SB 394

Department of Legislative Services

Maryland General Assembly
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FISCAL AND POLICY NOTE

Senate Bill 394 (Senator Frosh, *et al.*)
Finance and Education, Health, and Environmental Affairs

Statewide Container Recycling Refund Program

This bill establishes a 5-cent beverage container deposit and a Statewide Container Recycling Refund Program within the Maryland Department of the Environment (MDE). The bill also establishes a Container Recycling Refund Program Fund administered by the Comptroller to be used for the payment of refunds and handling fees to container redemption centers and to support the new program, among other activities.

Fiscal Summary

State Effect: Special fund revenues increase by $111.0 million in FY 2016 and by more than $247.4 million annually thereafter from the payment of deposits by distributors, under the assumptions discussed below. General fund revenues increase by about $122,500 in FY 2016 from investment earnings of the new fund. Special fund expenditures for payments to redemption centers and grants to local governments and others may increase by $106.9 million in FY 2016 and by more than $240.3 million annually thereafter. Special fund expenditures increase by $195,900 in FY 2015 for MDE's administrative costs, and general/special fund expenditures increase by $40,000 in FY 2015 and by $837,400 in FY 2016 for administrative costs of the Comptroller's Office. Future year estimates reflect annualization, inflation, and growth in beverage container sales and redemption rates.

(in dollars)	FY 2015	FY 2016	FY 2017	FY 2018	FY 2019
GF Revenue	$0	$122,500	$335,600	$483,200	$564,100
SF Revenue	$0	$110,960,800	$247,374,300	$249,848,000	$252,346,500
SF Expenditure	$195,900	$107,124,100	$240,526,400	$245,194,500	$249,932,500
GF/SF Exp.	$40,000	$837,400	$619,100	$648,300	$678,800
Net Effect	($235,900)	$3,121,800	$6,564,300	$4,488,500	$2,299,200

Note:() = decrease; GF = general funds; FF = federal funds; SF = special funds; - = indeterminate effect

Local Effect: Local government expenditures increase by about $20.0 million in FY 2015 for counties to establish redemption centers, under the assumptions discussed below. Expenditures increase by $26.2 million in FY 2016 and by more than $60.8 million annually thereafter for counties to establish additional redemption centers and operate existing centers. Local net revenues increase by $7.6 million in FY 2016, but expenditures are projected to exceed revenues by more than $4.7 million annually beginning in FY 2018 (resulting from the collection of handling fees, net of refunds passed through to consumers, and grants from the State, less projected start-up and operating costs). Revenues likely increase significantly from the resale by local government redemption centers of additional beverage containers for their scrap value. **This bill imposes a mandate on a unit of local government.**

Small Business Effect: Meaningful.

Analysis

Bill Summary:

Establishment of the Deposit and Requirements on Distributors and Retailers

By April 1, 2015, every distributor operating within the State must register with MDE. After April 1, 2015, any new prospective distributor must register with MDE no later than one month before commencing business. A distributor must maintain records available for inspection by MDE of the number of redeemable beverage containers manufactured, sold, transferred, imported, or exported. A "distributor" is defined as a bottler or any other person that manufactures beverages in redeemable beverage containers, or that imports beverages in redeemable beverage containers to sell within the State.

Beginning January 15, 2016, every redeemable beverage container sold in the State must clearly indicate a refund value of 5 cents and the word "Maryland" or the letters "MD" on the container in a manner specified by the bill; no container marked as required by the bill may be sold to a consumer before January 15, 2016. The labeling requirement does not apply to a refillable beverage container that has a brand name permanently marked on the container and the equivalent of a refund value of at least 5 cents that is paid on receipt of the container by a retailer or distributor. A "redeemable beverage container" is defined as an individual, separate, and sealed glass, metal, aluminum, steel, or plastic jar, can, or bottle that, at its time of sale, contains between 6 and 101.5 fluid ounces of a beverage intended for consumption within the State.

