This bill requires a producer of “synthetic turf” and “turf infill” sold or distributed in the State, and an owner of previously installed synthetic turf and turf infill, to establish a system to track the chain of custody of affected products. The chain of custody information must be transmitted to the Maryland Department of the Environment (MDE). MDE must (1) publish the chain of custody information on its website and (2) develop and maintain a website that includes all chain of custody information it receives as well as other related information. The bill also prohibits the reuse of synthetic turf and turf infill except under specified circumstances.

### Fiscal Summary

**State Effect:** General fund expenditures increase by $45,200 in FY 2022 and by $11,600 in FY 2023 for MDE staff; future years reflect termination of contractual staff in FY 2023. State expenditures (multiple fund types) may increase to track, dispose of, and purchase new synthetic turf and turf infill, as discussed below. State revenues are not affected.

<table>
<thead>
<tr>
<th>(in dollars)</th>
<th>FY 2022</th>
<th>FY 2023</th>
<th>FY 2024</th>
<th>FY 2025</th>
<th>FY 2026</th>
</tr>
</thead>
<tbody>
<tr>
<td>Revenues</td>
<td>$0</td>
<td>$0</td>
<td>$0</td>
<td>$0</td>
<td>$0</td>
</tr>
<tr>
<td>GF Expenditure</td>
<td>45,200</td>
<td>11,600</td>
<td>0</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td>Other Exp.</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>Net Effect</td>
<td>(-)</td>
<td>(-)</td>
<td>(-)</td>
<td>(-)</td>
<td>(-)</td>
</tr>
</tbody>
</table>

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

**Local Effect:** Local expenditures may increase, potentially significantly, to track, dispose of, and purchase new synthetic turf and turf infill, as discussed below. Local revenues are not directly affected. **This bill may impose a mandate on a unit of local government.**

**Small Business Effect:** Potential meaningful.
Analysis

Bill Summary:

Key Definitions

“Synthetic turf” is plastic tufted carpet that (1) is intended to have, or incidentally has, an appearance that mimics grass; (2) functions as a replacement for grass; and (3) is at least 5,000 square feet (ft²) in size. “Turf infill” is material that (1) is poured on top of synthetic turf to hold synthetic turf blades in place; (2) weighs down the synthetic turf so it does not develop wrinkles or buckle; and (3) mimics the impact absorption properties of soil under natural grass. “Turf infill” includes shredded or granulated tire, rubber, or silica sand.

System to Track the Chain of Custody for Synthetic Turf and Turf Infill

By January 1, 2022, each producer of synthetic turf and turf infill sold or distributed in the State must establish a system to track the chain of custody of the synthetic turf and turf infill from their manufacture to their installation, use, reuse, recycling, and final disposal. For synthetic turf and turf infill already installed as of January 1, 2022, the owner of the synthetic turf and turf infill must establish a system to track the chain of custody.

The chain of custody information must be transmitted to MDE in writing and must include specified information relating to the producer, the installer, the owner, and the transporter of the synthetic turf or turf infill.

MDE must publish the chain of custody information on its website. MDE must also develop and maintain a website that includes a copy of all chain of custody information that has been submitted, the names of the producers that provide the chain of custody information, and a list of brands specified in the chain of custody information.

Restrictions on Reuse and Disposal

Synthetic turf and turf infill may not be reused unless the original owner submits a written request to MDE and MDE approves the request.

Current Law: Current law does not specifically address synthetic turf or turf infill. The solid waste infrastructure in Maryland consists of both permitted and nonpermitted facilities, and solid waste is managed through a combination of recycling, composting, landfilling, energy recovery, and exporting for disposal or recycling. Privately and county-owned facilities make up the majority of facilities in the State.
State/Local/Small Business Effect:

Maryland Department of the Environment – Administrative Costs

General fund expenditures for MDE increase by $45,177 in fiscal 2022, which accounts for the bill’s October 1, 2021 effective date. This estimate reflects the cost of hiring one contractual natural resources planner to (1) accept and post required chain of custody information to MDE’s website; (2) conduct outreach to affected producers and owners; (3) review requests from owners to reuse synthetic turf and turf infill; and (4) conduct any necessary compliance and enforcement activities. It includes a salary, fringe benefits, one-time start-up costs, and ongoing operating expenses.

<table>
<thead>
<tr>
<th>Contractual Position</th>
<th>1.0</th>
</tr>
</thead>
<tbody>
<tr>
<td>Salary and Fringe Benefits</td>
<td>$34,765</td>
</tr>
<tr>
<td>Operating Expenses</td>
<td>10,412</td>
</tr>
<tr>
<td><strong>Total FY 2022 MDE Expenditures</strong></td>
<td><strong>$45,177</strong></td>
</tr>
</tbody>
</table>

Future year expenditures reflect termination of the contractual employee in fiscal 2023 after (1) MDE has conducted initial outreach and developed a method to post the required chain of custody information to its website and (2) most affected entities are aware of the bill’s requirements. It is assumed that any ongoing responsibilities after fiscal 2023 can be handled with existing resources. To the extent that existing resources prove insufficient in future years, MDE can request additional resources through the annual budget process.

