WHERE in the Future?

Scenarios

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Introducing the Scenarios

Work on the scenarios included in this package resulted directly from the production of the Trend Deck, and from an extensive horizon scan of the locative information landscape. Common amongst many of these signals and trends were repeating critical uncertainties: drivers underlying the expression of the trends that seemed particularly important and influential, but which were also particularly uncertain. These drivers can be underlying social, economic, or technological factors.

Two of the most critical uncertainties in the location information landscape have to do with the attitudes of users towards the stewardship and management of their location information, and the diversity of forms and platforms in the marketplace - what you could call the platform ecology.

In this project, I have explored how two questions, when paired against one another, contribute to outcomes on a 5 year timeline that make the future of location-based software service and product design uncertain.

What will the diversity of forms and platforms be?

The second fundamental uncertainty has to do with the diversity of location-based platforms and products in the marketplace. Will sales channels, traffic rankings, and design innovation be dominated by a **small number of large players** utilizing conventional forms and patterns, or will the victors be **numerous smaller networks and platform products** that explore more exotic software design patterns and models of use?

This plurality of perspectives on the possible future is immensely valuable, for it enables today's developers of games and social media to consider the impacts of their design and business modeling decisions against four possible contexts of use, not one. Each of the four scenarios contrasts with the others, but in other ways they are all comparable and bound together in their confrontation of two core and critical uncertainties.
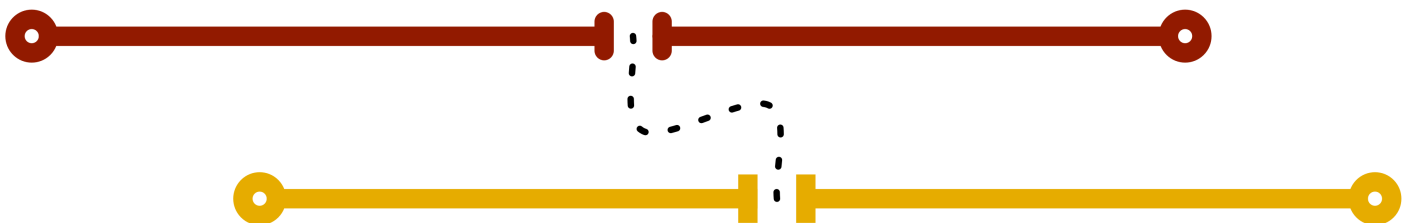
What will social attitudes towards location information be?

The fundamental uncertainty here is around user attitudes and values. We know from the explosive growth location-based software services have experienced in the past few years that uptake on location data is high. But how do users of location-based services feel about the treatment of that data in 2017? Will those users continue to be relatively **carefree** when it comes to what LBS's they'll sign up for, how they'll make their personal location data available, and who they'll make it available to? Or will these users broadly adopt **risk-averse attitudes** and values with regard to the location-based services they engage, how they do so, and what they will tolerate in terms of the handling of this sensitive and often personal information?

Of these four scenarios, **1 + 2 explore worlds in which the users of location-based services are risk-averse** in terms of their attitudes and values - they are savvy in terms of licensing agreements, they are wary of networks that may exploit their information, and they are cautious in considering the implications of rolling out new kinds of services dependent on location information.

Scenarios **3 + 4 explore worlds where users of location-based services are more carefree** - they sign up for new services without reading the fine print, engage in risky behaviour in their use, and tend to ignore warning signs that might indicate their information is at risk.

What will the diversity of platforms and design patterns be?

### What will social attitudes towards location information be?

By contrasting these two critical uncertainties against one another in a 2x2 matrix, the world of location-based services in the year 2017 can be richly visualized from four different perspectives.

In this diagram, each scenario is introduced and situated in the matrix:

DIVERSITY of forms and platforms

4
Cops and Robbers

1
Long and Winding Road

Diverse Players + Carefree Attitudes

A man used to victory in a location-based game learns that he's being gamed.

His high score and leaderboard position might not be all that's at stake.

Diverse Players + Risk Averse Attitudes

A 72-year old grandmother is introduced to the locative app marketplace.

She has high expectations for location-based services, and is amazed by the diversity.

CARE
FREE

RISK
AVERSE

Few Players + Carefree Attitudes

A young woman learns the hard way that reading the fine print can be critical.

Issues of ownership and privacy of information are challenged as she sees the true face of the SUP network

Few Players + Risk Averse Attitudes

A father and son both try and ditch the shackles of prototype RIM technology.

Both of them have gamed their way to freedom, but in a monopoly the stakes can be very high indeed.

3
Who is the Product...

2
A Short Leash

MONOCULTURE of forms and platforms

Enter the story-worlds of these four scenarios, each one set in a different Toronto of 2017, at a moment of significance for one user of one location-based service.

