### (Without Reference to File)

SENATE THIRD READING SB 54 (Allen, et al.) As Amended June 26, 2022 2/3 vote

### SUMMARY

Establishes the Plastic Pollution Prevention and Packaging Producer Responsibility Act (Act), which imposes minimum content requirements for single-use packaging and food ware and source reduction requirements for plastic single-use packaging and food ware, to be achieved through an expanded producer responsibility (EPR) program.

#### **Major Provisions**

- By January 1, 2024, requires producers of covered material to form and join a producer responsibility organization (PRO), subject to specified requirements and CalRecycle approval, to carry out the requirements of the Act. Prohibits a producer of covered material from selling, offering for sale, importing, or distributing covered materials in the state unless the producer is approved to participate in the PRO. Authorizes a producer to comply with the Act individually if it meets certain requirements. Establishes requirements and duties for the PRO and member producers.
- 2) Requires that all covered material offered for sale, distributed, or imported into the state on and after January 1, 2032, is recyclable in the state or eligible to be labeled "compostable," as specified.
- 3) Requires that all plastic covered material offered for sale, distributed, or imported into the state to meet the following recycling rates:
  - a) Not less than 30% of covered material on and after January 1, 2028;
  - b) Not less than 40% of covered material on and after January 1, 2030; and,
  - c) Not less than 65% of covered material on and after January 1, 2032.

Requires CalRecycle to review and assess whether to adjust the recycling rates commencing with the 2026 calendar year, as specified.

- 4) By January 1, 2032, requires the PRO to develop and implement a plan to achieve 25% reduction by weight and 25% reduction by plastic component for covered material sold, offered for sale, or distributed in the state, as prescribed, including interim targets of 10% by January 1, 2027, and 20% by January 1, 2030.
- 5) Prohibits producers of expanded polystyrene (EPS) food service ware from selling, offering for sale, distributing, or importing EPS food service ware in or into the state unless the producer demonstrates that EPS meets the following recycling rates:
  - a) 25% on and after January 1, 2025;

- c) 50% on and after January 1, 2030; and,
- d) 65% on and after January 1, 2032.
- 6) Requires the PRO to pay \$500 million per year from January 1, 2027, through January 1, 2037, to be deposited into the California Plastic Pollution Mitigation Fund (Fund). Authorizes the PRO to collect up to \$150 million from plastic resin manufacturers. Upon appropriation by the Legislature, 40% of these funds shall be expended by the Department of Fish and Wildlife, the Wildlife Conservation Board, the State Coastal Conservancy, the California Coastal Commission, the Ocean Protection Council, the Department of Parks and Recreation, the Natural Resources Agency, and the California Environmental Protection Agency to monitor and reduce the environmental impacts of plastics on terrestrial, aquatic, and marine life and human health, including to restore, recover, and protect the natural environment. Upon appropriation by the Legislature, 60% of these funds shall be expended by the Strategic Growth Council, the California Environmental Protection Agency, the Natural Resources Agency, and the Department of Justice to monitor and reduce the historical and current environmental justice and public health impacts of plastics, including to mitigate the historical and current impact of plastics on disadvantaged or low-income communities or rural areas.

# **COMMENTS**

Plastic pollution. Plastic is everywhere. From the highest mountain on earth to the deepest parts of the sea, plastic pollutes. Production has continued to increase rapidly over the last several decades and far outpaces our capacity to manage it. In 1950, 2.3 million tons of plastic were generated. By 2015, that had ballooned to 448 million metric tons. Half of all plastic ever created was manufactured in the last 15 years. By 2050, production is expected to triple current production and account for one-fifth of global oil production.

Plastic accounts for around 12% of California's disposed waste stream -- more than 4.5 million tons. Three of the four most prevalent types of plastic in California's landfills are forms of plastic film, which includes items like agricultural mulch film, pallet wrapping, grocery bags, and trash bags. Recycling figures are harder to estimate, as California has only recently begun collecting data from recycling facilities, but it appears that less than 15% of the plastic generated in California is recycled.

While the conversation around plastic has focused on its end of life, plastic pollution starts with fossil fuel extraction, and continues through manufacturing, transportation, usage, and finally disposal. Hundreds of petrochemical facilities throughout the United States create the pellets used in the production of plastic products. About 14% of oil is used in petrochemical manufacturing, a precursor to producing plastic. By 2050, it is predicted to account for 50% of oil and fracked gas demand growth.

