



January 2020

Draft Algorithm Charter

Statistics New Zealand

Table of contents

Introduction	3
Does the proposed text provide you with increased confidence in how the government uses algorithms?	4
Should the Charter apply only to operational algorithms?	7
Have we got the right balance to enable innovation, while retaining transparency?	7
Have we captured your specific concerns and expectations, and those of your whanau, community or organisation?	8
Conclusion	11

Introduction

We welcome the chance to submit on the algorithm charter

1. InternetNZ welcomes the chance to submit on the Draft Algorithm Charter. We address the consultation questions below.
2. InternetNZ is an independent not-for-profit that operates the .nz domain name registry, and works for an Internet that is open, secure, and for all New Zealanders.
3. The use of algorithms and the impacts they can have on people is a key issue for the Internet. The Internet has enabled the global-scale collection, sharing, and processing of information which modern algorithms are built on. At the same time, the ways people use and experience the Internet have been shaped for better and worse by algorithms that determine which people see which content on modern online services.
4. As online services implement algorithms so too do governments, and with this use of algorithms comes questions about democratic power, control, and decision making.
5. We anticipate continued developments and changes in this area over the next decade, with growing interest in ways to ensure the safe and responsible use of algorithms, and in ways to monitor, address, and prevent situations where decisions about or by algorithms harm people.

We welcome a broad conversation about data and algorithms

6. We see a need for a broad conversation with New Zealanders about the uses and impacts of algorithms across our society, and welcome the Draft Algorithm Charter as one part of that broader conversation.
7. As part of our contribution to the conversation, InternetNZ hosted a public online conversation about algorithms and data in November 2019, under the Twitter hashtag #DataCharter. We draw on that conversation in this submission.

Want more detail? Get in touch.

8. Please raise any questions with our policy team on policy@internetnz.net.nz.

Does the proposed text provide you with increased confidence in how the government uses algorithms?

The Draft Algorithm Charter is welcome but could go further

9. The Draft Algorithm Charter sets out the government's commitment to using algorithms in a fair and transparent way. We welcome that commitment, and welcome the Draft Algorithm Charter as a step to uphold it.
10. The Charter follows from the Algorithm review, which aimed **to ensure New Zealanders are informed, and have confidence in how the government uses algorithms**. We think that aim remains relevant, and better captures the key concerns which the Draft Algorithm Charter should address.¹

R1 We recommend that the Charter be framed with the goal of ensuring New Zealanders are informed and have confidence in how the government uses algorithms.

11. We see the Draft Algorithm Charter as an opportunity to share best-practice guidance for the safe and effective use of algorithms in New Zealand, which would ideally be available and usable by any organisation (government and non-government). This is a way to deliver to the broader goal of ensuring public confidence in the use of algorithms.
12. In our view, the proposed text addresses most of the right issues. When government decisions will significantly affect people, we expect agencies responsible to explain how their decisions draw on available information, to consider a range of perspectives and communities, including perspectives from Te Ao Māori, to consider human rights and privacy impacts, and to offer robust methods for monitoring, peer review, and for appeal or challenge in case things go wrong. These are aspects of good practice for any government decision, and it makes sense to extend them to the use of algorithms.
13. Algorithms raise some unique challenges, because they can operate without human supervision or control. In general, transparent decisions are supported by a public policy toolkit that assumes decisions are made by people, and involve written information. To understand or investigate a decision, interested people can talk to officials, request official information, or pursue formal investigations or legal action if something has gone seriously wrong. This public policy toolkit for transparency may not work so well if aspects of decisions are shifted to algorithms.
14. Algorithms based on machine-learning present both particular promise for solving problems, and particular challenges for transparency. These algorithms are developed based on training data, which is used to tune the

¹ "Algorithm assessment report—data.govt.nz" <<https://data.govt.nz>>.

way they match input features (like a person’s address, income, and declared gender) to desired outputs (like the assessed risk of defaulting on a loan). Even in the best-case scenario, where training data is available, unbiased, and accurately represents the target population and problem, there is a transparency challenge in that the workings of the resulting algorithm will be difficult to directly understand or explain. There is ongoing research in the best ways to understand and explain the operation of algorithms.

15. We think the best way to uphold transparency, and to allow people to notice and address potential problems, is for the Charter to require proactive steps to address these issues as an early part of design and procurement.
16. To deliver on its promise, we think the Draft Algorithm Charter needs to offer clearer guidance on how organisations should consider and avoid problems, for example, the use of data that will amplify existing inequalities, and how people can identify problems and hold agencies to account.

Organisations need clearer guidance to meet objectives and apply best-practices

17. The Charter mentions a range of objectives, like “keep[ing] in mind the people and communities being served by [algorithms]”, but does not offer specific guidance on how agencies should consider and address them. We think there is a need for clearer guidance on how agencies should approach each stage of considering, designing, procuring, building, implementing and reviewing the use of algorithms.
18. We see a particular need for guidance on when and how to conduct impact assessments and public consultation. In our view these should be conducted at an early stage, and should be supported by requiring agencies to proactively release information on operational algorithms, perhaps through the Chief Data Steward.

R2 We recommend a requirement that agencies proactively publish information on operational algorithms to a shared location online.

