e-ISSN 2582-4570

THE RIGHT TO REPAIR IN INDIA: UNLOCKING INNOVATION, SUSTAINABILITY, AND CONSUMER AUTONOMY

Divyansha Goswami[*]
Siddhant Gupta[**]

ABSTRACT

The right to repair has emerged as a counterforce to the paradox of modern consumerism, where individuals enjoy the freedom to purchase but are seldom free to repair. The right challenges the status quo based on 'planned obsolescence'— the practice by corporations and manufacturers to deliberately design products in such a way that they become frequently replaceable. This practice operates by way of restricted access to spare parts, proprietary software locks, warranty void clauses and other design choices that discourage repairs. The right to repair, in contrast, advocates for customers as well as independent repairers to be granted access to tools and technical know-how required for product restoration. Such practices not only adversely affect consumer autonomy but also fuel the ongoing environmental crisis, considering e-waste generation is rising in India. In this light, the paper thus explores how giving a formal recognition to the right to repair can significantly aid in sustainable governance. It will not only protect consumer interests but also enable an effective capacity-building of the citizens for them to meaningfully avail of their fundamental right against climate change, which has recently been granted judicial recognition as an inherent facet of the right to life under Article 21 of the Indian Constitution. It also puts forth that the often-cited IPR concerns justifying repair restrictions, can indeed be balanced with the right to repair, by offering a normative framework that reconciles the IPR concerns with this right. An approach based on a fine balance can safeguard innovation without undermining consumer rights and sustainability. Ultimately, the paper makes a case for the right to repair as a conscious policy decision necessitating a shift in how we conceive ownership and justice in an era of disposability, thus aligning it with the constitutional values of sustainability, access, and fairness.

I. Introduction

There were times when repair was second nature—frequent visits to automobiles, household appliances, and electronic devices repair shops, were a way of life. In the post-liberalization era, with the advancement of technology, the markets opened globally and were now flooded with newer and much more innovative products. However, instead of solidifying the repair practices, the products were rendered disposable and easily replaceable, owing to cost-effectiveness and advancements made in the manufacturing processes. Eventually, this shift led the manufacturers to focus more on mass-producing newer models on a frequent basis, rather than creating durable, repair-friendly designs. Consequently, in a consumption-oriented

[*] Research Scholar, Faculty of Law, University of Delhi
[**] Research Scholar, Faculty of Law, University of Delhi

e-ISSN 2582-4570

market, even the consumers started prioritizing convenience and affordability over sustainability and longevity. Such a consumption-oriented approach, *inter alia*, manifested in the form of proprietary designs restricting third-party repairs, digital locks and software restrictions requiring manufacturer authorization, warranty clauses that nullify repair rights upon repair attempts by non-authorized repairers, and limited availability of spare tools or the relevant know-how manuals. Therefore, what was once a natural consumer right, reduced to a corporate privilege, particularly in the automobile and electronics industry. This, in turn, fuelled the practice of 'planned obsolesce'[1]—a term that owes its origin to the times of the American Great Depression. During this period, the American businesses adopted the concept of "creative waste"[2] to fight their bear economy. The idea was premised upon deliberate discarding of products to buy new ones, and push for a strong economy. Even though the newer products and appliances were hardly discernibly different from the older ones in design and utility, it was the "visual trappings of progress desired by consumers"[3] that promoted continuous sales. Thus, the approach that shaped the aspirations of post-world war Americans, gradually permeated other developed and developing economies alike, in a globalized world.

It is trite to say that, with the passage of time, a consumerist approach once thought to be innovative and economy-friendly, took a toll not only on the consumers and market, but also the environment. The new set of challenges range from hindrance of free-flow trade between Original Equipment Manufacturers (for brevity, "OEMs") and, the third-party buyers and sellers; to hampering an effective e-waste management. Moreover, the real financial burden, borne out of a culture of over-consumption, falls upon the consumers who are forced to replace the products that can feasibly be repaired. Even the companies, without any hesitation, compromise on the product quality and durability, to ensure that the products are easily rendered outdated. It is ironic that ease to manufacture newer products, in reality, stifles true innovation, by allowing the companies to focus on disposability, rather than longevity and sustainability. Further, at times, 'planned obsolesce' can be viewed as a deceptive unfair trade practice. The 'Right to Repair' (for brevity, "R2R") movement emerged in response to these multi-fold issues, in the same country where the practice of 'Planned Obsolescence' had once emanated from—in the early 2000s, the first push came from the automobile sector in America, when the independent repairers found themselves incapable of accessing the vehicle diagnostic

---

1 Bernard London, *Ending the Depression Through Planned Obsolescence* (Glasgow, 1932).

2 *Ibid.*

3 Nigel Whiteley, *Toward a Throw-Away Culture: Consumerism, 'Style Obsolescence' and Cultural Theory in the 1950s and 1960s*, 10 *Oxford Art Journal* 3–27 (1987).

e-ISSN 2582-4570

data and repair manuals, strictly controlled by the OEMs. This gave way to the first active legislative intervention, in the form of Massachusetts Right to Repair Law, 2012[4], permitting the third-party and independent automobile repairers to have the same kind of access to repair know-how and tools as the authorized dealerships and repair shops. This legislation also stirred a fruitful dialogue between consumer advocacy groups and the automobile OEMs, which translated into a nationwide Memorandum of Understanding in 2014[5]. The automobile OEMs agreed to ensure an easy access to repair data and tools. However, with the advent of digital technology, the OEMs, apart from creating structurally weak products, resorted to introducing new software-based restrictions, leading to renewed legal battles.

