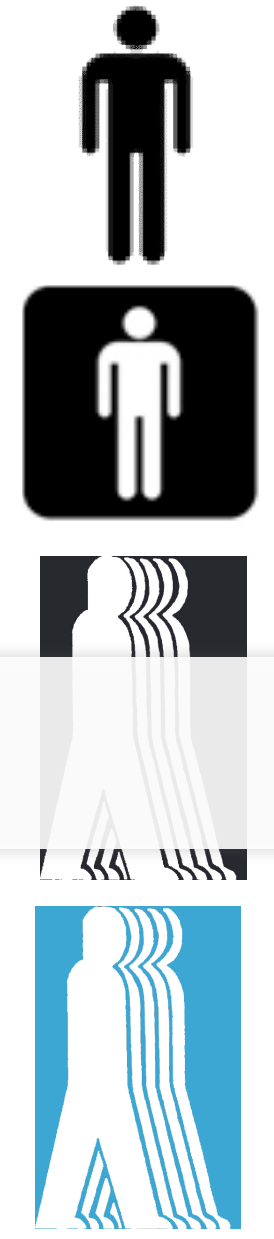
occasion, phenomenon

junction, gathering

jamming?

- Alan Kaprow 1957

AIGA International Symbols



'wellwelly' would like to use your current location

Don't Allow OK

- upload data from mobile >
- upload data from sensor >
- upload to computer >



Title

Alerts, in particular, should be used only rarely.

Cancel OK

Title

Too-frequently requesting confirmation is likely to be more annoying than helpful.

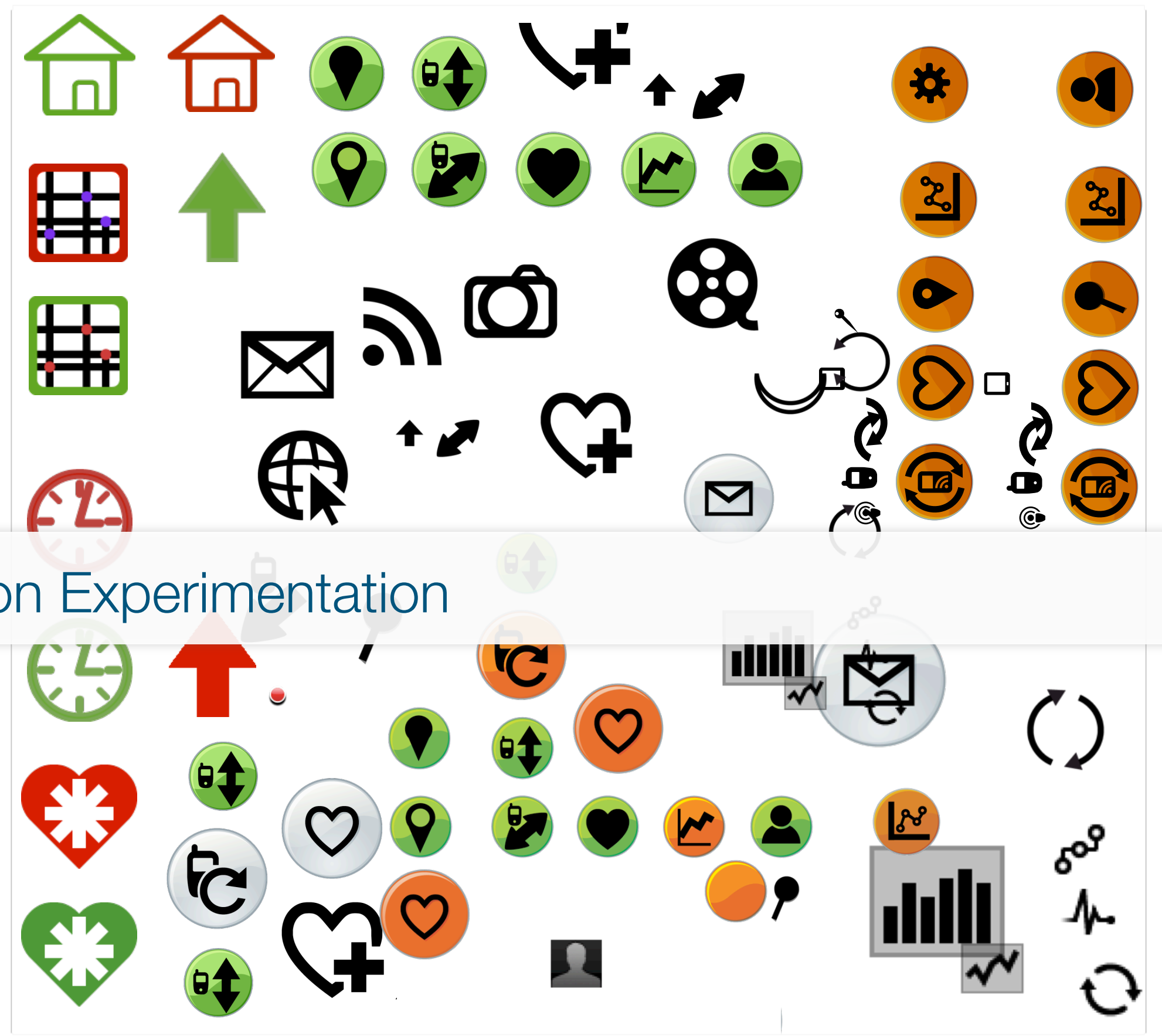
OK

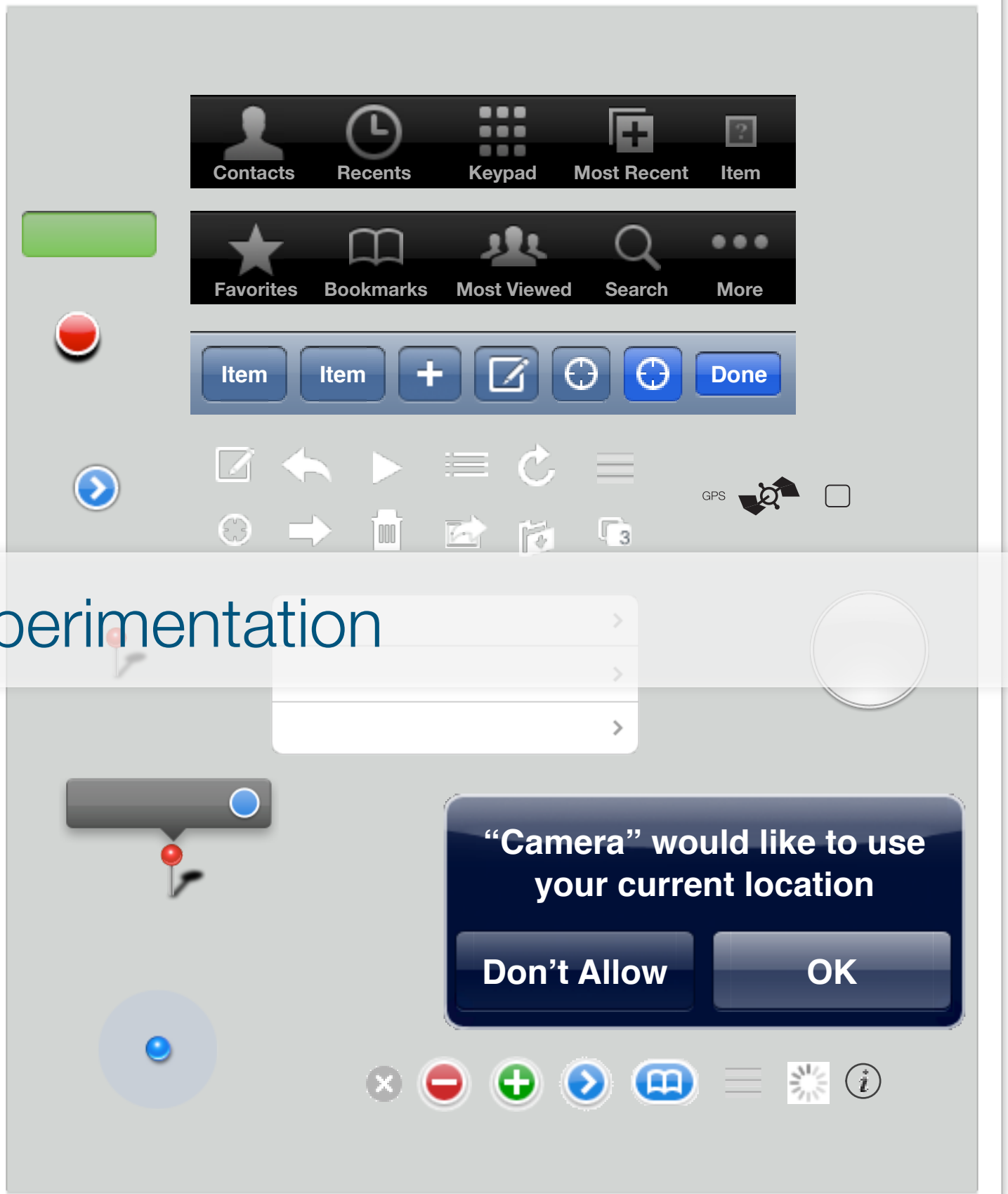
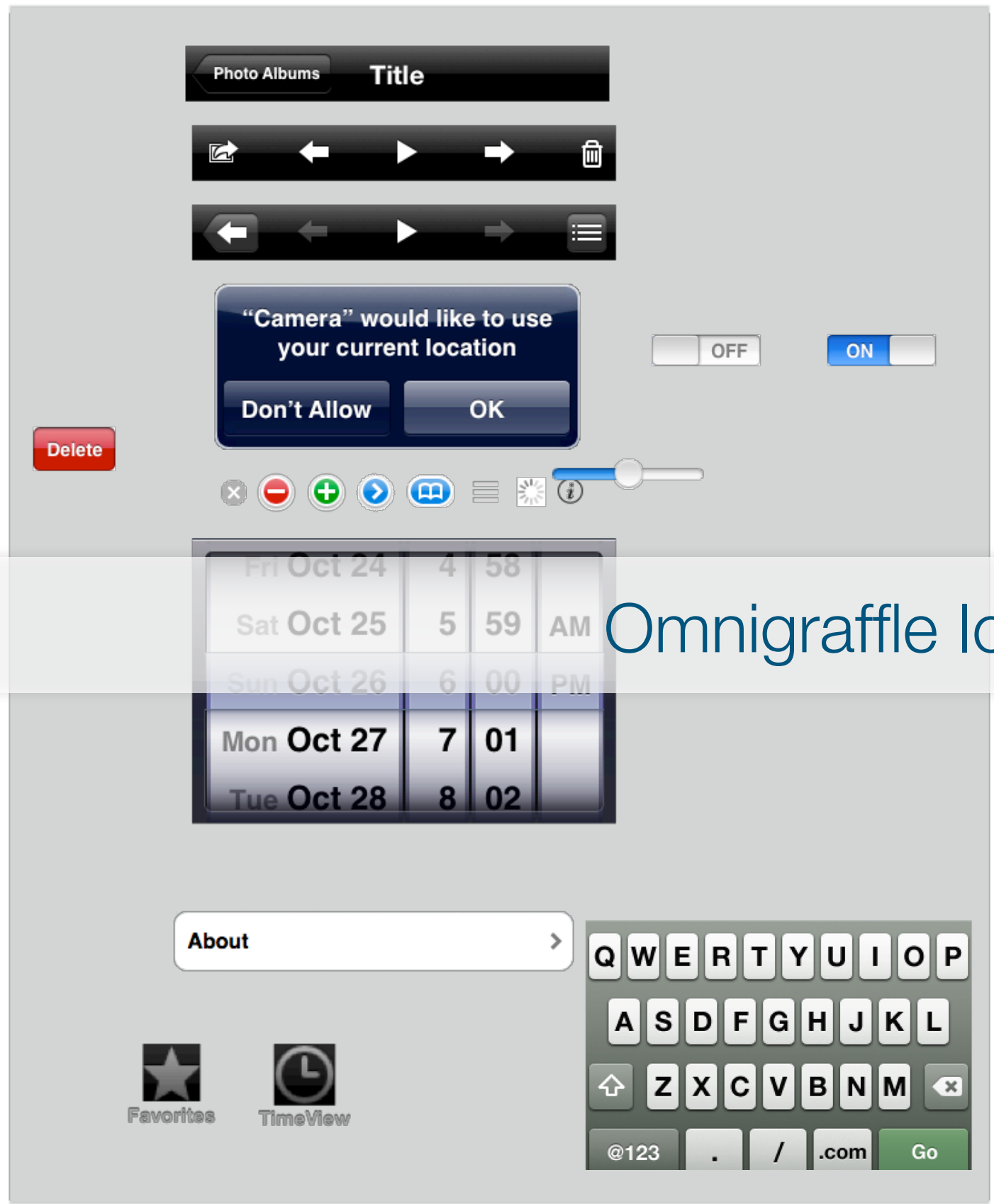


Isoman Isotype Neurath

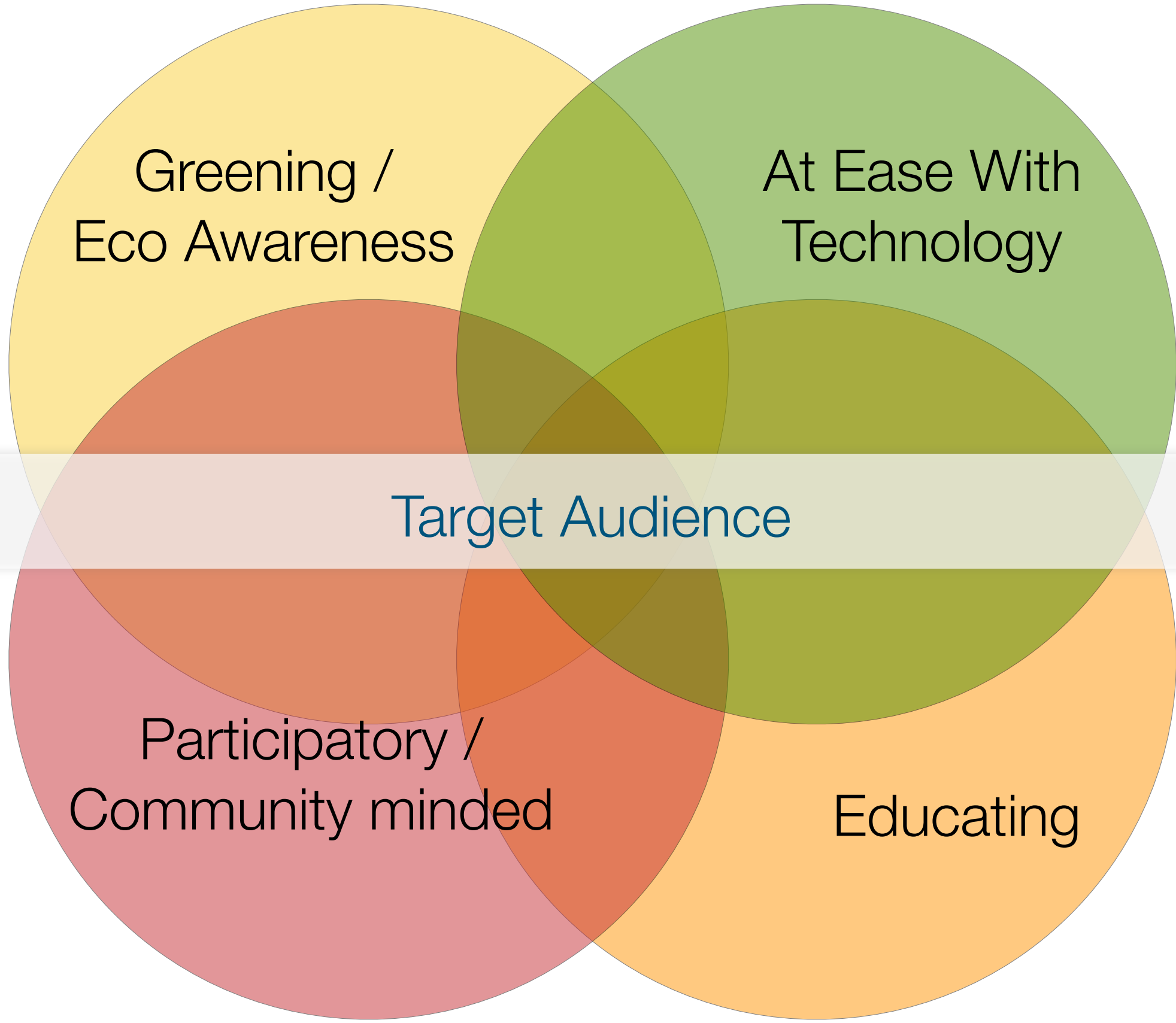


Icon Experimentation





Omnigraffle Icon Experimentation



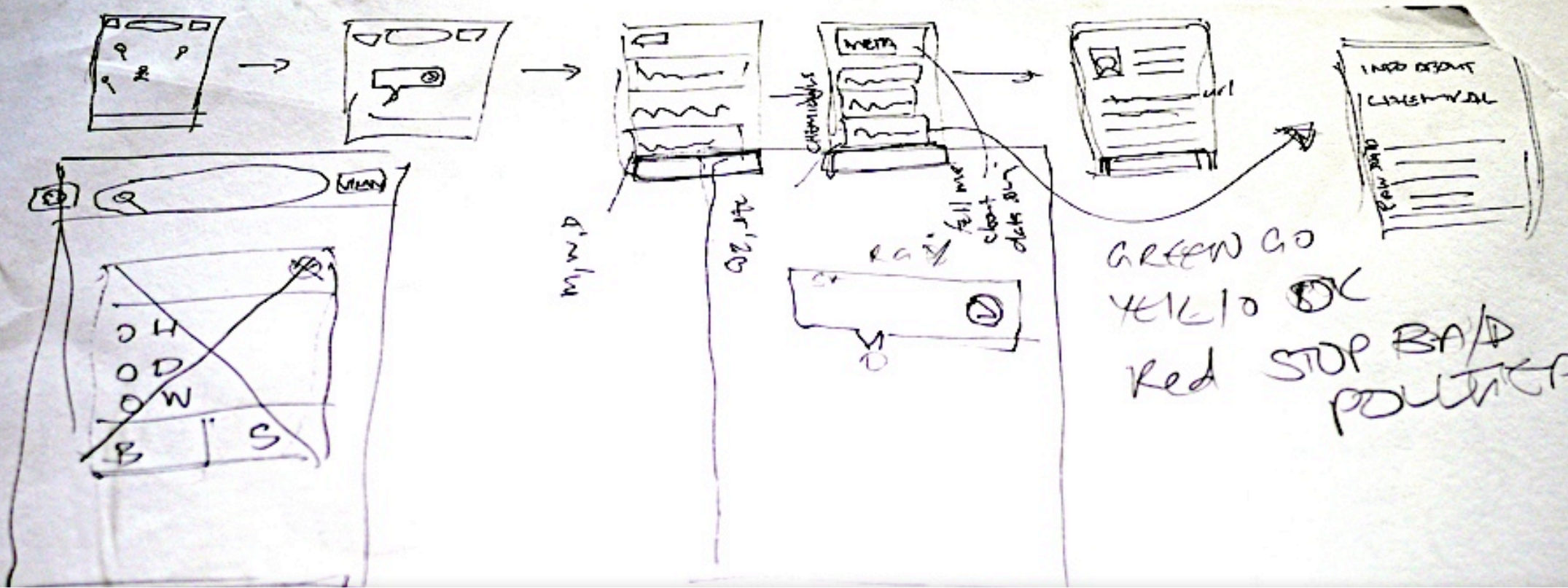
Greening /
Eco Awareness

At Ease With
Technology

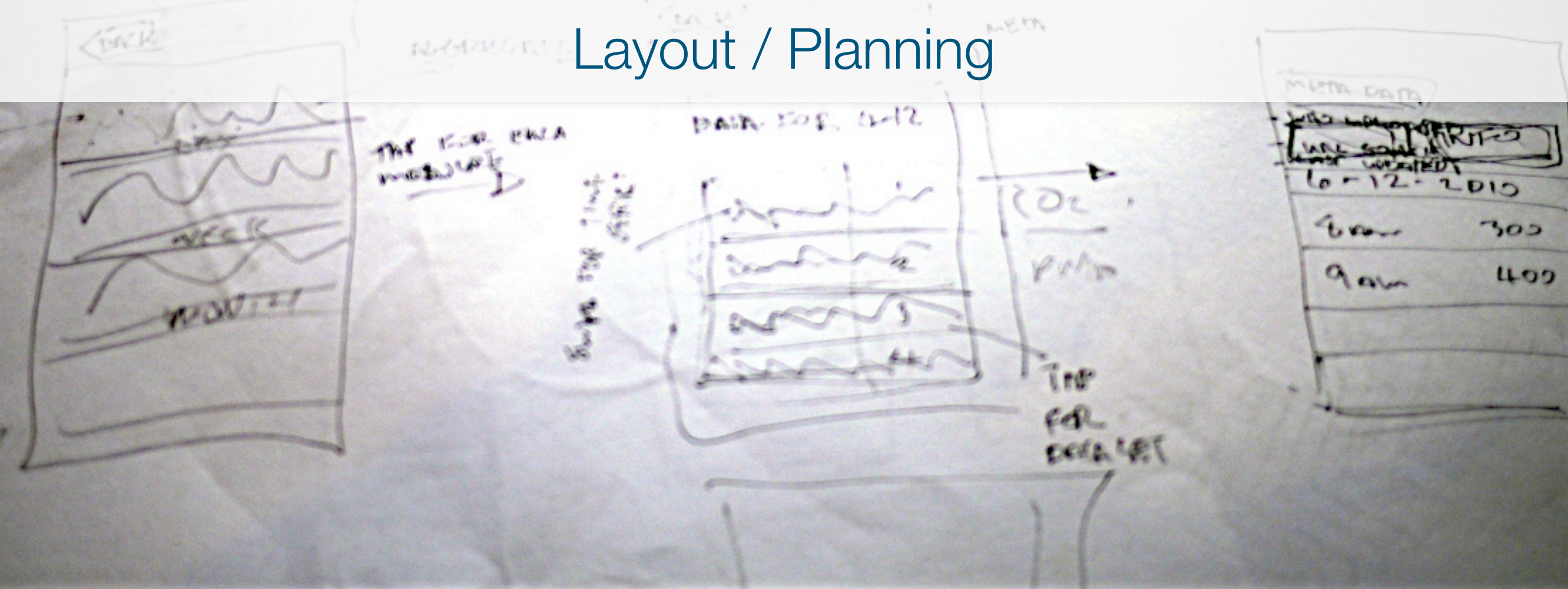
Target Audience

Participatory /
Community minded

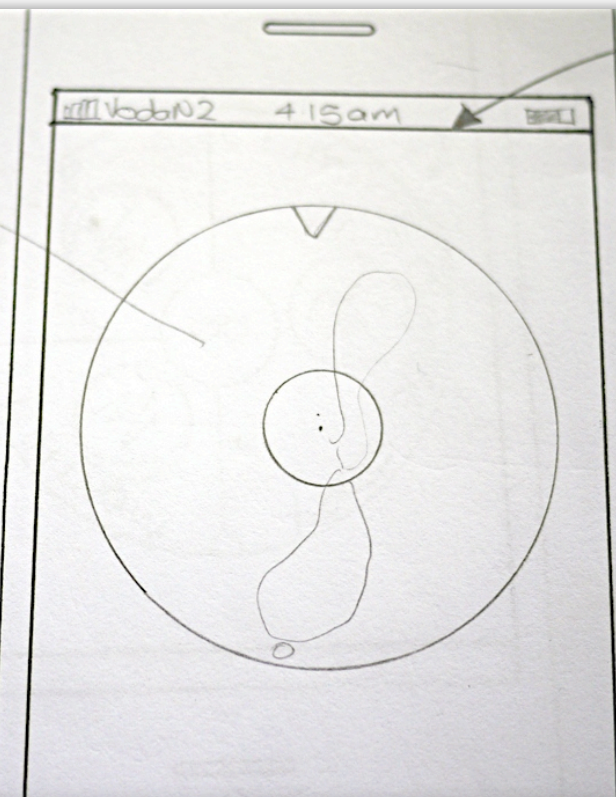
Educating



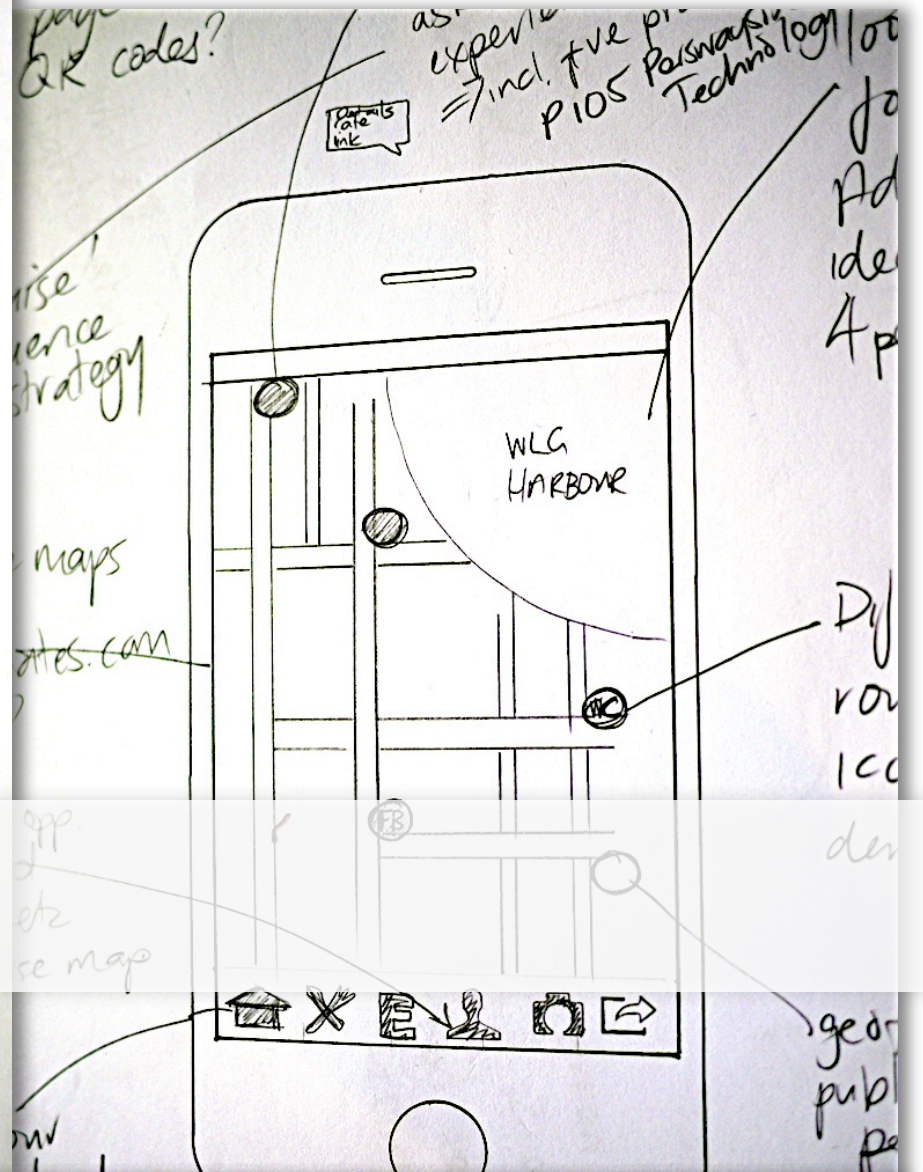
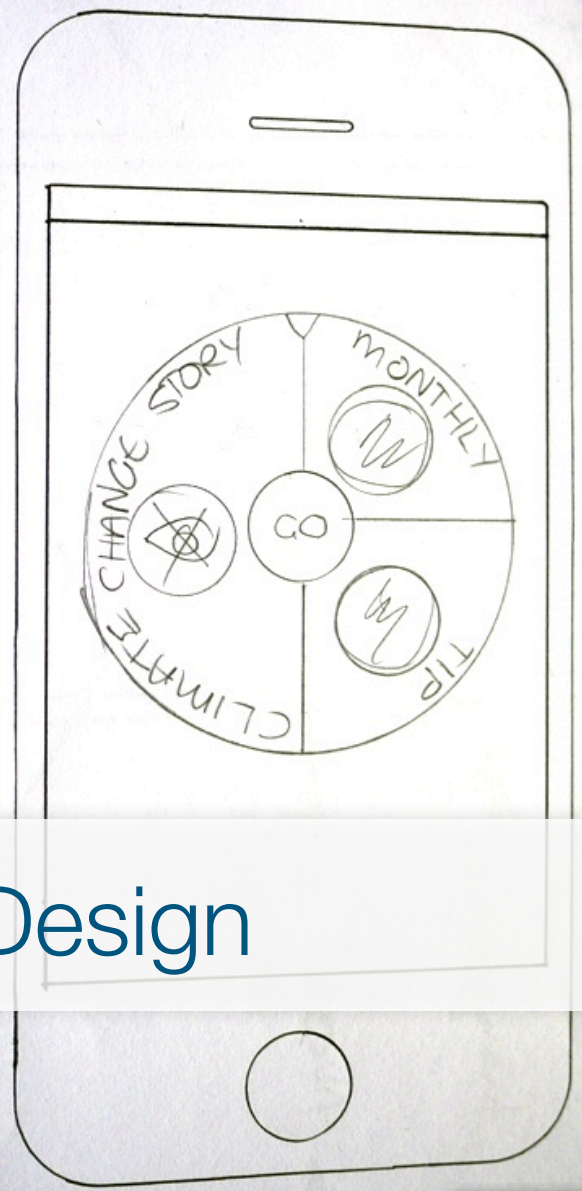
Layout / Planning



Step 1
 Loading Image
 - Pic of World on black background
 in New Zealand as main focus.