We see a need for community risk-testing to identify problems early on

19. As we have said, we see a need for proactive work to identify potential problems at an early stage. The proposed wording addresses communities who may face risks from algorithms, but does not specify how agencies should engage these communities.
20. When building or procuring a computer system, it is common to engage independent security researchers to assess risks and simulate attacks, so that problems can be found early and safely. In the same way, we see potential for processes looking at algorithmic decisions to engage with people representing relevant communities at an early stage, with conversations supported by people who can explain relevant technical

issues. As with security researchers, it is important to have a perspective that is independent from the relevant agency and from relevant vendors.

We see social licence as a key concept to include in the Charter

21. The Draft Algorithm Charter would sit alongside other frameworks listed on the StatsNZ website, including:²
 - a. [Principles for the safe and effective use of data and analytics – May 2018](#), developed with the Privacy Commissioner
 - b. The Social Investment Agency’s consultation on the [development of guidance for Data Protection and Use](#)
 - c. The Ministry of Social Development’s [Privacy Human Rights and Ethics \(PHRaE\)](#) Framework
 - d. Work by the [Data Futures Partnership](#)
22. These all offer different, but potentially useful approaches to the safe and effective use of algorithms. While all of this work is useful, we see a risk that the multiplication of frameworks confuses both government agencies and people in New Zealand about what requirements apply to various uses of data and analytics.
23. We think the model of social licence developed by the Data Futures Partnership offers a useful framework to guide the use of algorithms. The social licence model offers a concrete and practical approach to consultation which can consider a broad range of individual and community concerns.
24. Unfortunately, the active work of the Data Futures Partnership has ended, and its websites at [trusteddata.co.nz](#) and [datafutures.co.nz](#) are now offline. This is a loss of knowledge in an important area. Fortunately, much of this material remains online through the Internet Archive, though links to the original websites no longer work as a way to access it.

² ‘Data Leadership | Stats NZ’
<<https://www.stats.govt.nz/about-us/data-leadership#principles>> [accessed 14 January 2020].

- R3 We recommend that the Draft Algorithm Charter explicitly require consideration of social licence**
- R4 We recommend that the Data Futures Partnership’s reports Trusted Data and Social Licence are referred to as examples of best practice**
- R5 We recommend that the websites and reports of the Data Futures Partnership are made available online and kept online, in a way that includes access from their original domain names.**

Should the Charter apply only to operational algorithms?

25. We agree that it is particularly important to offer guidelines and accountability for the use of operational algorithms by government. Operational algorithms are defined as those which result in, or materially inform, decisions that impact significantly on individuals or groups.³
26. As proposed, the Charter is an aspirational document and an optional commitment for government agencies using algorithms.
27. We agree that the distinction between operational algorithms and others matters. In our view, public confidence in the use of operational algorithms requires binding commitments by government agencies, with meaningful and usable processes to enable transparency and accountability to the public and to affected people and communities.
- R6 We recommend that agencies using operational algorithms be required to accept the Charter, to adopt specific measures for public accountability, and to be subject to independent review in light of emerging best practice**
- R7 We recommend offering the Charter as an optional commitment for any organisation using algorithms, including organisations outside government.**

Have we got the right balance to enable innovation, while retaining transparency?

28. InternetNZ stands for the benefits of the Internet. While we support innovation, we have learned over the past decade, and the past year, that innovation is not always beneficial to people in New Zealand.
29. In the uptake of algorithms, particularly by government, as on the Internet, we need steps to deliberately foster beneficial innovation, and to keep an eye out for potential downsides as technologies have a greater impact on society.
30. We see the Charter as a key opportunity to ensure that our government approaches algorithms in a way that protects and enhances public

³ “Algorithm assessment report—data.govt.nz” <<https://data.govt.nz>>.

confidence, privacy, human rights, and other vital community interests. That is the type of innovation we hope for on the Internet and in the use of algorithms.

Have we captured your specific concerns and expectations, and those of your whanau, community or organisation?

31. As part of our contribution to the conversation, InternetNZ hosted a public online conversation about algorithms and data in November 2019, under the Twitter hashtag #DataCharter. Below are some specific concerns that our panellists want to see addressed. For a full list of responses see **Appendix A: #DataCharter Twitter Roundtable**.

Everyone welcomes the development of an algorithm charter, but want to see it go further

32. The opportunities of automated decision making can only be realised if New Zealanders trust government to implement automated decision making responsibly, for the best interests of New Zealanders. Even the perception that the algorithms exacerbate and perpetuate existing inequalities will undermine any efforts to implement operational algorithms.
33. Our panellists all agree that creating an Algorithm Charter for New Zealand government agencies is something that should be a priority for Government. Overall, they want to see more ambitious objectives for the Charter.
34. On what the charter gets right:

“It’s a start. What it gets right is that we should have (a charter)” -
@kamal_hothi

An Algorithm Charter needs clear definitions and a clear purpose

35. The objective of the draft Algorithm Charter appears to be “[a commitment] to transparent and accountable use of operational algorithms”. While our panellists commend this objective, there are views that the Charter needs to be clear about what transparency and accountability will mean in its application.
36. Further, accountability and transparency may be better positioned as elements that contribute to equitable outcomes for New Zealanders, rather than accountability and transparency being the outcomes themselves.