The right to repair gained momentum globally, particularly posed by digital technology. It empowers the customer to modify the products they own without manufacturer- imposed restrictions, thus promoting consumer autonomy, sustainability, and anti-competitive business practices. Various jurisdictions, namely the United States, European Union, and Australia. have taken significant legislative measures for enforcement of this right. US, being the flagbearer of this movement, has right-to-repair legislations in place in several states.[6] The European Union's Ecodesign Directive[7], which came into force recently in 2024, mandates that spare parts remain accessible to the end-consumers and independent repairers for up to 10 years. In a similar vein, Australia's Productivity Commission Report (2021)[8] recommended legislative intervention to curb unfair repair restrictions and promote a sustainability-based consumer autonomy. However, the global formal recognition of the right to repair has not yet translated to a concrete law in India. The Indian legal landscape remains fragmented when it comes to ensuring repair rights. Since India does not have a comprehensive legislative framework for codifying this right, its nuances must be understood by an intersection of certain legal provisions under consumer protection, competition law, and intellectual property law.[9] Though the Department of Consumer Affairs has launched a R2R portal recently in 2022, it still lacks

4 Massachusetts Right to Repair Law, 2012

5 Memorandum of Understanding, https://www.njgca.org/wp-content/uploads/Right-to-Repair-national-MOU-01-23-14.pdf (last visited on March 24, 2025).

6 Fair Repair Act, s.3830 https://www.congress.gov/bill/117th-congress/senate-bill/3830 (last visited on March 24, 2025)

7 Ecodesign for Sustainable Products Regulation, available at: https://commission.europa.eu/energy-climate-change-environment/standards-tools-and-labels/products-labelling-rules-and-requirements/ecodesign-sustainable-products-regulation_en (last visited on March 24, 2025).

8 Australian Government Productivity Commission, *Annual Report 2021–22* (September 2022) https://www.pc.gov.au/about/governance/annual-reports/2021-22 (last visited on March 24, 2025)

9 Gaurav Pathak and Gaurangi Kapoor, "Suggested Framework for the Right to Repair in India," in Ashok R. Patil (ed.), *Consumer Law and Practice: Contemporary Issues and the Way Forward* (NLSIU 2022).

e-ISSN 2582-4570

a legislative backing. Thus, to foster a repair economy, it becomes crucial to explore how these laws interact amongst themselves, and to examine their interaction through the lens of sustainability, considering that India now stands as the third largest e-waste generator globally, after China and the US.[10] Though the small-scale repair shops and traditional technicians contribute significantly to bolster the informal economy in India, by promoting repair practices and reducing waste, they continue to face systemic challenges such as financial constraints, affecting their capacity to invest in advanced tools and training, and shortage of skilled labour, preventing expansion of operations.[11] This calls for integrating the circular and approach, and repair-friendly model, adopted by the informal sector small-scale repair shops into the operations of the big enterprises, to ensure meaningful sustainable growth.

II. Contours Of the Right to Repair in India

Socio-Cultural Perspectives

India has been home to suitability, frugality, and resourcefulness long before the emergence of sustainable movements in response to global consumerist approaches. The idea of restoration and repurposing of goods find place even in the Ancient Indian texts, including the Vedas and the Upanishads, in the form of the concept of '*Aparigraha*'[12] i.e., non-possessiveness, which deters over-consumption. The Gandhian teachings, shaped by the principles of self-sufficiency and minimalism, also reflect this approach—his *charkha*, symbolizing self- reliance instead of relying of foreign goods[13], was also a way of promoting repair culture. A culture of repair manifests not merely in texts and teachings but in the daily-life traditional Indian values, in the rural and urban spaces alike. The colloquial term '*jugaad',* meaning innovative improvisation, permeates the daily routine and language in India, symbolizing the ability to seek practical solutions for repurposing or reusing items, instead of quickly discarding them. A culture of repair ranges from common people repurposing old *sarees* and *dhotis* into quilts, to the persistence of professional second-hand and refurbished goods markets like Nehru Place in Delhi. These markets specialize in refurbished electronics,

---

[10] *India's e-waste offers $6 billion economic opportunity*, The Economic Times, *available at:* https://cfo.economictimes.indiatimes.com/news/indias-e-waste-offers-6-billion-economic-opportunity-report/118235677 (last visited on Mar. 25, 2025).

[11] Sudeep Singh and A. M. Mohanty, "Issues with Indian SMEs: A Sustainability-Oriented Approach for Finding Potential Barriers", in *Innovative Product Design and Intelligent Manufacturing Systems* 159–166 (Deepak Gupta ed., Springer Nature Singapore Pte Ltd., 2020).

[12] S. Radhakrishnan, *The Principal Upanishads* (Harper & Brothers, 1953).

[13] David Hardiman, *Gandhi in His Time and Ours: The Global Legacy of His Ideas* (Columbia University Press, 2004).

e-ISSN 2582-4570

auto and appliance parts etc, thus thriving on reuse and repair, aiding significantly in curbing e-waste generation.