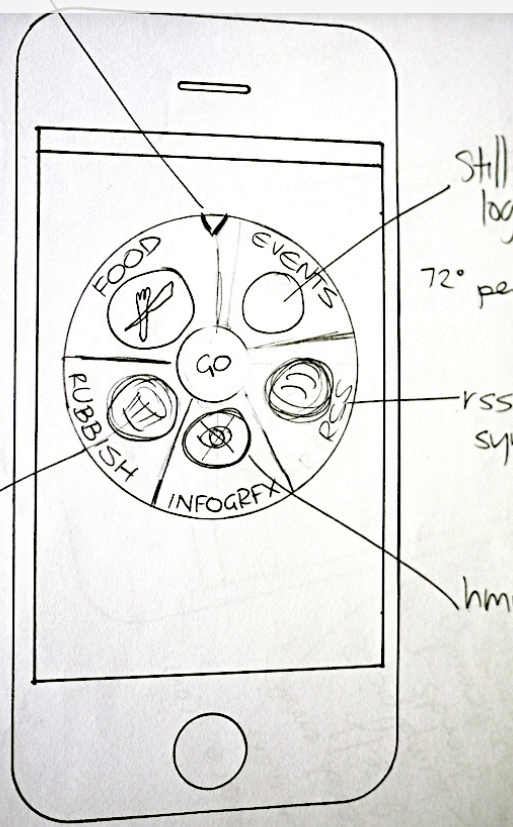
Step 2
 W
 W
 fa
 o



App. Layout / Design

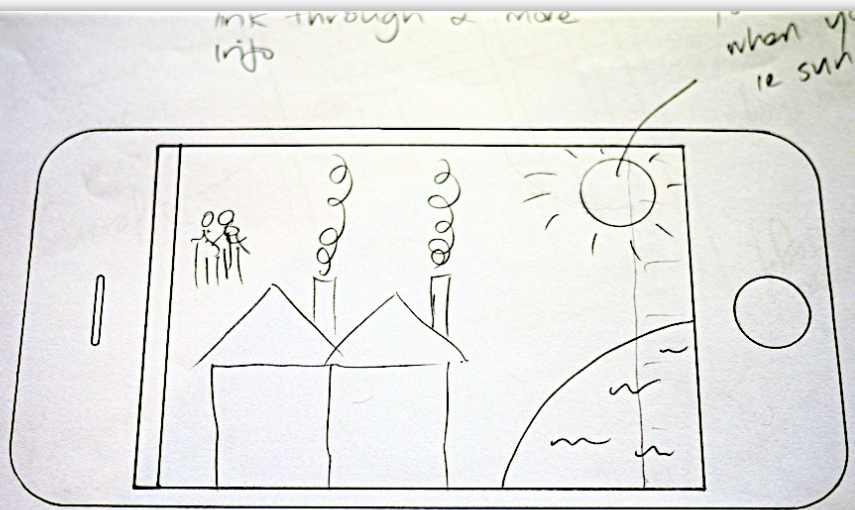
spin wheel w tap once if focus.

include Bike hirers purchase Public Transport?



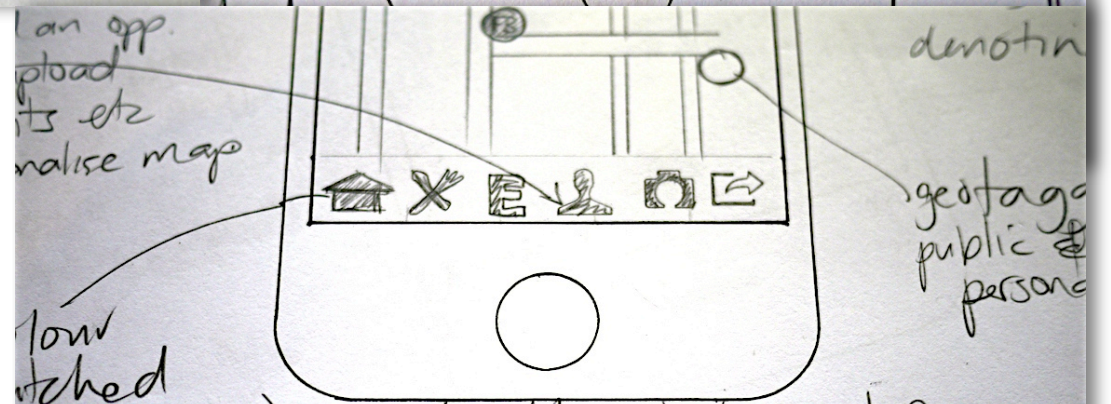
Still log
 72° per
 rss sup
 hmv

Semi cartoon style neurath modified look.



Naviga -> on picto

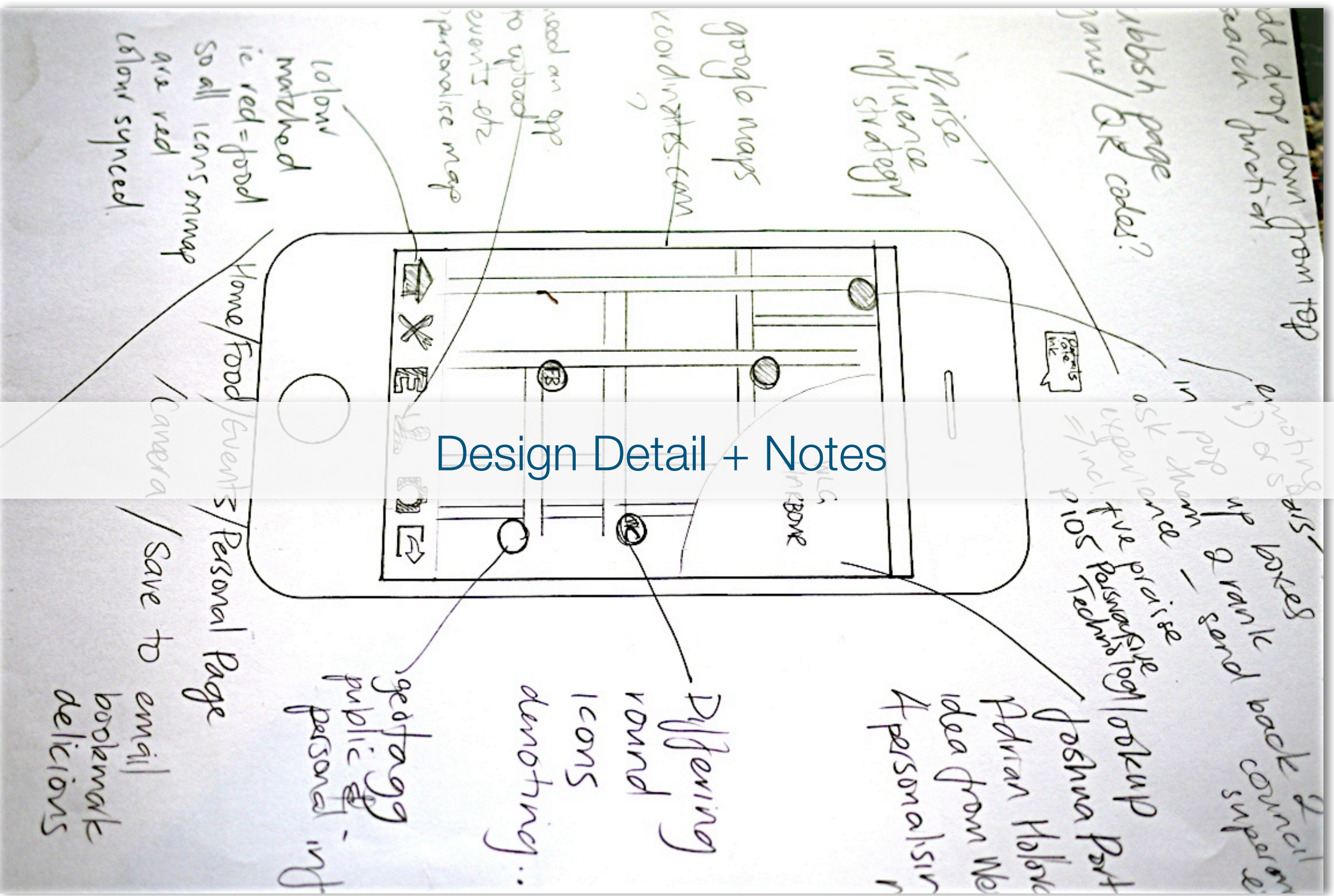
camera icon
 ve icon
 und email
 self pic
 mpls
 friends
 postcard
 friends
 nation
 ss up
 touch
 pe
 reed



Home/Food/Events/Personal Page
 /Camera / Save to email
 booked
 delic

an app. pload its etz nalise map

geotago public & persone



Design Detail + Notes

header
darker



white
lighter shade

darker
foot or

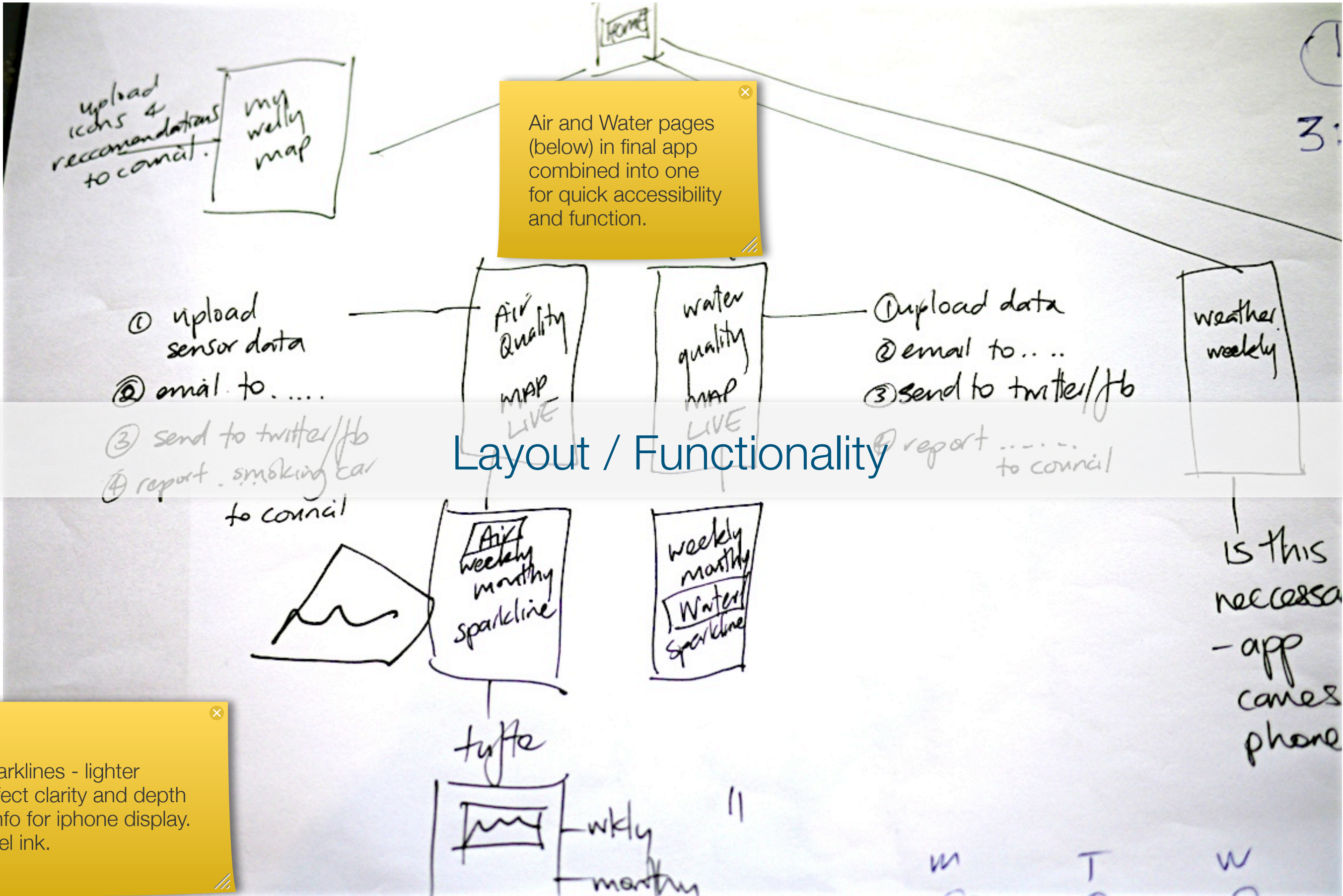
- To arrow or not 2 arrow that is the question?

Cartagen.org Maps Mobile Review

i.e is having an arrow indicative of swiping or will people just figure it out how much visual indication do I need ?



Design Sketches

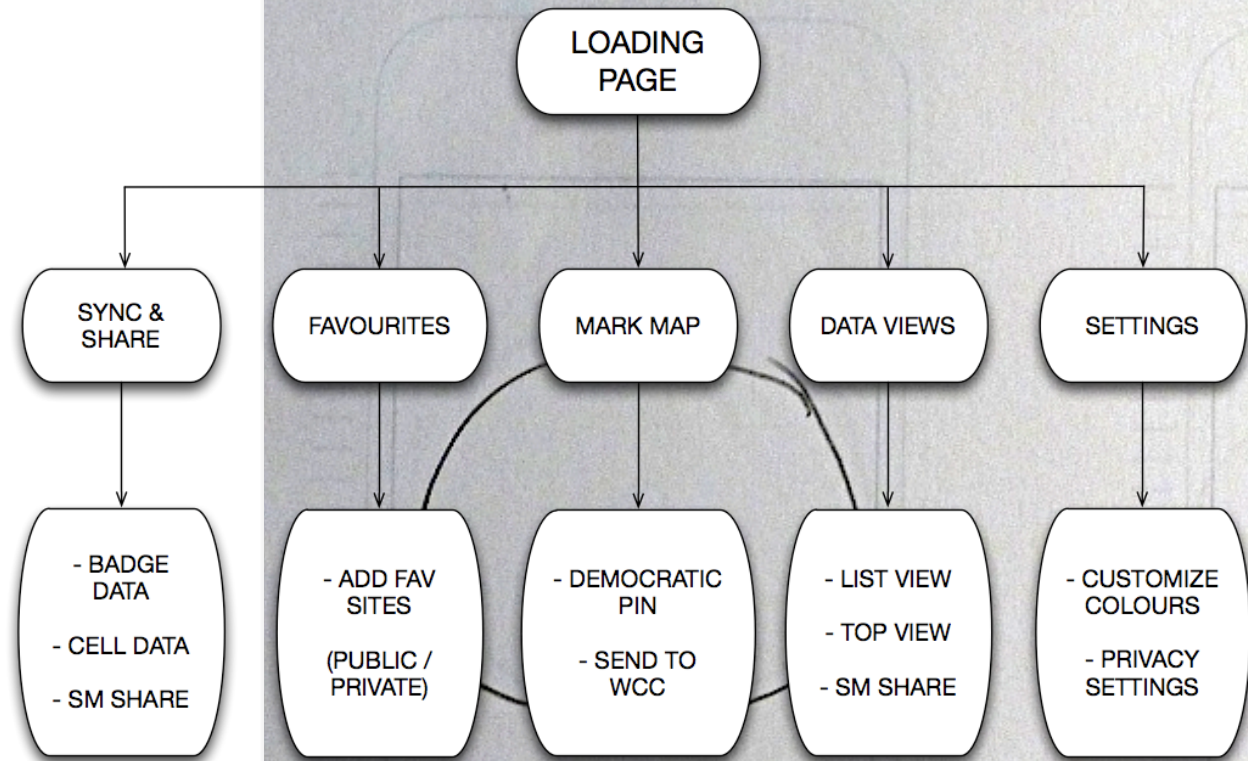


Air and Water pages (below) in final app combined into one for quick accessibility and function.

Layout / Functionality

Tufte

- Sparklines - lighter perfect clarity and depth of info for iphone display.
- Pixel ink.



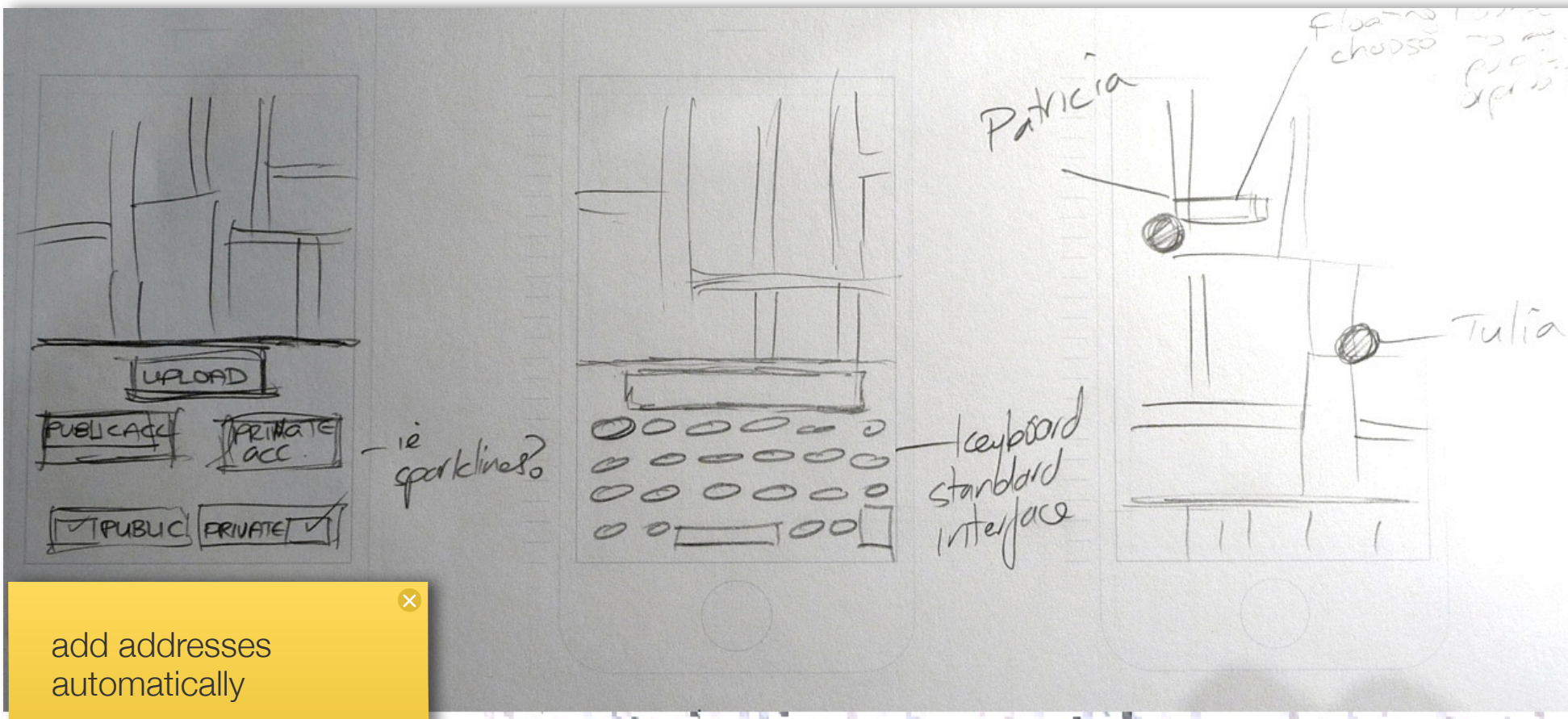
Notes

bathing
 water quality } WCC
 air } Council
 soil }

 transport routes - busses
 sewerage outlets (into sea)
 plant shops
 recycling / rubbish facilities

maps - live data - air = contribute
 - soil = citizen science
 - water =
 events - list format
 personal - social connect.
 law - consultations

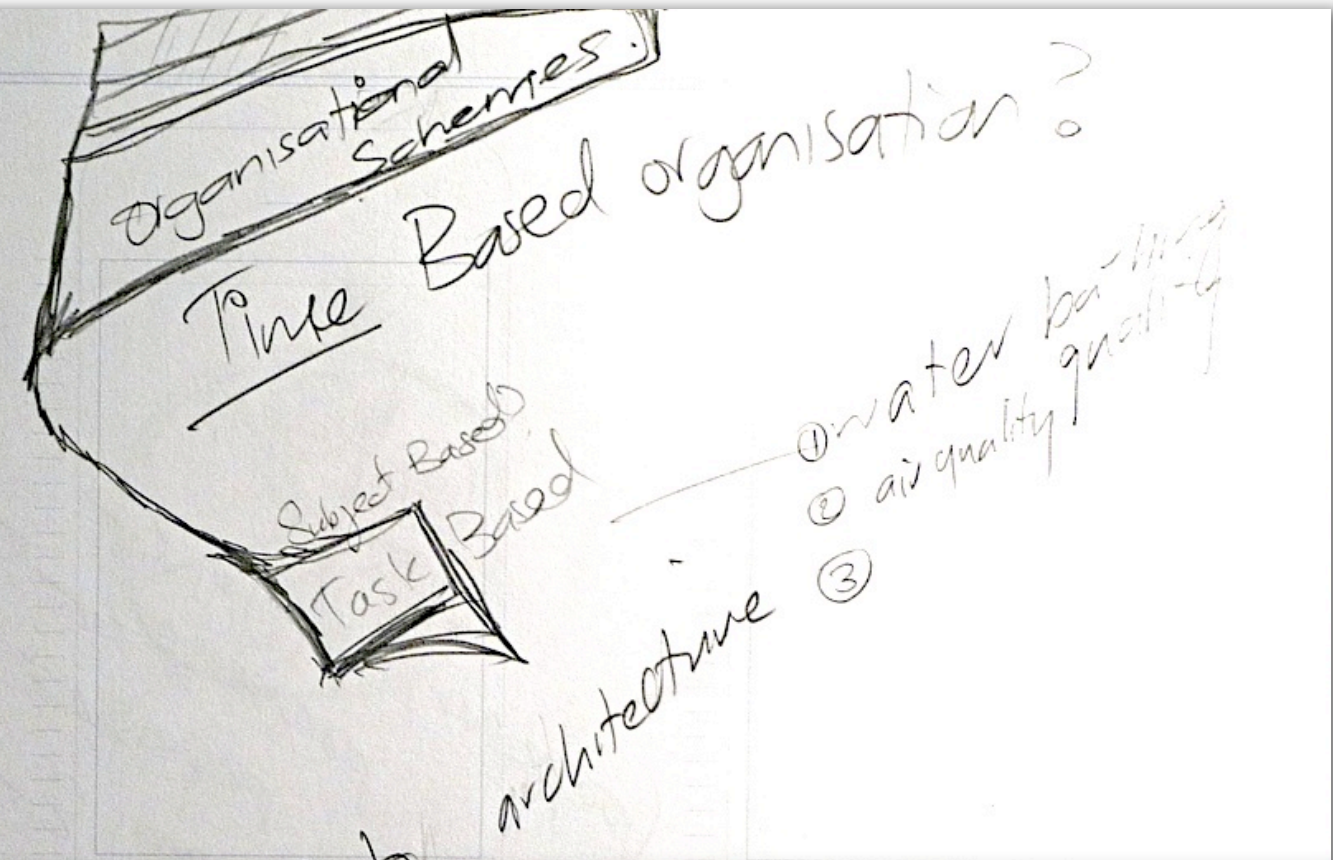
- Bathing Water Quality
- Groundwater
- Air Quality
- Land & Soil
- Rivers & Streams
- Wetlands
- Meteorology
- Rainfall
- Lakes
- Coasts & Estuaries.



add addresses automatically

enter addy

public private imperative



Design Sketches / Notes

The invisibility of info arch. means its often ignored but whether u know it or not, if you design a website u are creating info

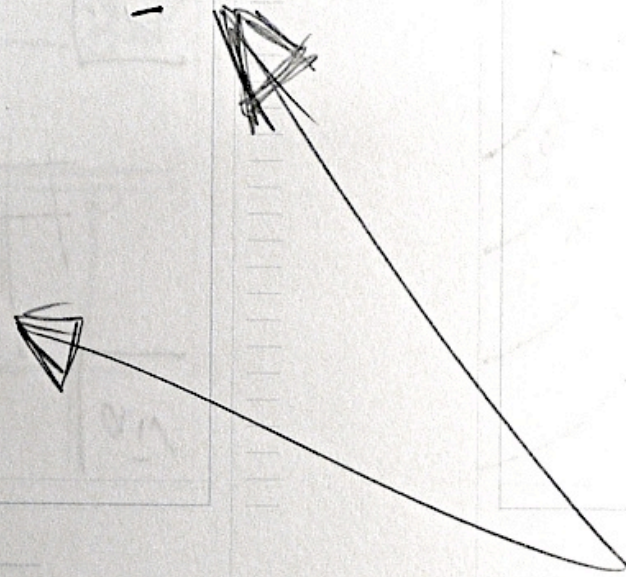
Information seeking behaviours
 => Findability?