37. On transparency:

"Transparent to whom and for what purpose? Transparency for the sake of transparency is not enough," according to Madeleine Clare Elish, from Data & Society." - @kamal_hothi

38. "@kamal_hothi Before we can have audit mechanisms we need clearly articulated goals/outcomes for algorithms - so that we have something to audit against.

Too often algorithms implemented just 'make things better/faster/more efficient" - @vizowl

39. As discussed on page 3, we recommend that the Charter be framed with the goal of ensuring New Zealanders are informed and have confidence in how the government uses algorithms.

People need clear guidance on holding agencies accountable

40. The Charter does not include any guidance for people about what to do when there are concerns about how an algorithm has been implemented, what data is used to inform decision making, or when reasons for a decision are not clear.

41. Automated decision making systems can operate as 'black boxes', where the decision making models are so complex, or are generated through machine learning, that decisions cannot be explained by a person.

42. Our panellists expressed concerns that people need to be able to understand how a decision was made when it affects them, and if that is not possible there needs to be a process to appeal automated decisions.

43. "One thing that distinguishes government algorithms from other algorithms is that there is often a huge power imbalance between the algorithm creators and its targets.

Not many other bad decisions can put you in jail." - @vizowl

R8 We recommend that Draft Algorithm Charter includes a commitment to enable community perspectives to be included when raised by a community, or in open consultation.

R9 We recommend that in addition to clearly explaining how decisions are informed by algorithms, government develops guidance on a right to appeal automated decisions and resources a responsible agency to hear appeals.

Automating inequality: algorithms can exacerbate existing inequalities of outcome and amplify biases in data

44. Operational algorithms have the potential to improve government decision making, through eliminating human error and bias, and increasing the speed of processing decisions. But the success of these algorithms require the

trust and social licence from New Zealanders that they are being implemented well.

45. A core concern of many of our panellists is that automated decision making based on data collection on citizens is still an emerging practice, that can generate poor outcomes when based on poorly collected, cleaned or understood data, and amplify existing biases and inequalities.
46. Even the perception of the flawed or biased application of automated decision making systems will [make citizens distrust government].
47. “@InternetNZ How do you manage consent and privacy, especially when linking disparate data sources?

How do you make the algorithm steps transparent?

How do you account for/make transparent biases in source material and collection?

How do you provide external audit capability?” - @Natdudley

R10 We recommend creating guidance on how organisations can do community risk-testing to identify problems and concerns at an early stage

The Algorithm Charter should reflect a commitment to a Te ao Māori perspective

48. There is a perception from our panellists that the draft Charter is too vague about how agencies will embed a Te Ao Māori perspective, and how they will consult with community.
49. The Draft Algorithm Charter states that an agency will “embed a Te Ao Māori perspective in algorithm development”, and “take into account the perspectives of communities, such as LGBTQI+, Pasifika and people with disabilities as appropriate”. These are good objectives, but there is no clear description of what it means to embed a Te Ao Māori perspective, or when community perspectives “are appropriate”.
50. A Te Ao Māori perspective may include ideas of indigenous data sovereignty, a shared governance structure, and community rights. These Māori concepts may be in opposition with the use of data in government decision making as currently in practice.
51. On sovereignty, governance and shared decision making:

“@InternetNZ How will data (re)shape social relations? How will we understand, monitor and respond to data harms? How do we extend beyond the individual to collective rights and interests in data? How can we re-vision data practices outside colonial logics? #datacharter” - @phactgirl

52. On what's missing from the charter:

“@InternetNZ @Stats_NZ Māori data sovereignty and governance. There is reference to 'a Te Ao Māori perspective'. I'm not sure what this means, but it doesn't sound like sovereignty, governance or shared-decision making #datacharter” - @phactgirl

R11 We recommend that the Draft Algorithm Charter should develop guidance on what it means to embed a Te Ao Māori perspective in algorithm development

Conclusion

53. We see the draft Algorithm Charter as a welcome step to support public confidence in the use of algorithms by government agencies.
54. We also see opportunities for the Charter to go further in two ways. Firstly, by offering clearer commitments and guidance on how agencies can ensure that all uses of operational algorithms are transparent, safe, and accountable. Secondly, by creating a framework for best practice which is usable by any organisation or researcher in New Zealand.
55. Conversation with our community has revealed a high level of interest in the risks which may arise from the use of automation and information about people in New Zealand.
56. We see the Charter as a way for the government to show leadership on addressing those broader issues, committing government agencies to best practices for the transparent, safe and ethical use of algorithms and personal data. We think this approach will allow innovation and improvements to government service delivery, while upholding public confidence, promoting wellbeing and equitable outcomes for all New Zealanders, and developing best practices that can be applied by organisations beyond government.
57. InternetNZ would love to see the Charter go further in offering clear guidance on how to build trust with communities through careful use of data, meaningful consultation, and by centring people's wellbeing in the desired outcomes.



