Free Software Melbourne https://freesoftware.org.au/committee@freesoftware.org.au
January 31<sup>st</sup> 2021

Right to Repair Productivity Commission 4 National Circuit Barton ACT 2600, Australia

### To the Productivity Commission,

My name is Ben Minerds and as the current president of Free Software Melbourne, I am contacting you on behalf of the organisation and mailing list members. Free Software Melbourne is an organisation of free software users and advocates. We share the values of the Free Software Foundation, the GNU project and LibrePlanet, and represent the Australian network of Free Software users and developers across Victoria. Part of our work involves raising awareness of the benefits of Free and Open Source Software (FOSS) and advocating for change where needed. We are making our submission to the committee as the Free Software and Right to Repair movements have many joint goals and motivations.

Our organisation focuses on the rights of users of software and the responsibilities of developers who develop software. As more and more devices contain embedded software we find our causes more and more in line with the Right to Repair movement. We see overwhelming public support for the Right to Repair among our members and the community. We also see the potential for great community and economic benefits to the country that would follow from improving the rights of consumers in respect to Right to Repair. We have outlined some of our arguments in favour of strong Right to Repair legislation below in the following six sections.

#### **Environmental Benefits**

Strong Right to Repair regulation is essential to promote better environmental practices amongst companies. We only need to look at the precedents in the car industry, where manufacturers required legislation in place in order to make the economic decision that environmental compliance is a better business decision than economic abuse.

Mandating a Right to Repair encourages companies to produce products that are easily reparable and upgradable. This can help ensure that products can endure beyond the first time they are dropped or damaged1.

A Right to Repair can also act as a shield against manufacturers adding planned obsolescence to components used in products2. These unethical and unenvironmental practices are currently widely used and are a severe impediment to our Right to Repair.

Current environmental regulations recognise that commercial entities should not be given free reign to make a profit from environmental damage and pollution.

Simply mandating that devices have user (or third-party) replaceable batteries (or options for them) would vastly improve the current situation of a market-led free for all. Normalising battery replacement services would also have the environmental benefits of reducing the number of devices going into landfill every year 345 and would provide more locations where batteries could be bought and safely 6 disposed of by the community 7.

Manufacturers will no doubt point to increased production costs for devices with replaceable components, but this cost must be weighed in light of the total costs to the communities including the economic costs we see in relation to poor disposal practices and device waste8.

# **Commercial Productivity and Community Benefits**

We have already outlined some of the ecological benefits of a Right to Repair, but there are also many economic advantages to providing Australian citizens with a right to repair their devices. Providing a Right to Repair would boost the independent electronic repair community and incentivise existing service providers to offer repair services for competing products. Knowing your competition could repair your product is a great incentive for companies to provide good after-sales services to their existing customers.

Increasingly these days, independent repair shops require access to information related to the products they are working on in order to be able to perform safe and durable repairs. We need legislation that would mandate the Fair and Open Access to information required to perform repairs on modern devices. While not every Australian would be able to make use of such information, the fact that independent electronics repairs are possible benefits the whole community in the form of jobs at those establishments and the enhanced value of our devices through improved lifetimes and extended productivity of devices.

Open Access to this kind of data also enhances the security of our devices by enabling another level of independent auditing, analysis and research. The simple act of being able to see how their devices should work can provoke an interest for people in being able to maintain their own devices. This in turn can stimulate skill building in the electronics repair industry.

It is also important that consumers should not be punished for turning to third-party repairers. Currently many manufacturers void a customer's warranty for even opening up their own device. It would be ludicrous if car manufacturers were to void their warranties if a customer popped the hood, yet this is exactly what is happening with our electronics devices 910.

## **Device Ownership**

Software often runs on your device from the moment it is turned on. It fundamentally defines the behaviour of many products. This software must be user replaceable to allow users control over their own devices and the possibility to repair and rejuvenate devices. Modern devices are largely defined by their software components, and without the right to replace the embedded software a user is never in control of their own device.

Without control over the software contained in our devices we don't really own them, and repairing and maintaining such devices is extremely difficult or in many cases impossible 1112.

Without a solid Right to Repair our own devices we can have them obsoleted out from under us by the manufacturer who wants us to buy new products.

# Right to Repair and the Community

Users are fundamentally disempowered by the current monopoly on device repair held by device manufacturers. This creates an unfair market for repair in which the consumer is often either completely neglected or heavily over-charged.

Often the public is not even aware of the possibility of repairing their devices. It should be the responsibility of device manufacturers to educate the community on the safe repair and recycling of their products.

It should also be their responsibility to provide independent repairers with enough information and tools to safely conduct repairs on consumers devices.