#1 on connects pages to support tasks
 P14 Information Architecture 4 Designers.

live (streaming data)

facilities — transport: — bus
— train
— bike hire
— car hire / sharing
— plant — hire
— purchase

- how hot is it temp? / humidity?
- which direction am I facing?
- how healthy is the air I'm breathing?
- pollen count?
- sunburn (time b4 burnt)
- noise level?

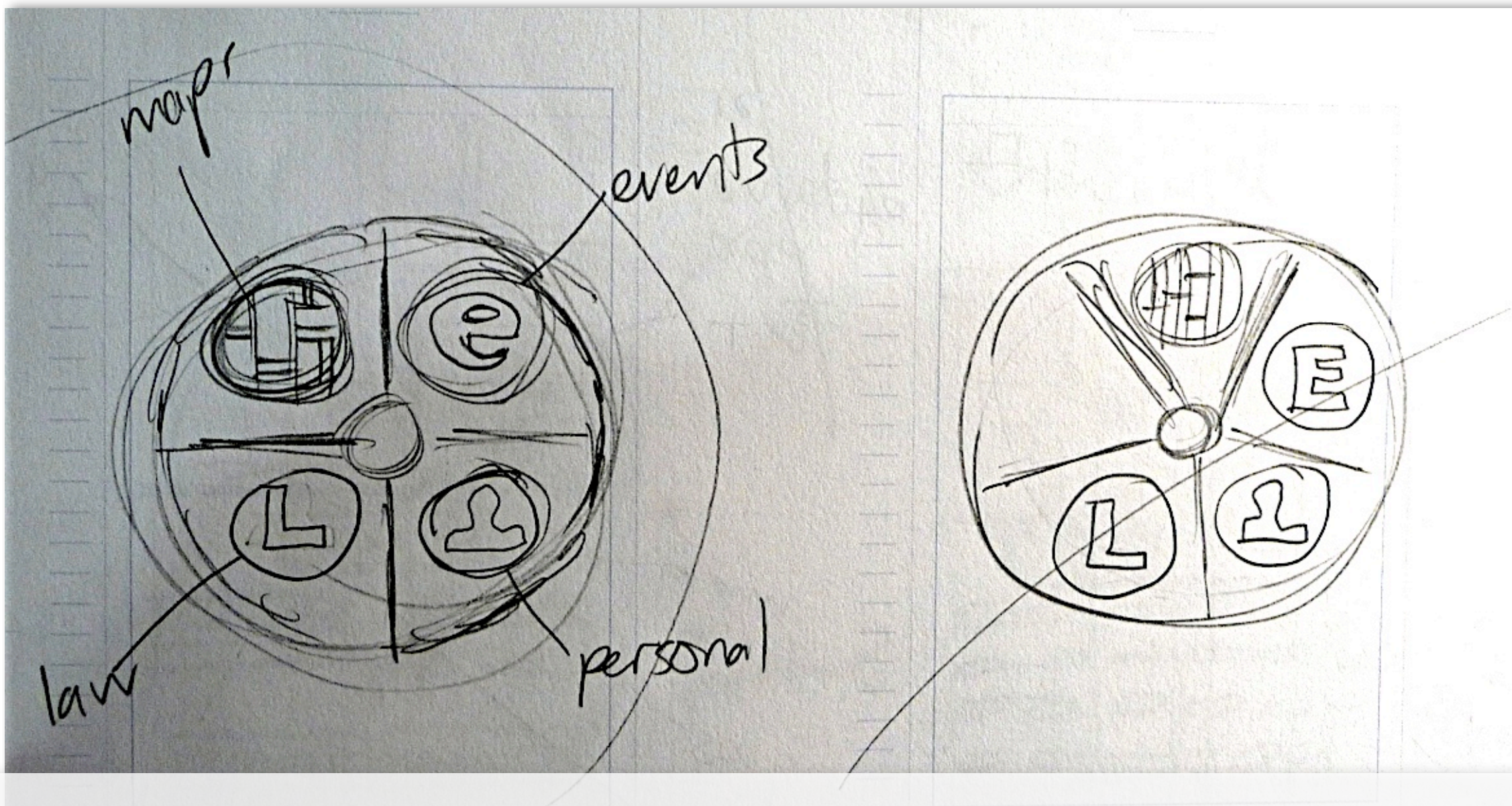


Do user testing to discover most imp features / needs.

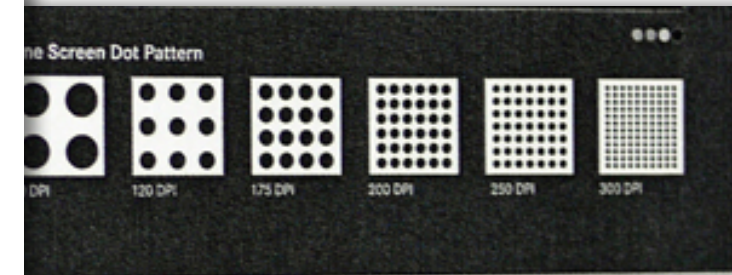
Need to do user testing

To emotionally engage users in the product
- 3 levels of user needs
→ stated
→ observed
→ latent (unstated)

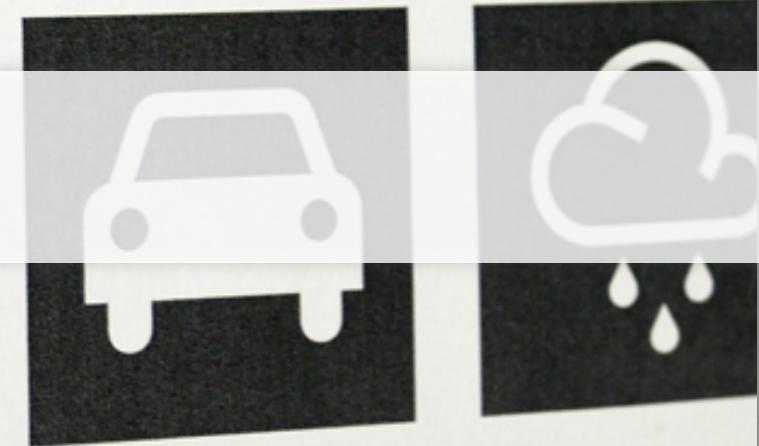
Testing / Functionality / Health Exploration



Wheel & Icon Exploration



Majority of paper promo- extremely elaborate or saturated. In order to emphasize on content, the Mohawk brochures were simply produced in two colors. This also helped to ensure the system would be easy to reproduce by printers across the U.S.



12567 lbs. net greenhouse gases presented
96,152,000 BTUs of energy not consumed
6830 lbs. of solid waste not generated

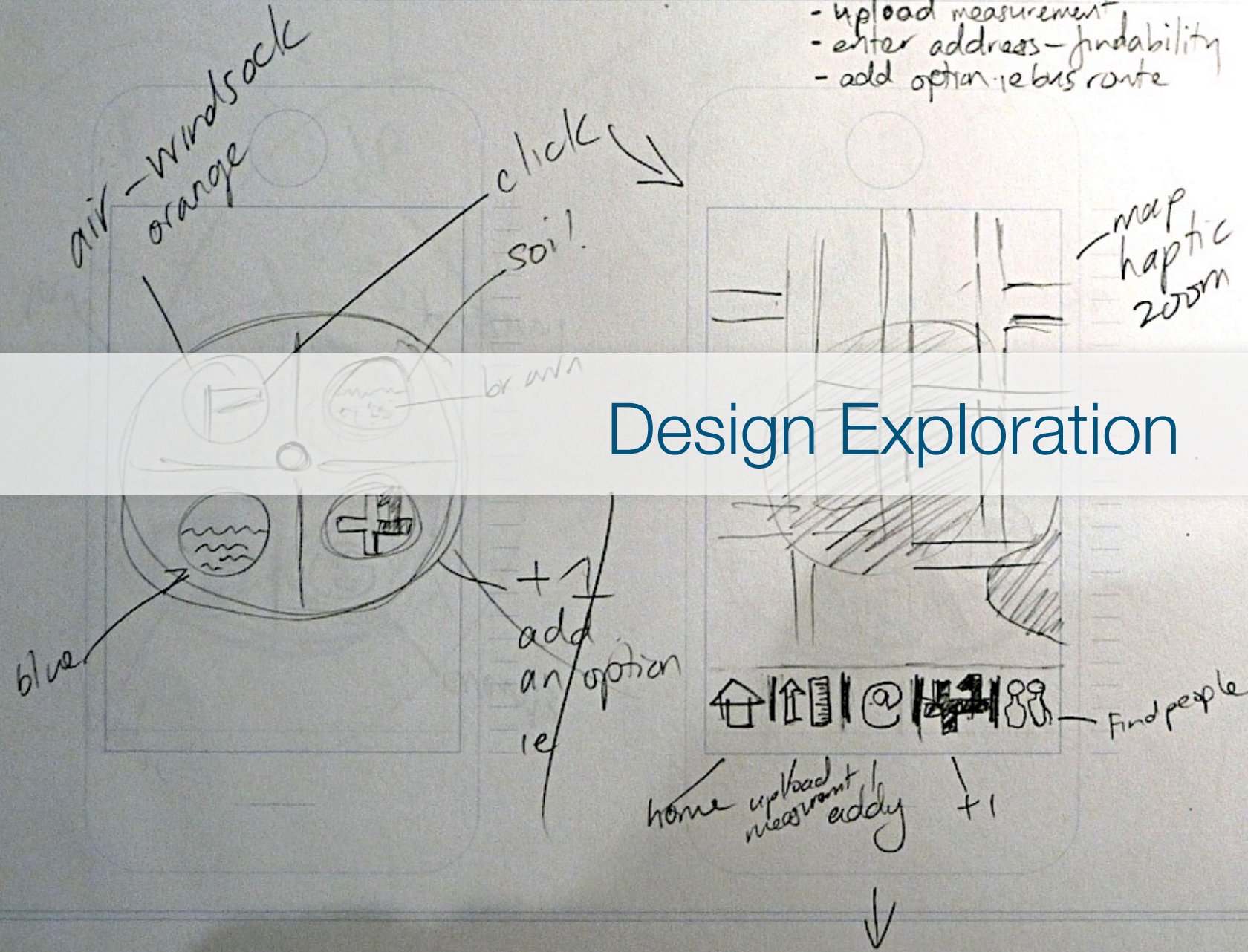
52,661 gallons wastewater flow used
391.97 lbs. of waterborne waste not generated

Graphic icons draw eyes attention / not language specific
Majority of Otto Neurath's not simple enough for wide understanding imo.

Mobiles → not just a communication tool → nav personal measurement instruments

→ capable of — sensing our natural environment
— empowering collective action: • citizen.sci

- find people
- home
- upload measurement
- enter address - findability
- add option - ie bus route

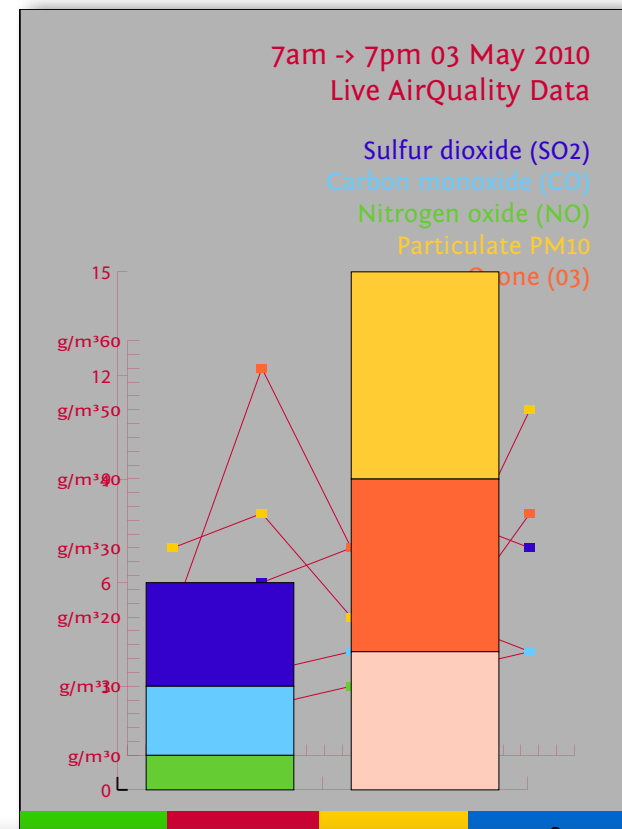
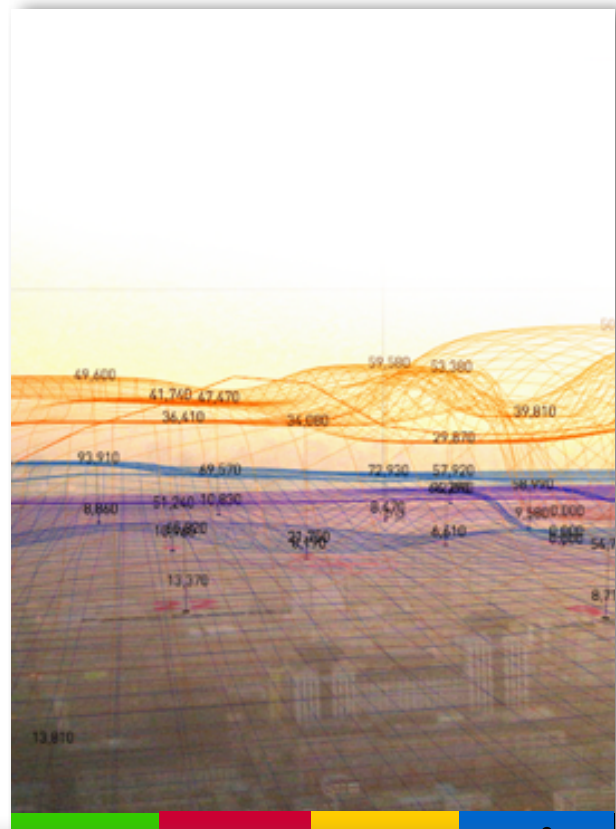
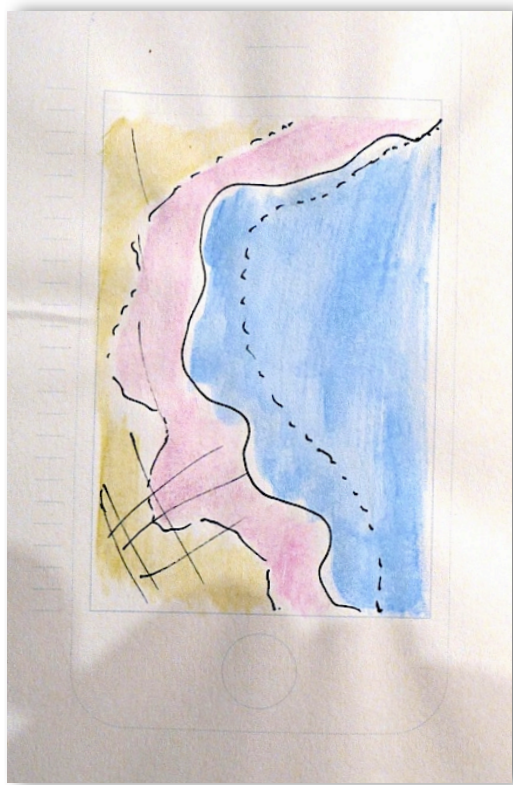


Design Exploration

air = pollin
= methane
= chlorine gas

can send alerts to other sensors/phones or WiFi
64 nanosensors
NASA

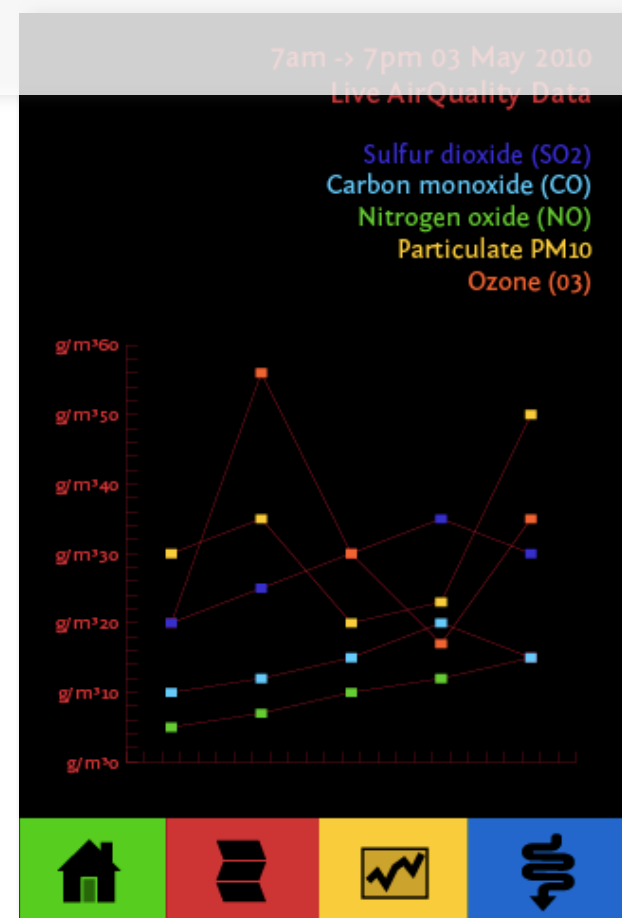
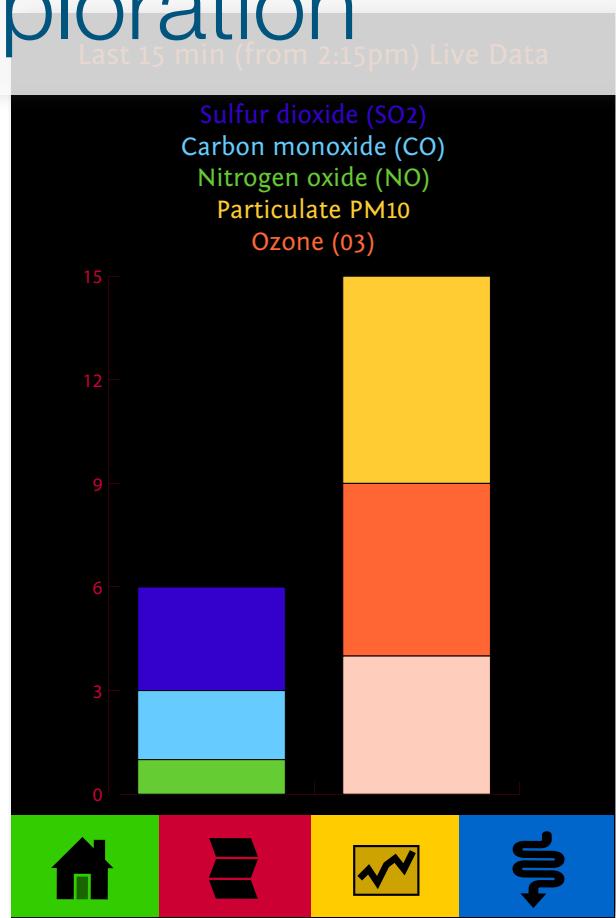
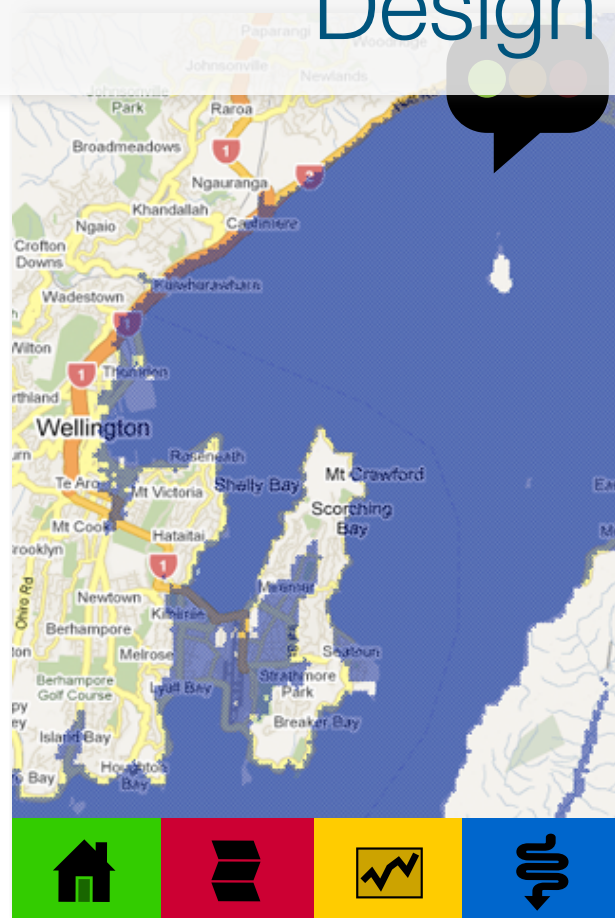
- consumes 5 kilowatts
- lasts 4 100 hours
- outside
- use fire fighters emergency fighters

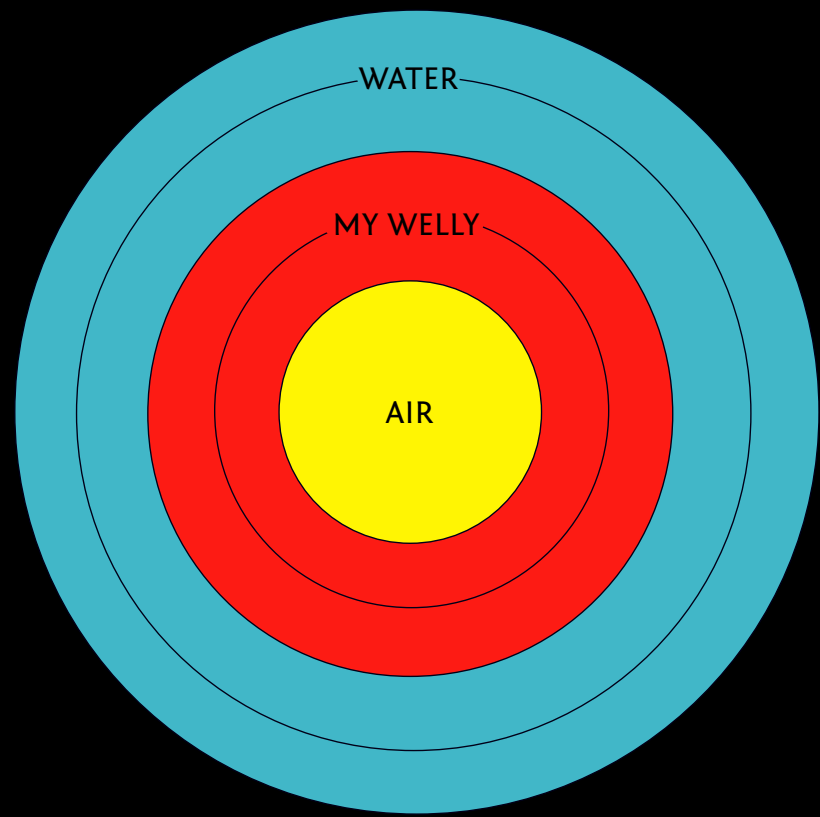
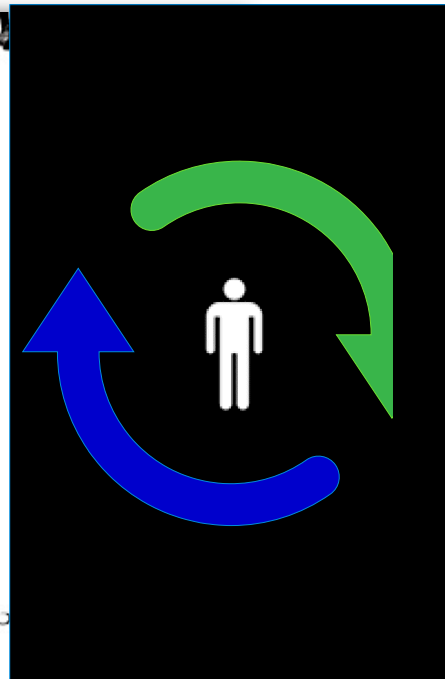
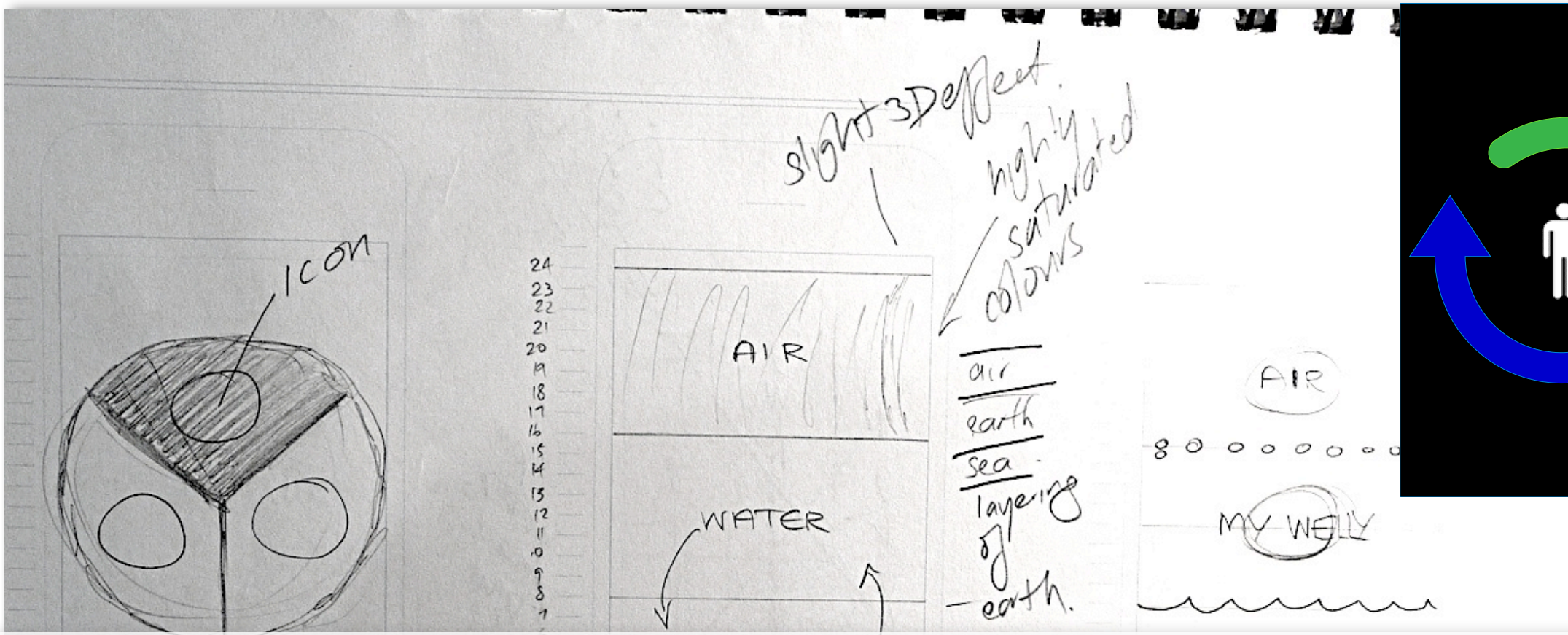


Design Exploration

Map of WLG (right and above watercolour painting version) showing predicted water level rises like on: flood.firetree.net

Include access to tide maps?