Kim Connolly-Stone

Policy Director
InternetNZ

Appendix A: #DataCharter Twitter roundtable

Introduction

1. InternetNZ helps New Zealanders harness the power of the Internet, to work, play, communicate and learn. As the Internet has developed and matured, so has our understanding of how aggregate data can tell stories about people, and inform decision making.
2. We have seen increasing use of automated decision making in our lives, from Facebook using algorithms and machine learning to deliver promoted content and targeted advertising to users, Amazon predicting what books you might like to read next, or Gmail sorting emails into categories before you have to read them. As these private companies use algorithms to deliver content at scale, algorithms are also being used by governments to automate service delivery and make decisions that impact people's lives.
3. As these technologies develop, there is a risk that average New Zealanders may lose the ability to understand how decisions were made, know what data was used to inform these decisions, and find ways to appeal decisions made by automated systems. Concepts like machine learning, artificial intelligence and operational algorithms may be conflated and confused, and government decision making will become a black box that citizens can't engage with.
4. We were interested in helping New Zealanders understand how data can be used to inform algorithms, and the government use of them. So we asked people who work with data and algorithms ('our Panellists') that we thought represented important perspectives on the government use of algorithms.
5. On November 20 2019, we held a Twitter roundtable, where we facilitated our panellists to answer a series of questions about their views on the government use of data and algorithms.
6. This document is a summary of answers to the questions posed by InternetNZ. This is not all of the conversation. Some of the tweets we have included in this summary are not from our invited participants, but are valuable contributions and we thought we should acknowledge them.

1. So to kick things off, welcome! What's your interest in the algorithm charter, and why should NZers care?

phactgirl	@InternetNZ Ngā mihi ki a koutou katoa. From data justice and Indigenous data sovereignty positions, my interest is in who is included or excluded in governance and decision-making around the algorithm charter and related policies, as well as how algorithms can reinforce current inequities
EmilyK100	@InternetNZ Kia ora Ipurangi Aotearoa mō ō koutou pōhiri ki a mātou! My interest is in the socially-oriented uses of algorithms - especially in benefit administration, criminal

	justice, immigration and child protection.
teh_aimee	<p>@InternetNZ Kia ora all - thank you for organising this!</p> <p>As we increasingly base our societies off #algorithms, we need to be doubly careful with them. They will come to affect us all and, if we're not careful, in ways we cannot influence or perhaps even see.</p> <p>#datacharter</p>
zentree	<p>@InternetNZ Hi. I care because we personally interact with algorithms (particularly government applied ones) very often with a potential for big impact on our lives.</p> <p>I would like to move the definition away from maths or programming, but more to a set of rules.</p>
keith_ng	<p>@InternetNZ Algorithms are super pervasive, not only do they make decisions in a way that might not be transparent, but we might not even be aware that those decisions are getting made!</p>

nullary	<p>@kim_weatherall Yes! Very much in line with what we've heard on Twitter with the NZ government consulting on a draft algorithm charter https://t.co/j9nvd2ZQol #DataCharter</p>
aschiff	<p>My interest is somewhat selfish <U+0001F605>. I do data analysis for a living, and if data is misused or abused and algorithms get a bad reputation, it makes my work more difficult.</p> <p>NZers should care because algorithmic decisions affect them directly.</p> <p>#DataCharter https://t.co/ZGaqWd7bpG</p>
mandylibrary	<p>We should all care because data and algorithms are one of the tools that the government is proposing to use to make decisions about people's lives. And we all have a life that will be impacted! #datacharter https://t.co/fbBKeFthgX</p>
Thoughtfulnz	<p>Why I care, and NZers should, is as citizens of a small degrees of separation society, our individual voices count for a lot in discussions of civics. And if we don't speak, the alternative is outsourcing our influence on how we are governed to sellers of AI systems.</p> <p>#DataCharter https://t.co/T4dJlqUubR</p>
kamal_hothi	<p>Keen to see what kind of accountability model we can implement.</p> <p>NZers should care that there are real checks in place and since the idea of 'fairness' is at the core of our society, we should find ways to implement this in a meaningful and practical way. #DataCharter https://t.co/t3ymL3bd8S</p>
tslumley	<p>Everyone should care because lots of decisions are made that way, in the government and also in industry.</p> <p>I'm particularly interested in how we can work out how the algorithms are making their decisions -- with or without their cooperation.</p> <p>#DataCharter https://t.co/PAGb8X0j07</p>

NatDudley	<p>Hi pals, participating in Internet NZ's chat on this because I think it's important everyone knows, understands, and has a say in how our Government uses algorithms.</p> <p>Feel free to follow along (or mute the hashtag #DataCharter if it's not your jam)</p> <p>https://t.co/gC64dkvOK9</p>
brendospeaks	<p>Understanding why an algorithm has made a decision cannot be understated. In a more autonomous society, decision matrices need to be fully understood. To ensure that there is no bias, algorithms must only use data that is needed is a first step towards this. #DataCharter</p> <p>https://t.co/YDtvG AJpLN</p>
andrewtychen	<p>People should care because the government has a lot of power to influence and affect your life, and people should care about what informs that power and how that power is used. #DataCharter</p> <p>https://t.co/Ka9u4eDC4C</p>