While you read them, contemplate some of the implications the details and broad strokes of these future worlds might have on the decisions you make today during the development and design of location-based platforms, applications, and games.
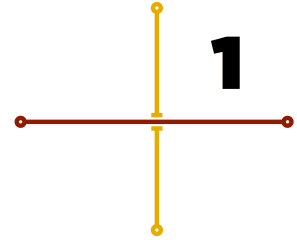
The Long and Winding Road

WHOOSH, Huff. Whoosh, huff.

Kinga Nowicki sighed. It was her 72nd birthday, and she had hoped that she would be exempt from blowing out candles after so many years. The cake her daughter Aniela and her grandson Tomasz had brought over was small and ornate, unlike any kind of cake she had ever seen before, but that was getting to be par for the course these days - always something new, always something hard to understand.

After the cake was done, and the 3D panoramic photos were finished sending out to family members scattered all over the world, Aniela and Tomasz presented her with a present - bigger and heavier than she expected...

Kinga slowly tore the paper away, expecting a piece of cookware or a new set of saucers. She was surprised and a bit bewildered with the box left sitting in her lap. She was about to ask when Tomasz answered the question for her:

"It's like a computer, Grandma. We're all so scattered around the globe that we thought we could get you something that would help you keep in touch!"
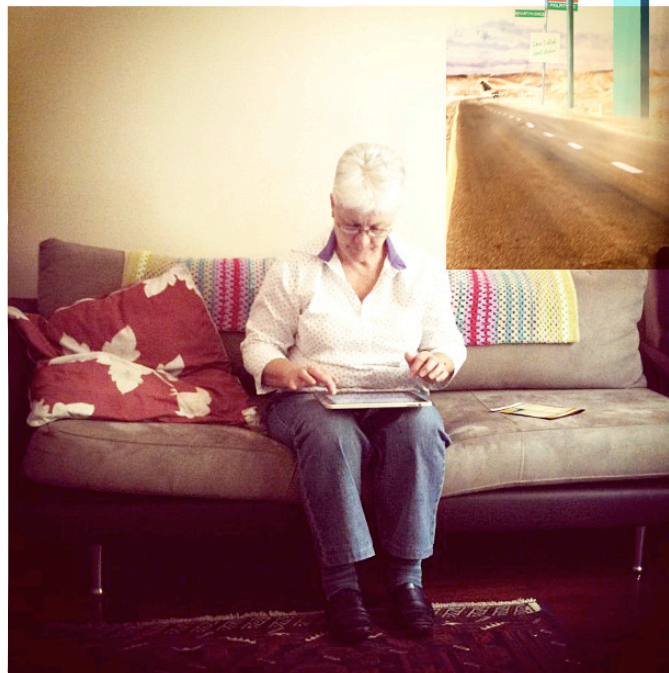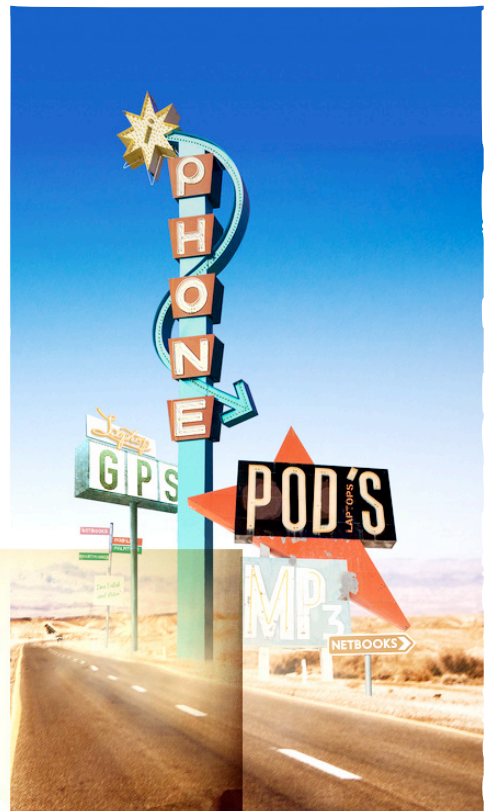
Kinga looked the box over, noting a slew of specifications and buzzwords that meant almost nothing to her - LTE+, 5.2″ haptic display, NFC / RFID / GPS… it was more like a Rosetta Stone without a reference than a real birthday gift. She tried to keep a smile on her face as Tomasz walked her through the meaning of some of the features, while Aniela looked equally uneasy. "At least I'm not the only one left behind by all these gadgets," Kinga thought.

Kinga wasn't comfortable with the idea of a device that could sense her every move and update people all over the world with details as to her exact coordinates, conversation partners, and topic of contemplation. There had been a number of scares in the past few years, with so-called "location pirates" using the coordinate information of everyday people to pin crimes on innocent bystanders, and funnel money without hope of recovery.