Circular Design Exploration

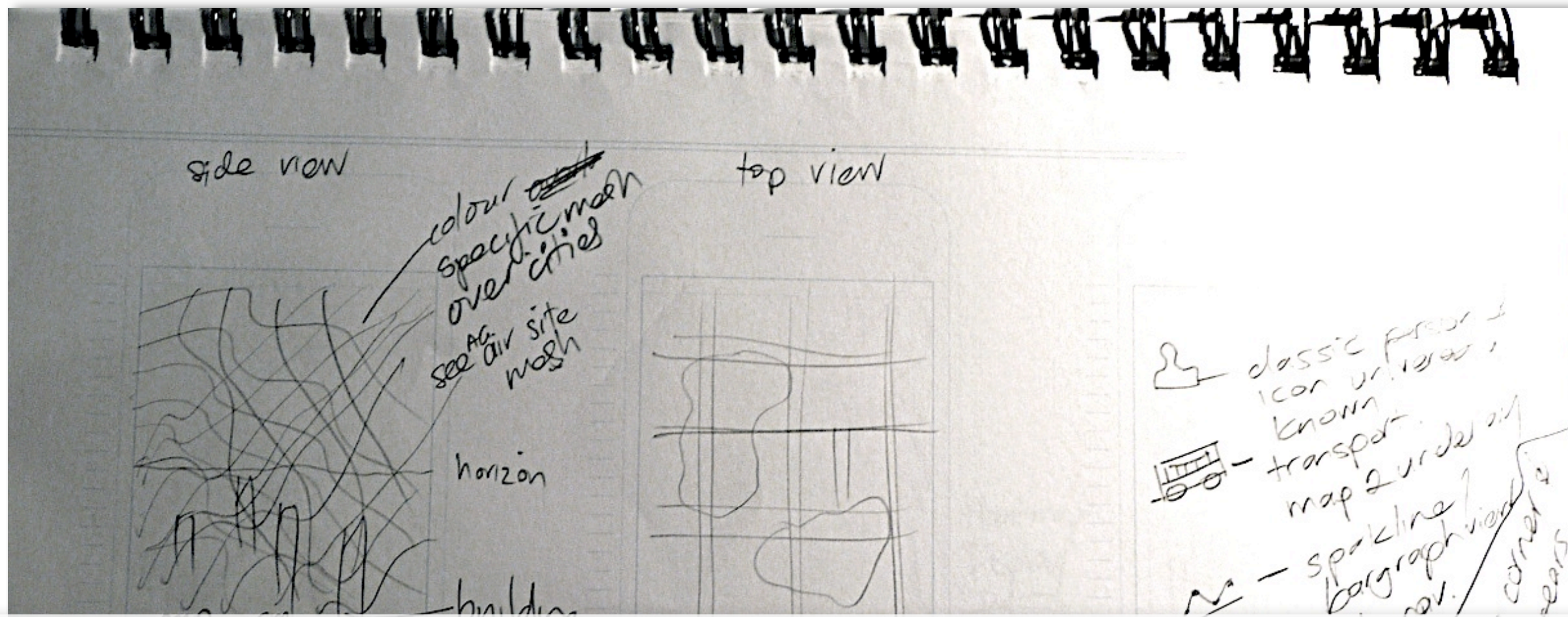
Front Page/Screen.
 Simple Thin lines
 leaves more room
 & bigger touch points.

fine dividers
 & 4 big touchpoints
 + ease/speed of access.

still not to
 sure bout this
 name.

If we are becoming
 more image
 dependant - icon better?
 or words - quicker 2
 understand.

could my app be language deficient?



Air Quality / Interface / Icon / Map Considerations



- Air Feed
- Wellington Central Focus - can expand to other suburbs later / if demand.
 - WGA Creator - 5-10 mins / 1 Mbps howly.
 - measure 3 Factors -
 - ① PM10
 - ② Carbon Monoxide
 - ③ Nitrogen Dioxide

use finger pinching to zoom in/out.

black b/g text large enough
to place personalized
photo underneath
to display text.

STENCIL IDEA

touch
sensitive
areas.

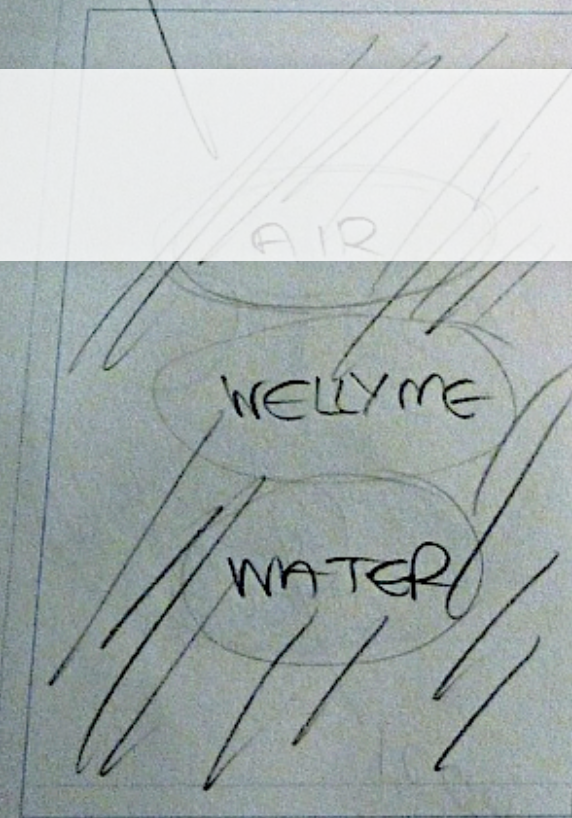
what colour does
air feel like
white/blue?

all fonts
Sans-serif

slight curvature

Naive Binder - 60's graphic design
bond - dr, no film

Design Exploration



1cm
min
around
each
wd.

AIR
WELLYME
WATER

red?

green

blue

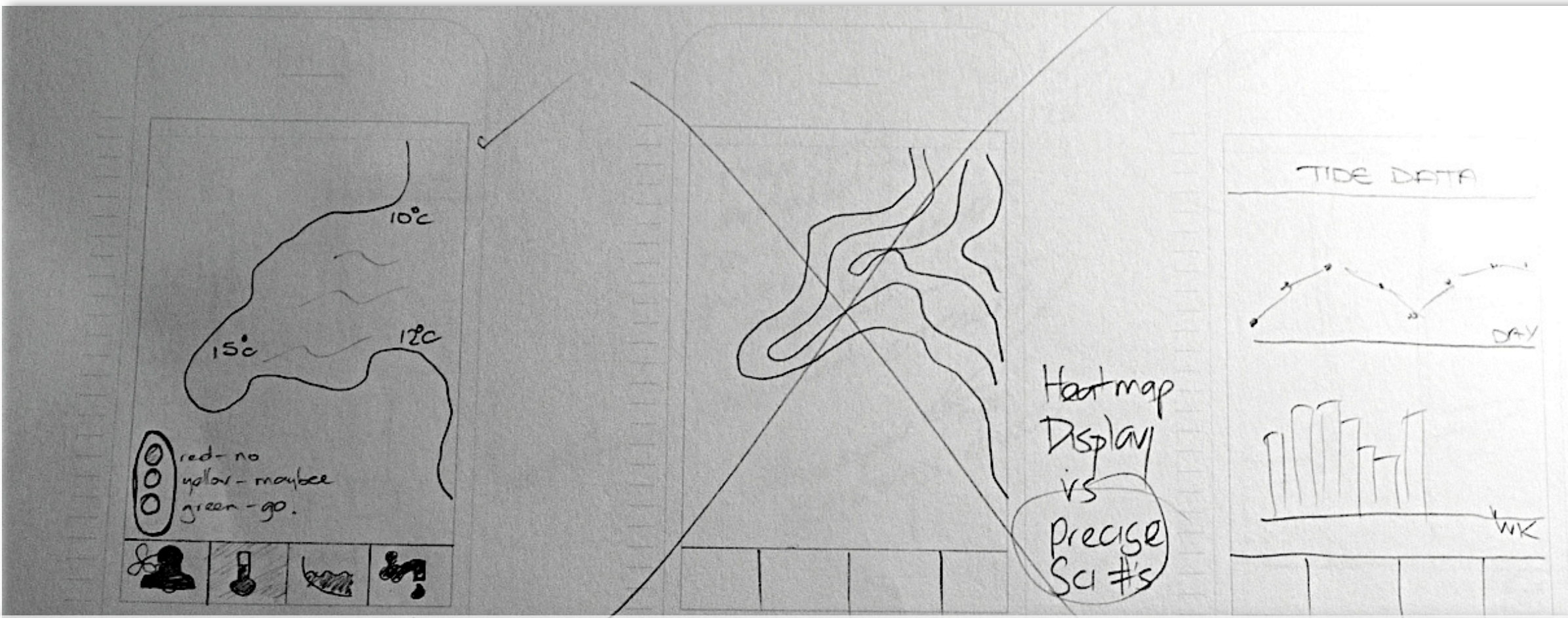
Saturation - landscape automatic.

Colour wheel - interface design - clear/simple/colours

makes obvious (i) compared w other
apps

datafinder - landscape automatic
txt 2 small?

- data - not interactive.



Combine so | **Map / Graph Exploration** |

Tide Data

- I. Tuft Sparkline - succinct format for mobile
- II. Per Day / Week

Toxic Algae alerts

- I. Council post signs sometimes not visible to people at beach.
- II. At start of Masters council didn't post Toxic Algae alerts to website/ now do.
- III. Get PUSH Notifications sent to phone.

Water - Greater WGA - monitors 77 beaches + Rivers
 ↘ not all in vally central.

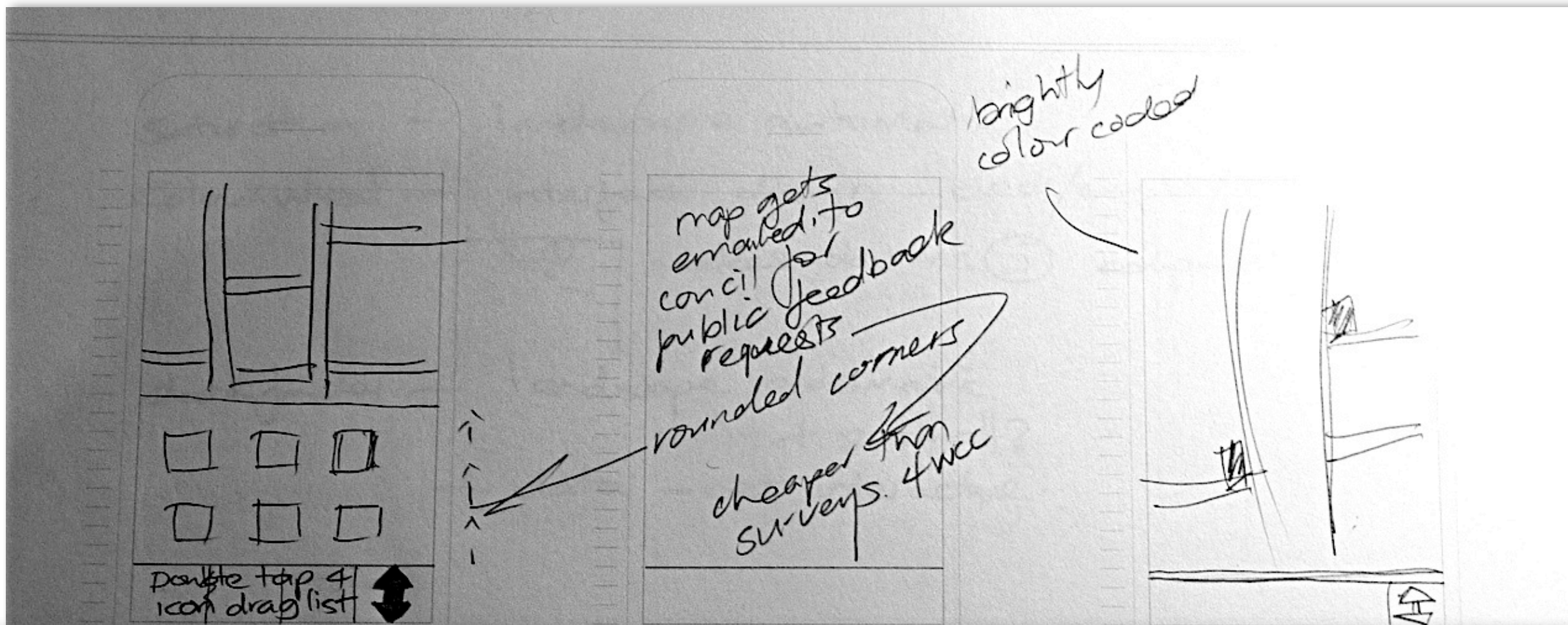
- In 2008/09 59/77 beaches o.k 2 swim @ / River Qual = 10/21 - poor res

Buttons - report to council - send pic + note @ council.

Bacteria monitored EColi & Enterococci

Sampled weekly during summer bathing months / food gathering / + Animal Walking

live water map. / water temp / tides. / cit ser Toxic Algal



App. Notes

My WELLY,
WELLY ME.

list of icons that are sent through to council
as a map of public demand / need / suggestions

- Rubbish Bin
 - Trees / Plants
 - Toilet / Mothers Room
 - Seat.
 - add note. w map.
 - + personal details
- tree
public telephone
water fountain.

Living Planet Index - Thackera / Jobs
Kevin Kelly - Helpful tools and tips

Flipside...

Kevin Kelly - What technology wants?

'Biology of Desire' Documentary

Reprap Machines in the future will
design for us all - we won't be serving
technology it will be serving us?

Working in harmony?

Cybernetics - Cyborgs - Donna
Haraway

Daily Push Notifications

Daily Weekly Infographic explaining X
of ways to help your local and the
larger environment.

Int 2 • Living Planet Index.

- 10 ways 2 reduce carbon output
- — ways 2 save \$ of the planet.
- testing air quality
- make your own air sensor — /water sensor

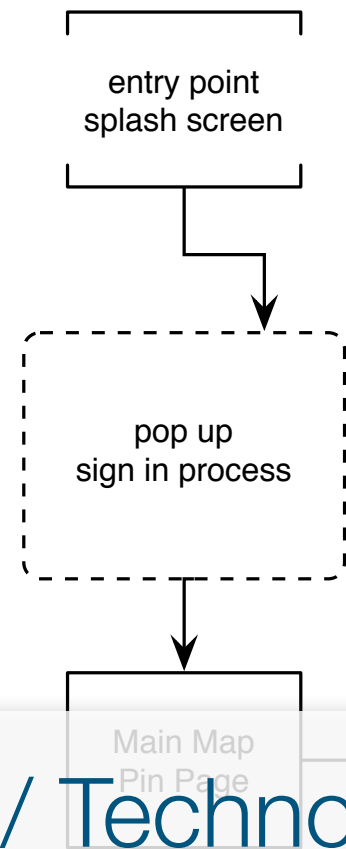
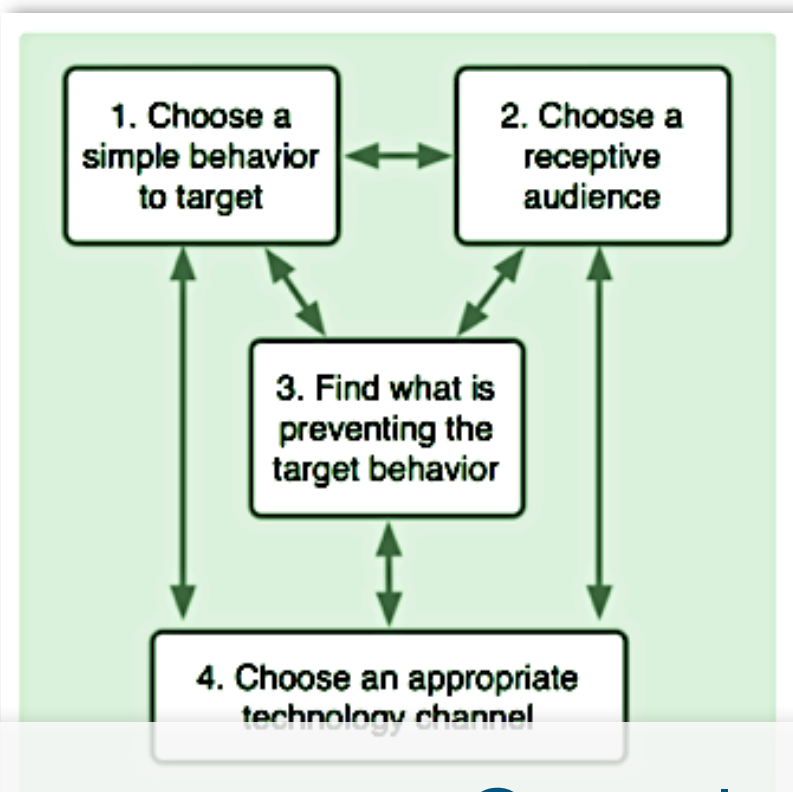
Green Notes

Allow 4 — creative feedback loops.
— democratic participation!

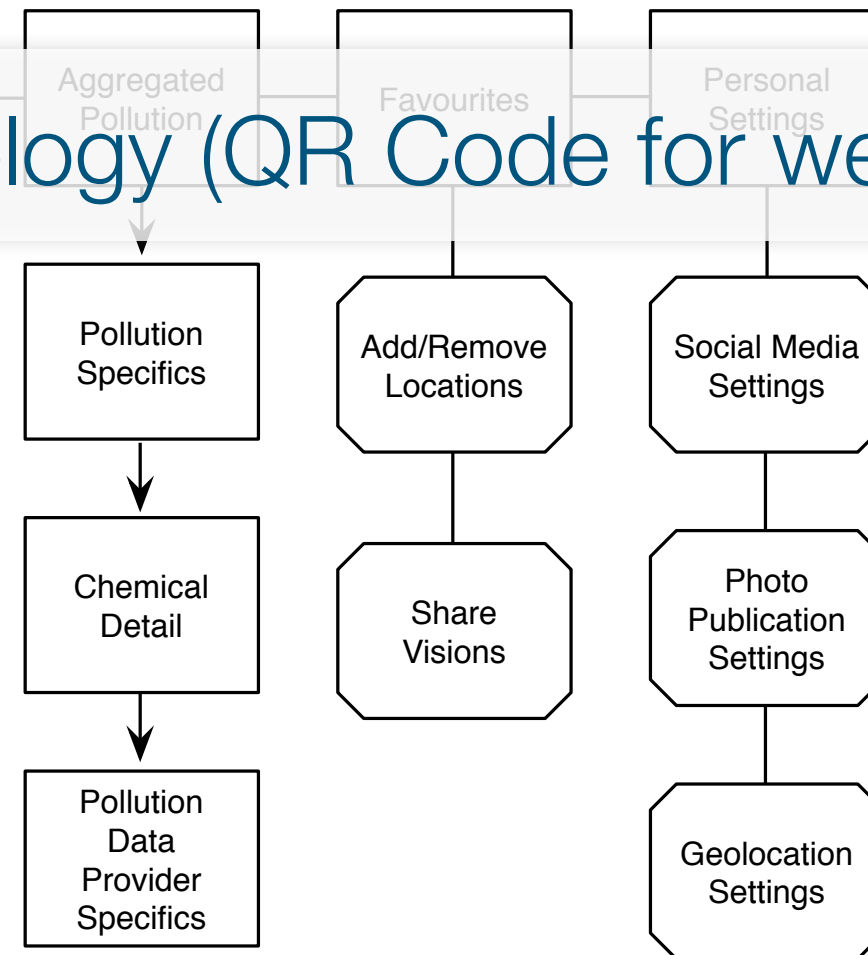
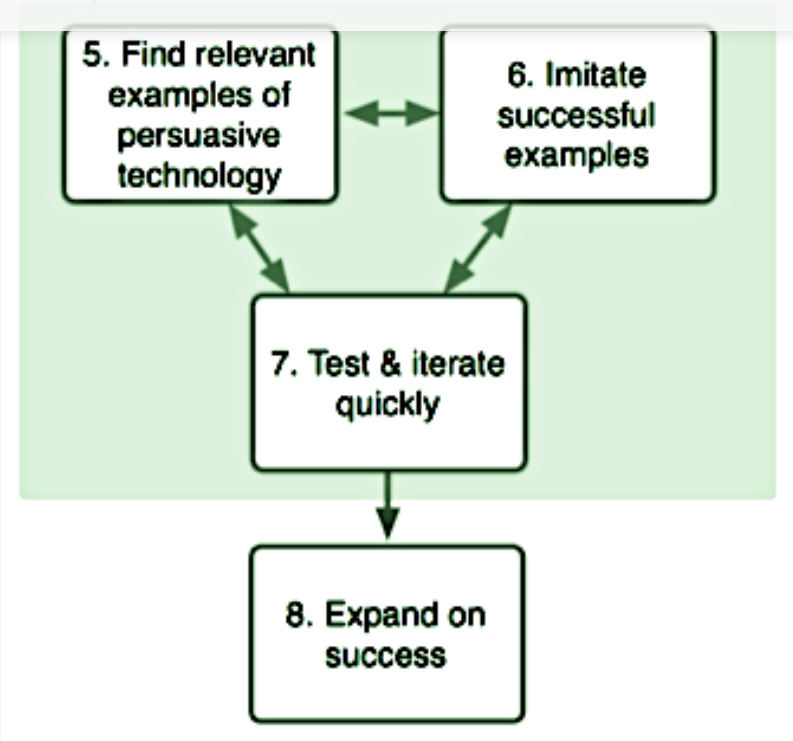
Arduino

- I. Air and Water sensor - make.com your own.
- II. Open source Platform
- III. Customise to suit individual tastes-like mobile phone covers



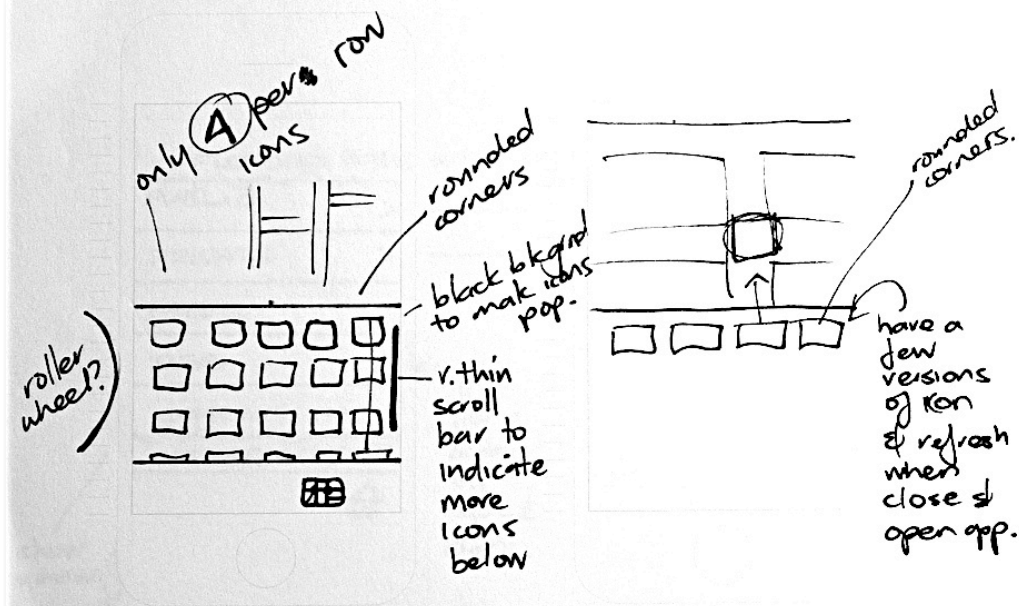


Captology / Technology (QR Code for website)



FOR QUICK CONTACT AND REFERENCE DETAILS: TAKE A PICTURE OF THE ABOVE QR CODE WITH A WEB ENABLED MOBILE TO GO TO TUNEINSHAREOUT.COM



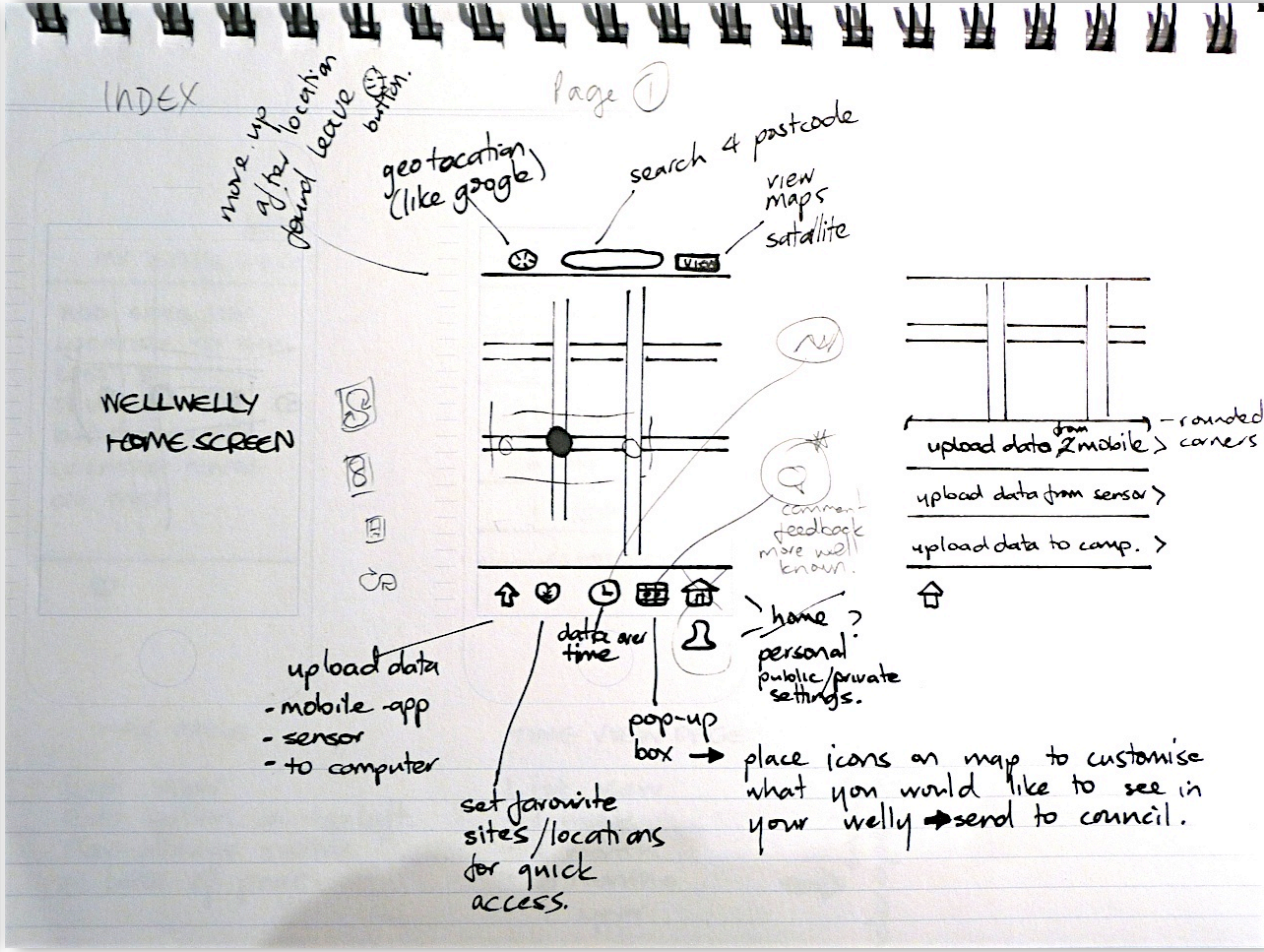


when pressed
 - map changes to personalised one
 - list of icons opens to drag & drop icons.