2. What are the most important big-picture questions about data and algorithms now and in coming years?

ErnestynneWalsh	<p>@InternetNZ I think it was Tahu that summed it up nicely in a presentation whose data, whose ethics, whose decision.</p>
phactgirl	<p>@InternetNZ How will data (re)shape social relations? How will we understand, monitor and respond to data harms? How do we extend beyond the individual to collective rights and interests in data? How can we re-vision data practices outside colonial logics?</p> <p>#datacharter</p>
N3rdyByN4ture	<p>@InternetNZ Who owns the data, how it was collected, who do the insights garnered from that data serve?</p> <p>That point of view also determines the point of view in which algorithms are written.</p> <p>Which is how AI can be inherently racist</p> <p>https://t.co/CGIDI7SEHu</p>
kamal_hothi	<p>@InternetNZ Should we actually use an algorithm just because we can? #DataCharter</p> <p>It's not as loud now, but I expect we will make mistakes and come back to this over and over.</p>
EmilyK100	<p>@InternetNZ How data get produced that become algorithms. Who controls the settings of the algorithm. What it controls, and the level of power it has compared to humans. Who knows about its use, and how it works. That should cover it.. ;)</p>
teh_aimee	<p>@InternetNZ #Ethics, #bias, #data #provenance and #governance, the #environmental impact of data #collection, #storage and #analysis (incl by #algorithms), and ditto for #social impact.</p> <p>To name a few :)</p> <p>#MaoriDataSovereignty will also be _big_ here (a good thing!).</p> <p>#datacharter</p>

APndrgrst	@InternetNZ The combination of different data sets is powerful. How do we think about the potential future use of data that is collected now? Especially in the context of corporations being able to change Ts+Cs and buy up other data. #datacharter
timClicks	@InternetNZ Making decisions based on data takes power away from politicians. How will our political system adapt to a more technocratic government, esp. when officials are supposed to be politically neutral.
timClicks	@InternetNZ Almost every spreadsheet contains data entry errors. Who ensures the quality of boring work like data entry and data labelling/coding.
timClicks	@InternetNZ Will decisions based on data be required to be updated when the data changes? Public policy is typically fixed, only be updated with a review in a few decades' time. If the link between the rationale (evidence/data) and the policy is explicit, policies could be much more dynamic
StuFlemingNZ	@InternetNZ Ownership, data sovereignty and usage rights. Protection and regulation of biometric data and metadata. Transparency of algorithms and data sharing among govt organisations Fairness in service accessibility and no tiering for data monetisation Regulation of corporations using AI
NatDudley	@InternetNZ How do you manage consent and privacy, especially when linking disparate data sources? How do you make the algorithm steps transparent? How do you account for/make transparent biases in source material and collection? How do you provide external audit capability? #DataCharter

aschiff	Improving literacy around algorithms and data. Non-technical folks need to better understand the benefits and limits of predictions made by algorithms and the right questions to ask of algorithm developers/vendors. #DataCharter https://t.co/AUTU8t6Pqj
mandylibrary	Use of algos presumes lots of data avail to use. How can we make sure that our data is stored in carbon neutral datacentres & that we aren't using so much data that we end up increasing the amount of electricity we use at a time when we need to be reducing our use. #datacharter https://t.co/pbFdjQLqPP
mandylibrary	How can we plan to step down if it turns out to be too carbon intensive a system? What should the carbon metrics be and how will we monitor them? #datacharter https://t.co/pbFdjQLqPP
vizowl	One key focus for me is how to create a culture around the deployment and use of algorithms that makes it easy to people to deal with bad/wrong/inappropriate or just inane decisions. #DataCharter https://t.co/lbN9rbCQPF

3. What does good practice look like in the use of data or algorithms?

cameronfindlay	@InternetNZ I'm a fan of the @ODIHQ data ethics canvas. Practical to work through, collaborative in nature, useful in practice. Like to see government data & algorithm initiatives work through something like this and share the results publicly. Check it! https://t.co/QpMPegcA4k #datacharter
----------------	---

vizowl	<p>@InternetNZ I think that external review is an under-utilised way of establishing trust and transparency of algorithm use.</p> <p>#DataCharter</p>
ErnestynneWalsh	<p>@InternetNZ Tikanga framework is one that I like and use as part of having a Te Ao view</p> <p>#DataCharter</p>
mandylibrary	<p>@InternetNZ I'd refer folks to this article for serious look at what good practice should look like. #datacharter https://t.co/AVPpf4s3xu</p>
kamal_hothi	<p>@InternetNZ This - "A governance framework for algorithmic accountability and transparency" from European Parliamentary Research Service. #DataCharter</p> <p>https://t.co/PNM6shAPsS</p>
tslumley	<p>@InternetNZ An example of good practice I saw last week: using a combination of short intensive training of nurses and a neural network to reduce skin cancer false positives far enough that dermatologists can look at the rest (in development)</p> <p>#DataCharter</p>
EmilyK100	<p>@InternetNZ I think really understand how the data you want to use has been shaped FIRST, before deciding IF it can be used to make the inferences an algorithm will 'concretise' if asked to do so. Also community consultation during development.</p>
teh_aimee	<p>@InternetNZ 5.Maintain, maintain, maintain! Data is #management is vital. 6.Use #openstandards wherever you possibly can. 7.Finally, but perhaps most importantly - set in place strong data #governance right from the start, and regularly update as needed.</p> <p>(2/2) #datacharter</p>
teh_aimee	<p>@InternetNZ 1.Don't collect #data unnecessarily, & try not to reinvent wheels. 2.Use data that's fit for purpose. 3.If you have to choose, choose #social benefit (eg respecting #privacy) over economic benefit (eg Facebook making billions) 4.Know when to retire data.</p> <p>(1/2) #datacharter</p>
APndgrst	<p>@InternetNZ Protecting against bias and discrimination is vital. The Charter only mentions bias in relation to reviewing the performance of algorithms. It is vital that preventing bias and discrimination considered much earlier in the process, when the system is being designed. #datacharter</p>
zentree	<p>@InternetNZ Algorithms have to be explainable (so we know if undesirable features creep in models). They also have to include the level of uncertainty associated to them, and they must report proportion of false positive/negative. #datacharter</p>
NatDudley	<p>@InternetNZ - Don't collect unnecessary data. - Get rid of data that isn't expressly used for service provision - Proactively seek external assessment of biases in data collection models #DataCharter</p>

