

# North Carolina's Scrap Tire Disposal Program

Prepared for:



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# Scrap Tire Disposal in North Carolina

The goal of North Carolina's scrap tire disposal program is to effectively manage and reduce the environmental and health hazards posed by discarded tires through responsible collection, recycling, and disposal. Established to address the challenges posed by waste tires, this program focuses on the proper collection, recycling, and disposal of scrap tires throughout the state. Led by the Department of Environmental Quality, this initiative implements strategies to prevent illegal dumping, promote tire recycling, and harness the potential of scrap tires in various beneficial applications such as civil engineering projects, playground surfaces, and alternative fuel sources. Through partnerships with stakeholders, tire retailers, and recycling facilities, North Carolina's scrap tire disposal program endeavors to mitigate environmental risks while fostering sustainable practices in waste management.

In North Carolina's scrap tire disposal program, counties play a pivotal role in collecting and properly disposing of scrap tires, often through designated tire recycling centers. North Carolina's counties are tasked with the on-the-ground implementation of tire disposal strategies, working within the framework of state regulations and guidelines established by the Department of Environmental Quality (DEQ). They collaborate with DEQ-approved tire processors, recyclers, and disposal facilities to ensure the safe and environmentally sound handling of scrap tires within their respective jurisdictions. Additionally, counties often engage in public outreach and educational initiatives to raise awareness among residents and businesses about proper tire disposal practices and the benefits of recycling, fostering community participation and environmental stewardship. Through their active involvement, North Carolina's counties contribute significantly to the state's concerted efforts toward effective scrap tire management, promoting sustainable solutions and mitigating potential environmental risks associated with discarded tires. These counties receive reimbursements from the state, incentivizing them to efficiently manage tire disposal while ensuring a cleaner and safer environment.



# Problem Definition

To comprehensively grasp the issue addressed in this report, a robust problem definition is crucial to fully articulate the matter at hand. North Carolina counties are reporting a notable surge in scrap tire disposals and elevated disposal expenses. Coupled with decreased state funding, counties struggle to finance their programs and are compelled to make adjustments in their budgets. This report addresses three research questions: Has there indeed been a dramatic increase in scrap tire disposals, and if so, what is the root cause? Have changes in the program's legislation over the years made it harder for counties to cover their costs? What solutions can be recommended to make tire disposal more affordable for counties?

## Funding Streams

North Carolina's scrap tire disposal program offers two primary channels for counties to secure funding to bolster operational expenses. The initial avenue involves a tax distribution generated from the Scrap Tire Disposal Tax, disbursed by the North Carolina Department of Revenue on a per capita basis. The second option entails applying for cost-over-run grants through the Department of Environmental Quality, designed to complement the remaining operational costs after factoring in the tax distribution. Counties can apply for these grants semi-annually, with one cycle spanning April through September, and the other from October through March. However, recent legislative changes have impacted the amount of available grant funding, resulting in county representatives noting that these grants have not been adequately covering the additional operational costs. Subsequent pages will elucidate these legislative alterations in detail.



# Changes in Tax Allocations

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## **SESSION LAW 1991-221**

1991 was the year the scrap tire disposal program was enacted. The legislation allocated 10% of revenue to the Solid Waste Management Trust Fund (SWMTF), and 90% of revenue went back to counties on a per capita basis.

## **SESSION LAW 1993-548**

In 1993 there were changes in the allocations of revenue, and a new account was created; the Scrap Tire Disposal Account (STDA). The legislation allocated 5% of revenue to the SWMTF, 27% to the STDA, and 68% went back to counties on a per capita basis. 25% of the funds in the STDA are allocated to make grants that the counties can apply for to supplement the cost of operating the program.

## **SESSION LAW 2007-153**

In 2007, there were slight changes made in the legislation that affected the distribution of revenue. The legislation allocated 8% to the SWMTF, 22% to the STDA, and 70% of revenue went back to counties on a per capita basis.

## **SESSION LAW 2013-360**

In 2013, significant changes were made to the distribution of revenue that had a major effect on the program's affordability for counties. 30% of revenue was allocated to the general fund, and \$420,000 of these funds are used to make grants. 70% of revenue goes back to the counties on a per capita basis. The grant funding was changed from a percentage based allocation to a fixed allocation.



# Case Studies

## Purpose

Four counties—Buncombe, Cherokee, Mecklenburg, and Pasquotank—were purposefully selected to partake in an in-depth case study. This selection was made strategically to ensure a robust geographic representation across the state, encompassing varying demographics, socio-economic backgrounds, and regional characteristics. By including these diverse counties, the project aimed to gain comprehensive insights into the program's landscape, taking into account the unique attributes and challenges present in each area.