City health

add icons: tree/shrub
 rubbish bin / toilet
 mothers room / public seat
 polluting building / fruit + veggies
 organic/eco cafes / food sites
 water fountain

on map: transport route
 rubbish bins (incl. recycling or colour codes)
 park bench
 mothers room
 organic/good food sites
 water fountain.

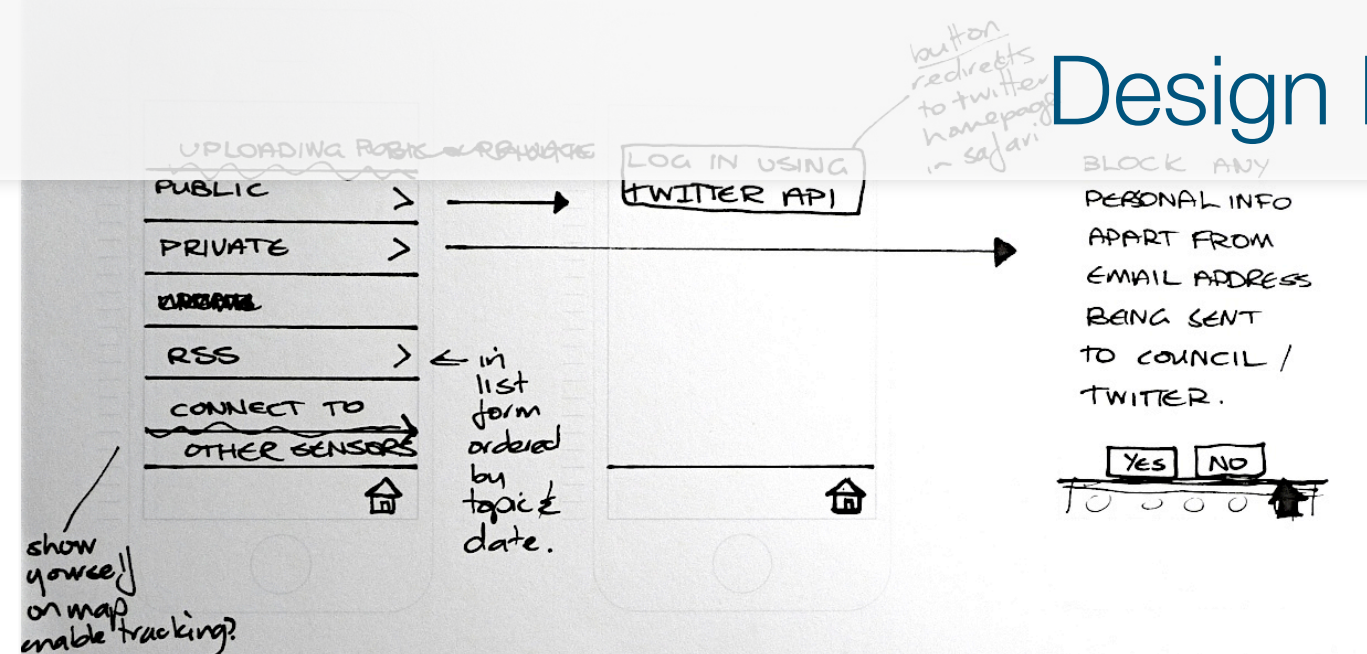


upload data
 - mobile app
 - sensor
 - to computer

set favourite sites/locations for quick access.

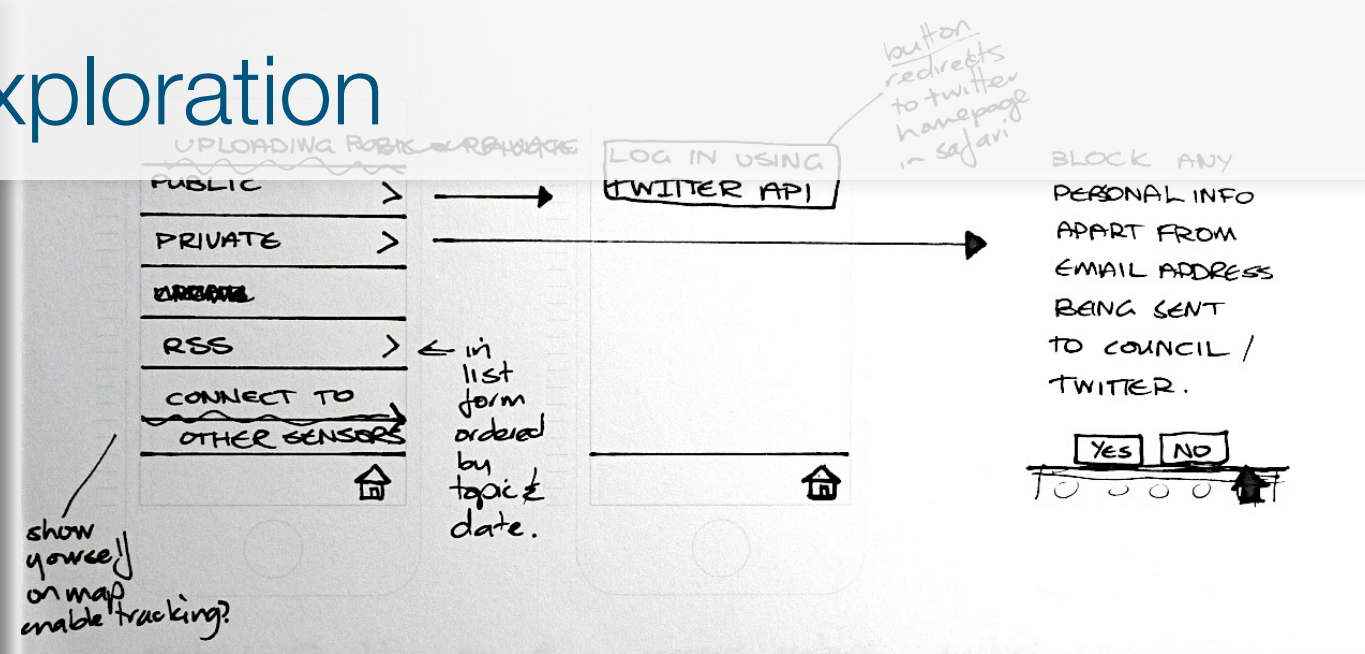
place icons on map to customise what you would like to see in your welly → send to council.

Design Exploration




upload data - public/private
 ON OFF
 add twitter id & enable tweeting air quality?

- RSS of local council events relating to air / water / soil quality events & public meetings
- correct w/ other sensor updaters.

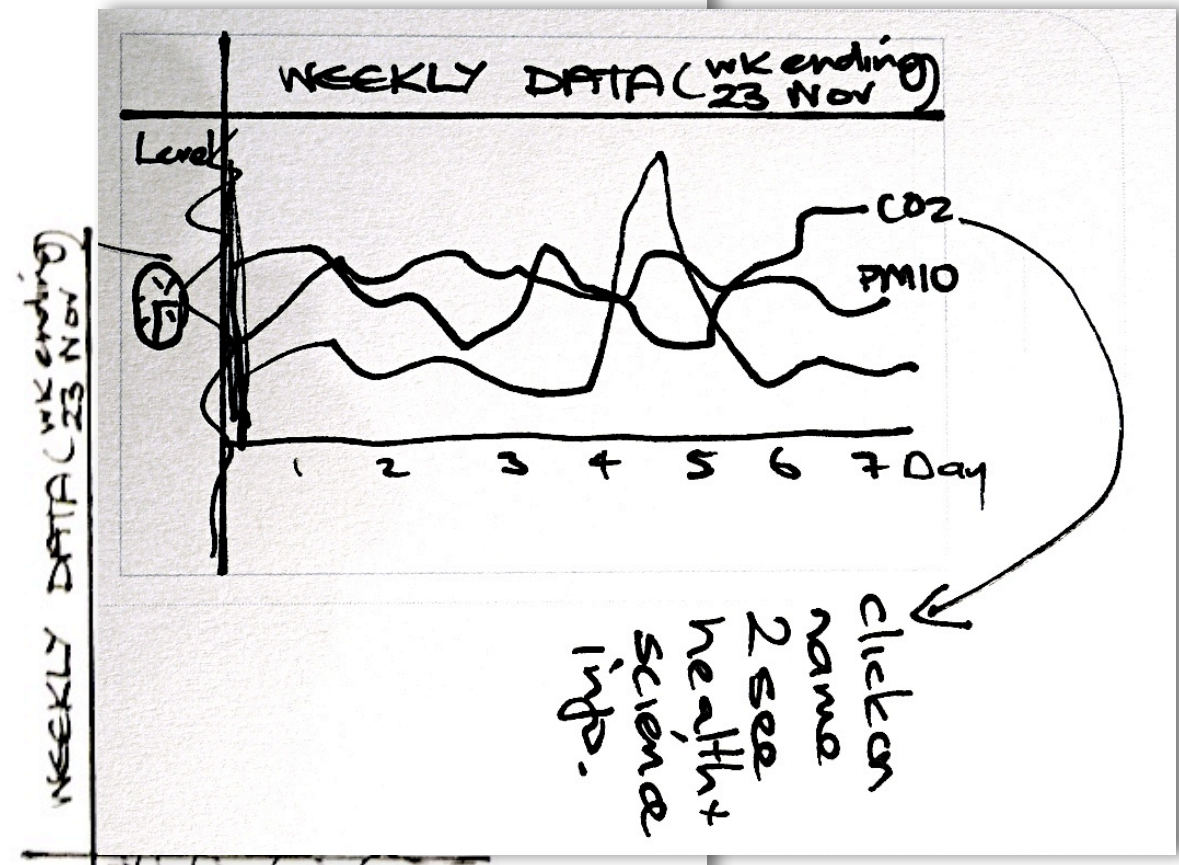


upload data - public/private
 ON OFF
 add twitter id & enable tweeting air quality?

- RSS of local council events relating to air / water / soil quality events & public meetings
- correct w/ other sensor updaters.

EDIT
 MY SITES/FAV'S?
 ADD SITES/FAV
 LOCATION TO THIS
 LIST BY
 TOUCHING 
 button on each
 LOCATION NAME
 ON MAP

TIME VIEW
 BLURB >
 1 WEEK >
 1 MONTH >
 6 MONTHS >
 1 YEAR >
 CUSTOMISE



Design Exploration

FAV PAGE

List view
 Edit button on top left.
 Nav - always visible
 @ base of page.

TIME VIEW PAGE

List view
 - 1 week
 - 1 month
 - 6 months
 - 1 year

BLURB: CLICK 2 view
 sparkline of data over
 specified time period

switches into
 landscape format

colour
 codes
 2 separate

healthy welly
well welly
tag welly

~~man~~
tohu you

box
text
select both
then
pathfinder

According to Luke Wroblewski
over 55 million smartphones
shipped during the first three
months of 2010.



Notes / Name Exploration / Facts

Maori word exploration:

ora: alive, survive, health, vitality

waiora: (noun) health, soundness

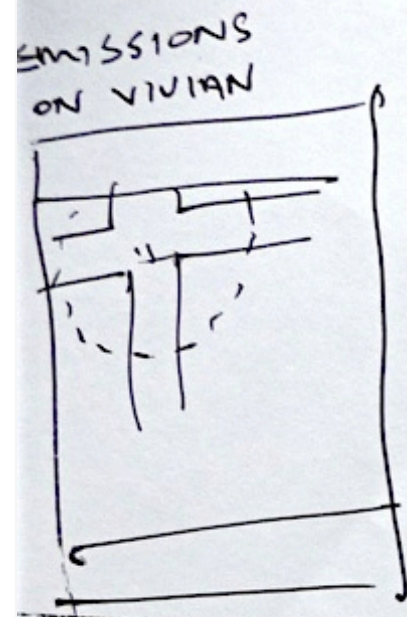
ira: life principle, gene

tohu: save life of; mark symbol emblem; advice; to preserve, conserve

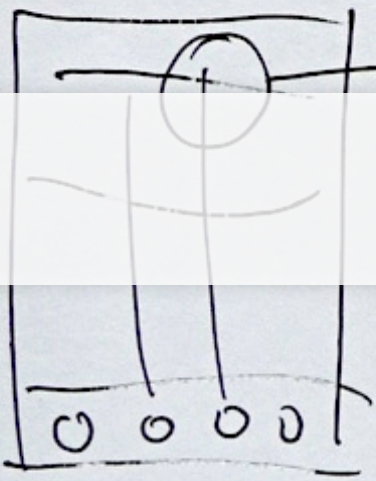
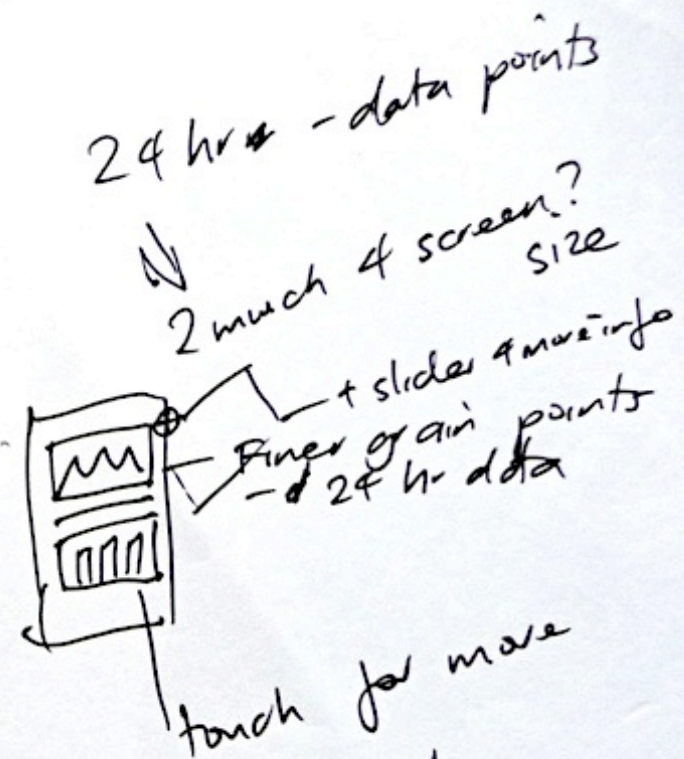
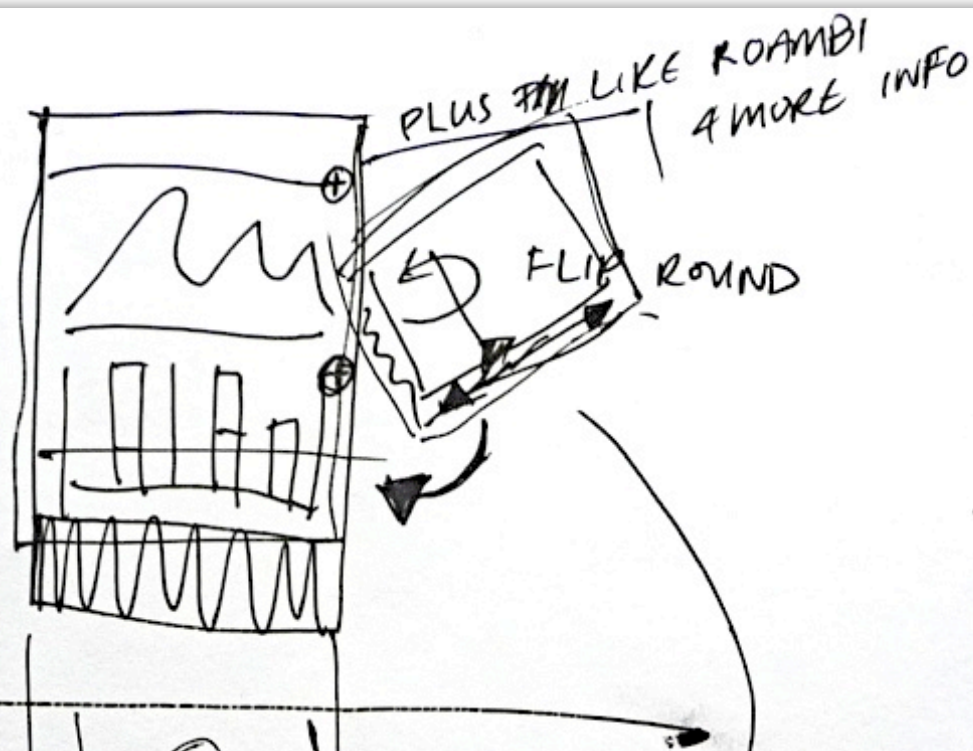
mauri: life principle, special nature, material nature of life principle

koiora: life

Shake - a cute novelty
considered for refreshing the
phone but could become
tiresome - ie if you walk over a
bump or in the middle of a
meeting or don't want to draw
attention to the phone.



TAP?
SWIPES?

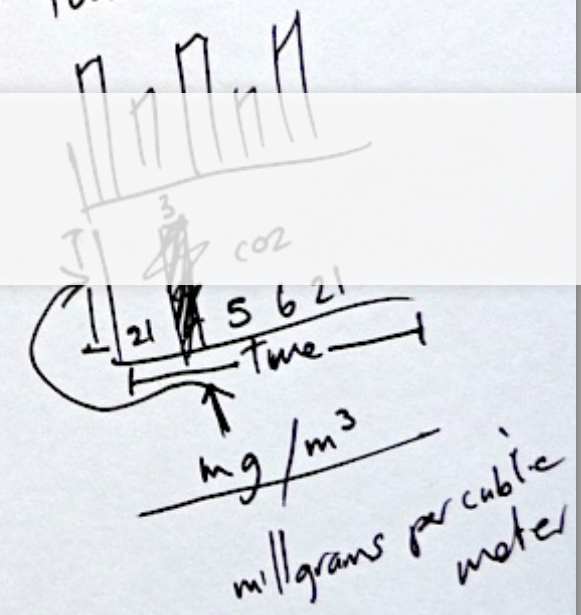


- ① individual datapoint details
- ② Long term
- ③ CO2 data.

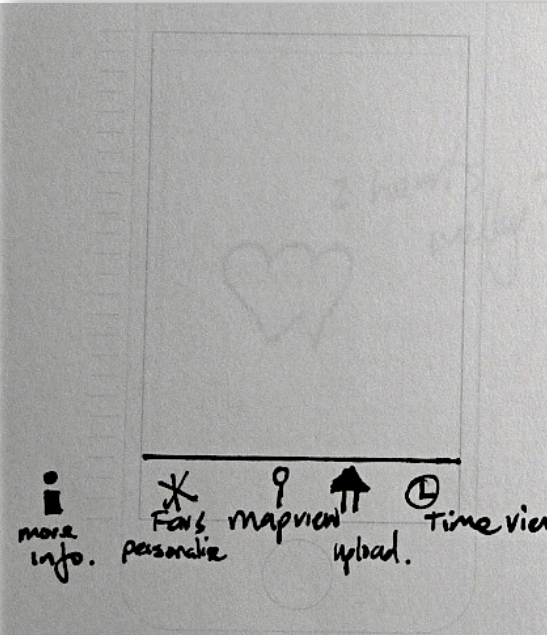
Interaction / Detail / Exploration

max collect by @terranwood on twitter

- 1 hourly 24
 - 2 daily 30/31 views
 - 3 monthly 12
- pinch & expand



CO2 MAP



more info. Favs personalise map view upload Time view

***Fav's Personalise.**

- bookmark / quicklink to fav location
- add icons → send to council (twitter/flicker)
- change ps

Upload.

upload data for

1	✓	PM10
2	✓	CO2
3	✓

Date
Time
GPS.

Social Objects Feature Set.

- upload personal data
- layers of data ie PM10, transport routes

AOL METHOD

Social Objects.

Maps
Report
Share. - email / friend / write

① Outline of design context

Sites win ↓
Nav
UX
UI
Infographics
within the mobile platform

② Central Proposition of thesis idea
How can ~~engage & educate~~ mobile phone technology enable users to engage & inform themselves regarding

(backup w ie Smith 1999)

③ Aims / Objectives / Audience. =

make info available to wider public community.

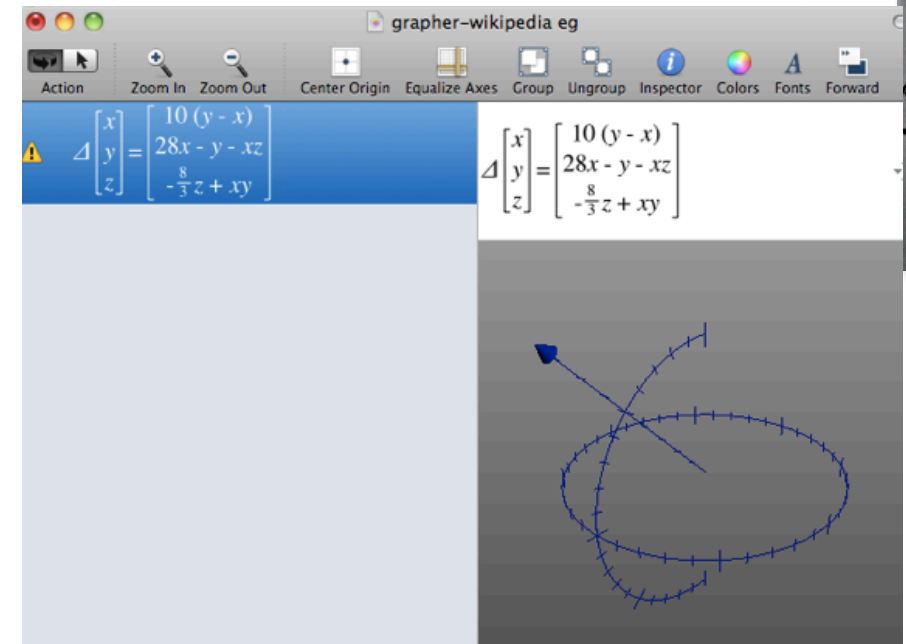
④ Supporting theory & research.