# **Digital Restrictions**

Another issue we have seen emerging is that device manufacturers are increasingly using application and account requirements to restrict access to devices. By forcing users to use proprietary software to access the content on their devices, manufacturers restrict the community's freedom and productivity to use their devices as they see fit. Forcing users to sign up for commercial services in order to use devices they have already purchased is becoming a common practice and often puts users at an increased risk of being subject to a data breach. This risk is growing every year and is exacerbated by this unnecessary mandatory account creation. These kind of restrictions can also hamper the capability of repair services to access the device and perform simple verification.

Device manufacturers have shown that they are not above remotely disabling features or even entire devices when a product is obsoleted by a newer model, the company is taken over by a rival or they just decide that it would become profitable to do so. This kind of deliberate disabling of functionality or devices should not be tolerated.

## **Current Practices that harm our Right to Repair and Solutions**

There are a number of current device manufacturing practices that hamper our communities Right to Repair.

- Sealing devices: By making devices impossible to access without causing structural damage to the case manufacturers create a monopoly on repairing their devices. Manufacturers should be regulated to make devices accessible for repair.
- Non-Replaceable components: By not allowing device components such as batteries to be replaced manufacturers limit the usable lifespan of a device (often to the weakest component) causing premature device failure. – Manufacturers should be regulated to make commodity device components like batteries replaceable and standardised.
- Custom connections: By using custom power and data cables manufacturers hamper competition and create an unfair monopoly for accessories and connectors. Europe is a great example here producing a charging standard. – Power charging and connector standards should be put into place.
- Restrictions on third-party parts: Device manufacturers can restrict or outright refuse to
  distribute parts essential to the repair and maintenance of our devices. In some cases
  exorbitant pricing is placed on replacement parts and services to artificially encourage new
  device sales. Manufacturers should be regulated to make replacement parts available at a
  reasonable rate to repair service providers.
- Restrictions on information: Often manufacturers are unwilling to share the information required to repair and maintain their devices with third-party repair shops. Manufacturers should be regulated to provide enough tools and information for the safe diagnosis, repair and maintenance of their devices to third-party repair providers.

Due to the many overwhelming benefits to the community, productivity, environment and the economy, the members of Free Software Melbourne implore you to implement strong Right to Repair legislation that at least addresses the current harms our lack of Right to Repair is causing.

"If you can't fix it you don't own it" - Self-Repair Manifesto

Regards,

Ben Minerds, on behalf of the members of Free Software Melbourne

### References

- 1: Waste Advantage Magazine, The Challenge of E-Waste: Why Right to Repair Matters, https://wasteadvantagemag.com/the-challenge-of-e-waste-why-right-to-repair-matters/
- 2: Susanna Ala-Kurikka, Electronic goods' life spans shrinking, study indicates, https://www.endseurope.com/article/1646040/electronic-goods-life-spans-shrinking-study-indicates 3: iFixit, Recycling isn't the Answer; It's the Last Resort,

https://www.ifixit.com/Right-to-Repair/Recycling

- 4: The Ohio State University, Reducing, reusing, and recylcing electronics makes a difference, https://u.osu.edu/hardwarsustainability/sample-page/
- 5: Plunkett, J, Away is a Place, https://ewastecollective.org/away-place-essay-e-waste/
- 6: Lucy McAllister, The Human and Environmental Effects of E-Waste, https://www.prb.org/e-waste/
- 7: Denise Wilson, Impacts of WEEE (Waste Electrical and Electronic Equipment), https://ewaste.ece.uw.edu/students/impacts-of-e-waste-on-the-environment/
- 8: Brett H.Robinson, E-waste: An assessment of global production and environmental impacts, https://www.sciencedirect.com/science/article/abs/pii/S0048969709009073
- 9: Andy Kollmorgen, Car warranties and dealer servicing,
- https://www.choice.com.au/transport/cars/maintenance/articles/car-warranties-and-dealer-servicing 10: The Federal Chamber of Automotive Industries (FCAI), Agreement on access to service and repair information for motor vehicles,
- https://www.fcai.com.au/library/publication/agreement\_on\_access\_to\_service\_and\_repair\_information\_for\_motor\_vehicles.pdf
- 11: Liam Tung, You'll be warned if your iPhone 11 uses a non-genuine replacement screen, https://www.zdnet.com/article/apple-youll-be-warned-if-your-iphone-11-uses-a-non-genuine-replacement-screen/
- 12: Kyle Wiens, Apple Shouldn't Get to Brick Your iPhone Because You Fixed It Yourself, https://www.wired.com/2016/02/apple-shouldnt-get-to-brick-your-iphone-because-you-fixed-it-yourself/