The shift in Indian approach from repair to replacement, *inter alia*, was on account of the entry of multinational corporations to India in the post-liberalization period., and the consequent increased availability of consumer goods.[14] Gradually, this led to the decline of traditional small-scale repair shops, due to readily available mass-produced goods at cheaper costs. The demand for repair also saw a steep decline, owing to the prevalence of disposable fast-fashion products and electronic goods. Though India held onto the materialist "use and throw" culture for several decades, it is interesting to note that the new-age startups, and urban repair Repair cafés and workshops promoting sustainable products and practices, is but a revivalist practice premised on bringing back a culture of repair and re-purposefulness to India. It is, therefore, unsurprising that the companies as well as small businesses specializing in mobile phone repairs, laptop refurbishing and appliance fixing are gaining traction in India.[15] The role of repair in India's informal economy is also not unnoticed—the informal sector is indeed the backbone of Indian economy, which involves the contributions of local craftsmen as well as small-scale technicians, cobblers, blacksmiths etc. India's longstanding traditional repair practices align with the principles of a circular economy.[16]

Legal Perspectives

Presently, the uncodified legal framework for the R2R in India primarily revolves around competition law concerns and consumer protection, particularly the monopolistic restrictions imposed by the OEMs on repair markets. The Competition Commission of India (for brevity, "CCI"), in *Shamsher Kataria* ruling [17], invoking sections 4(2)(b) and 4(2)(e)[18] of the Competition Act, 2002, affirmed the OEMs acting as a dominant enterprise and establishing dominance in repair markets, to be an abuse of dominance, which not only adversely impacts independent repairers but also hampers consumer welfare. Even the Consumer Protection Act, 2019[19] or the proposed Digital India Act, 2023[20] focus on the discussions relating to consumer

---

14 *Supra* note 11

15 *NITI Aayog*, *Innovation for Sustainable Development: The Role of Startups in India's Green Economy* (2021).

16 *The Circular Economy: Lessons from India's Thriving Repair and Reuse Culture*, available at: https://thecsrjournal.in/the-circular-economy-lessons-from-indias-thriving-repair-and-reuse-culture/ (last visited on Mar. 25, 2025).

17 *Shamsher Kataria v. Honda Siel Cars India Ltd.*, 2014 SCC OnLine CCI 95.

18 *The Competition Act, 2002*, No. 12 of 2003, s. 4.

19 *Consumer Protection Act, 2019*, No. 35 of 2019.

20 *Digital Personal Data Protection Act, 2023*, No. 22 of 2023

e-ISSN 2582-4570

rights and fair market access. For instance, the Apex Court in *Jaswant Rai*[21] ruling allowed unavailability or inaccessibility of spare parts to be treated as a physical defect in the product, if it could be shown that a "reasonable purchaser" would not have entered into a contract with the manufacturer in the first place, had he been aware of the true quality of the said product. Additionally, in the *Sanjeev Nirwani v. HCL*[22] ruling, the Apex Court acknowledged and affirmed the manufacturers' duty to produce and provide, spare and consumable parts specific to a product, even after the warranty periods, undoubtedly at reasonable costs.

The above-stated rulings show that the right to repair in India is predominantly treated as a remedial measure, and not as an inherent 'right,' as the nomenclature suggests. This approach stems not from want of legislative or judicial efforts, but from a discourse majorly centred around IPR issues, and competition concerns. As a result, this approach overlooks the potential of a strengthened right to repair, in promoting sustainable development. The interplay among these allied fields thus serves both as a remedy, and a barrier, hindering the full realization of this right. The law as a barrier is a flip side of law as a remedy—the manufacturers usually raise copyright and patent concerns in favour of repair restrictions. The Copyright Act permits the OEMs to implement software controls such as Digital Rights Management, and to bar third-party modifications by way of end-user agreements. Specifically, Copyright Act, 1957 secs. 65A and 65B[23] of the Act criminalize bypassing digital security measures, or tampering with rights management information. In certain cases, the manufacturers also invoke 'package licensing' under the Patents Act, 1970, to extend protection over the repair process itself., in addition to opposing mere repairs. Though Patents Act, 1970, sec. 140[24] The Act prevents patent holders (here, OEMs) from imposing unfair conditions on buyers or licensees, the OEMs often bypass this protection by way of strategic licensing agreements requiring proprietary tools and diagnostics. Thus, in the absence of explicit legislative recognition, the legal landscape regarding the right to repair remains unsettled in India, as the courts address issues related to anti-competitive practices on a case-by-case basis, often focusing on consumer and competition concerns, with a negligible emphasis on environmental considerations and the sustainability aspect related to the right to repair. Consequently, the narrow focus undermines the full potential of right to repair framework, as an instrument of promoting sustainable development and aiding substantially in waste reduction, economic resilience, and climate

[21] *Jaswant Rai v. Abnash Kaur*, Suit No. 67 of 1966.
[22] *Sanjeev Nirwani v. HCL* CC/618/2014
[23] *Copyright Act, 1957*, No. 14 of 1957, ss. 65A, 65B.
[24] *The Patents Act, 1970* (Act No. 39 of 1970), s. 140.

e-ISSN 2582-4570

responsibility. Consequently, despite there being no express legislation, The Right to Repair Portal India serves as a major initiative of the Department of Consumer Affairs (DoCA) within the Ministry of Consumer Affairs Food and Public Distribution which aims to give consumers power through repair manual and authorized service center access as well as additional resources. Currently four sectors participate in the Right to Repair Portal voluntary scheme including agricultural equipment and mobile phones and electronics along with consumer durables and automobiles. Major firms operating within these sectors have initiated the practice of disclosing repair manuals as well as spare components details. Agricultural machinery falls into a category with strong participation levels because farmers require extended use from their farm equipment. A number of consumer electronic producers including smartphone companies have launched repair documentation to their customers. The repair tools and spare parts access varies depending on the industry because numerous manufacturers avoid granting complete access because of intellectual property concerns alongside safety concerns. User safety stands as a major concern in automobile and high-end electronic devices and medical equipment because wrong repairs may lead to severe consequences. The belief that manufacturers use safety concerns to monopolize repair markets faces criticism as a repair monopoly justification technique.