The bill broadly defines "beverage" to include soft drinks, beer and other malt beverages, bottled water (including flavored water), fruit juice, tea, and coffee drinks. The definition does not include wine; distilled spirits; a syrup, liquid concentrate, condiment, or additive intended primarily as a flavoring ingredient in food or drink; any liquid that is a drug, a medical food, an infant formula as defined by the Federal Food, Drug, and Cosmetic Act, or a liquid dietary supplement as defined in the Dietary Supplement Health and Education Act of 1994; any milk and dairy-derived product; and any product that is frozen at the time of sale.

Beginning January 15, 2016, every distributor must pay to the Comptroller a deposit of 5 cents for every redeemable beverage container that the distributor sells, donates, or transfers within the State. Payment of deposits must be made on the fifteenth business day of each month for all sales, donations, and transfers occurring during the preceding month.

Beginning January 15, 2016, every distributor that pays a deposit to the Comptroller must collect from a retailer or on-premise seller a deposit of 5 cents on each redeemable beverage container the distributor sells within the State. A retailer must charge a consumer the deposit at the point of sale. A deposit charge must appear as a separate line item on a bill or invoice and may not be included in the calculation of any sales tax. A "retailer" is defined as a person who sells a beverage in a redeemable beverage container to a consumer for off-premises consumption. An "on-premise seller" is a person who sells a beverage in a redeemable beverage container for on-premise consumption, and includes a bar, restaurant, hotel, sporting venue, entertainment venue, and gaming venue.

Acceptance of Containers and Payments of Refunds by Redemption Centers

Beginning January 15, 2016, a person may return an empty redeemable beverage container to a redemption center for a full refund of the 5-cent deposit paid on the container. Each county must designate convenience zones in consultation with MDE by April 1, 2015, and must prepare and make available to the public a map showing the convenience zones within its jurisdiction. The map must be updated by April 1 of each year. Beginning January 15, 2016, at least one licensed redemption center must be located within each convenience zone.

A redemption center may be operated by a county, a municipality, or a private business or nonprofit organization licensed by MDE. A redemption center must:

- accept all types of empty redeemable beverage containers for which a deposit has been paid;
- verify that all containers bear a valid Maryland refund value;
- pay refunds in either cash or a redeemable voucher;

- ensure each container is recycled through a contractual agreement *with an in-state recycling facility*, or on-premises if the redemption center is also a recycling facility;
- remain open at least 40 hours per week, of which at least 5 hours must be on Saturday or Sunday; and
- forward to the Comptroller all documentation to support claims for payment.

A redemption center must refuse to pay the refund value on any container that is broken or corroded, contains free-flowing liquid, does not properly indicate a Maryland refund value, or exhibits characteristics of having been processed and baled previously. In addition, a redemption center may not accept more than 450 containers from a single redeemer at one time, except from a curbside recycling service provider or an on-premise seller.

A redemption center may use a reverse vending machine. A reverse vending machine, which issues a redeemable credit slip for the value of returned containers, must:

- accept any type of empty redeemable beverage container that bears a valid Maryland refund value and pay the refund in either cash or a redeemable voucher;
- reject a container if the reverse vending machine is unable to read the barcode; and
- be routinely serviced.

The Comptroller must remit to a redemption center the refund of each redeemable beverage container the redemption center accepts. In addition to the refund, the Comptroller must pay a handling fee of one cent for each container to a redemption center.

A redemption center must request payment no more than once per month and must include specified information along with supporting documentation on forms required by the Comptroller. The Comptroller may refuse payment on any request that contains significant discrepancies or that does not include sufficient supporting documentation.

MDE, in consultation with each county, must adopt rules and procedures for the licensing of redemption centers. To protect against fraud, MDE, in consultation with each county, must establish random third-party verification procedures for redemption centers that count containers manually.

The Container Recycling Refund Program Fund

The bill establishes a Container Recycling Refund Program Fund to be administered by the Comptroller, which consists of container deposits collected, money appropriated in the State budget, and any other money from any other source. (Although the bill also specifies that the fund's investment earnings remain in the fund, it does not amend § 6-226 of the State Finance and Procurement Article to exempt the fund from existing law that requires all investment earnings and interest from special funds to accrue to the general fund.)