Once the device was turned on, its amazing screen lighting Kinga's face, Tomasz began to show her how it worked. He could sign his Grandma up for dozens of social services, used by all of the family's rank and file - but they all spoke the same language, and her new device could update all of the networks at once if she had something to say, through one quickly dictated message. Tomasz could also set the device up to download millions of applications that transformed her location co-ordinates into something more than just numbers - into information that a machine could read and visualize in any number of different ways. It wasn't about finding her position on a map, it was about understanding the community around her and finding new ways to stay in touch.

One application called *1-2-Tree™* could help her address a regular problem - cats stuck at the top of the maple tree in her front yard - but it would do so with a built-in delay, so that she wouldn't feel obliged to stand outside in the sun chatting up the firemen while they did their job… although Aniela joked that that might be Kinga's favourite part of the experience.

With *Where You Stand™,* Kinga could walk the streets of Cabbagetown and travel back in time - viewing historical images of the neighborhood as it appeared during her childhood, and leaving virtual notes posted on fenceposts with stories of her first kiss, or of the snowstorm that once raged for weeks on end.

A few weeks prior, Kinga's doctor had fitted her with a special necklace that, while fashionable, served a greater purpose - it monitored her heart rate, brainwaves, and breathing; screening for potential signs of an impending stroke or heart attack. Tomasz showed her an application called *HeartBEATS™* that took this information, "mashed it up" with the latitude and longitude information from her daily week, and used it to create a unique piece of music for her workout every day. Aniela suggested that a third career might be in the cards for Kinga - as a producer of ambient symphonies!

Kinga figured that she might only use a handful of these applications, but that if they were going to reside on her newfangled device they were going to be completely safe and secure. She wasn't going to fall victim to one of these hoaxes resulting from people stealing her location information while she travelled around the city. Tomasz understood completely, and showed her how to filter for applications that had a *LockBox Rating* - software that had been independently reviewed and found to exceed the specifications laid out by the Canadian government in its 2015 *Location Information Privacy Order*. These pieces of software tended to be more expensive than their less accredited alternatives, but for Kinga this made all the difference in the world. What was another $5 on top of a $8 sticker price when it ensured her safety and peace of mind?

Kinga had sheltered cats all of her life, but found that she no longer had the energy to care for more than one at a time - was there an application with a virtual pet, she wondered? *PetPrints™* was designed to interface with hundreds of other services and location information

platforms - but when Kinga travelled around and visited her favourite stores, friends, and restaurants, the pet would automatically check where she was using the tablet's advanced software, and update its looks and personality to reflect her travels. If she spent too much time gabbing with old friends (as Aniela often accused), the pet could become a bit of a blabbermouth... but if she spent a bit more time walking Cabbagetown's forest trails, the pet could very well come across as every bit the nature lover that she was.

With a municipal election coming up, Kinga asked her grandson if there were any applications that would help her learn more about the various candidates in her riding. Just a moment later, they were signed up for *CANDIDate*, a service that many politicians had agreed to use for transparency's sake, that publicly shared their location and activity on the campaign trail with all of their followers. Kinga requested that the application automatically detect her location.

Much to her surprise, it let her know that the Liberal candidate in her riding was meeting with residents on her street that very day. From the looks of the profile page he had set up on *CANDIDate*, he wasn't too hard on the eyes, and the real-time location feed in his profile indicated that he was just down the street... Kinga thought about it for a second, and wondered if maybe this new technological device wasn't so bad after all.

DIVERSITY of forms and platforms

CARE FREE — RISK AVERSE

MONOCULTURE of forms and platforms
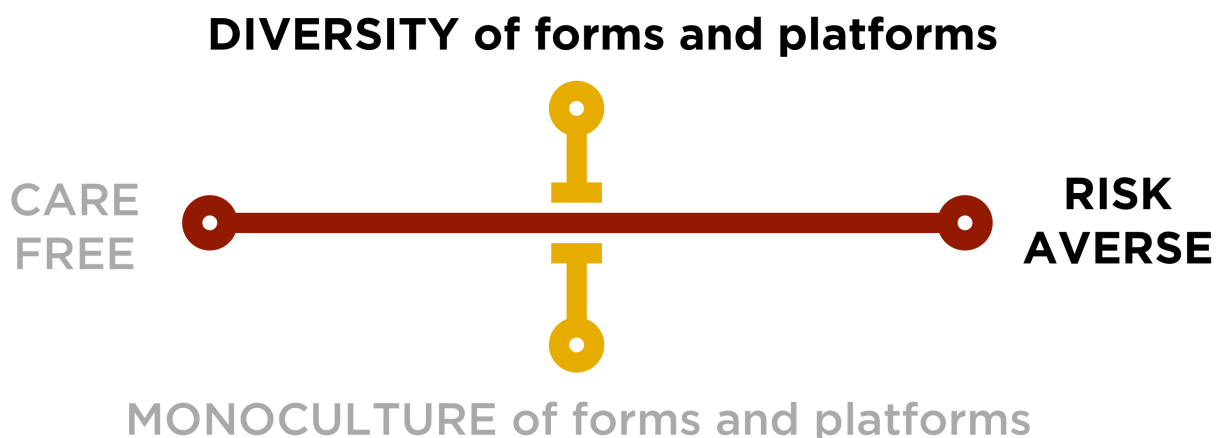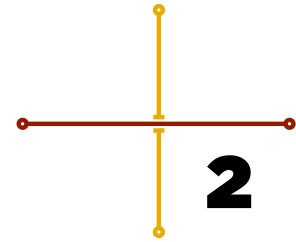
A Short Leash

CLICK. Click-Click. Click.