aschiff	<p>Transparency of methods and data.</p> <p>Explaining exactly what is predicted.</p> <p>Reporting uncertainty associated with all predictions, not just point predictions.</p> <p>Worrying about biases and feedback loops.</p> <p>Ongoing testing and refinement.</p> <p>#DataCharter https://t.co/rFla1nJgnm</p>
mandylibrary	<p>Community directed and informed by technical and social expertise. Humanities, including historians and political science folks need to be involved and helping to guide our technical work. #datacharter https://t.co/SGEuJz9d3G</p>
Thoughtfulnz	<p>Most good practice looks at outcomes, and looking down lists of such examples, the words "potentially biased" kept springing to mind.</p> <p>I know Electronic car registration reminders. It doesn't subvert accountability, it is just acting as a reminder #DataCharter https://t.co/1Rhj8lVgV</p>
kamal_hothi	<p>Going beyond principles and creating concrete ideas of transparency is crucial.</p> <p>"Transparent to whom and for what purpose? Transparency for the sake of transparency is not enough," according to Madeleine Clare Elish, from Data & Society.</p> <p>#DataCharter https://t.co/TKesv2uMBF</p>

4. How can the use of algorithms go wrong? What's an example of bad practices?

ErnestynneWalsh	<p>@InternetNZ @InternetNZ algorithms are built by people it's not the algorithms that have problems but a lack of involving many different people from different areas from the beginning and having a diverse range of people involved in the process #DataCharter</p>
phactgirl	<p>@InternetNZ This is a complicated question for me. In a colonial racialised society, it is not possible for data practices to exist outside of this context, as key scholars such as @ruha9 have so clearly articulated. Algorithms based on racist data produce racist outcomes 1/2 #datacharter</p>
tslumley	<p>@InternetNZ It's also useful to remember how the non-use of algorithms can go wrong. All that biased training data we complain about didn't just fall out of the sky -- it represents decisions that affected people.</p>
BrendanBougen	<p>@InternetNZ Virginia Eubanks (@PopTechWorks) wrote a whole scary book about this #AutomatingInequality #DataCharter https://t.co/aDKYEPY3LY</p>
EmilyK100	<p>@InternetNZ In both criminal justice, and child protection, the use of system data to make individual predictions about specific individuals reinforces the existing inequalities in both systems, unrelated to incidence. But humans can be biased too so... need transparency most of all.</p>
teh_aimee	<p>@InternetNZ Oh gosh, SO many. Everything from biased #algorithms influencing hiring practices, to credit ratings, to social ratings, and more. And it can / will get so _much_ worse.</p>

	(1/2) #datacharter
danfnz	@InternetNZ Facebook. Often algorithms end up as huge unlicensed human trials. #DataCharter make them accountable.
NatDudley	@InternetNZ “Accidentally” reintroducing racist red-lining policies is a great example. You can’t just use historical data without understanding and mitigating historical context. https://t.co/Ff7HgJ79yw #DataCharter

aschiff	Feedback loops are particularly bad. Historic biased decisions -> biased data -> biased predictions -> even more biased decisions -> even more biased data -> etc ... #DataCharter https://t.co/QoRvYCvAax
mandylibrary	We could create systems that further entrench us in our high carbon lifestyles. #datacharter https://t.co/FOqUbPtYu9
mandylibrary	Gestures wildly at the Chicago Police Department and the Australian robodebt mess. #datacharter https://t.co/FOqUbPtYu9
Thoughtfulnz	Australia. More specifically centrelink. More specifically robodebt. Using bad data matching practices to send out possibly illegal threatening letters. There is a lot wrong with this, but it might, for those in power, might have been an effective display of that #DataCharter https://t.co/HyscQxYIzn
vizowl	One class of algorithms going wrong is the idea of them being pitched as a solution and then the end result not really being anything at all - e.g. the Immigration New Zealand deportation algorithm/colour coded spreadsheet #DataCharter https://t.co/nfTIF4X2FM