The fund must be used only to pay handling fees and refunds to redemption centers, to implement and administer the Statewide Container Recycling Refund Program, and to provide funding for State and local recycling centers, recycling equipment, recycling education, and marketing, as well as State and local environmental programs. Money expended from the fund for the program is to supplement and not supplant funding that otherwise would be appropriated for the program.

MDE may adopt regulations to implement the bill. The Office of Recycling within MDE must work with the counties to (1) assist with the implementation of the program; (2) achieve the statewide redeemable beverage container redemption rates specified in the State's Greenhouse Gas Reduction Act Plan; (3) develop strategies for protecting against fraud in the payment of handling fees and refunds; and (4) facilitate the exchange of information between redeemable beverage container manufacturers, distributors, retailers, and licensed redemption centers, including universal product code information for reverse vending machines.

Current Law/Background: Chapter 719 of 2010 required MDE to conduct a study to evaluate solid waste management processes that reduce the solid waste stream through recycling and source reduction. MDE created the Maryland Solid Waste Management, Recycling, and Source Reduction Study Group and consulted with local government officials, waste haulers, recyclers, environmental groups, academia, State elected officials, and other affected parties including material resource facilities to study these issues. In December 2011, the study group submitted its final report and recommendations which included, among other things, a discussion of beverage container deposit programs.

In discussing the nature of the problem, the study group found that beverage containers generally constitute a disproportionately large share of litter as compared with their share of the solid waste stream. Beverage containers are also larger than other prevalent types of litter, such as cigarette butts, and may be more visible. The study group speculated that this may be part of the reason for the prevalence of beverage container deposit programs. According to the Container Recycling Institute, 10 states have enacted and currently implement beverage container deposit programs: California, Connecticut, Hawaii, Iowa, Maine, Massachusetts, Michigan, New York, Oregon, and Vermont. Delaware enacted legislation in 2010 that repealed its container deposit law, but established a statewide universal recycling requirement instead. Vermont has also enacted universal recycling legislation, and is studying the potential effect that universal recycling may have on its beverage container recycling program.

In its research of existing and proposed beverage recycling programs, the study group found that there are two main types of container deposit programs: (1) traditional programs where payments are made by consumers to the private sector, such as retailers; and (2) programs where the State funds redemption centers, and recycling processors purchase the collected materials from the redemption centers. The study group found that, while it is somewhat difficult to compare the cost of programs between states, the second type of program is generally cheaper. The study group also found that reverse vending machines may be an efficient tool, avoiding the need for personnel to count or weigh containers.

The study group also found that recycling rates of beverage containers are significantly higher in states that have established beverage container deposits. However, the study group also noted that, while these programs are generally regarded as successful in reducing beverage container litter, the reductions cannot be definitively traced to the container deposit programs. For example, data from a U.S. Environmental Protection Agency (EPA) national survey showed that beverage container litter has decreased by 74% across the nation as a whole since 1969.

Nevertheless, jurisdictions with container deposit programs generally have higher rates of recovery for beverage containers than jurisdictions with curbside programs alone. The study group report cited a 2002 report that found that the capture and participation rate for curbside programs is generally around 50%. Maryland recycled about 42.8% of beverage containers in 2012 through a combination of curbside and drop-off recycling, while states with deposit programs generally have an average recovery rate of roughly 80%. Thus, the study group concluded that a container deposit law in Maryland could roughly double the recycling rate of beverage containers in Maryland. While that would be a significant increase in the percentage of beverage containers recycled, it would only represent a 1% to 2% increase in the State's overall recycling rate for all materials. Finally, it should be noted that, while the preamble for the bill and other sources state that fewer than 25% of recycled beverage containers are reused or repurposed, it is unclear whether this information is based on data specific to Maryland and how the data may be reconciled with the recycling rate recorded by MDE.