Plastic production is a significant driver of climate change. The manufacture of four plastic bottles alone releases the equivalent greenhouse gas (GHG) emissions of driving one mile in a car, according to the World Economic Forum. The United States (U.S.) burns six times more

plastic than it recycles, according to research published by the Plastic Pollution Coalition in April 2019 by Jan Dell, a chemical engineer and former vice chair of the U.S. Federal climate committee. In 2019, the production and incineration of plastic added more than 850 million metric tons of GHGs into the atmosphere, which is equal to the emissions from 189 five-hundred megawatt coal power plants.

An estimated eight million metric tons of plastic waste enters the world's oceans annually. By 2040, that number is expected to triple to 24 million metric tons. Ocean plastic pollution is driven by ocean currents and accumulates in certain areas throughout the ocean. The North Pacific Central Gyre is the ultimate destination for much of the marine debris originating from the California coast. However, plastic generated in California pollutes oceans across the globe, as bales of plastic collected for recycling here are exported for processing and recycling. The plastic with value is collected and recycled, and the rest is discarded or incinerated.

As plastic circulates in the environment, it breaks down into smaller particles, known as microplastic. Microplastic refers to plastic particles that are less than 5 millimeters in length (about the size of a sesame seed). They come from a variety of sources, generally from larger plastic debris that degrades into smaller and smaller pieces over time, and microfibers, which are small plastic fibers that are shed from polyester fabrics, such as polyester fleece, and from plastic-based textiles like upholstery and carpet.

Microplastics have become ubiquitous in the environment. They are floating in outdoor and indoor air, even in areas far from any identifiable source. The particles are small enough to be carried by wind currents. Like all plastic in the environment, these particles accumulate toxins like pesticides, heavy metals, and other chemicals. A recent study conducted in 11 national parks found that over 1,000 metric tons (comparable to over 100 million plastic water bottles) fall on the country's western protected lands each year as dust and in rainfall. They make up a measurable portion of household dust. Humans are breathing plastic particles, and the science is lacking about the impact this may have on public health.

Microplastics are also in our water, even making their way into our drinking water, and has been found in both bottled and tap water. Researchers at the State University of New York and the University of Minnesota tested 159 drinking water samples from cities and towns across five continents. Worldwide, 83% of the samples worldwide contained microplastic. In the United States, 94% of the samples contained microplastic, including a sample collected from the United States Environmental Protection Agency headquarters. Microplastics consumed by marine organisms make their way into the animals' tissues and are beginning to show up in the fish that humans eat.

Recycling plastic into new products is helpful, as it keeps the recycled plastic out of the environment and reduces our dependence on virgin resin, but recycling alone is not a solution; we also need less of it. Recycling is currently only feasible for some of the more common, and least toxic, forms of plastic. Many forms of plastic are commonly treated with toxic flame retardants and plasticizers, which make them difficult to recycle. The abundance and variety of the types of plastic in our recycling system make it difficult to sort, and high contamination rates in bales of recycled plastic have caused many countries, as mentioned, to stop accepting recycled plastic from the United States unless it meets stringent contamination rates. The most significant challenge to recycling remains its low scrap value and lack of market demand.

Plastic is primarily landfilled, recycled, or incinerated – each of which produces varying amounts of GHG emissions. Landfilling emits the least GHG emissions on an absolute level, although it presents significant other risks. Mechanical recycling has a moderate emissions profile but displaces new virgin plastic on the market, making it advantageous from an emissions perspective. Incineration leads to extremely high emissions. Some newer technologies have become known as "chemical recycling" and turn plastic into fuel or chemicals. Chemical recycling technologies have significant environmental impacts, particularly on the surrounding communities, including toxic air emissions, GHG emissions, and hazardous waste generation.

*The California Recycling and Plastic Pollution Reduction Act of 2020 (Initiative).* After years of legislative measures failing to reach the Governor's desk, a coalition of environmental organizations developed the Initiative, which is qualified for the November 8, 2022, General Election. The Initiative requires CalRecycle to adopt regulations to reduce plastic waste.

If the Initiative is approved by voters, it would require CalRecycle to develop regulations that require producers to ensure that single-use plastic packaging and food ware is reusable, refillable, recyclable, or compostable by 2030, and specifies that "combustion, fuel production, and other forms of disposal" do not constitute recycling. The regulations must also require producers to reduce or prohibit single-use plastic packaging and single-use plastic food ware that CalRecycle determines to be unnecessary for the delivery of a product or food item. The Initiative further requires producers to source reduce, by both weight and number of items, single-use plastic packaging and food ware by 25% by 2030, as specified. The regulations would prohibit the distribution of EPS food service ware by food vendors. CalRecycle would be authorized to exempt or provide an extension for any single-use plastic packaging or food ware cannot comply with a regulation due to health and safety reasons, is unsafe to recycle, or presents unique challenges and has no alternative.