5. What are we talking about when we talk about “government algorithms”?

mandylibrary	@InternetNZ In the proposed charter they define “operational algos” by referencing page 7 of this report. #datacharter https://t.co/6jVAklj0uK
kamal_hothi	@InternetNZ Not entirely sure, to be honest. #DataCharter Even after reading this. https://t.co/bJFp0FRxzc
teh_aimee	@InternetNZ For me? Algorithms designed by or for use in government. That or is important - an algorithm designed by a third party and used in #government still counts as a government #algorithm. #datacharter

keith_ng	@InternetNZ Models/formulas/crazy spreadsheets/boring spreadsheets which are used to make/inform decisions in government.
----------	---

aschiff	It's not clear! Govt has long used sort-of algorithms or rules of thumb to make decisions. This is one area where I think the Charter needs to improve, its definition of "operational algorithms" is vague. #DataCharter https://t.co/MSjam54IgU
mandylibrary	In the proposed charter they define "operational algos" by referencing page 7 of this report. #datacharter https://t.co/6jVAKlj0uK https://t.co/ZkQUTbRotV
vizowl	One thing that distinguishes government algorithms from other algorithms is that there is often a huge power imbalance between the algorithm creators and its targets. Not many other bad decisions can put you in jail. #DataCharter https://t.co/k8EaymUoV5
mandylibrary	Or cut your benefits. Or put you into debt. Our relationship with the state is *different* from our relationships with other institutions. #datacharter https://t.co/piMy4hFUtE

6. What does the @Stats_NZ draft algorithm charter get right?

mandylibrary	@InternetNZ @Stats_NZ Andrew Chen's submission summarises quite well. #datacharter https://t.co/VBkQz13AVE
tslumley	@InternetNZ @Stats_NZ Most of the bullet points are things I'd like as principles, especially the first and last one. But it's not clear what these mean operationally, and how/whether they can be enforced against the govt.
EmilyK100	@InternetNZ @Stats_NZ A clear focus on explanation and consultation, and how to challenge decisions if needed. A requirement to provide the devilish detail (because that's where problems hide). But like others have said, what that actually = is what counts in the end.
teh_aimee	@InternetNZ @Stats_NZ That it exists. Other countries have had - in some cases - #AI principles in place for some time now. It's vital we do so as well. And good to see Te Ao Māori, albeit rather, er, vaguely. #datacharter [See next question at 5:30 for, er, what could be improved...]
zentree	@InternetNZ @Stats_NZ Making explicit the interest in capturing perspectives from a wide range of groups. Peer review.
mandylibrary	@InternetNZ @Stats_NZ Andrew Chen's submission summarises quite well. #datacharter https://t.co/VBkQz13AVE

tslumley	@InternetNZ @Stats_NZ Most of the bullet points are things I'd like as principles, especially the first and last one. But it's not clear what these mean operationally, and how/whether they can be enforced against the govt.
aschiff	Bringing this issue out into the open -- getting started is hard. Requiring peer review. Establishing a chain of responsibility for automated decisions. #DataCharter https://t.co/rIBX9krtuE
mandylibrary	Plan to integrate human rights considerations. #datacharter https://t.co/y2fXaYEVEv
Thoughtfulnz	Something that appeals to me is a strong focus on transparency of operation, which is a good thing. #DataCharter https://t.co/UB3e5ahIBs
kamal_hothi	It's a start. #DataCharter What it gets right is we should have one. https://t.co/Hbqfjnabwo

7. What does the @Stats_NZ draft algorithm charter leave out?

zentree	@InternetNZ @Stats_NZ "Open and available" should be the default position for government algorithms. #datacharter
phactgirl	@InternetNZ @Stats_NZ Māori data sovereignty and governance. There is reference to 'a Te Ao Māori perspective'. I'm not sure what this means, but it doesn't sound like sovereignty, governance or shared-decision making #datacharter 1/3
mandylibrary	@InternetNZ @Stats_NZ I see a lack of engagement with the real harms that data/AI/algos can and have caused to communities. I think better acknowledgement of those harms, both local and global, would create a stronger #datacharter. See here for a list: https://t.co/lzGWufBKOr
ktaiuru	@InternetNZ @Stats_NZ The documents reference Te Ao Māori but with no substance or Te Ao Māori representation. Treaty principles have been ignored.
tslumley	@InternetNZ @Stats_NZ Enforcement. How does an individual/organisation/business/iwi challenge an algorithm for violation of the principles. What's the timeline; what are the required actions; is there an Ombudsman, as for #OIA, or do you need judicial review?
EmilyK100	@InternetNZ @Stats_NZ Details 'available on request' should just be 'publicly available'. It's not that hard to list the variables used, describe the algorithm type, provide error rates at different risk points, and state the cut-offs for particular decisions. 'On request' limits this crucial info.
teh_aimee	@InternetNZ @Stats_NZ I'm not seeing #openbydefault, which concerns me hugely. There are also a number of language changes from the data principles to the algorithm charter (happy to give chapter and verse if people want!). (1/3) #datacharter

teh_aimee	<p>@InternetNZ @Stats_NZ For example, a change from “regular assessments” in the principles to “periodically” in the algorithm charter. From “decisions” in the data principles to “significant decisions” in the algorithm charter.</p> <p>(2/3) #datacharter</p>
teh_aimee	<p>@InternetNZ @Stats_NZ Plus it seems to leave out major #algorithm types, and obscures what this is about by using non-plain English (eg not using #AI anywhere as an example of what algorithms are).</p> <p>(3/3) #datacharter</p>
APndrgrst	<p>@InternetNZ @Stats_NZ I think the charter shouldn't just apply to the tech, but the wider algorithmic system -- data collection/use, decision-making etc. There are a couple of clauses that allude to this, but it has to be more clearly stated.</p>