Finally, the study group examined the environmental effects of beverage container recycling more broadly, noting that, as a potential benefit of implementing a deposit program, Maryland could avoid between 164,000 and 241,000 million tons of carbon dioxide equivalent annually. Thus, a deposit program would not only assist in achieving the State goal of increasing the statewide recycling rate to 55% and the waste diversion rate to 60% by 2020 established by Chapter 629 of 2012, but it could also support the

State's goal of reducing greenhouse gas (GHG) emissions by 25% by 2020 (established by Chapters 171 and 172 of 2009). The State's Greenhouse Gas Reduction Act Plan includes a beverage container recycling rate goal of 80% by 2020 and 90% by 2030, which is one component of the plan's "zero waste" goal of reducing GHG emissions by 4.8 million tons of carbon dioxide equivalent annually; this reduction comprises 8.6% of the plan's overall GHG reductions and represents the fourth largest source of emissions reductions (behind energy, transportation, and agriculture/forestry).

In December 2011, the University of Maryland Environmental Finance Center issued a report for the Abell Foundation and the Waterfront Partnership of Baltimore, Inc., to quantify a beverage container deposit program's contribution to Maryland's goals to reduce GHG emissions and stormwater-related trash and to determine what money might be available to the State as a result of unredeemed beverage container deposits. The report noted the potential for litter reduction and an increase in recycling from a beverage container deposit program, but also acknowledged a potential negative impact on local recycling programs and potential concerns about handling costs. In conclusion, the report noted that the economic outcomes of a program would vary based on the design of the program. Finally, the report indicated that maximizing the benefits of container deposit legislation depends on achieving high recycling rates, and that minimizing the costs of container deposit legislation depends on an efficient return system.

State Fiscal Effect: Special fund revenues for the Container Recycling Refund Program Fund increase by $111.0 million in fiscal 2016 from the payment of deposits by distributors to the Comptroller assuming about 4.85 billion beverage containers are transferred by distributors in fiscal 2016, with about 2.2 billion containers resulting in the payment of a deposit after the January 15, 2016 program implementation date. Future year revenues are annualized and reflect growth in beverage container sales.

Container Recycling Refund Program Fund expenditures increase by about $83.7 million in fiscal 2016 to (1) pay refunds and handling fees to redemption centers; (2) pay for the administrative expenses for MDE and the Comptroller's Office; and (3) otherwise support the Container Recycling Refund Program, as required by the bill. Future year special fund expenditures reflect annualization, inflation, and an increase in the redemption rate, as discussed below. This does not account for grant expenditures made to support local recycling centers and other purposes specified in the bill, which is discussed below.

Refunds and Handling Fees to Redemption Centers

The bill requires the Comptroller to remit to a redemption center the refund of each redeemable beverage container the redemption center accepts and to pay a handling fee of one cent. Thus, special fund expenditures from the payment of refunds and handling fees increase by $79.9 million in fiscal 2016. This estimate is based on the following information and assumptions:

- about 2.2 billion beverage containers result in a deposit in fiscal 2016;
- 60% of beverage containers are returned to redemption centers in fiscal 2016;
- 20% of redemption centers are privately owned and 80% of redemption centers are owned by local governments; and
- fraudulent returns from out-of-state redeemers result in refund and handling expenditures equal to 2.5% of container deposit revenues.

Assuming 40% of containers are not returned to redemption centers, unclaimed deposits result in the retention by the State of $44.4 million in fiscal 2016. This revenue is sufficient to cover the cost of handling fee payments in fiscal 2016, with a remaining balance of about $27.2 million for the Container Recycling Refund Program Fund in fiscal 2016, not accounting for any grant expenditures made from the fund. The fund balance, if not spent, also generates interest earnings for the general fund of about $816,400 in fiscal 2016, assuming an interest rate of 3%; however, as noted below, the fund balance is likely to be utilized for grants to support local redemption center operations, among other uses, which results in fewer interest earnings, as discussed more below. Future year general fund revenue increases are projected through fiscal 2019 due to investment earnings.