III. Sustainability Through the Right to Repair

Right to Repair as a Capacity-Building Measure

Today, it becomes more important than ever to explore the potential of right to repair in India as an instrument of sustainable development, considering that the Apex Court has recently, in the *MK Ranjitsinh*[25] ruling has recognized the right against the adverse effects of climate change, as a distinct fundamental right under Articles 14 and 21 of the Constitution. While the ruling does not expressly discuss the relevance of the right to repair in India, it does emphasize the need for a holistic approach towards understanding the concept of sustainable development in India. The ruling highlights how the agenda of sustainability in India "reflects the complex interplay between environmental conservation, social equity, economic prosperity and climate change"[26], and therefore calls for moving "beyond mere adherence to international agreements"[27]. This approach heavily resonates with the right to repair movement, which holds

[25] *M.K. Ranjitsinh v. Union of India*, (2024) InSC 280.
[26] *Supra note 26, Para 59*
[27] *Ibid.*

e-ISSN 2582-4570

potential to bring about a real and meaningful change. Such an approach can analogously be applied to balance the IPR concerns with environmental sustainability, emphasizing that neither should be subservient to the other, but rather that they should complement and reinforce each other. Here, it goes without saying that the Court has advanced a 'Human Rights-based Approach ("HBRA")[28] regarding the adverse impact of climate change upon standard and quality of life, but it is pertinent to note that simply granting or declaring a right without the corresponding capacity-building by the duty-bearer (here, the state), risks the right being reduced to a mere paper parchment.[29] For a right to translate into a meaningful right, capacity-building becomes central to HBRA.

It is , therefore, imperative for the state to undertake active capacity-building measures, that not only involve government initiatives, but also an active engagement of non-state actors, to ensure that all individuals (in this case, citizens and non-citizens alike) can effectively avail of and exercise this right—a strengthened right to repair can be a pivotal component of such capacity-building, as it can not only empower the consumers to extend the lifespan of their products but also contribute to environmental sustainability. For instance, capacity building, within this context, can entail sensitisation of citizens, solidifying institutional frameworks, and engaging non-state actors including businesses and civil society, that can enable a meaningful realization of the concerned right. A study related to consumer perspectives on the right to repair revealed that the intention to repair is, inter alia, influenced by factors such as environmental awareness, perceived ease of repair, and beliefs about legislation[30]. This underscores the need for capacity-building measures that effectively address these areas to promote repair practices. However, building a legal capacity does not necessarily require legislative intervention. Instead, strategic policy decisions employing effective utilization of existing legal frameworks can significantly strengthen this right. The existing scholarship largely advocates for enacting a separate R2R legislation, but falls short of exploring the potential of leveraging current regulations, such as the E-Waste (Management) Rules[31], and of integrating principles from IPR and Competition Law, to promote sustainability. For instance,

---

[28] Principle One: Human Rights-Based Approach, available at: https://unsdg.un.org/2030-agenda/universal-values/human-rights-based-approach#:~:text=The%20human (last visited on March 26, 2025)

[29] M. Broberg and H.-O. Sano, 'Strengths and Weaknesses in a Human Rights-Based Approach to International Development – An Analysis of a Rights-Based Approach to Development Assistance Based on Practical Experiences,' 22(5) *The International Journal of Human Rights* 664–680 (2018).

[30] D. Marikyan and S. Papagiannidis, "Exercising the 'Right to Repair': A Customer's Perspective", (2024) 193 *Journal of Business Ethics* 35–61.

[31] Central Pollution Control Board, *E-Waste (Management) Rules* (2022).

e-ISSN 2582-4570

the said Rules include the key provision of Extended Producer Responsibility (EPR)[32], holding the OEMs accountable for the entire lifecycle of their products (including take-back, recycling, and disposal). While this provision focuses primarily on end-of-life management, it can be extended to encourage the manufacturers for designing easy-to-repair durable products. The EPR guidelines can be amended to incentivize the manufacturers for producing repairable and upgradable products, thereby strengthening the right to repair framework and reducing e-waste generation without any additional legislation for the time being.

Theoretical Models Supporting Sustainable Capacity-Building in R2R

The right to repair framework is generally debated within the confines of IPR concerns[33]and competition concerns[34], leading to the assumption that their interaction inherently obstructs sustainability. However, contrary to the conventional examination, a closer examination reveals that, when applied correctly, they can actively support a sustainability-driven repair economy. In fact, leveraging current laws, as an alternative to bringing an express legislation, can prove to be a more pragmatic approach for creating a robust and sustainable repair ecosystem, when supported by a well-established theoretical foundation. This involves situating the legal framework within a broader theoretical perspective, to bring more coherence to the interaction of theories from different allied fields.

At the core of the IPR justifications for repair restrictions, lies the Benthamite Utilitarian Theory[35], which maintains that exclusive IP rights should only be granted if they maximize overall societal welfare, suggesting that patents and copyrights promote innovation by granting monopolies.[36] However, excessive protection can not only adversely impact the market efficiency (free flow of ideas as well as trade)[37] but also cause environmental harm. Furthermore, as highlighted by Prof. Bernstein, social progress encompasses not only innovation but also "adoption process"[38], meaning thereby that progress can be attained only if the people get a real opportunity to avail of new technology. Thus, even the traditional IP justifications align with viewing the right to repair as a measure for ensuring consumers'

---

32 *Ibid.*

33 Leah Chan Grinvald and Ofer Tur-Sinai, *Intellectual Property Law and the Right to Repair*, 88 *Fordham L. Rev.* 104 (2019).