Cartagen.org Maps Mobile Review

Design Strategy / considerations

Emotional design - influence through: colour
typology
: info structure
navigation

Game Play - make the mundane fun.
ie foursquare gives rewards / badges / points & 'unlock' advanced features.



grapher-wikipedia eg

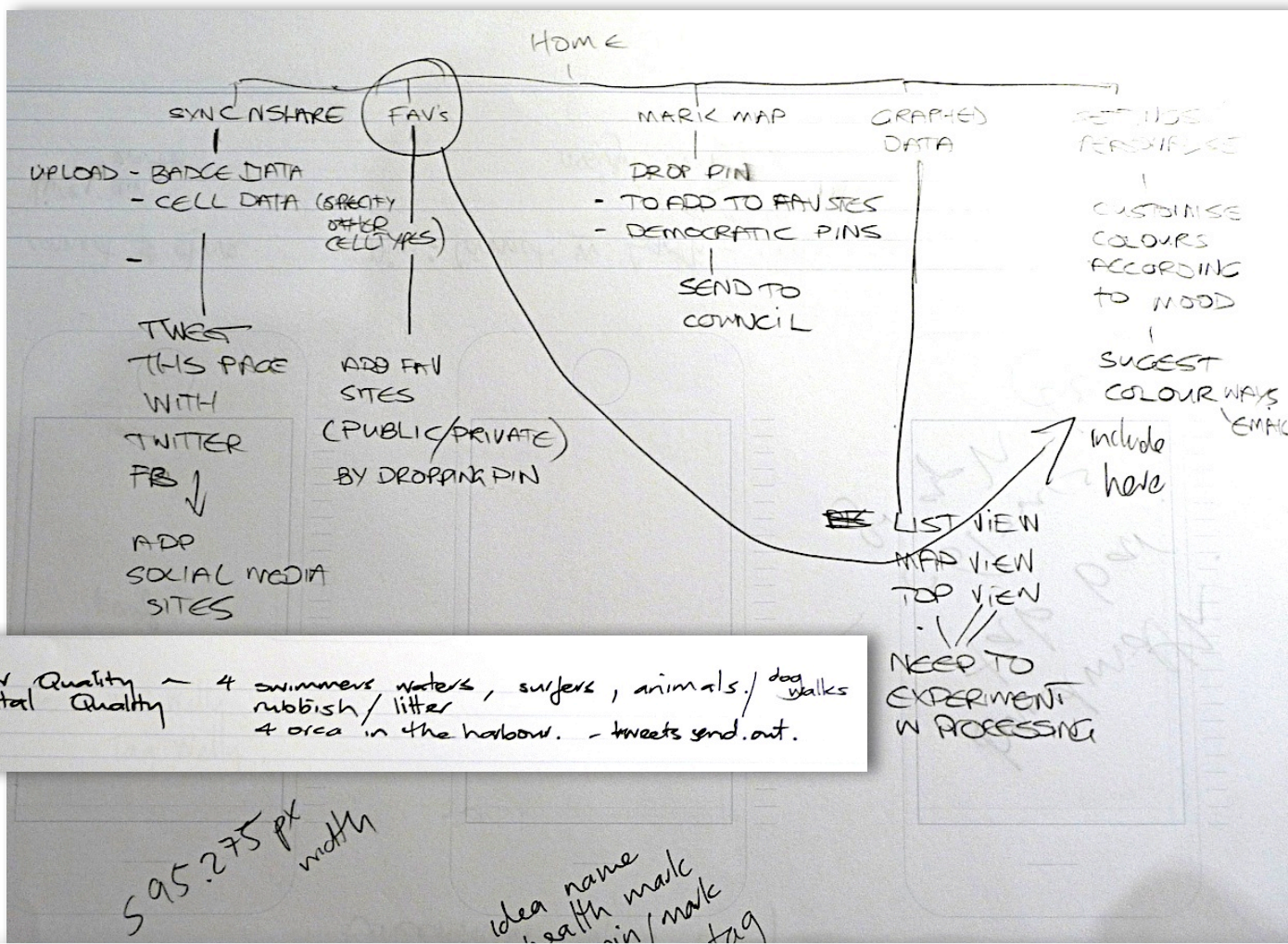
$$\Delta \begin{bmatrix} x \\ y \\ z \end{bmatrix} = \begin{bmatrix} 10(y-x) \\ 28x-y-xz \\ -\frac{8}{3}z+xy \end{bmatrix}$$

⑤ Unique Platform or dept. pt for research

① Mobile technology ie iPhone

How I do it

<- Quick play with Grapher (MacOSX) to explore possibility of 3D graphs on phone similar to intheir visualization.



(ACT) actors = user interface elements

light cognitive load
make it easy
after loads during experience to help them task
accomplish

Designing Web Interfaces Bk

- Make it Direct
- Keep it Lightweight
- Stay on the Page
- Provide an invitation
- Use Transitions
- React Immediately

green
R 140
G 198
B 63
blue
0
113
188

Cartagen.org Maps Mobile Review

"Climate Cycles are much longer than human cycles"
Earth Air Fire Water - humanistic studies P.32 of the Environment Bk.

Hoki - lives 4 over 100 yrs.

Age of Fishes / Fishing / overfishing

Greenwash your city

opening page

bandwidth tab bar
colours for 7h look to

connect & share
live air earth
aim: connect w earth - like minded citizens
assign icon / upload your own

Summarise areas / research to date
(However) - new para.

connecting people / mobiles
& pollution.

⇒ Design Solutions.

HOME
Central Prop
Sorted list

call phones
clean the air.

Theory ⇒ Production
Through my work I will show

call phones ①

② my project will

roller wheel color background

→ labels / colours / zoom function.
+ text size.

Visualises vis. its from user
testing
optimal usability

viewed in browser!

treejack series pages links
users task → find page ①

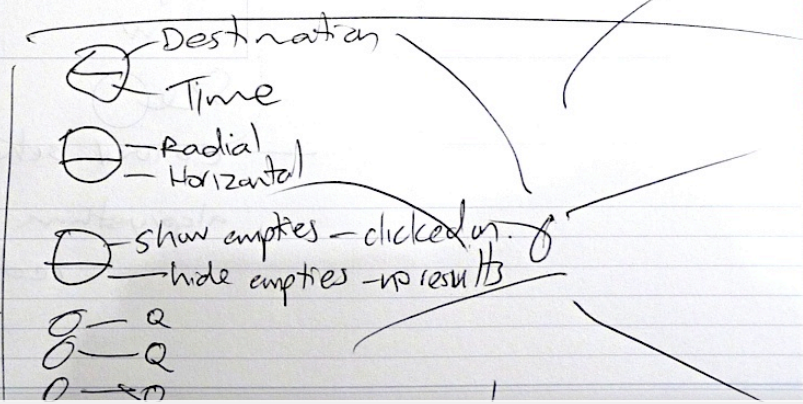
software → track time / correct path

project task → find confusing page

software
sell to
multiple

task
page
results

radius = how many people
want to page
legend key to gain



Cartagen.org Maps Mobile Review

Selling / Storytelling
Selling an emotion
- unique issues 4 clients
- not enough how a cell in water
NanCar / innovate the mainstream
Blue Ocean strategy?
basqua - business
water in basul
Shelter of abandoned rabbits
⇒ creating dialogue
- innovation
- analysis
4 stages of entrepreneurship
PPP
preparation

artistic signature
who can support me
what is the art
your own signature

vi ideas - how UI works
Interactivity
useful
confusing
slow
size
- colour scheme
algorithm range
red → green.

Capra
SVA
Java Lib

Conducted an Informal Survey taken amongst a Masters of Design meetup group.

10 (anonymous) 8 page questionnaires were filled out.

Questions were based around mobile technology, social media, internet access and various interface experience questions.

As this did not go through the universities ethics process the details cannot be included in my masters. This ethnographic research through informal answers and discussions afterwards did provide helpful insights into social and cultural perceptions that helped inform future designs.

Mobile Interface Mashup Survey

Masters-MeetUp Survey by Greer Mitchell Massey University Wellington

- Do you own a mobile phone? Yes / No (circle correct answer)
- What brand and model number is it? Samsung S11-M300
- Does your phone have internet capability? Yes / No (circle correct answer)
- Have u ever accessed the internet from either your or another mobile phone before? Yes / No (circle correct answer)
- If so how did you find this experience? If not, why not?
Nothing great, was just the once to download a tune, didn't really resemble the internet as i know it from computer - just words, simple basic but boring.
- If so, how many times (circle correct answer) 1-10 10-20 20-50 50-100 100-200 too numerous to count
- Does your phone have a built-in camera? Yes / No (circle correct answer)
- How often do you use your mobile camera? (circle correct answer) (estimated number per month) 1-10 10-20 20-50 50-100 100-200 too numerous to count
- If your phone does not have a camera built in, would you consider this an important 'must have' feature when purchasing your next phone? Yes / No (circle correct answer) Why or why not?
Don't use it enough, maybe if i was buying a mobile had more of a budget, id get a phone that had a decent camera - so perhaps would use it more then
- Have you ever uploaded pictures / video to a social media service like Flickr.com, Brightkite.com, Facebook.com from your mobile phone before? Yes / No (circle correct answer) If not what technology do you generally transfer photos from your
cost to buy card to then upload it onto computer.

Mobile Interface / Use / Social Media / Survey



This walkshop was part of Webstock 2010 Conference (webstock.org) proceedings. We walked around an inner city block in Wellington CBD discussing the technological infrastructure of the urban landscape. As I live within this block I was quite surprised by the plethora of inner city cameras (that I had not noticed) that were watching us in our daily travels. We discussed issues of privacy, who owns the data, what was and could possibly be done with the data, aspects of urban design, display, wayfinding, and infrastructure that could be elaborated or expanded on for public good. Video recording of the walkshop here: <http://www.youtube.com/watch?v=yD0Ylf76IRg>

Adam Greenfield Webstock Walkshop Jan 2010



Adam Greenfield. Networked Urbanism.

Anne Callaway - friend / futurist in Welly.

Sweeden - Conference
UBICAMP.

visuals in info in minority report
→ info felt light. almost magical

AG →
ultimate
interests.

Arch + Urbanism

Ethical
Social
Physc — logic
— for
today.

this will kill that.
the press will kill the church
printing will kill architecture.

technodeterminism

Adam Greenfield Webstock Proper 2010 Talk

Snapper - have to hold it more than 10 secs
- not fluid / quick enough.

UN Revision of Wld Pop.

Cartner Top ten Predictions for 2009.

sensors 20% by 2010?

active democratic actors
constant → variable

gills as glass outside detects air pollution
on outside.

latent to explicit.

Wold
Christian ~~that~~ 'emotional (sensors)
maps'

The big city gives you a sense of being lost
in the crowd.

↳ anonymous to knowable.
↳ sensing billboards.

cameras — juris prudence
stepped over??

Cities have traditionally ordered themselves
together i.e. silk district — info used to be expensive.

Bernard
↳ Global Neotechnic Apparatus
expiring to persisting.

in the air.es

The interval before you go into urban
space more important than once in it.

Design Strategy / considerations

Emotional design - influence through:

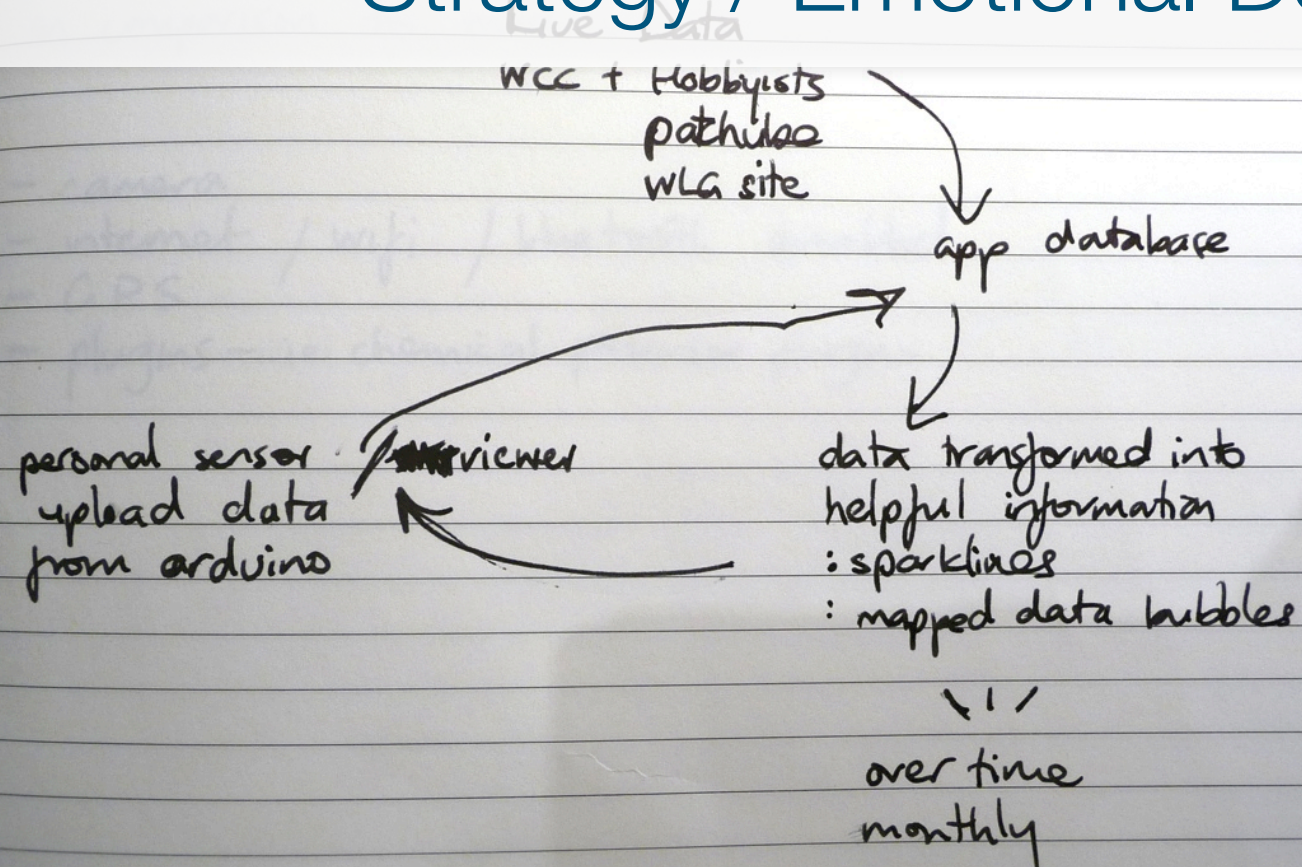
- colour
- typology
- info structure
- navigation

Game Play - make the mundane fun.
ie foursquare gives rewards / badges / points & unlock advanced features.

what makes a smart phone exceed in social experiments
in comparison to more basic / older models of cell phone

- camera
- internet / wifi / bluetooth enabled
- GPS
- plugins - ie chemical sensor plugins

Strategy / Emotional Design / Tech / Notes / Latour



Politics of Nature - How to bring the sciences
into democracy
Bruno Latour

01. Politics does not fall neatly on one side of a divide
and nature on another.
From the time 'politics' was invented, every type
of politics has been defined by its relation to
nature, whose every feature, property & function
depends on the polemical will to limit, reform,
establish, short-circuit, or enlighten public life.

As a result, we cannot choose whether to
engage in political ecology or not, but we
can choose whether to engage in it surreptitiously
by 'distinguishing' between questions of nature
and questions of politics, or 'explicitly' by
treating those two sets of questions as a
single issue that arises for all 'collectives.'

02. In short, in many often vague and
sometimes contradictory guises, concern for
nature has already been introduced into
political life

Cradle to Cradle

P.9. "I realised that design is a signal of intention" — Bill.

P.12. "The scientific community is usually paid to study problems, not solutions; indeed finding a solution to the problem under study usually brings an end to funding for research." — Micheal

"moreover, we scientists are trained in analysis rather than synthesis"

P.14. We imagined a world of products that made children the standard of safety. What about designs that as Bill put it, "loved all the children, of all species, for all time"?

Cradle to Cradle / Environment

- butter
- water blasting
- laser-blinds

sua convention 1988 — ^{agreed} enlarges navigation
Annex 4 — lists crimes.

02 letter than NZ — no whaling in 200 exclusive zone
around NZ + Antarctica

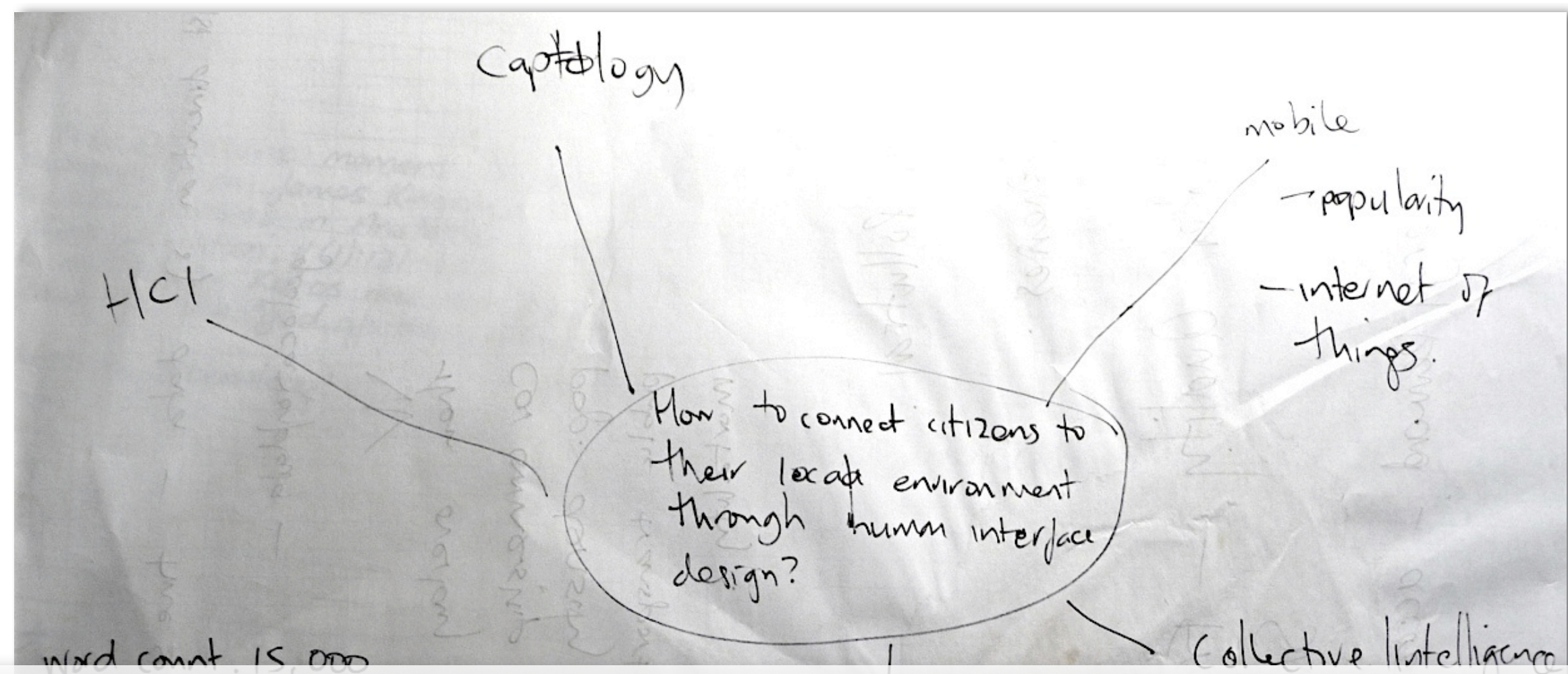
1994 exclusive Antarctic Treaty — no new claims allowed after 1994

Japan (& most other countries) don't recognise

IWC — no dispute regulations in IWC
as there is in other law

90% of ^{plastic} litter goes into the sea

5-1 million tonnes. goes into the sea or yr from NZ



Captology / Design / Interaction

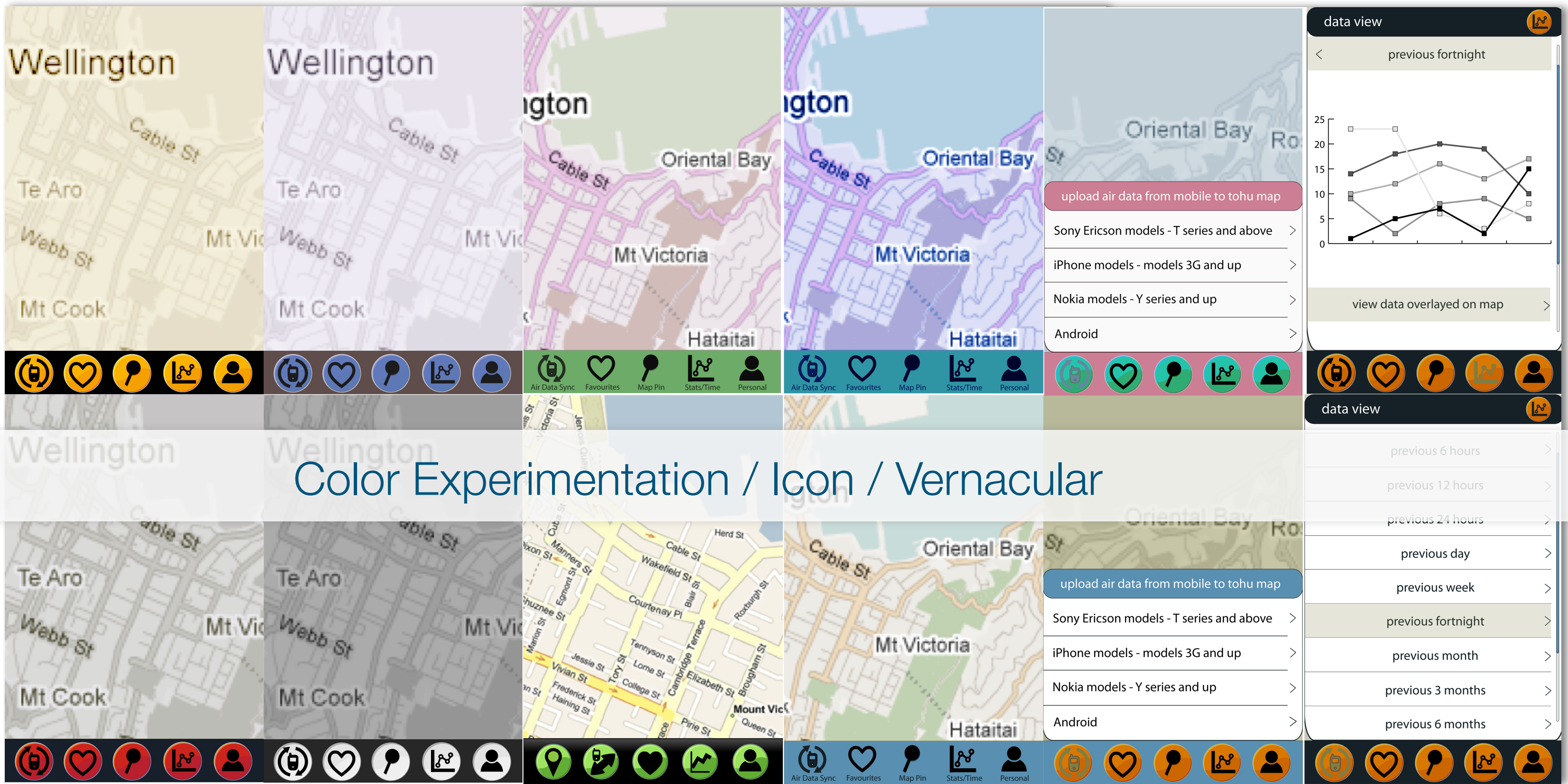
Profession
Account.

Informed
From
Styles.

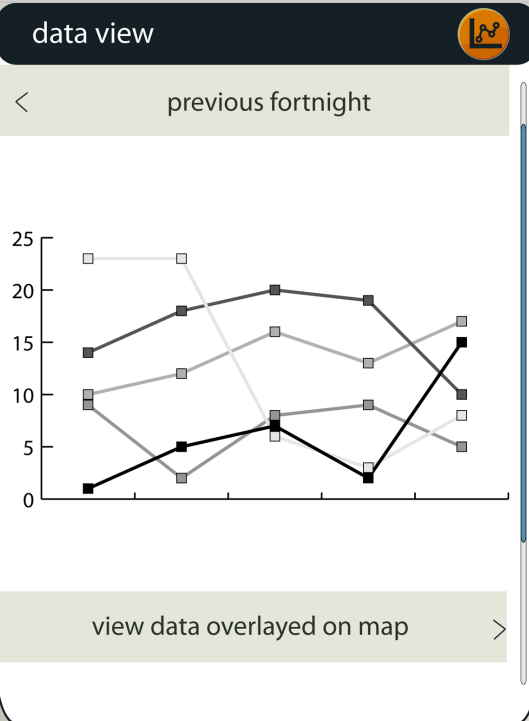
effective design
humans
Ben Schinderman.

knowledge access as
a human right

Kairos: Finding the opportune moment to present your message. (See: James Kinneavy & Catherine Eskin, Kairos in Aristotle's Rhetoric, 'Written Communication', 11 (1):131-142 (Jan 1994))
 *In greek mythology Kairos was the youngest son of Zeus and the "god of the favourable moment."
 P41 'Persuasive Technology'



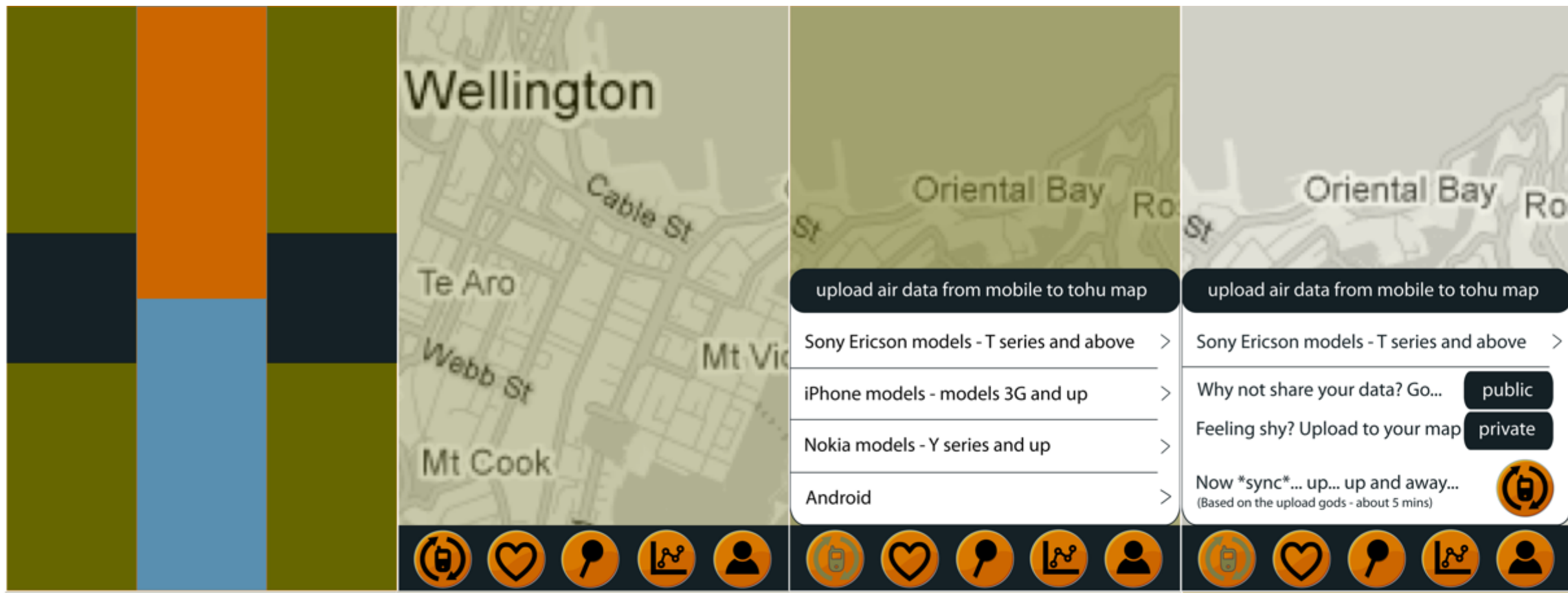
Color Experimentation / Icon / Vernacular