Although the bill specifies that the Container Recycling Refund Program Fund is to be used to implement the Container Recycling Refund Program, and for other specified activities, after providing refunds and handling fees to redemption centers, a portion of the $27.2 million projected fund balance in fiscal 2016 may be retained and, therefore, not expended for other purposes, in order to establish a reserve fund to protect against future losses that may occur as redemption rates increase in the future. For example, expenditures are projected to exceed revenues under the above assumptions if the redemption rate increases to more than 81% in a future fiscal year. Other states with a 5-cent deposit have experienced redemption rates that generally average around 80%, according to MDE, and the stated goal of the bill is to achieve an 80% redemption rate by 2020 and 90% by 2030. Therefore, the establishment of a substantial reserve fund through the retention of excess container deposit revenues in the initial years may allow the fund to withstand several years of deficits and provide time for needed adjustments to the program.

Maryland Department of the Environment and Comptroller Administrative Expenses

Special fund administrative expenditures for MDE increase by $195,907 in fiscal 2015, which reflects the bill's October 1, 2014 effective date. This estimate reflects the cost for

MDE to hire three natural resource planners and one office secretary specialist to register distributors, license redemption centers, consult with counties, develop regulations, communicate with all affected entities, assist in program development, develop strategies to meet the redemption rate targets and to reduce fraudulent container redemption, and to otherwise implement the bill. It includes salaries, fringe benefits, one-time start-up costs, and ongoing operating expenses.

Positions	3
Salaries and Fringe Benefits	$171,333
Equipment and Other Operating Expenses	24,574
Total FY 2015 MDE Administrative Expenditures	**$195,907**

It is assumed that MDE administrative costs are covered by special funds from the State Recycling Trust Fund until revenues from the Container Recycling Refund Program Fund are available. It is further assumed that the new MDE staff are hired upon the effective date of the bill to initiate preparation for program implementation. For example, within six months of the bill's effective date, distributors must be registered with MDE and counties must have designated all convenience zones. Additionally, it is assumed that counties begin construction and procurement for redemption centers in fiscal 2015.

Future year MDE administrative expenditures reflect full salaries with annual increases and employee turnover as well as annual increases in ongoing operating expenses.

General/special fund administrative expenditures for the Comptroller increase by $40,000 in fiscal 2015 for contractual assistance in initiating the reprogramming of an existing data system. Expenditures increase by $837,358 in fiscal 2016 to complete the reprogramming and to hire one accountant and one revenue specialist to administer the collection and processing of funds; four field auditors to conduct audits of redemption centers; and two revenue examiners and one tax consultant to handle additional hearings and appeals. The estimate includes salaries, fringe benefits, one-time start-up costs, and ongoing operating expenses.

	FY 2015	**FY 2016**
Positions		9
Salary and Fringe Benefits		584,206
Programming Costs	$40,000	200,000
Equipment and Other Operating Expenses	0	53,152
Total Comptroller Administrative Expenditures	**$40,000**	**$837,358**

Future year administrative expenditures for the Comptroller reflect salaries with annual increases and employee turnover as well as annual increases in ongoing operating expenses.

Revenues to the new fund are not available to cover the Comptroller's initial administrative costs, as the Comptroller's duties start prior to the receipt of container deposit revenues. Also, the bill does not establish a priority structure for determining uses of the new fund. Therefore, it is unclear whether the fund can cover the Comptroller's administrative expenses in future years should the fund balance become depleted. To the extent that refunds and handling fees receive first priority, general funds may be needed to cover the Comptroller's costs.