34 Miriam Imarhiagbe, The Right to Repair in EU Competition Law, 5(1) Nordic J. Eur. L. 169 (2022).

35 Jeremy Bentham, *The Stanford Encyclopedia of Philosophy* (Mar. 17, 2015).

36 Stephen R. Munzer, *New Essays in the Legal and Political Theory of Property* (Cambridge Univ. Press, 2001).

37 Michele Boldrin and David K. Levine, *The Economics of Ideas and Intellectual Property*, 102(4) *Proc. Natl. Acad. Sci. USA* 1252–1256 (2005).

38 Gaia Bernstein, *In the Shadow of Innovation*, 31 *Cardozo L. Rev.* 2257, 2275 (2010).

e-ISSN 2582-4570

capacity to get the innovative benefits of technological advanced products. A robust right to repair framework will not only positively impact environment, but also enable the consumers to derive more utility from the innovative goods, thereby serving the overarching utilitarian goal of enhancing overall societal well-being.

Similarly, Lockean Labour Theory justifies property rights based on labour input, but is qualified, majorly, by two factors—there is enough good left for others, and the labourer does not take more than what he needs. In the similar vein, Gordon has put forth, based on natural-rights perspective, that the IP rights are concerned with both public rights, and with those whose "intellectual labour" goes into creation.[39] This perspective supports the right to repair as a moral entitlement of the consumer, since consumers also mix their labour with the goods they own.[40] This can be instantiated by considering gamers who upgrade their PCs, or tweak software to optimize its performance; another example can be farmers applying physical labour and technical expertise to upgrade their tools and machinery, outside of manufacture-controlled repair services. This perspective also challenges the traditional view that ownership stops at purchase, rather the consumers invest their own labour into maintaining and modifying a product. Concomitantly with benefitting consumers and independent repairers, a RTR legal regime can potentially push innovation in repair markets as it allows the consumers and independent repairers in carving out newer repair methods, improving repair tools, or developing innovative repair kits.

A holistic understanding, therefore, requires transcending mere price and profit considerations, as has been done by the Post-Chicago school of antitrust law. The Post-Chicago School has expanded the analytical framework beyond the narrow focus of Chicago School on price effects, incorporating a broader examination of non-price harms (such as planned obsolescence). This shift acknowledges that non-price factors can also constitute anti-competitive behaviours, capable of substantially shaping market dynamics and consumer welfare.[41] The Post-Chicago school, as a scholar has noted, has thus recognized anti-competitive practices can indeed cause market failures by creating externalities not apparent in

[39] Wendy J. Gordon, *A Property Right in Self-Expression: Equality and Individualism in the Natural Law of Intellectual Property*, 102 *Yale L.J.* 1533 (1993).

[40] John Locke, *Two Treatises of Government*, available at: https://www.britannica.com/topic/Two-Treatises-of-Government (last visited on Mar. 27, 2025).

[41] Mark Glick and Darren Bush, *The Chicago School, the Post-Chicago School, and the New Brandeisian School of Antitrust: Who is Right in Light of Modern Economics?* 30(4) *Geo. Mason L. Rev.* 935 (2023)

e-ISSN 2582-4570

the pricing structures.[42] This perspective provides a framework for strengthening the right to repair, as giving the due weightage to non-price factors in IPR, consumer and competition matters, can serve as a proactive tool to foster a viable repair economy. These theories, often understood as incompatible with the right to repair, indeed translate into "internal justifications"[43] for solidifying the right to repair in a manner complementary to the IPR front. A case for right to repair can thus justifiably be grounded in the very rationales that have traditionally been used to justify IP rights.

Most importantly, a right to repair framework accounting for the said IPR concerns and theories makes way for a much more inclusive understanding of the right to repair in India Apart from an individual's personal right to repair and modify their products, it can also be understood to mean, by extension, sharing repair information publicly, advertising repair businesses, small-scale repair businesses manufacturing, importing and selling spare parts in competition with the OEMs, and mandating the OEMs to disclose repair know-how and supply spare parts. Such an approach "visualizes the notion of a right to repair as concentric circles"[44], with personal repair rights at its core and gradually moving towards the rights, that are more public in nature.

IV. LEGAL POSITION OF "RIGHT TO REPAIR" AROUND THE GLOBE

United States of America

The United States Right to Repair movement conducts several state-level initiatives to allow consumers and independent repair shops full access to electronic device tools while also enabling vehicle maintenance through authorized parts and comprehensive device information. Multiple state-level legislation has been passed during March 2025.[45]

The New York Digital Fair Repair Act (2022) became law on December 28th 2022 to establish an obligation for original equipment manufacturers to give consumers and independent repairer's access to repair information required for consumer electronic devices.