This estimate does not include any health insurance costs that could be incurred for specified contractual employees under the State’s implementation of the federal Patient Protection and Affordable Care Act.

State Agencies, Local Governments, and Small Businesses as Producers, Consumers, and Owners of Synthetic Turf and Turf Infill

The regulated community is likely broad and includes (1) synthetic turf and turf infill producers; (2) any State or local agencies that own synthetic turf and turf infill fields/spaces (e.g., for schools and parks); and (3) any other entities that own synthetic turf and turf infill fields/spaces. According to the Synthetic Turf Council, the threshold size of affected synthetic turf and turf infill established by the bill (at least 5,000 ft²) likely includes personally owned synthetic turf areas in yards, turfed areas in hotels, and golf putting areas. All of these affected entities must develop a chain of custody for the synthetic turf and turf infill and apply for and obtain MDE approval prior to reusing the materials.

According to the Synthetic Turf Council, a synthetic turf sports field is typically warranted for eight years, but the actual life expectancy of a given field depends on the type and
amount of use of the field as well as field maintenance. For landscape applications, synthetic turf can last significantly longer than eight years. The Synthetic Turf Council also indicates that turf infill can be composed of a wide variety of substances, including crumb rubber, coated rubber infill, polymer elastomers, sand (silica), and organic materials (such as coconut fibers and cork).

Chain of Custody Tracking Requirements: The Department of Legislative Services is not aware of similar chain of custody requirements relating to synthetic turf and turf infill that may exist in other states. The Synthetic Turf Council advises that it is also not aware of any similar requirements in other states. Furthermore, MDE advises that it does not have any information on how in depth or complex the tracking systems established pursuant to the bill might be. Ultimately, the responsibility to develop and maintain the tracking systems falls on owners and producers of synthetic turf and turf infill. Without actual experience under the bill, it is assumed that the bill’s chain of custody tracking requirements primarily have operational effects on affected entities. Because producers and owners must track the products from manufacture to final disposal, and because the products may last several years, efforts to track the products throughout their lifetimes could impose an operational burden on producers and owners.

The extent to which any State or local agencies or small businesses incur any costs due to the chain of custody requirements is unknown; any fiscal effect likely varies by entity, depending on the number of affected fields, available information, the content of the chain of custody documents, and the sophistication of any database necessary to maintain the chain of custody information. Some entities, such as the Department of Natural Resources and the Maryland-National Capital Park and Planning Commission (M-NCPPC), report that they can comply with these requirements using existing resources.

Prohibition on Reuse: The bill prohibits the reuse of synthetic turf or turf infill unless the original owner submits a written request to MDE and MDE approves the written request. If such a request is approved, then this provision has no fiscal effect on the owner of the materials.

If, however, a request to reuse synthetic turf or turf infill is denied, the prohibition may result in additional – or at least accelerated – costs for an owner to (1) dispose of affected materials earlier than they otherwise would have and (2) purchase new products in lieu of reusing existing materials. The ultimate effect of the bill’s prohibition on any given owner depends on several factors, including (1) the synthetic turf and/or turf infill materials that must be disposed of; (2) the amount or size of the materials in question; and (3) when the materials otherwise would have been disposed of and replaced in the absence of the bill. While the effect will vary on a case by case basis, if MDE denies a request for reuse, it is assumed that at least some affected owners could incur potentially significant costs earlier than they otherwise would have, given the costs associated with purchasing and installing
new materials and the fact that some of the materials that are no longer able to be reused may need to be disposed of using special care (including potentially as hazardous waste). While an owner, even in the absence of the bill, will at some point incur costs to dispose of synthetic turf and turf infill and, presumably, costs to purchase new turf/turf infill to replace materials that are no longer useable, if a request for reuse is denied, the bill accelerates that spending.

For example, M-NCPPC, the Prince George’s County Department of Parks and Recreation, and Montgomery Parks estimate that increased costs to dispose of fields could be as high as $150,000 per field if MDE denies a request for reuse and some of the materials need to be disposed of using special care (including potentially as hazardous waste). Montgomery Parks has five fields that are likely affected and the Prince George’s County Department of Parks and Recreation has four. Disposal costs are less to the extent the materials do not have to be handled as hazardous waste. Morgan State University and Calvert County also anticipate increased costs if requests for reuse are denied.

**Additional Information**

**Prior Introductions:** HB 1547 of 2020, a bill with similar provisions, received an unfavorable report from the House Economic Matters Committee. HB 1142 of 2019, also a bill with similar provisions, received a hearing in the House Environment and Transportation Committee but was subsequently withdrawn.

**Designated Cross File:** None.

**Information Source(s):** Calvert and Prince George’s counties; Montgomery Parks; Prince George’s County Department of Parks and Recreation; City of Bowie; Baltimore City Community College; University System of Maryland; Morgan State University; Maryland Department of the Environment; Department of Natural Resources; Montgomery County Public Schools; Maryland-National Capital Park and Planning Commission; Synthetic Turf Council; Department of Legislative Services

**Fiscal Note History:** First Reader - February 18, 2021
Revised - Clarification - February 23, 2021
Revised - Updated Information - February 23, 2021

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