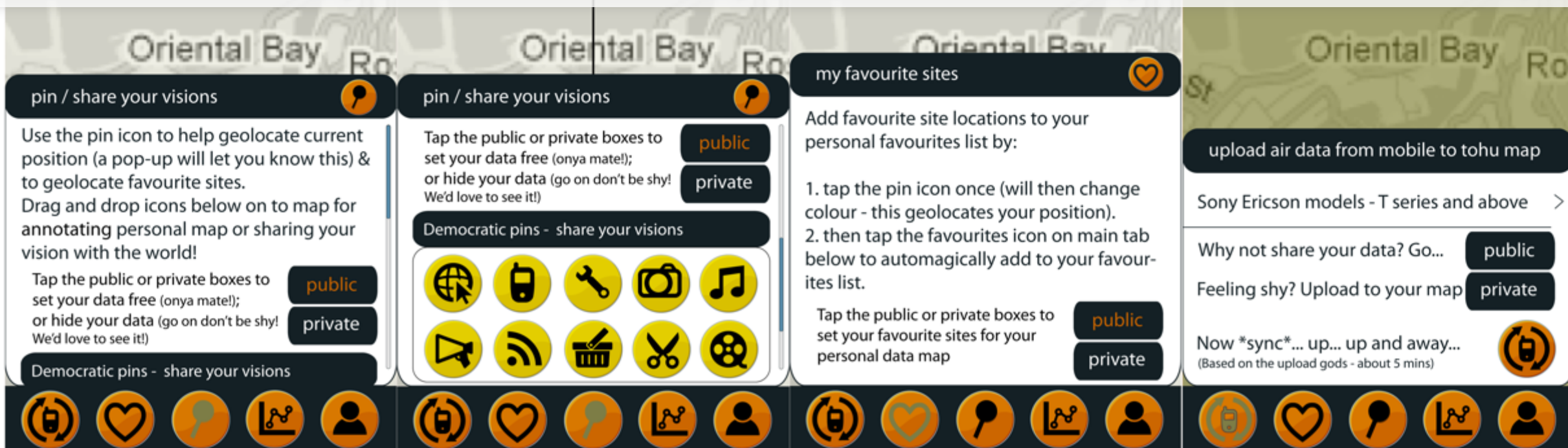
- data view
- previous 6 hours
 - previous 12 hours
 - previous 24 hours
 - previous day
 - previous week
 - previous fortnight
 - previous month
 - previous 3 months
 - previous 6 months

- upload air data from mobile to tohu map
- Sony Ericson models - T series and above
 - iPhone models - models 3G and up
 - Nokia models - Y series and up
 - Android

- upload air data from mobile to tohu map
- Sony Ericson models - T series and above
 - iPhone models - models 3G and up
 - Nokia models - Y series and up
 - Android



Digital Concept Sketches




```

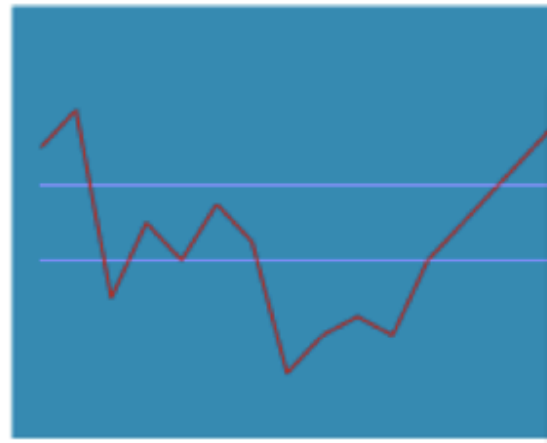
<!doctype html>
<html>
<head>
<title>Sparklines</title>
<script src="sparklines.min.js"></script>

<style>
#spark{
width:500px;
height:250px;
}
</style>

</head>
<body>
<canvas id="spark"></canvas>

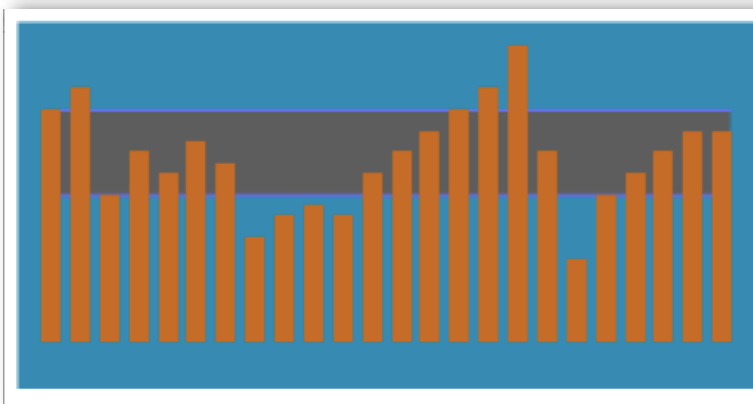
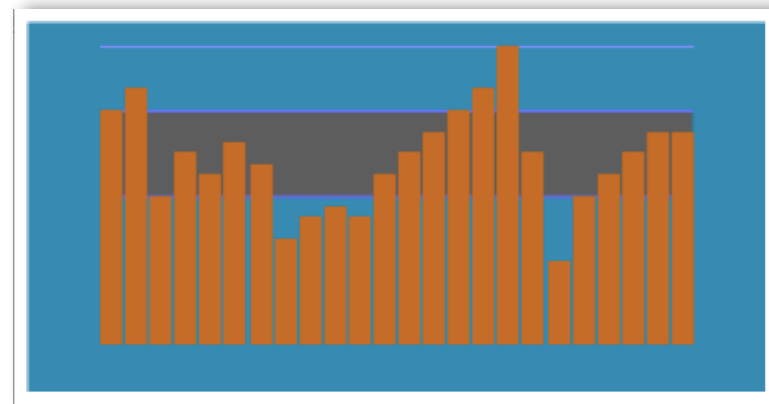
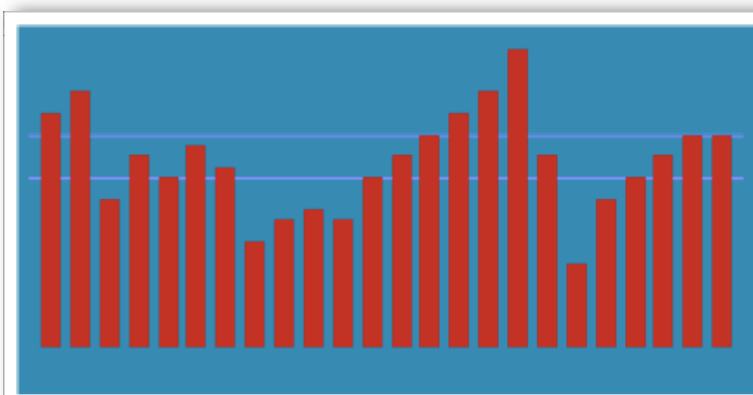
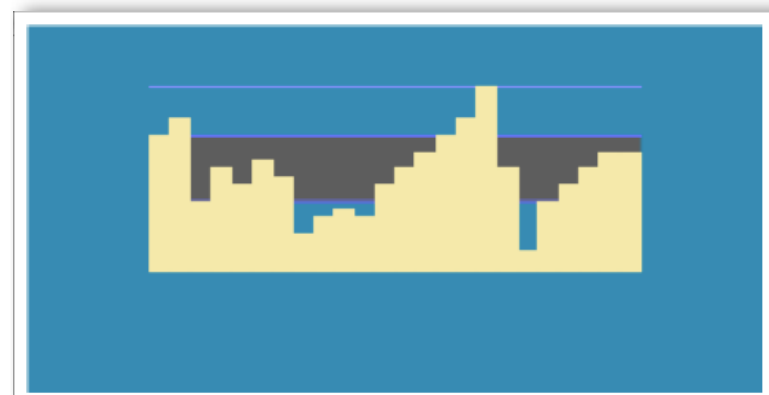
<script>
var data = [120,130,80,100,90,105,95,60,70,75,70,
var opts = {
"value_lines":[90,110],
"top_padding":10,
"bottom_padding":10,
"left_padding":10,
"right_padding":10,
"background":"#0079a8",
"stroke":"#c50800",
//average_color:"#000000",
//percentage_lines:[0.25,0.35,0.75],
//fill_between_percentage_lines:true,
//perc

```



Processing is a well known language to create sketches, animations, games. It is a simplified dialect of java.

The modern browsers that ship with today's smart phones support HTML5 element.



Processing.js Sparkline and Bar-chart Experiments

```

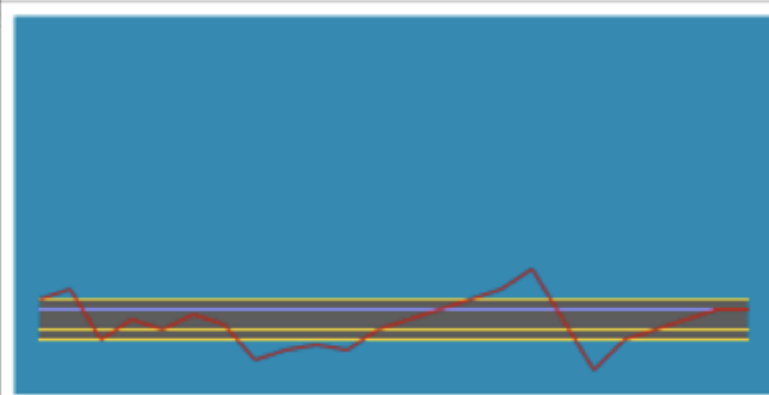
<!doctype html>
<html>
<head>
<title>Sparklines</title>
<script src="sparklines.min.js"></script>

<style>
#spark{
width:500px;
height:250px;
}
</style>

</head>
<body>
<canvas id="spark"></canvas>

<script>
var data = [120,130,80,100,90,105,95,60,70,75,70,90,100,110,120,130,
var opts = {
"value_lines":[90,110],
"top_padding":100,
"background":"#0079a8",
"stroke":"#c50800",
//average_color:"#000000",
"percentage_lines":[0.25,0.35,0.75],
"fill_between_percentage_lines":true,
"percentage_color":"#ffd61c"

```



```

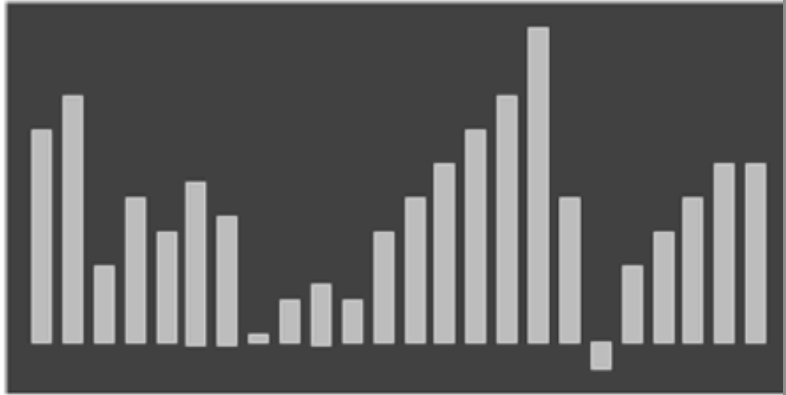
width:500px;
height:250px;
}
</style>

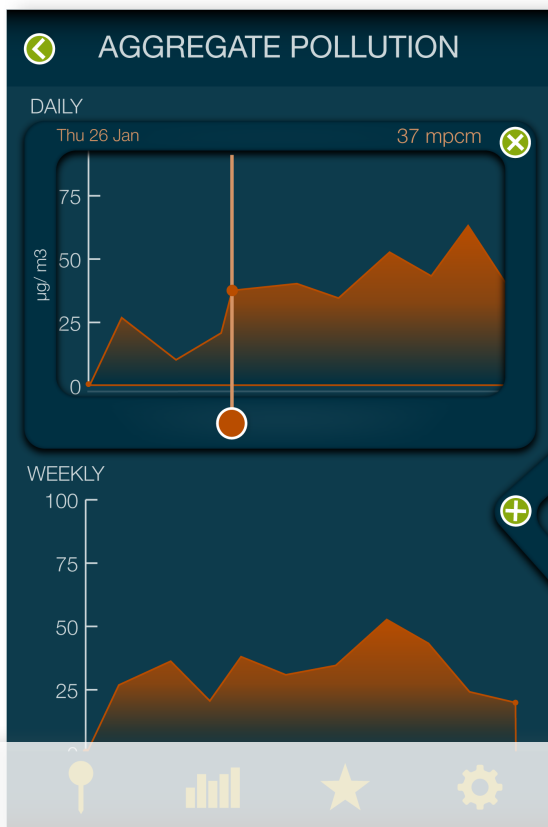
</head>
<body>
<canvas id="spark"></canvas>

<script>
var data = [120,130,80,100,90,105,95,60,70,75,70,90,100,110,120,130,150,
//var opts = {
//value_lines":[85,150],
//top_padding":25,
//bottom_padding":25,
//left_padding":50,
//right_padding":50,
//background":"#0079a8",
//stroke":"#f4e694",
//average_color:"#000000",
//percentage_lines:[0.25,0.75],
//fill_between_percentage_lines:true,
//padding_between_bars':0,
//marking_padding':10,
//extend_markings':false
//percentage_color":"#ffd61c"
//};

var MySparkline = function(id,data,mixins) {
this.background = "#0079a8";

```





SHARE YOUR VISIONS

- Mothers Room
- Street light
- Tree
- Seen birdlife
- Public Seating

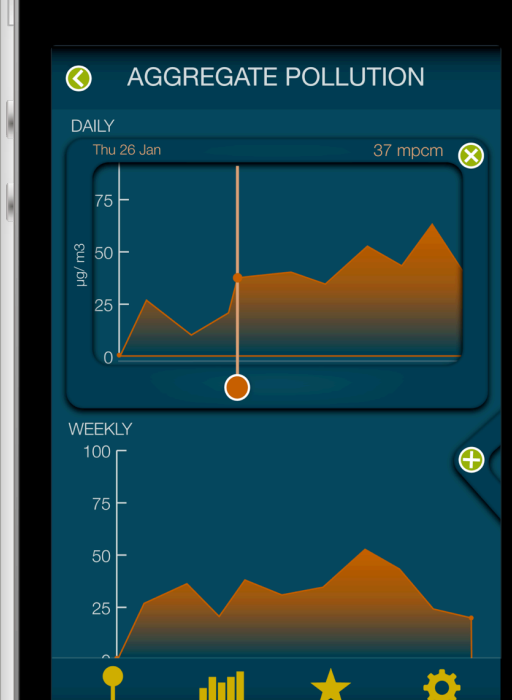
Drag icons from wheel to annotate map

SHARE YOUR VISIONS

- Mothers Room
- Street light
- Tree
- Seen birdlife
- Public Seating

Drag icons from wheel to annotate map

Manners / Taranaki St
Moderate

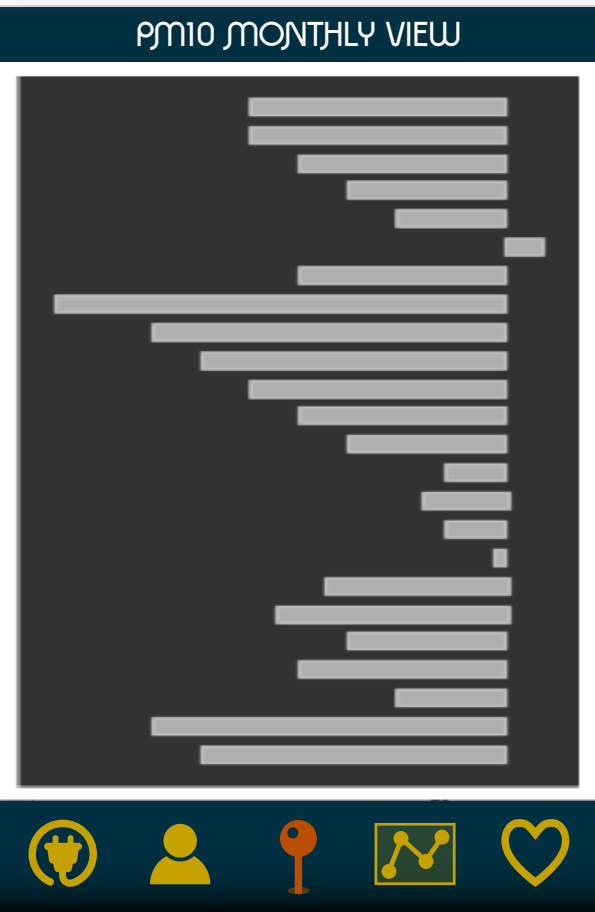


SHARE YOUR VISIONS

- Mothers Room
- Street light
- Tree
- Seen birdlife
- Public Seating

Drag icons from wheel to annotate map

Digital Sketches



GRAPHED DATA

View Data as:
Bar chart or Sparkline

PM10 Hourly / Daily / Monthly / Yearly
TOUCH ABOVE WORD FOR VARIOUS VIEW

PERSONAL SETTINGS

- Tag social media sharing privately (on) publicly (off)
- Tag personal photos as private (on) publicly (off)
- Geolocation tagging

EMAIL MODEL INCLUSION REQUEST

To: chchchanges@tuneinshareout.com
Cc: adam@greenfield.com
Sender: greer@funkive.com

Message: Hi, Thank you for making available a free Wellington based health app. It ROCKS! I'd like to request model Android T25x included in the next update please

Q W E R T Y U I O P
A S D F G H J K L
⬆ Z X C V B N M ⬅
. ? 1 2 3 space Send

SHARE ON SOCIAL MEDIA

Twitter: @envirotainment

Foursquare: @gfm

Brightkite: @envirotainment

Facebook: greermitchell

Q W E R T Y U I O P
A S D F G H J K L
⬆ Z X C V B N M ⬅
. ? 1 2 3 space Send

WellWelly



my favourite sites

Add favourite site locations to your personal favourites list by:

1. tap the pin icon once (will then change colour - this geolocates your position).
2. then tap the favourites icon on main tab below to automagically add to your favourites list.

Tap the public or private boxes to set your favourite sites for your personal data map

public private

FAVOURITE SITES

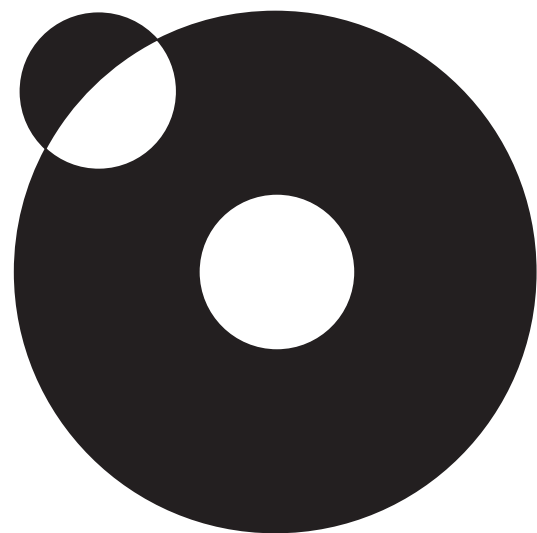
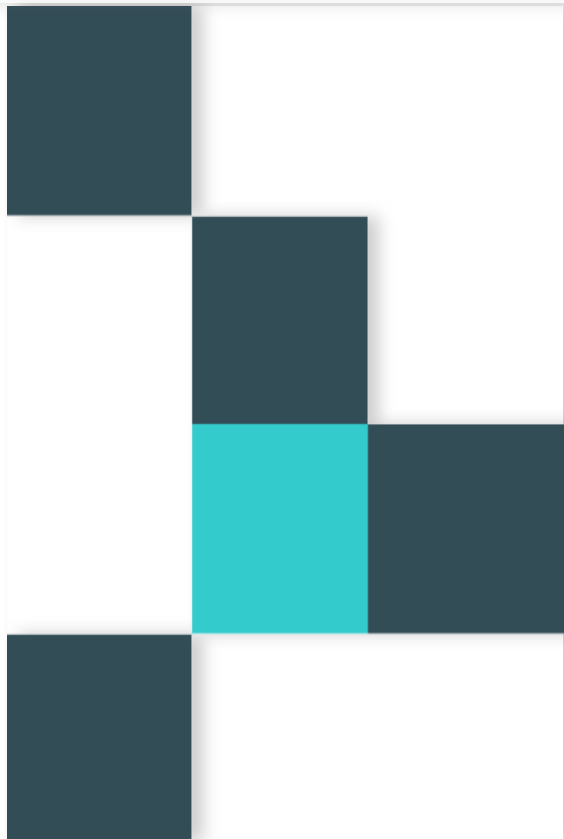
Add locations to your personal favourites list:

1. Tap the pin icon once (will then change colour - this geolocates your position).
2. Tap the favourites icon on main tab below to automagically Well add to your favourites list.

20 Egmont Street, The Tea Store, CBD, Wellington.



Digital Sketches

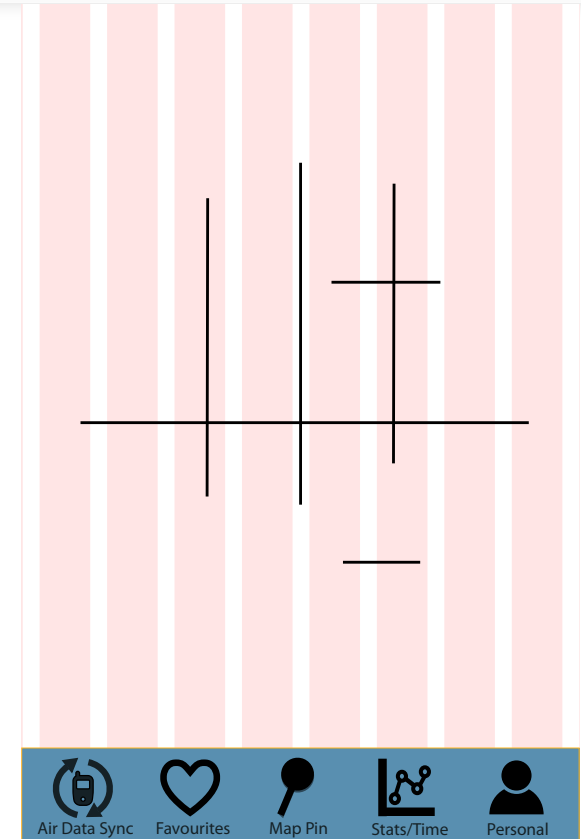
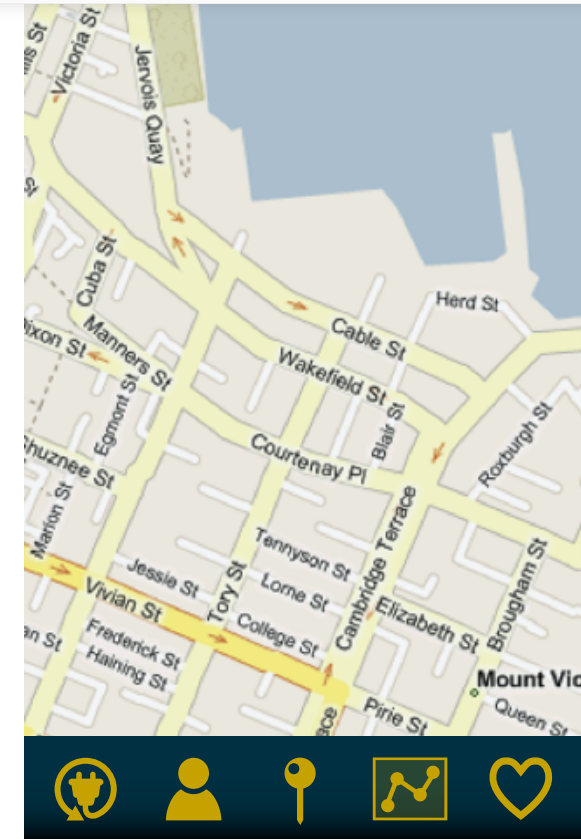