The Initiative establishes a Plastic Pollution Reduction Fee, as determined by CalRecycle, but not to exceed 1-cent, per item on single-use plastic packaging and food ware to fund recycling and plastic pollution mitigation programs. Like SB 54, the Initiative establishes penalties of up to \$50,000 per day for violations. The Initiative could be withdrawn from the ballot by its signatories, no later than June 30, 2022.

*The Plastic Pollution Prevention and Packaging Producer Responsibility Act (SB 54).* This alliterative measure is intended to reduce the amount of single-use packaging and food ware generated in the state and significantly increase the recycling of covered materials by creating an EPR program that requires producers to take responsibility for the materials they produce. This bill was developed over a long stakeholder process that included environmental organizations, producers, local governments, and recycling service providers.

SB 54 establishes stringent recycling requirements, increasing from 30% to 65%, and requires plastic covered materials to be source reduced by 25%, by 2032. The bill establishes extensive requirements, criteria, guidelines, and procedures on producers and the PRO to achieve these goals, and requires CalRecycle to promulgate regulations to implement and enforce the Act.

This bill is intended to ensure that the material that is collected is actually recycled into new products. The definition of recycling specifically excludes combustion, incineration, energy generation, fuel production, and other forms of disposal. Additionally, CalRecycle is required to develop regulations that exclude plastic recycling technologies that generate significant amounts of hazardous waste. This definition is intended to exclude technologies, such as gasification,

pyrolysis, and solvent-based technologies. The bill authorizes CalRecycle to adopt regulations to define guidelines and verification requirements to ensure that covered material that is shipped out of state or exported is recycled in a manner consistent with the requirements of the bill.

Unlike earlier EPR programs in California, which require CalRecycle to revoke an approved plan prior to pursuing other enforcement measures, this bill authorizes CalRecycle to pursue enforcement against a PRO or individual producers who are in violation of the Act with, or without, revoking the plan. Additionally, this bill includes an additional regulatory "backstop" for CalRecycle if the PRO or a producer fails to meet the recycling and source reduction targets established by the bill. This provision would allow CalRecycle to adopt regulations to require producers or the PRO to take the actions necessary to achieve the recycling rates or source reduction requirements.

Finally, this bill requires producers, via the PRO, to pay \$500 million annually for 10 years (of which the PRO may recoup up to \$150 million per year from resin manufacturers), for a total of \$5 billion, which, upon appropriation by the Legislature, will be used to monitor and reduce the impact of plastics in the environment, restoring the natural environment, and monitoring and reducing the historical and current environmental justice and public health impacts of plastics.

#### According to the Author

Senate Bill 54 will reduce the amount of waste that burdens taxpayers and local governments, plagues human health, and pollutes our natural environment by decreasing single-use packaging and the most problematic plastic food service ware products sold in California and ensuring the remaining items are effectively composted and recycled.

Roughly two-thirds of all plastic ever produced has been released into the environment and remains there in some form, either in our landfills or polluting our coast and ocean, and our streets, parks, streams, and rivers. These items fragment into smaller particles, known as microplastics, concentrating toxic chemicals and contaminate our food and drinking water sources. Exposure to these plastics and associated toxins has been linked to cancers, birth defects, impaired immunity, endocrine disruption and other serious health problems. Additionally, plastic negatively impacts marine ecosystems and wildlife as seabirds, turtles, marine mammals, whales and dolphins die from ingestion or entanglement.

Though the state and communities in California have been focusing efforts on reducing the burden from single-use packaging since the 1980s, taxpayers and local governments still spend over \$420 million annually in ongoing efforts to clean up and prevent litter in streets, storm drains, parks and waterways. Existing recycling infrastructure cannot keep pace with the continued exponential growth in single use waste. Less than 9% of plastic is recycled, and that number is dropping since the implementation of China's National Sword policy, which severely restricts the amount of foreign waste China accepts. The cost of recycling exceeds the scrap value of the plastic material so the markets for plastic packaging that were previously considered recyclable have been lost. Experts agree that upstream reduction of single use waste upstream is the most effective and least expensive way to protect human, wildlife, and environmental health. SB 54 would be an important step by significantly reducing California's reliance on single-use packaging and products.

# **Arguments in Support**

According to a coalition of supporters:

SB 54 would also support California's transition to a circular economy. It will require all single-use plastic packaging and foodware to actually be recyclable or compostable and require that all packaging meet high recycling rates to stay on the market. While most single-use plastic packaging today actively hinders the recycling process, SB 54 will require that this packaging be re-designed to be part of the circular economy. By shifting the financial responsibility of recycling off the public and onto the producers of single-use packaging and foodware, this policy will incentivize better, less wasteful product designs. SB 54 also includes a definition of recycling that prevents producers from using incineration or other plastics to fuel technologies to meet their required recycling rates.