Other Container Recycling Refund Program Expenditures

In addition to the payment of handling fees and refunds to redemption centers, the Container Recycling Refund Program Fund must be used to implement and administer the Statewide Container Recycling Refund Program and to provide funding for State and local recycling centers, recycling equipment, recycling education, and marketing as well as State and local environmental programs. Thus, in addition to the issuance of refunds and handling fee payments and covering administrative expenses for MDE and the Comptroller, any remaining balance in the fund may result in grants to local governments to assist in the development and operation of redemption centers, grants to State agencies to increase recycling rates, and grants or loans to any entity approved by MDE to establish recycling or other environmental programs. For example, under the assumptions discussed above, if the balance of revenues in the fund at the end of fiscal 2016 is made available for grants, then grant expenditures increase by about $27.2 million; if 15% of the balance is retained to serve as a prudent reserve, then grant expenditures may increase by about $23.1 million. Assuming $23.1 million in grants are distributed, general fund interest earning revenues increase by only about $122,500 in fiscal 2016, significantly less than if no grants are made.

Local Fiscal Effect: The bill requires at least one redemption center to be located within each designated convenience zone by January 15, 2016, although the bill does not mandate the number of convenience zones or redemption centers. However, based on the number of redemption centers per capita in other states with beverage container recycling programs, it is likely that between 300 and 500 redemption centers are eventually established. For this analysis, it is assumed that 200 redemption centers are established in fiscal 2015, prior to the program's implementation, and that an additional 30 redemption centers are established each year, such that 350 centers are open by 2020, the year that the State's 80% goal is to be reached. This analysis assumes that 80% of the redemption centers established under the bill are owned and operated by local jurisdictions.

While the estimated capital and operating costs to establish and operate a redemption center varies widely, this estimate assumes that the *average* capital cost to construct a new center, retrofit an existing building, and procure all new equipment needed to operate a center is $125,000, while the *average* annual operating cost per center is

$275,000. Actual costs vary significantly and depend on funding available for each county, any existing infrastructure that may be retrofitted, land availability, leasing or acquisition costs, and decisions regarding building design, staffing levels, and overall redemption center operations, including the use of reverse vending machines.

Under these assumptions, county expenditures increase by $20.0 million statewide in fiscal 2015, by $26.2 million in fiscal 2016, and by more than $60.8 million annually beginning in fiscal 2017. In fiscal 2015 only, this increase in expenditures is not offset by any revenues from the payment of refunds and handling fees. Total estimated expenditures exceed revenues from refunds, handling fees, and grants (assuming 85% of the State Container Recycling Fund balance each year is distributed to local redemption centers) to counties over a five-year period between fiscal 2015 and 2019 by $26.6 million.

This estimate does not account for any increase in revenues from the retention of additional scrap material recovered by local government redemption centers, which is projected to be significant, and upon resale, may offset the projected deficits incurred by local centers under the assumptions discussed above. For example, based on available data from California on the scrap value of containers collected in fiscal 2013, adjusted for the number of containers projected to be sold in Maryland and assuming that the recycling rate is 42.8% currently and increases each year as discussed above, the additional revenues available to local governments range from between $11.5 million in fiscal 2016 to $21.5 million in fiscal 2019.

Small Business Effect: The bill may create a business opportunity for small businesses that establish private redemption centers. However, as noted above, this analysis assumes that a significant majority of redemption centers are owned by local governments, as the handling fee is relatively low. Additionally, small business container recyclers and other businesses engaged in the collection or recycling of beverage containers likely benefit from an increase in the demand for their services. Finally, small business retailers of redeemable beverage containers, as well as bars, restaurants, and other small on-premise sellers subject to the bill may incur additional costs to ensure that deposits are presented on consumer bills or invoices as a separate line item.

Additional Information

Prior Introductions: A similar bill, SB 641 of 2013, received a hearing in the Senate Education, Health, and Environmental Affairs Committee, but no further action was taken. Its cross file, HB 1085, received an unfavorable report from the House Environmental Matters Committee.

Cross File: None.

Information Source(s): Calvert, Frederick, Harford, and Howard counties; Baltimore City; Maryland Department of the Environment; Comptroller's Office; Maryland Association of Counties; Container Recycling Institute; the states of California, Hawaii, Minnesota, and Vermont; Iowa State University; U.S. Environmental Protection Agency; University of Maryland Environmental Finance Center; Department of Legislative Services

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