---

[42] Christopher S. Yoo, *The Post-Chicago Antitrust Revolution: A Retrospective*, *All Faculty Scholarship* (2020), *available at:* https://scholarship.law.upenn.edu/faculty_scholarship/2212 (last visited on Aug. 3, 2025)

[43] *Sup*ra note 33

[44] *Supra note 44, page 70*

[45] *The State of Right to Repair*, available at: https://pirg.org/connecticut/edfund/resources/the-state-of-right-to-repair/ (last visited on Mar. 27, 2025).

e-ISSN 2582-4570

Under this law manufacturers do not need to give access to motor vehicles alongside home appliances and medical devices. This legislation becomes applicable to all electronic devices that become first used or purchased within New York State starting from July 1, 2023 onwards. [46]

The state of Colorado leads the way when it comes to Right to Repair legislative action within multiple industrial sectors, through its 2022 regulation the medical device industry enables wheelchair users to possess essential components together with maintenance equipment and code software they need for motorized chair fix.[47] Agricultural Equipment (2023) creates mandatory requirements for farming equipment manufacturers to deliver maintenance materials to their users.[48] Broad Electronics (2024): Encompasses personal electronics, printers, appliances, HVAC systems, and more. Colorado will become one of the leading states in the nation after January 1, 2026 when its restrictive "parts pairing" rules come into effect under this law.[49]

Under the Minnesota Digital Fair Repair Act (2023) starting July 1 2024 manufacturers must follow the law for their post-July 1 2021 manufactured products. Under this legislation different digital electronic products such as personal electronics and appliances as well as servers and industrial equipment receive coverage. Under exceptions for this disclosure law off-road and recreational vehicles together with video game consoles and medical devices and agricultural equipment maintain immunity.[50]

The California Right to Repair Act (2023) commences operation on July 1st 2024 to mandate that manufacturers provide repair materials along with maintenance instructions and repair tools for all consumer appliances up to the category of personal electronics. According to the law manufacturers need to offer repair materials for three years starting from production for devices that cost between $50-$100 or they need to maintain access to repair materials for seven years from production for products worth more than $100. Home alarm systems and fire suppression systems as well as video games consoles together with selected agricultural and construction equipment have exemptions under this legislation. [51]

---

[46] *The Digital Fair Repair Act, 2021* , s4104-A/A7006-B

[47] Consumer Right to Repair Powered Wheelchairs, *available at:* https://leg.colorado.gov/bills/hb22-1031 (last visited on Mar. 27, 2025).

[48] *Ibid.*

[49] The Minnesota Digital Fair Repair Act, 2023

[50] The Minnesota Digital Fair Repair Act,s. 325E.72

[51] The Right to Repair Motor Vehicle Data Law (Senate Bill No. 244).

e-ISSN 2582-4570

Under Massachusetts Automotive Right to Repair Law (2012 updated to 2020) vehicle owners alongside independent repair shops maintain full privileges to essential diagnostic and repair information. The 2020 update of the Massachusetts law added wireless telematics systems into the coverage which granted immediate vehicle data access for repair purposes.

More and more states now understand RTR's significance since their initiatives were created to address customer rights and environmental preservation while fostering competitive markets. The nation lacks uniform federal RTR regulations which creates different legal standards between states throughout the country. An increasing number of states have implemented Repair Right To Replace legislation across the country in March of 2025 because of expanding support for standardized repair rights.[52] The enforcement of RTR matters is advancing through the actions of government agencies at both federal and state levels. The U.S. Copyright Office through its October 2024 DMCA exemption granted repair access to ice cream machines and other equipment to McDonald's franchisees and third parties. Commercial and industrial equipment maintenance professionals can now use this DMCA amendment to bypass digital security barriers during their repairs because of significant RTR movement success.[53] The Federal Trade Commission (FTC) is currently investigating companies such as Deere & Co. because they assert the company monopolizes repair markets by blocking essential repair software and necessary tools from being accessible to the public.

European Union

The Right to Repair movement within the European Union has developed into a wide-ranging legal system that works to support sustainable buying habits while dealing with waste reduction. The initiative supports EU-wide environmental and resource efficiency goals under the European Green Deal and Circular Economy Action Plan to create a sustainable economy.[54] On April 23rd the European Parliament enacted significant reform with the Right to Repair Directive. The directive compels producers to establish repair service programs which should be both affordable and speedy while consumers must obtain detailed information regarding

[52] 'Already, 20 States Have Active Right to Repair Legislation in 2025', https://pirg.org/articles/already-20-states-have-active-right-to-repair-legislation-in-2025/ (last visited on Mar. 27, 2025).

[53] 'McDonald's Ice Cream Machines Get Help from the Feds', https://www.axios.com/local/chicago/2024/11/13/mcdonalds-ice-cream-copyright-law (last visited on Mar. 27, 2025).

[54] 'Right to Repair Directive – What Will This New Legislation Mean for Your Business?', https://www.womblebonddickinson.com/uk/insights/articles-and-briefings/right-repair-directive-what-will-new-legislation-mean-your-business? (last visited on Mar. 27, 2025).

e-ISSN 2582-4570

their rights to maintenance. The legal guarantee extends by one year for all products repaired under warranty terms which encourages customers to select repairs instead of new purchases.[55]

As part of the directive amendments to the Sale of Goods Directive (EU) 2019/771 manufacturers now provide legal guarantees of an additional year to consumers making repair selection. The EU demonstrates its dedication to product extension cycles through this amendment while working to decrease waste amounts.[56] The EU directive mandates producers to provide technical maintenance services for products which can be fixed under current EU product laws including home appliances and televisions. The established right to repairs creates a dependable solution for customers which pushes manufacturers toward more environment-friendly business operations. A combination of scholarly research has evaluated how well the directive accomplishes its goals. The directive makes substantial improvements but academic scholars mention it falls short of solving problems with planned product deterioration while not providing adequate access to repair details. Manufacturers need stronger requirements which make them design products for both durability and repair accessibility.[57]