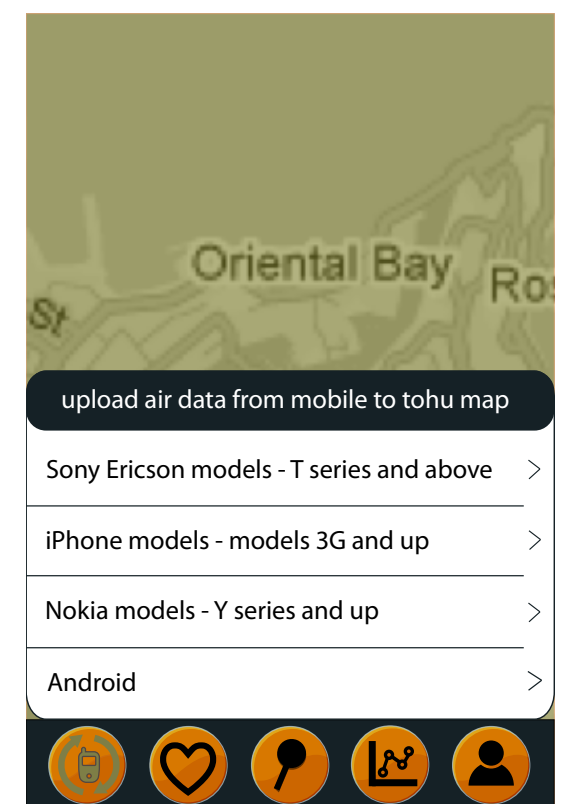
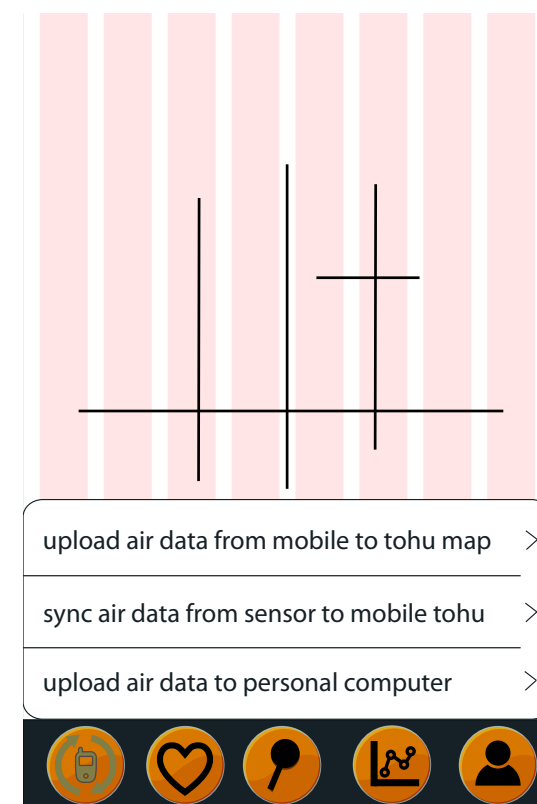
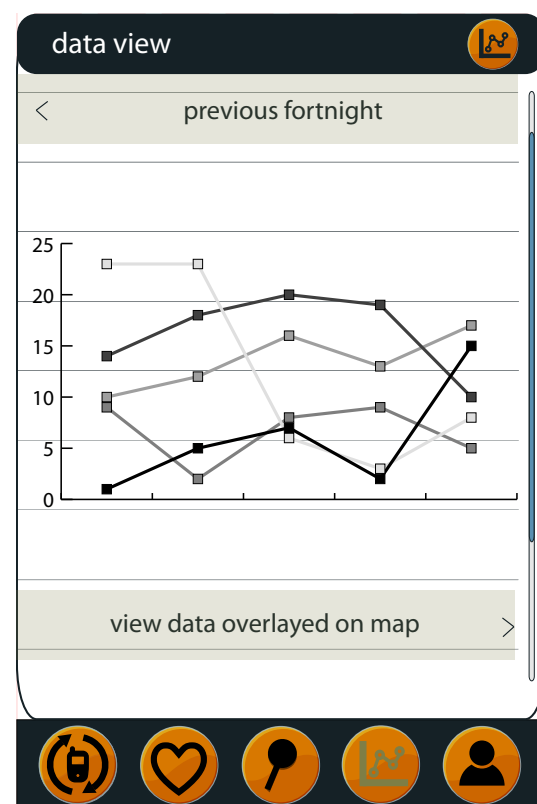
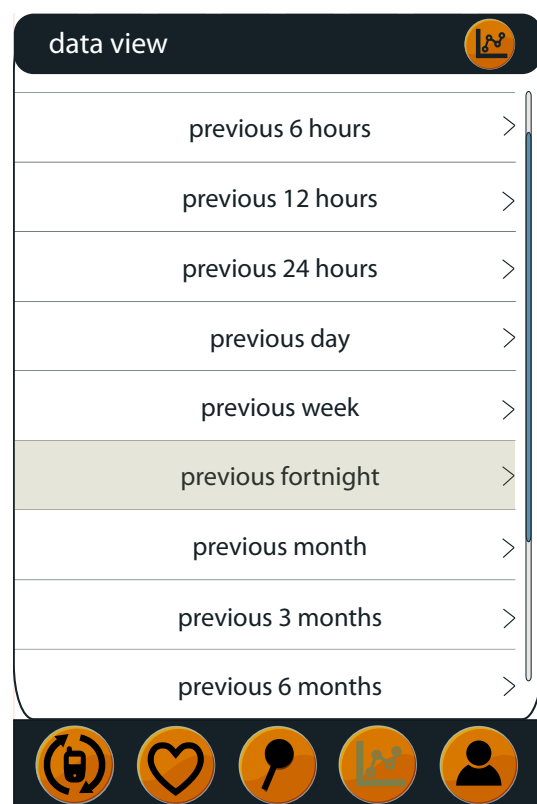
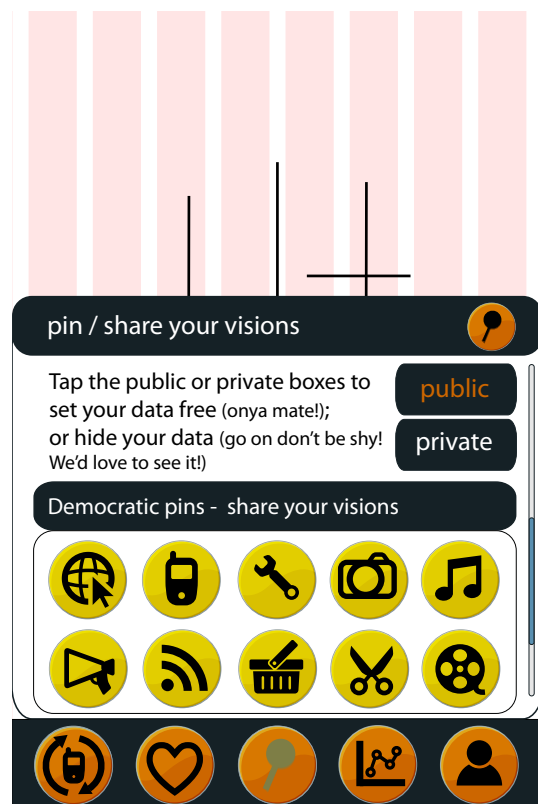
FAVOURITE LOCATIONS

13 Leeds Street, Hannah Warehouse, Wellington.

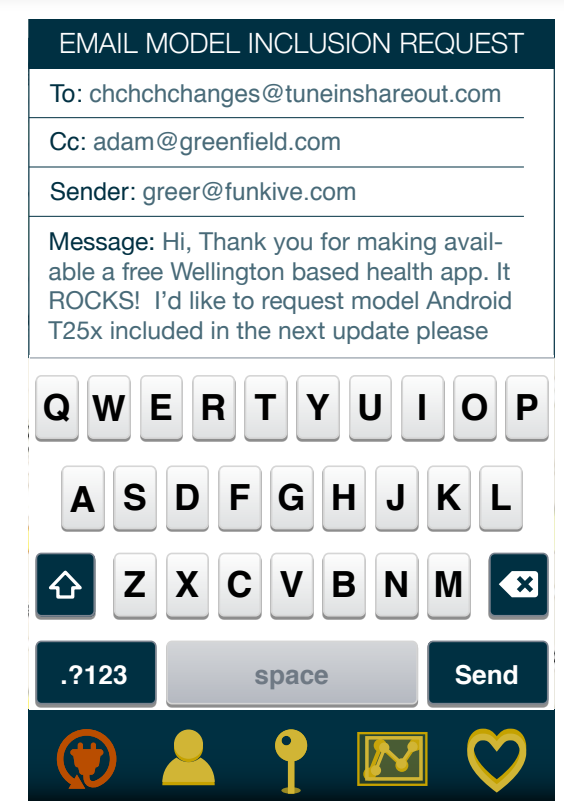
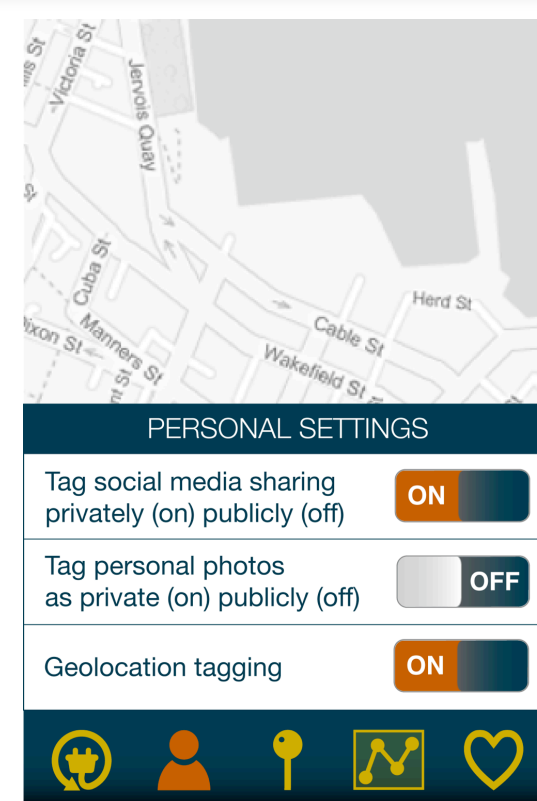
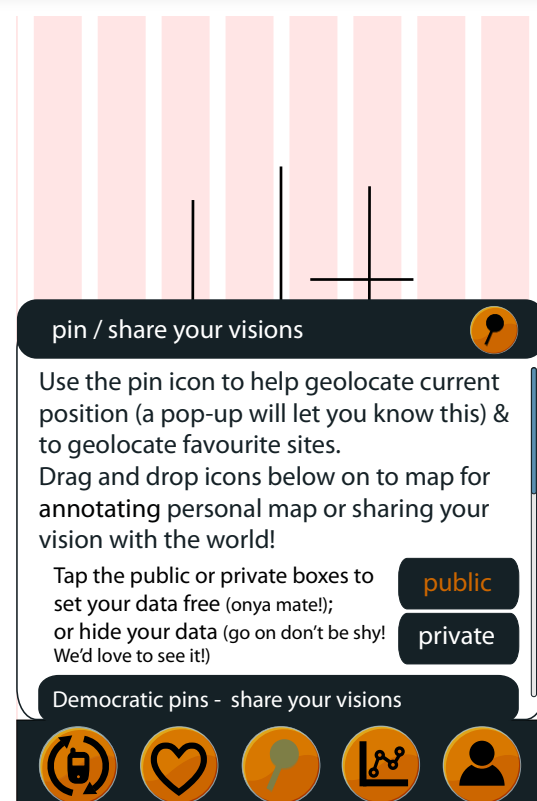
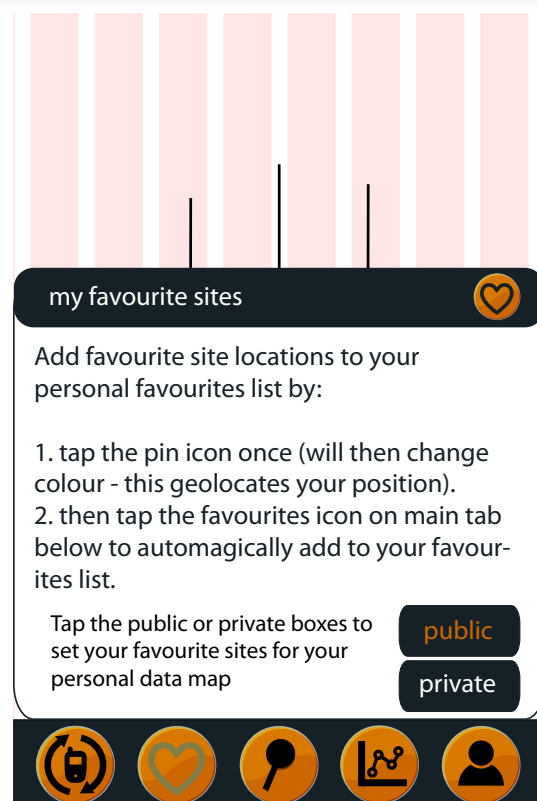
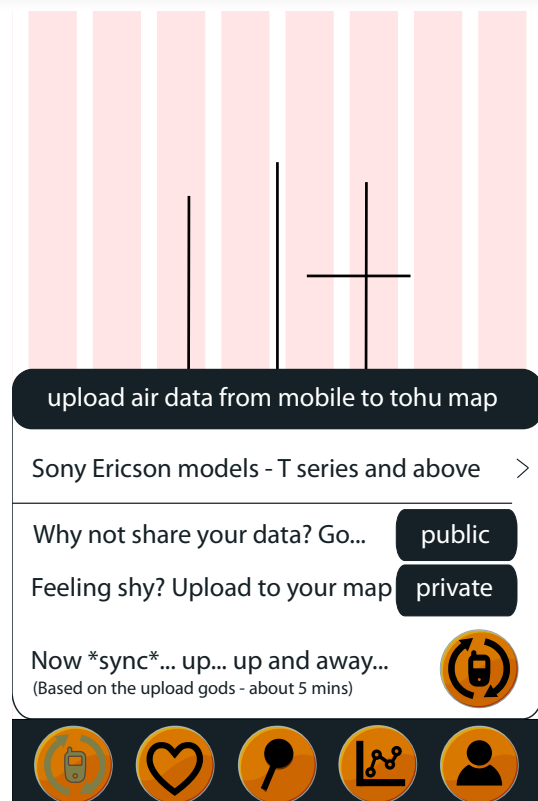
126 Oriental Parade, Te Aro, Wellington, 6011.

20 Egmont Street, The Tea Store, CBD, Wellington.





Digital Sketches



SHARE ON SOCIAL MEDIA

Twitter: @envirotainment **Sign in**

Foursquare: @gfm **Sign in**

Brightkite: @envirotainment **Sign in**

Facebook: greermitchell **Sign in**

Q W E R T Y U I O P

A S D F G H J K L

↑ Z X C V B N M ↵

.?123 space **Send**

SEND TO TWITTER

To: @envirotainment **Sign in**

Message: Asthmatics beware: High levels of PM10 & CO2 around Taranaki & Vivian Street intersection in past hr. See: <http://bit.ly/3gfish> for more info

Send

Q W E R T Y U I O P

A S D F G H J K L

↑ Z X C V B N M ↵

.?123 space **Send**

EMAIL MODEL INCLUSION REQUEST

To: chchchanges@tuneinshareout.com

Cc: adam@greenfield.com

Sender: greer@funkive.com

Message: Hi, Thank you for making available a free Wellington based health app. It ROCKS! I'd like to request model Android T25x included in the next update please

Q W E R T Y U I O P

A S D F G H J K L

↑ Z X C V B N M ↵

.?123 space **Send**

PIN / SHARE YOUR VISIONS

Tree	
Seen birdlife	
Public Seating	

PERSONAL SETTINGS

Tag social media sharing privately (on) publicly (off) **ON**

Tag personal photos as private (on) publicly (off) **OFF**

Geolocation tagging **ON**

Digital Sketches

VIEW DATA

- Air Quality
- Water Quality
- Your Requests
- Animal Spotting
- Your Air

PM10 Particulate

- Hour
- Day
- Week
- More...

Barchart / Sparkline

PIN / SHARE YOUR VISIONS

Tree	
Seen birdlife	
Public Seating	

VIEW DATA

PM10 Particulate

Particulate Matter (PM) fine particles/ or soot are tiny subdivisions of solid or liquid matter suspended in a gas or liquid. Human activities, such as the burning of fossil fuels in vehicles, power plants and various industrial processes also generate significant amounts of aerosols. Averaged over the globe, anthropogenic aerosols - those made by human activities currently account for about 10 percent of the total amount of aerosols in our atmosphere.

- Air Quality
- Water Quality
- Your Requests
- Animal Spotting
- Your Air

PM10 MONTHLY VIEW

PM10 MARCH 2010

```

Light_seeking_Robot_test_final
}
void leftForward(){
  digitalWrite(motorRightF, LOW); // set leg 1 of the H-bridge low
  digitalWrite(motorRightR, HIGH); // set leg 2 of the H-bridge high

  digitalWrite(motorLeftL,LOW); // set leg 1 of the H-bridge low
  digitalWrite(motorLeftR, LOW); // set leg 2 of the H-bridge high
}
void rightForward(){
  digitalWrite(motorRightF, LOW); // set leg 1 of the H-bridge low
  digitalWrite(motorRightR, LOW); // set leg 2 of the H-bridge high

  digitalWrite(motorLeftL,LOW); // set leg 1 of the H-bridge low
  digitalWrite(motorLeftR, HIGH); // set leg 2 of the H-bridge high
}
void rStop(){
  digitalWrite(motorRightF, LOW); // set leg 1 of the H-bridge low
  digitalWrite(motorRightR, LOW); // set leg 2 of the H-bridge high

  digitalWrite(motorLeftL,LOW); // set leg 1 of the H-bridge low
  digitalWrite(motorLeftR, LOW); // set leg 2 of the H-bridge high
}

Light_seeking_Robot_test
int motorRightF = 5;
int motorRightR = 6;
int enableRight = 7;

int motorLeftL = 10;
int motorLeftR = 11;
int enableLeft = 12;

int rightLDR;
int leftLDR;

void setup(){
  pinMode(motorRightF, OUTPUT);
  pinMode(motorRightR, OUTPUT);
  pinMode(enableRight, OUTPUT);

  pinMode(motorLeftL, OUTPUT);
  pinMode(motorLeftR, OUTPUT);
  pinMode(enableLeft, OUTPUT);

  digitalWrite(enableRight, HIGH);
  digitalWrite(enableLeft, HIGH);
}

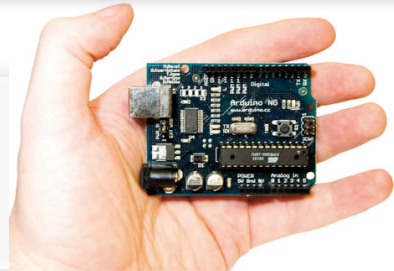
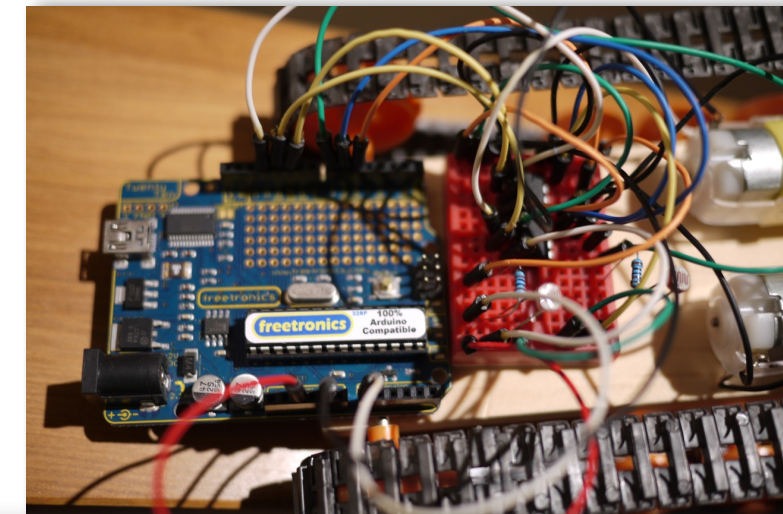
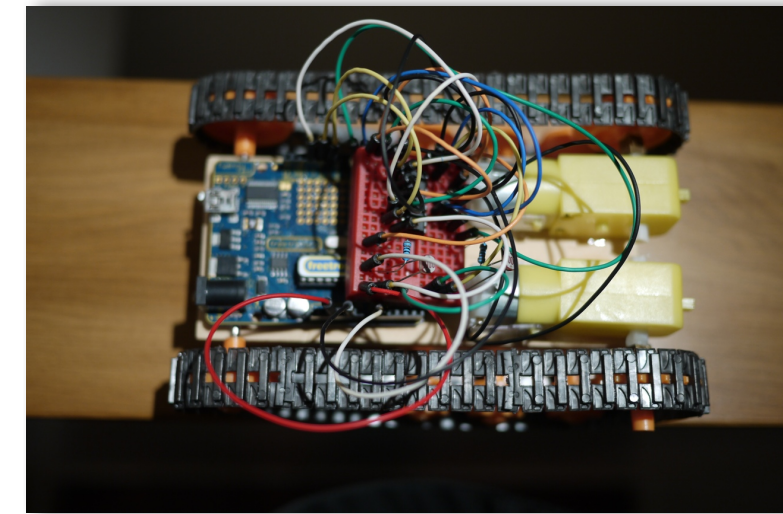
```

Arduino Light Seeking Robot ->

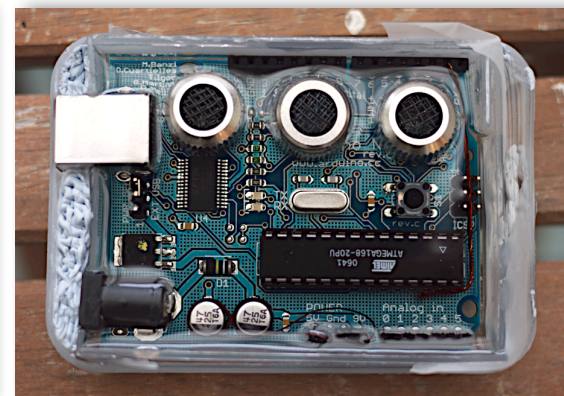
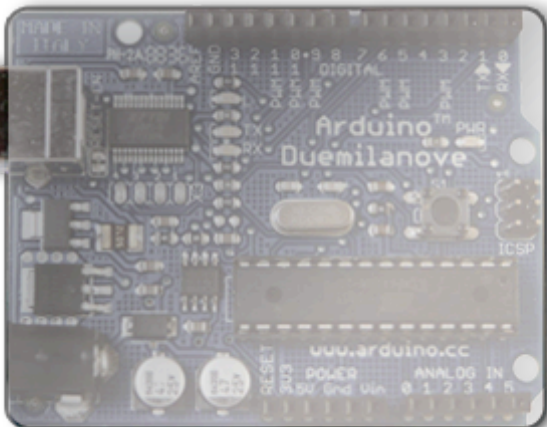
A 2 Day weekend workshop to reacquaint myself with arduino and the processing language.

The robot (powered by a 5v battery and 2x fishtank batteries) was designed to accelerate towards the light.

Needed to be set in resin or something similar to stop the wires from coming loose from the breadboard.

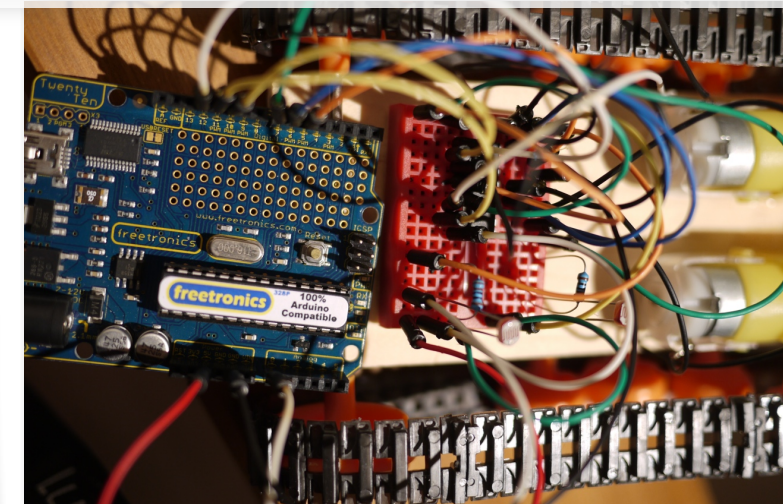


Arduino Mobile Device Experimentation



<- Arduino 1st Sensor Device Test

Not mixed properly, so didn't turn out very well. Was my first time working with resin.





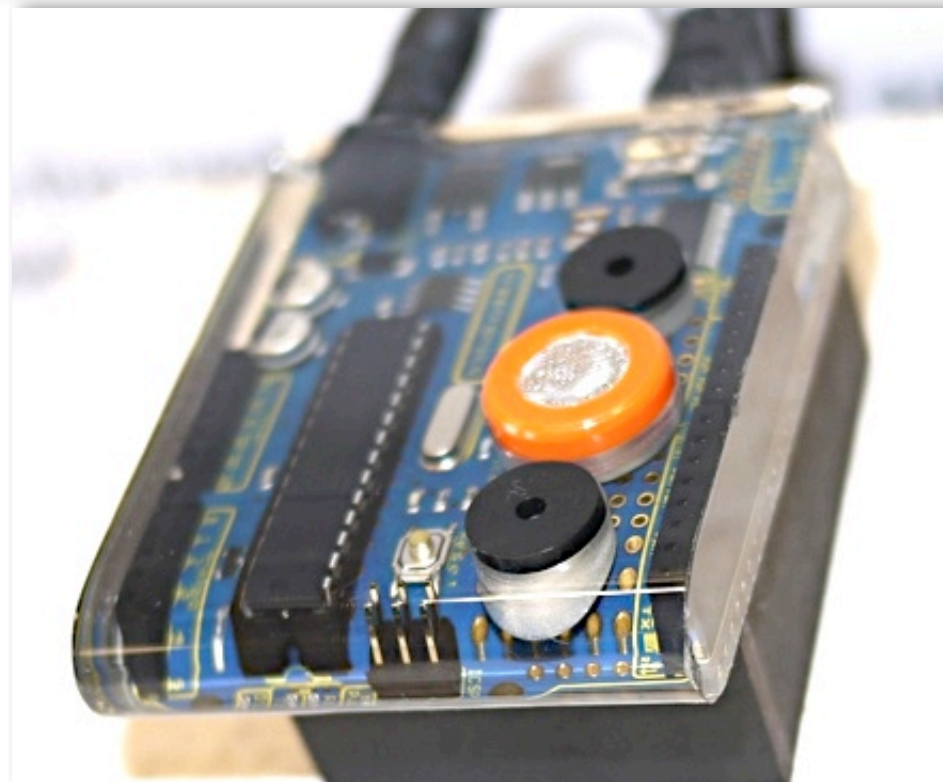
- Arduino Final Prototype
- Clear Resin
- 3 Air Sensors

Final Arduino Mobile Syncing Air Sensor Prototype (below).

iPhone Working Prototype (shown on security shell encased iTouch 4 exhibition).

- iPhone Working Prototype
- Arduino Air Sensor Prototype
- Thesis

Arduino Air Sensor / Application / Thesis



Tune In Share Out (TISO) Website where mobile owner can access:

- Brief overview of app.
- Downloads web app.
- Contact TISO.
- Follow on Twitter.



The banner features the TISO logo (three overlapping circles) at the top left. To its right is the text: "Tune In Share Out connects you to your local environment, council, and social streams through live air and water quality feeds." Below this is a "Download to iPhone" button. On the right side of the banner is a smartphone displaying the app's logo. The bottom section of the banner is divided into four columns, each with an icon and text:

- Air Quality Statistics:** Tune In Share Out offers interactive sparklines of air quality data, present time series data views.
- Interactive Map:** Mapped air quality and water temperature quality and information for citizens on the go.
- Air Quality Sensor:** Portable air quality badge that syncs data with iPhone to track your quantified self over time, and share data with your social network and the world. For detailed information please contact sensor@tuneinshareout.com.
- Share your city visions:** Place icons on map to share with council and the world your needs or wants for your city infrastructure and amenities (either privately or publically).

At the bottom of the banner, there are social media links: "Follow @tuneinshareout on Twitter for news and updates" and "Email feedback@tuneinshareout.com to give feedback or report issues". It also says "Designed by Greer Mitchell".

NB: A web app is an app. that can be downloaded to a mobile device from the internet as opposed to downloading via iTunes App Store.

tuneinshareout.com

Images below are cycled through on website to give the viewer an idea of app.

TISO Website