#### **Arguments in Opposition**

In opposition to this bill, Beyond Plastic writes:

The issue of single-use disposables, both plastic as well as packaging made from paper, glass and metal, is one of the most pressing environmental challenges of our time and policies to address it must be carefully crafted to effectively reduce pollution and protect all communities, especially environmental justice communities, both inside and outside of California...

As currently written we do not believe that the bill will achieve the laudable goals we share of reducing plastic pollution nor will it mitigate the climate and pollution impacts of singleuse packaging. Other states are looking to California for leadership on this issue and should this bill be adopted, it would set an unfortunate precedent for other states to follow.

#### **FISCAL COMMENTS**

According to the Assembly Appropriations Committee:

 This bill includes several new duties for CalRecycle, including developing and issuing reports, undertaking public processes prior to issuing reports, developing complicated regulations, building reporting systems, and developing web resources. Overall, staffing and contracting needs will be significant, including needed staffing for this budget year in order to meet statuary timelines.

CalRecycle estimates costs of approximately \$3.6 million and 22 new positions in fiscal year (FY) 2022-23 (General Fund or Special Fund.) These costs are expected to increase to approximately \$5.1 million and 32 positions in FY 2023-24 and FY 2024-25. CalRecycle expects costs to increase in out-years for enforcement and updated reporting. In addition, CalRecycle estimate costs of \$1 million in FY 2022-23 and \$1 million in FY 2024-25 to develop the waste characterization studies.

Regulated parties will ultimately reimburse CalRecycle's costs. However, CalRecycle will need resources from an as-yet-unidentified source to cover its start-up costs until reimbursement funds are available to it. The bill requires, on or before the end of FY 2026-27, and once every three months thereafter, the PRO to pay to CalRecycle a California circular economy administrative fee, which will be funded by the producers that make up the PRO. The bill requires CalRecycle to set the fee at an amount adequate to cover the department and any other state agency's full costs of implementing and enforcing this bill, and to deposit PRO administrative fees into the California Circular Economy Fund. Upon

appropriation by the Legislature, moneys in the fund may be expended by CalRecycle for the department's activities pursuant to this bill and to reimburse any outstanding loans made from other funds used to finance the initial costs of the department's activities pursuant to this bill.

- 2) By requiring, among other things, local jurisdictions and recycling service providers to include covered material in their collection and recycling programs, this bill imposes a statemandated local program. Regulated parties will ultimately reimburse local jurisdictions for these costs; however, the state may need to initially reimburse local jurisdictions for any costs incurred as a result of this bill until PRO reimbursement funds become available.
- 3) Annual state revenue of \$500 million, from January 1, 2027, through January 1, 2037, totaling \$5 billion over the ten-year period. Upon appropriation by the Legislature, 40% of these funds shall be expended by the Department of Fish and Wildlife, the Wildlife Conservation Board, the State Coastal Conservancy, the California Coastal Commission, the Ocean Protection Council, the Department of Parks and Recreation, the Natural Resources Agency, and the California Environmental Protection Agency to monitor and reduce the environmental impacts of plastics on terrestrial, aquatic, and marine life and human health, including to restore, recover, and protect the natural environment. Upon appropriation by the Legislature, 60% of these funds shall be expended by the Strategic Growth Council, the Department of Justice to monitor and reduce the historical and current environmental justice and public health impacts of plastics, including to mitigate the historical and current impact of plastics on low-income communities or rural areas.

# VOTES

#### **SENATE FLOOR: 29-7-4**

YES: Allen, Archuleta, Atkins, Becker, Caballero, Cortese, Dodd, Durazo, Eggman, Glazer, Gonzalez, Hertzberg, Hueso, Hurtado, Kamlager, Laird, Leyva, Limón, McGuire, Newman, Pan, Portantino, Roth, Rubio, Skinner, Stern, Umberg, Wieckowski, Wiener
NO: Borgeas, Grove, Jones, Melendez, Nielsen, Ochoa Bogh, Wilk
ABS, ABST OR NV: Bates, Bradford, Dahle, Min

#### **ASM NATURAL RESOURCES: 9-0-2**

**YES:** Luz Rivas, Flora, Friedman, Mathis, McCarty, Muratsuchi, Stone, Wood, Grayson **ABS, ABST OR NV:** Cristina Garcia, Seyarto

#### ASM APPROPRIATIONS: 14-0-2

**YES:** Holden, Bigelow, Calderon, Carrillo, Megan Dahle, Davies, Mike Fong, Gabriel, Eduardo Garcia, Levine, Quirk, Jones-Sawyer, Akilah Weber, Wilson **ABS, ABST OR NV:** Bryan, Fong

# UPDATED

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