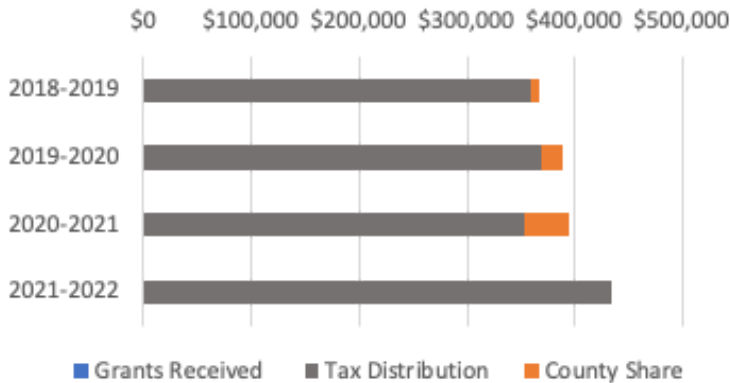
The primary objective of these case studies was to gain a nuanced understanding of the prevailing conditions within the program. Additionally, it sought to facilitate direct engagement with representatives from these counties to discern whether the reported issues were systemic problems affecting the state as a whole or if they were specific challenges stemming from individual county-level program management. This hands-on approach aimed to identify commonalities, differences, and potential solutions that could be tailored to address both overarching issues and county-specific concerns. The intention was to foster a collaborative effort among counties, leveraging shared experiences and innovative strategies to enhance the overall effectiveness of the program across North Carolina.

## Data

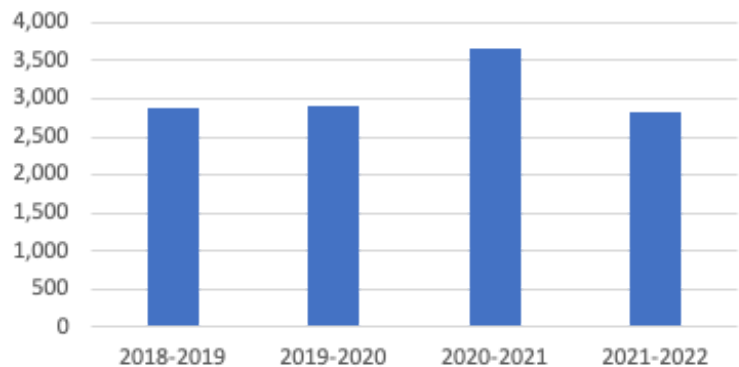
The counties were tasked with providing essential data points concerning scrap tire disposal: the annual tonnage disposed of, disposal costs per fiscal year, and any grants received from the Department of Environmental Quality. Through meticulous data collection, analysis, and review, this process aimed to create a comprehensive overview of county-specific experiences. The goal was to identify potential shortcomings in funding from both the Department of Environmental Quality and the Department of Revenue. This detailed examination not only highlighted funding gaps but also aimed to pinpoint opportunities for refining waste management policies and resource allocation strategies, ultimately striving for more effective scrap tire disposal practices.

# Buncombe County

Cost of Disposal Revenue Streams Per Fiscal Year



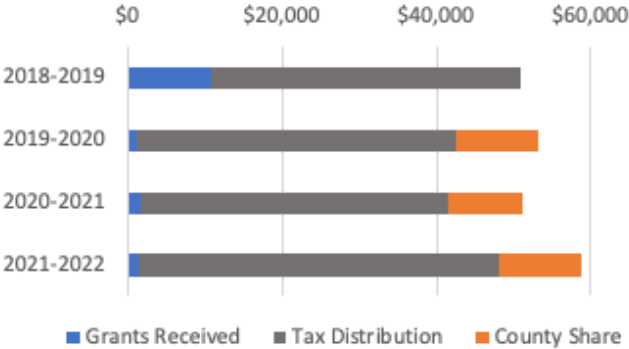
Total Scrap Tire Tonnage- Buncombe



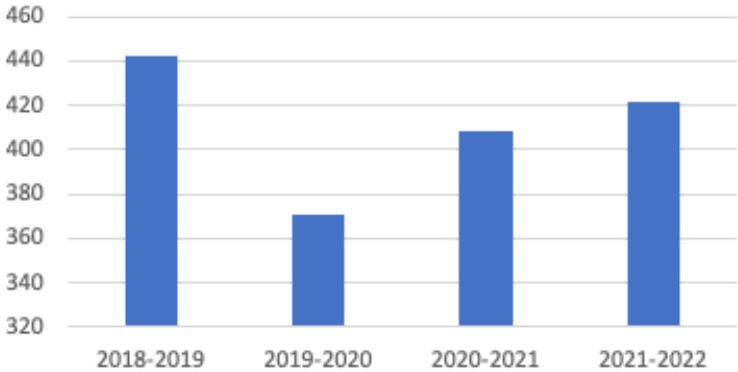
Buncombe County has maintained a relatively consistent scrap tire tonnage disposal rate year over year, with a minor uptick noted in FY 20-21, followed by a return to a stable level in FY 21-22. Notably, Buncombe County's disposal cost data is intriguing due to their ability to sustain the entire program using primarily the tax distribution and a small fraction of the county's budget. This financial efficiency is partly attributed to the county's population size and the substantial tax distribution it receives, enabling effective program operation with minimal reliance on additional funding sources.