It was 9:30am, and Jean Trepanier had just settled in to his regular work routine - or so it appeared. He worked for RIM, a once-major player in the global telecommunications industry that had reinvented itself around the provision of location services to corporations trying to effectively manage off-site workforces. RIM's newest tool, a subscription asset tracking suite called *Crèche™,* was designed to help managers and executives keep track of the physical positions of employees without micromanaging or exposing themselves to the sensitive details of workers' increasingly personal daily schedules.

As a member of the quality assurance team for *Crèche™,* Jean had mapped all the ins and outs of the service - include how to game it to ensure a relaxed workday. He told himself that if *Crèche™* made a splash in the industry, the company would need to know how to deal with crafty users hunting for workarounds in the service.

In 2015, the Conservative majority Canadian government had pushed through a piece of legislation called the *Location Information Privacy Order*, intended to limit the exposure of managers and executives to personal information in a business landscape where most employees were carrying at least one device capable of pinpointing his or her location through GPS, RFID, and social media. As user attitudes towards privacy and the protection of personal information had become more and more vocal, the government felt the responsibility to act by drawing a line in the sand.

Desperate for a new revenue stream following the collapse of its Blackberry product line, RIM quickly stepped into the limelight. Using the encryption channels and security software which had been the hallmark of its earlier information technology products, the company had developed a new set of tools that would allow the tracking of employees - and students, and recognized offenders - through an anonymized central network that shuffled its data about in such a way that even RIM itself wouldn't be able to decode it.

But as is often the case with complex systems, the system workaround Jean had discovered to evade his own employer was delightfully simplistic... and his name was *Rover*. By affixing the RIM-designed and location-tracking bracelet that Jean wore to the family pet, and placing a bowl of food beneath his workstation, Jean could take his work with him to the park or even skip out of work for the whole afternoon... and no-one would be the wiser. The *Crèche™* system wasn't designed to constantly pass live location information up the management chain, it was designed to recognize when someone had deviated from a pre-planned itinerary or left a recognized destination for more than a certain amount of time. In a way, it was the inverse of the check-in-driven location-based services that had surged in popularity in the early 21st century.

With his bracelet firmly affixed to Rover's collar (the two weren't so different, when Jean thought about it), he mapped out his itinerary. He would go pick up his son from school, sign him out for the day, and have some quality family time - the kind he had been sorely missing as a result of some emergency QA work that had reared its head over the weekend. With a full bowl of food beneath Jean's workstation, Rover would have no incentive to leave his station, and Jean could enjoy a day of fun with his son JJ.

Jean tested the system out on his way across town to JJ's school - he called in to his manager to inquire about a specific element of the QA process he was working on. His boss didn't seem to pick up on any discrepancy in Jean's location information through the *Crèche™* interface - thank goodness the biometric analysis system wasn't yet rolled out, or an ambulance might have been dispatched in the general direction of his canine heart rate.

Walking in the front doors of JJ's school, Jean apologized to the hallway moderator for not swiping in with his bracelet - at Jean's suggestion at the PTA meeting, JJ's school had been invited into a trial run of a version of *Crèche™* designed to help principals keep track of students. Attitudes towards privacy and the location of children were a contentious topic from both sides of the argument, and the hallway monitor could only tell Jean that his son was playing with a number of other children in a room somewhere in the south end of the school.

Out of the corner of his eye, Jean caught a peek of a single child sitting in the middle of an otherwise empty classroom with a giant backpack in front of him. Where were all the other children, he wondered? He opened the door to the empty classroom, and asked the boy, about his son's age, why he was all alone. The boy smiled sheepishly, but said nothing. This was odd, thought Jean, and he asked the boy again. Once more, the child smiled, and yielded nothing. *"What, have you got them all in your backpack?"* Jean asked? At this, the boy clutched the pack close to his chest and a worried expression crossed his face.