The RTR promotion work of the European Economic and Social Committee (EESC) includes running events and awareness campaigns to help establish repair practices in EU consumer communities. These initiatives strive to give power to customers as well as establish sustainable behaviors throughout Europe.[58]

China

Chinese Right to Repair (RTR) movement functions under the Law of the People's Republic of China on the Protection of Consumer Rights and Interests which people know as the Consumer Protection Law. Consumer rights and business obligations come from the Consumer Protection Law which China adopted in 1993 with subsequent amendments in 2009 and 2013. Article 23 of the Consumer Protection Law contains an essential provision related

---

55 'Right to Repair: Making Repair Easier and More Appealing to Consumers', https://www.europarl.europa.eu/news/en/press-room/20240419IPR20590/right-to-repair-making-repair-easier-and-more-appealing-to-consumers (last visited on Mar. 27, 2025).

56 EUROPEAN COMMISSION, *Directive on Repair of Goods* (June 2024).

57 'A Critical Assessment of the European Directive Proposal on the Common Rules Promoting the Repair of Goods', *available at:* https://www.sciencedirect.com/science/article/pii/S0921344924005871 (last visited on Mar. 27, 2025).

58 Emilie Prouzet, 'Placing the Right to Repair at the Core of the EU's Consumer Protection Policy', *European Economic and Social Committee*, *available at:* https://www.eesc.europa.eu/en/news-media/articles/placing-right-repair-core-eus-consumer-protection-policy (last visited on Mar. 28, 2025).

e-ISSN 2582-4570

to Right to Repair. The article requires businesses which offer repair replacement or return services to fulfill them immediately and without unfair denial when these undertakings result from state regulations or consumer agreements. Under Article 23 of the Consumer Protection Law businesses must deliver promised repair services to consumers which establishes their rights during product failure or defects.[59] The Consumer Protection Law of China received support from government enforcement through the Implementing Rules of the Law on Protection of the Rights and Interests of Consumers on July 1, 2024. The rules established by the Implementing Rules for the Law on Protection of the Rights and Interests of Consumers specify different norms for consumer rights especially regarding defective product recalls. Under the Consumer Protection Law companies involved in manufacturing and importing must create recall plans while both releasing information and paying expenses related to product recall and notifying consumers of their rights. All entities participating in product sales or lease functions and component repair making or supply must help and collaborate with product recalls. According to the Implementing Rules businesses need to deliver honest and detailed product information and service explanations to their customers. The need for business clarity helps customers obtain essential knowledge to choose products wisely and use their rights confidently.[60] Under the Product Quality Law of the People's Republic of China consumers must obtain products both free of unreasonable dangers and capable of meeting advertised properties and functions. The legislation operates as an industry defense system which protects consumers from hazardous merchandise therefore lowering repair needs and boosting their security.[61] An evolving pattern of RTR in China remains evident after legislative changes according to scholarly studies. Consumer rights exist under current laws but additional explicit RTR provisions need to be introduced because modern electronic technology presents new repair-related challenges.[62]

Japan

Japan combines legal systems with cultural traditions to determine policies related to the Right to Repair (RTR). The automotive sector in Japan benefits from existing laws that form the base of repair activities although the nation has yet to enact dedicated Right to Repair

[59] Law of the People's Republic of China on Protecting Consumers' Rights and Interests, 1993.

[60] 'Implementing Rules of Consumer Protection Law Released', *available at:* https://www.roedl.com/insights/newsletter-china/2024-04/implementing-rules-consumer-protection-law-released? (last visited on Mar. 28, 2025).

[61] Product Quality Law of the People's Republic of China, 2000.

[62] Yanmin Quan, Xiaohao Zhang, 'Outlook on the right to repair: how will it find its way into China's Copyright Law?' 18 *Journal of Intellectual Property Law & Practice* 382–385 (May 2023)

e-ISSN 2582-4570

(RTR) legislation like those in the European Union or selected U.S. states. The Road Vehicles Act contains Article 64 as an essential regulation for "disassembling repairs" of automobiles. The Ministry of Transport (MOT) needs to inspect vehicle systems undergoing disassembly if such repairs are not conducted at certified or designated garages according to article 64. Significant vehicle repair work needs approval from the Ministry of Transport to maintain safety standards but limits which facilities can provide these types of repairs. Japanese government authorities have established clearer definitions for "disassembling repairs" along with simplified examination procedures for repair facilities. [63] Japanese cultural traditions embrace the concepts of repair and maintenance that are fully embodied in the practice of "kintsugi" – the art of fixing broken pottery with mixture of lacquer and powdered gold. Japan's cultural understanding of repairing products continues into contemporary grassroots movements which support both fixing and recycling of items thereby generating a social pattern focused on sustainable product durability.[64] Evidence gathered from scholarly research shows Japan's RTR framework is currently in a state of development. Existing laws serve as the foundation for consumer repair rights yet more specific regulations are needed for RTR matters specifically in modern electronic products dealing with technological difficulties.