aschiff	<p>An enforcement mechanism.</p> <p>A requirement to contribute to developing best practice, not just "draw on best practice where it exists".</p> <p>Requirements for training of people in govt who use and procure algorithms.</p> <p>#DataCharter https://t.co/eUlrMOZac</p>
mandylibrary	<p>Carbon and a commitment to keeping the gov use algos carbon neutral. #datacharter https://t.co/XOno3ZVaOZ</p>
Thoughtfulnz	<p>The biggest thing that bothers me about the draft charter, is the lack of having any process or commitment to change outcomes or improve bias. It covers monitoring but then...</p> <p>#DataCharter https://t.co/tkNXzTt7xg</p>
APndrgrst	<p>The #datacharter needs a glossary. Transparency, accountability and explainability are often used interchangeably to mean different things. We need clarity about if the charter is talking about the transparency of the wider system, or the actual algorithms themselves. https://t.co/JufgdERdOO</p>
vizowl	<p>I'd like to see a really clear statement the systems that use algorithms need to be demonstrate that the principles of that charter were incorporated in the design process right from the start - so that they can't just be tacked on at the end.</p> <p>#DataCharter https://t.co/Vx6wYs8CWQ</p>
vizowl	<p>The interplay between algorithmic outputs and human decision making.</p> <p>I'd like to see things like 'Deployment of decision making algorithms will also include training on interpreting probabilities' - that probably wouldn't work - but something like that ...</p> <p>#DataCharter https://t.co/Vx6wYsqdOo</p>

kamal_hothi	<p>Practical steps #DataCharter</p> <p>It is not reaching out to people who could be worst affected by something going wrong.</p> <p>People who are not able to have the luxury of having this conversation over Twitter. https://t.co/0aKjfmJSTD</p>
-------------	--

8. What is one thing you would add or change to improve the draft algorithm charter?

phactgirl	<p>@InternetNZ I'm not sure who was involved in drafting the charter, but I feel strongly that those who have the most power in this situation should not be determining what is acceptable in this space - those who are most impacted should be centrally involved, if not driving the process</p>
EmilyK100	<p>@InternetNZ See last response - make all details available. Also, clarify enforcement processes. I know, I know, it's 'one thing', but ALSO consider before devt if the issue at hand is amenable to algorithmic tools #DataCharter</p>
teh_aimee	<p>@InternetNZ I'd like to see a commitment to reviewing and renewing it regularly, as things change.</p> <p>I'd also like to know how those writing the charter are engaging to ensure they hear from a wide cross-section of NZers.</p> <p>#datacharter</p>
teh_aimee	<p>@InternetNZ I'd like to see #openbydefault added – it's vital we do everything we can to avoid #blackbox algorithms, and the public should be able to interrogate them.</p> <p>Some need to be closed for national security reasons, but most won't.</p> <p>#datacharter</p>
teh_aimee	<p>@InternetNZ I'd also like to see some sort of real #accountability added, and teeth.</p> <p>Otherwise - as we've seen with the govt #web #standards, for example, as well as the #a11y charter - many agencies, er, lag (to put it mildly).</p> <p>#datacharter</p>
aschiff	<p>@InternetNZ I'd add some 💰money💰 to set up a cross-govt Commission tasked with dealing with these issues. #DataCharter</p>

mandylibrary	<p>Fix the carbon blindness! #datacharter</p> <p>Let's not build a carbon intensive system when we need to achieve zero carbon. https://t.co/XCgdZBuN3b</p>
--------------	--

Thoughtfulnz	I would like to see more duty of care, committing to have someone responsible for improving matters based on the reporting and data gathering from the other sections. You don't get to use algorithms to opt out of responsibility. #DataCharter https://t.co/3T8QDc2zKt
--------------	--

9. Closing thoughts: what would you like to see from the draft algorithm charter and this conversation?

EmilyK100	@InternetNZ Actions, including retrospective applications. #DataCharter
teh_aimee	@InternetNZ We feed thoughts in, and get a decision out at the end. No idea – like algorithms unless they're #open – what happens in between. This alienates people, and leads to poor decision-making, amongst other poor outcomes. (3/3) #datacharter
teh_aimee	@InternetNZ Something I see happen (far too) often is that submissions (one could argue this forms the basis of one, and definitely fits a consultation / engagement ethic) are somewhat #blackbox. (2/3) #datacharter
teh_aimee	@InternetNZ I'd be very curious to hear what happens next, and I want to see open, ongoing communication about it from the charter writers. (1/3) #datacharter
aschiff	@InternetNZ Teeth, not just words. Thanks @InternetNZ for leading this discussion! #DataCharter

mandylibrary	I want to see the government taking seriously the carbon costs of ICT and prioritising carbon reduction. I want a shiny exciting future for everyone--and that means making wise choices about how we use carbon and when we decide not to use it. #datacharter https://t.co/no1DCLRxS1
Thoughtfulnz	All in all, it is important to me that algorithms do not make things worse for citizens, and when those using algorithms cause harm they address that harm. Not actually different to my general hopes for government without algorithms too. #DataCharter https://t.co/0a7BmK9nt5