Tired of the act, Jean snatched the bag from the boy's hands, and opened it up to see what was inside. Beneath a $10 bill was a bundle of prototype *Crèche™* bracelets. Picking them up and scanning them against his smartphone revealed that one of them was JJ's, and the others belonged to his friends. *"You can tell me what's going on - I don't think we want anyone to get in trouble"* Jean told the boy.
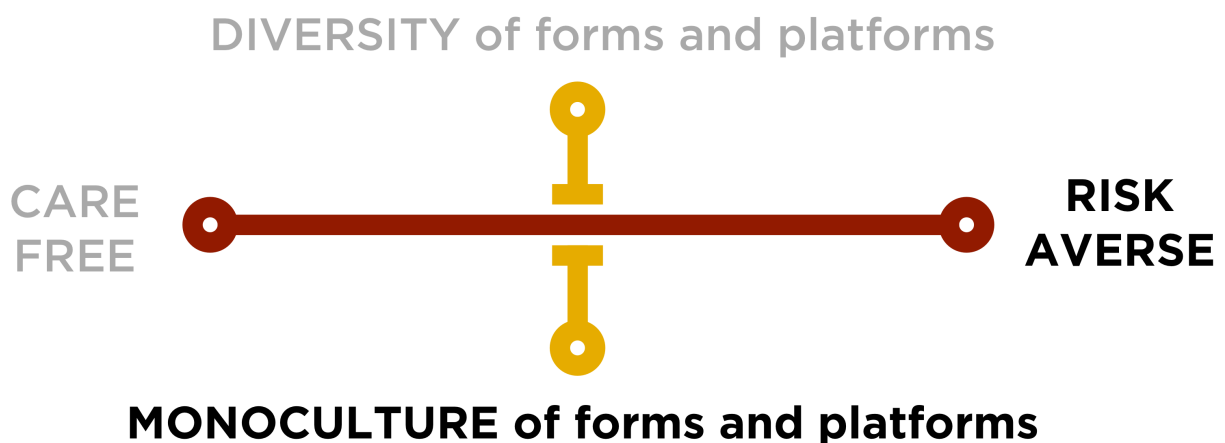
"This is what I do" the boy said. *"I take the other boys' bracelets when they want to skip off for the afternoon. Nobody wants to hang out with me anyway."*
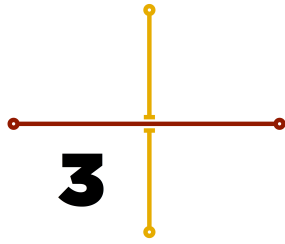
Furious, Jean stormed out the front of the school towards his car - JJ was only 12 years old, and already he was skipping school! At the same time, he had a hard time not sympathizing with the boy's craftiness - after all, it was the same kind of scheme his old man was hatching on the very same day. Jean had unearthed similar tactics during his early days working on RIM's relational location system project... the researchers called the person who would stick behind with a cache of bracelets while everyone went on a coffee run the *"locoy."*

After an hour of driving around looking for JJ and his friends, Jean turned a corner and immediately saw them, playing in a field. He parked the car and tromped out across the field towards the edge of the forest where they were playing. His smartphone was alerting him to an incoming video call, what terrible timing, and he silenced it three times on the walk across the field towards his son, the other boys, and... the dog, Rover.

Bounding across the field with a stick in his jaws, Rover still had Jean's RIM *Crèche™* bracelet firmly affixed to his collar. JJ hadn't skipped school to cause trouble, he had skipped school to visit the house with his friends and pick up the dog for a game of fetch in the park. The dog that was supposed to be Jean's decoy for his day off work, hadn't been in the house for hours. *Gulp.*

Jean reached gingerly into his pocket and retrieved his smartphone. "Three missed video calls" read the screen. With a lump in his throat, and a desperate excuse forming somewhere in the back of his head, Jean called his boss back, wondering how he was going to explain a game of fetch in his afternoon itinerary...

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3

Who is the Product Being Sold?

POP. Pop. Pop-pop. Pop.

One by one, the annoying pop-over windows were taking over Ashna's screen. It was so annoying to be back on a pokey old desktop PC after getting used to the LTE+ connection on her new smartwatch, but the Library stubbornly refused to update its catalogue for compatibility with outside services. Something about privacy issues and copyright concerns... amongst other snoozefests. After another three pop-overs squished the last bit of readable content off the screen, Ashna gave up, and made for the exit.

Her watch vibrated subtly as she pushed the Library doors open and stepped out into the street. In her ear, a soundbite played from her favourite movie, *Ferris Bueller's Lost Weekend:*

"If you don't get your head out of the books, the books can take over your head." It was a signal that she'd unlocked an achievement on *SUP™*, the world's biggest location-based service. Everyone she knew had at least one account, sometimes two if they had something to hide from their parents or significant others. *SUP™* wasn't a social network on its own, but it connected with *Facebook* and *URLife*, the two biggest networks in Canada, and delivered them user location information - it was like an easy-to-use compass that fed data about where you were, who you were with, and what you might be doing.