Global progress in the Right to Repair (RTR) movement is taken with different legal approaches. Several states of the United States provide conditions the of repair right for electronics, appliances, and agricultural instruments and in the United States, New York, coloorado, minimissa, and California have RTR laws and by force in the United States Massachusetts is ready to enterprise and automotive repair rights. The FTC looks at monopolistic Repair restrictions, and security bypassing in some repairs is allowed under a 2024 DMCA exemption. The validity of the Right to Repair Directive (2024) has been debated as it adds to repair accessibility through extending repair warranties and establishing affordable repair services; however, scholars claim they should also extend manufacturer obligations. The 2024 Implementing Rules apply the repair rights to China’s Consumer Protection Law, which also gives repair rights to Chinese consumers. However, there are relatively few modern RTR provisions for advanced electronics. There are no specific RTR laws in Japan but auto repairs are regulated under the country’s Road Vehicles Act, in which major repairs needing government approval are obliged. Modern electronics do not receive the same regulatory

[63] Government of Japan, ‘Regulatory reforms’ (1999)

[64] Marieev Krista Princer, "Putting the Pieces Back Together: Using a Kintsugi-Influenced Directive to Promote Self-Forgiveness and Resiliency in Young Adults with Shame and Guilt", 2022 *Art Therapy* 4 (2022).

e-ISSN 2582-4570

support as do cultural traditions that support sustainability through grassroots repair initiatives. Even though RTR laws in most of the world are promulgated to benefit consumer rights and sustainability, inconsistencies among regions show the role for strong, common laws to enhance repair accessibility and minimize electronic waste.

V. Conclusion and the Way Forward

The right to repair in India can be traced back to the historical repair culture in India, where repairing and repurposing formed an inherent part of consumption. Traditionally, Indian markets have thrived on small-scale repair shops and repair professionals, thus making a repairability both culturally and economically significant. However, as the markets became more globalized and capitalized, restrictive manufacturer policies, proprietary repair models and technological barriers gradually started to promote over-consumption. Resultantly, this led to competition and consumer concerns, as well as environmental concerns, necessitating legal and policy interventions.

Considering that India contributes massively in e-waste generation globally, the Right to Repair cannot be reduced to merely a consumer rights issue, but also must be viewed as an instrument for economic sustainability and capacity-building—a RTR framework can operate as an enabling tool for the citizens to exercise their fundamental right against climate change meaningfully. The policies that extend life spans and reduce untimely disposals minimizes e-waste generation and promotes sustainable consumption patterns, as opposed to a disposability-culture that contribute to linear economy and exacerbate environmental degradation. Apart from that, by ensuring access to repair, India can empower small-scale professionals, thus reducing the corporate dependence and contributing to the circular economy. Strengthening repair rights thus aligns with the broader socio-economic goals of self-reliance, especially in a country like India, where the populace majorly relies on affordable repairs, rather than costly replacements.

From a legal standpoint, there is no express legislation providing formal recognition to this right in India, yet the existing consumer and competition legal framework provides a foundation for reinforcing this right. For instance, the Consumer Act, 2019 already acknowledges the significance of fair-trade practices and consumer rights. Similarly, the Competition, 2002, incorporates mechanism to address the monopolies in repair markets. These provisions can systematically be extended to include repairability clauses, preventing

e-ISSN 2582-4570

manufacturers from imposing unfair trade restrictions on independent repairers, and restricting consumer autonomy.

Furthermore, an effective right to repair framework must address the apparent contradictions between the Right to Repair and intellectual property laws—at first glance, the intellectual property rights, particularly copyright and patent, seem to restrict repairability, but a nuanced theoretical and pragmatic examination demonstrates that the IP law can, in fact, act as a catalyst for the Right to Repair framework, rather than a hindrance to repairability. The research underscores that the same theoretical justifications (both utilitarian and non-utilitarian justifications) that are used to justify the IP restrictions, can aid in balancing innovation incentives with public access. The right to repair one's own products, therefore, does not inherently violate intellectual property rights, and instead ensures a post-modernist view of innovation, accounting for societal needs.

Therefore, it becomes imperative that India must move beyond a fragmented legislative approach towards a more cohesive legal framework, to ensure that a Right to Repair framework can operate as an enabler of sustainable and equitable economic growth. To start with, the interpretations of the existing mani-fold legal instruments, must be revisited and restructured, to promote repairability as a right, rather than a corporate privilege. This shall require proactive policy decisions that deter anti-repair policies, along with active judicial engagement.

In this regard, the comparative analysis of various jurisdictions offers valuable lessons—the European Union's Ecodesign Directive enforces repair-friendly mandates for the manufacturers to provide spare parts and repair know-how. The US has also seen a significant progress, by way of Right to Repair legislations, particularly in the fields of digital goods and automobiles. Several other jurisdictions and many US states, despite not having repair legislations in place, have witnessed significant growth in this area, on account of a robust right-to-repair policy. India can draw inspiration from these models, to integrate mandatory repair provisions within the various intellectual property laws, along with consumer and competition framework. At the same time, such integration must also ensure that the lessons from global counterparts are not borrowed blindly, but are adapted in alignment with India's unique repair culture, existing legal infrastructure, suited to India's socio-economic realties.

A meaningful realization of the Right to Repair, therefore, demands a systemic shift, not only in the legal interpretation but also policy formulation. Establishing repairability as a legally protected right does not necessarily require focusing excessively on an express

e-ISSN 2582-4570

legislation; instead repair restrictions can be dealt with effectively, by way of legislative amendments, judicial clarity, and requisite policy decisions. Such a shift is imperative, not only from a legal lens, but also from a socio-economic and environmental lens. The research positions the required shift within a theoretical as well as a pragmatic framework, that can foster a robust repair ecosystem that advances sustainability, consumer welfare, and economic self-sufficiency. It is need of the hour for Indian Right to Repair infrastructure, to transition from a fragmented piecemeal approach to a unified, repair-friendly legal and policy framework.