For years, users had been unable to figure out whether they wanted to use *Facebook* or *URLife's* location services for checking-in to bars, restaurants, and parties; and when *SUP* emerged it just made sense that a third party would take care of that stuff, and feed it out to both of the big networks independently. Why choose which network you wanted to use, when *SUP* could just feed your information to both of them? Best of all, using *SUP* was free, and even came with a few perks - if you signed up for the *WhatSUP* program, they'd send you a free add-on to your smartwatch that kept track of more than just your location. The smartwatch could determine Ashna's position within a couple of metres, but it couldn't tell what she was doing on its own. With the *WhatSUP* near-field computing feature, Ashna's watch knew all the details of the dresses she was flipping through on the racks at the mall, the chapters she liked best in the books on her shelf, and the ingredients that she used the most in her spice cabinet. It was like having a personal assistant, and it was all completely free!

Ashna's parents and her older sister had warned her that nothing in the world was ever really free - *"If something is free, you are the product being sold!"* her mother had said just that morning. But Ashna didn't think it could be that complicated - the only complicated thing about using *SUP* was all the reading you had to do if you wanted to keep up with the technical mumbo-jumbo in their EULA. Some people were worried about big changes to *SUP's* license agreement rolling out seemingly every other day, but Ashna just figured that they were trying to build a better service.

And besides, anything that let her spend less time updating her three social profiles and more time enjoying the world around her sounded like a pretty good deal. Walking into the Kobo Kafé, Ashna brushed her watch against the frame at the door and was greeted in her earpiece by a famous Bollywood actress. A new autobiography had just been released, and the actress mentioned in a coy tone that she was disappointed in Ashna for jumping the gun, and purchasing the unauthorized biography that had come out a year earlier at another store chain. It was a good thing *WhatSUP* didn't know that she had re-read it two more times since then in the bath - when her smartwatch was temporarily out of commission.

Flipping through a recipe book on the shelf, Ashna was reminded that she'd been wanting to cook a dish she'd had the week before at Deeptree, a restaurant on King Street. As if on cue, the flexible e-ink pages of the book rippled, and a box suddenly appeared with directions to the restaurant she'd visited, reviews, and contact info in case she wanted to dine there again. More than 25 of her friends had eaten at the restaurant since her last geotagged photo share, and their icons were visible beneath the listing. She sent invitations to three of them, swiped the phone number of the restaurant, and transferred the call to her smartwatch.

After making a reservation for 7:00pm, Ashna left the Kafé. A ping in her ear notified her that she would be on her way to becoming Mayor of the Deeptree Restaurant if she could bring another two friends with her that evening, quickly followed by a georeminder that while she was in this part of the mall, she might want to go looking for new shoes to wear to dinner...

At the shoe store, she tried on four pairs of bright pink synthbio heels before finding a set that seemed classy enough for a dinner at Deeptree. A quick scan of the surrounding 3 kilometres revealed that the shoes were totally in-style that day - more than 175 women were wearing

them, and they were trending downwards in coolness as a result. *Drat*. If only Ashna had made reservations at a restaurant in the city's east end, away from all the business crowds, she might have been able to make the shoes work to her social advantage, and get some points out of it.

On her way out of the mall, yet another ping rang in Ashna's ear, this one reminding her of an update to the *SUP* license agreement. She sighed, and asked the smartwatch to read it aloud to her. Recognizing that she was on the edge of a street, the smartwatch asked her to confirm her request- after all, distraction was one of the leading causes of acci- *"Just read it!"* Ashna snapped. The machine promptly began reading out the changes to the EULA.

> *"Section IV.X.11a - As a result of the new Locative Bill of Rights, SUP is now required to remind you explicitly that information regarding your movements, perusals, and purchases within the Eaton Centre and Consumer Complex as tracked by the WhatSUP technology platform is exclusively the intellectual property of the Cadillac Fairv-"*
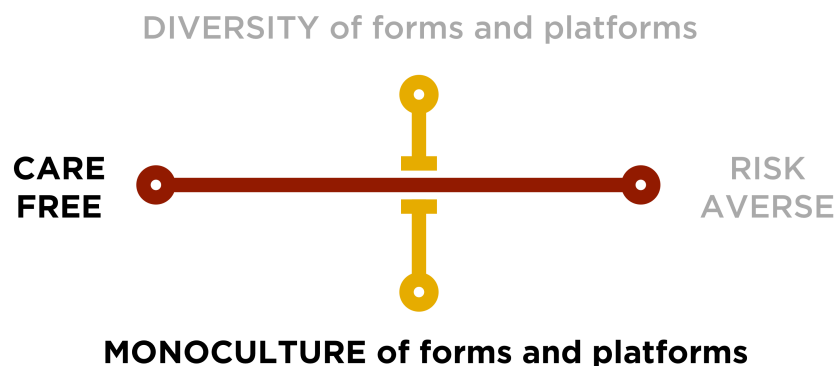
"Wait, WHAT?" Ashna stammered, incredulously. Cadillac Fairview?! She knew that the ease-of-use she was enjoying with *SUP* came at a cost, but she couldn't believe that her information was being sold without her knowledge. Pushing updates to social networks was one thing, but selling that information to the owners of the mall was quite another. Ashna interrupted her smartwatch and snapped at it to dial *SUP's* customer service hotline.
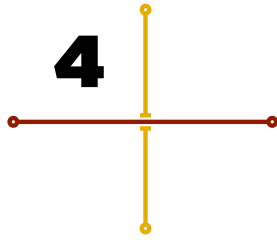
After 25 minutes on hold, Ashna finally got through to a representative, and gave him a piece of her mind before hanging up on him. Feeling proud of herself, she called the Deeptree Restaurant to see if they could bump her reservation to a later timeslot, giving her time to find a new and locatively unique pair of shoes.

> *"Oh, we're sorry Ms. Patel, our system show that you declined updates to the SUP EULA this afternoon, invalidating your reservation and notifying your friends on your behalf. Unfortunately, we've already made your table available to other guests. Our system also indicates that if you'd like to walk a few blocks east on Queen, based on your last location, we might be able to seat you at one of our sister restaurants."*

"But, but... wait, how did you know my location if I didn't accept the updated SUP license agreement?" Ashna asked.

> *"Oh, we're not sure of your precise location at present. We based the recommendation on a lease of your SUP locative history from seven minutes ago, for which we were the highest bidder as you cancelled your account. We hope this hasn't inconvenienced you in the slightest. Please visit Loblaws if you'd like to pick up the ingredients for the dish you were interested in on our menu... and have a pleasant day!"*

DIVERSITY of forms and platforms

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MONOCULTURE of forms and platforms

4

Cops and Robbers

SMASH!

The trashcan flew through the store window, spraying chunks of glass everywhere and sending disturbed citizens scattering in all directions. SMASH! In AR-replay, the destruction was even more satisfying. Darren Westender chuckled, swiped across his tablet's translucent screen to collect the loot and points from the store he'd robbed, and continued to stroll down Queen Street. That Starbucks was the 15th store he'd hit, and it was just after noon. By the end of the day, he could find himself nestled comfortably among the ranks of the *GTA's Most Wanted.*

Darren had been playing *Cops And Robbers™* for more than a year, running around the city performing one virtual smash-and-grab after another, and he still hadn't been caught by anyone playing as an officer of the law. If he could find another Starbucks to rob in the downtown core, he might even unlock a free mocha at Timothy's and cement his title as owner of the territory. It was good to be king.

But as he slid his ultra-thin tablet back into its holster, he heard the sound that he had been dreading since he first opted-in to *Cops And Robbers™* and granted it permission to access his other social accounts - the squelch sound of an APB being released to his friends and networks.

Whipping the tablet back out, he quickly flicked open the app to see if there were any Cops in the immediate vicinity. Luckily, he was all alone, but he decided to play it safe and duck into a no-name coffee and media café until the heat wore off.

He'd only been sitting down for two minutes when the APB went out again, and this time a few of the café's other patrons raised their heads, and began tapping the arms of their augmented reality glasses to see what the disturbance was all about - was there an opportunity to turn a criminal in and gain a few points for themselves? Was it morally just to squeal on someone who, let's face it in this city, was probably a friend-of-a-friend-of-a-friend? Darren slouched down into his chair, and pulled up a list of all the patrons currently in or nearby the café - nearly everyone playing a game was openly broadcasting their position and destination these days, especially the Cops - they got free donut samples if they entered a café or restaurant with their *C&R* badges on.

While there weren't any cops in the café, there was one name nearby that Darren recognized - Nick Leslie... why did that sound familiar? Darren did a quick search of the 2,732 friends in his various social networks and services, but Nick Leslie didn't come up on any of them. Was the guy a celebrity? That name had to be familiar for a reason... Darren called up a query of Nick Leslie's location over the past 24 hours, and was shocked with what he saw - the dude had been within 100 metres of *every* Starbucks he'd hit, and it was then that Darren remembered who he was.

Nick Leslie was the lead designer of *GameTO™*, a system of private maps and leaderboards installed across downtown Toronto that aggregated the results of all the location-based games going on in the city into one big public mashup. You could check out all of the *Cops* pursuing *Robbers*, and if they were sloppy enough, the *Robbers* evading the *Cops*. But you could also keep tabs on the FIFA-sponsored game of soccer being played with the Trump Tower and First Canadian Place as goalposts; and the giant Guillermo del Toro monster invading the city from Lake Ontario, steered by the movements of workers in and out of the PATH system. Nick Leslie was supposed to be a brilliant designer, but the word on the street was that he was also a bit of a punk - he'd been in the headlines a few months before for hijacking the personal information of a game player who had been a bit lax with his security settings and passwords, and he hadn't seemed too broken up about what he'd done.

It was then that Darren realized everyone in the café was staring at him. Stumbling hastily towards the exit, he noticed that the LED screens mounted over the doors were all showing visualizations of a *C&R* break-in at a Starbucks down the street earlier that morning - a virtual break-in that Darren had completed. But it wasn't that image that stopped him in his tracks - it was what surrounded it... pictures of his parents looking ashamed (that Darren had taken when he brought him a brand-new car instead of a *UofT.Remote* diploma), a looping video of his ex-girlfriend Katie laughing at the camera (after he'd taken her to Wendy's on their second date), and worst of all, a picture of Darren passed out on the couch at a friend's party with a *WANTED* sign emblazoned on top.

What the hell?!? Being tossed into the ranks of the *GTA's Most Wanted* was one thing, but those photos and videos were all supposed to be private! Darren wondered if he'd skipped a checkbox when agreeing to a EULA somewhere, or if he'd just gotten sloppy when signing up for yet another social info aggregation service. As he stumbled out into the street, Darren ran directly into a man entering the café - a man with a cruel smile on his face and a tablet in his hand. It was Nick Leslie.

Darren bolted, running straight up Yonge Street towards *Rob Ford Square* at Yonge and Dundas. The only explanation he could think of was that Nick Leslie was out to get him for his points - maybe he wanted a promotion to *Sergeant* in *Cops And Robbers*, or maybe he just wanted to make the destruction of TO's best gameplaying ego his personal mission. On the gigantic *GameTO™* screen in the middle of the Square, Darren saw red blip after red blip appear on the map around him - Nick had put out a *Code Red APB* for his apprehension. He looked down at his tablet and saw that the social news alerts were already flooding in - first among them a breaking story from Torontoist: *"The Junction's Darren Westender Gives Up Life to Vandalize Virtual Stores in GameTO Zone XG-17"*, complete with photos snapped of his stumble out of the café into a laughing Nick Leslie, and an embarrassing timeline showing the exponentially increasing amount of time he'd spent playing *C&R* over the last few months. Did he grant them access to that information? Was this kind of thing covered by the privacy policy?!?

Darren couldn't remember - he'd signed up for so many competing social location services in the last year that it was almost impossible to figure out which bits of data belonged to which one. As a group of tourists using an augmented-reality wayfinding app began to jump up and down while pointing at him excitedly, and Nick Leslie entered the square with a squadron of amateur police captains at his back, Darren sat down on the ground and consigned himself to defeat. Even the giant monster on the *GameTO™* screen was being steered towards him, as Bay Street's elite abandoned their lunch break and made their way north in droves to get a good capture of the arrest.

While all of the different location-based services in use in Toronto that day visualized the events that followed in different ways, and took different liberties with Darren's leaked personal information, they could all agree on one thing - this young hooligan's reign of terror was finally over.
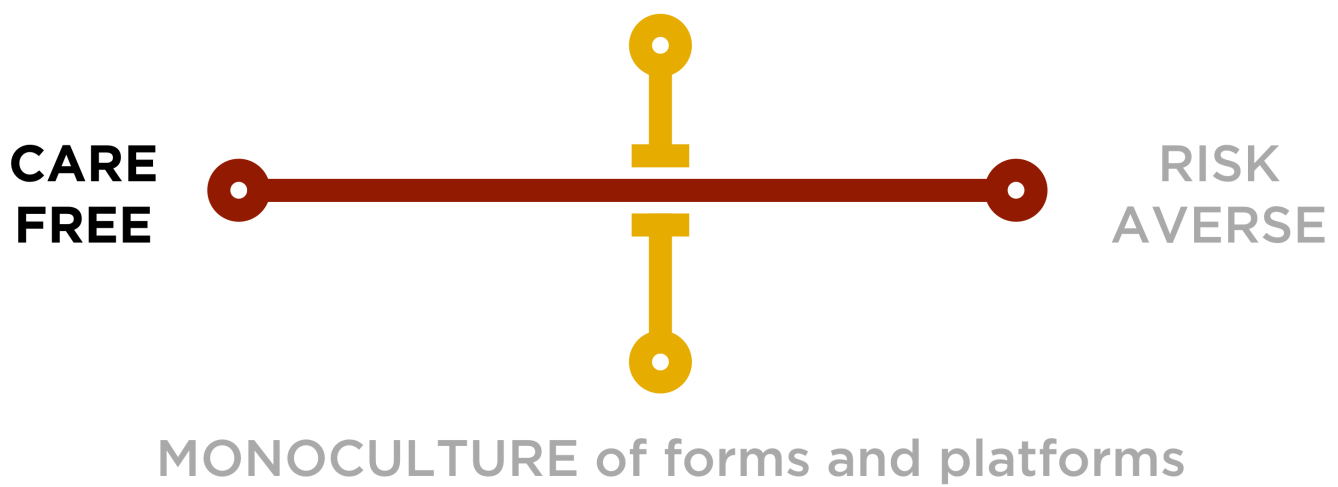
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