# Cherokee County

Cost of Disposal Revenue Streams Per Fiscal Year

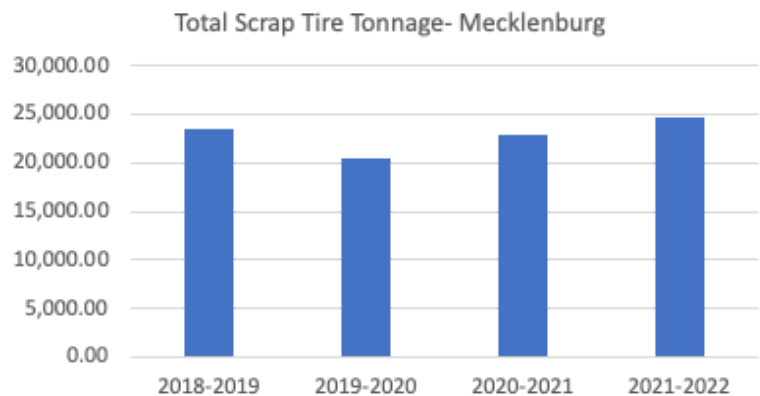
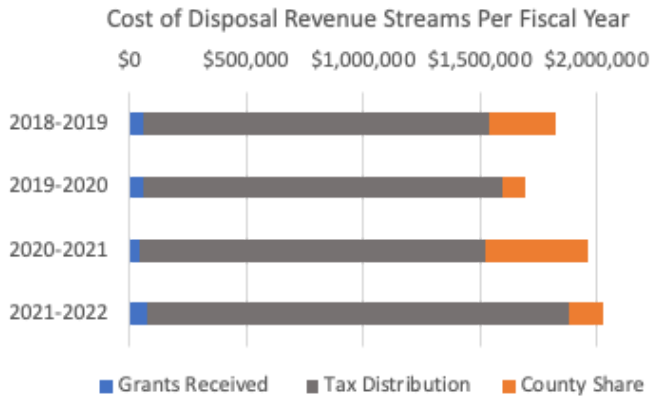


Total Scrap Tire Tonnage- Cherokee



Cherokee County has not experienced a significant increase in the disposal of scrap tire tonnage. Instead, there was a minor decrease in FY 19-20, followed by a return to typical levels in FY 20-21. An analysis of Cherokee County's disposal costs reveals that they have been receiving minimal grant funding, resulting in a substantial need to supplement their budget from the county's funds. In FY 21-11, Cherokee received \$1,320 in grants but had to supplement this amount with \$10,754 from the county budget.

# Mecklenburg County

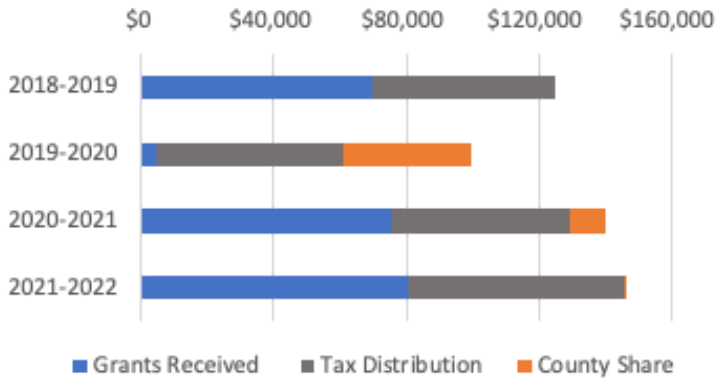


Mecklenburg County's scrap tire disposal tonnage has shown remarkable consistency year after year, with no noticeable increase in disposals. However, a thorough analysis of their disposal costs reveals a concerning trend: despite receiving only a minimal amount of grant funding, they are compelled to substantially supplement these costs from the county's budget. This financial strain is compounded by the fact that Mecklenburg County shares a border with South Carolina. County representatives strongly suspect that a significant number of tires are entering from South Carolina, yet they do not receive reimbursements for these, as the reimbursement system is based on the population within the county rather than the actual number of tires received.

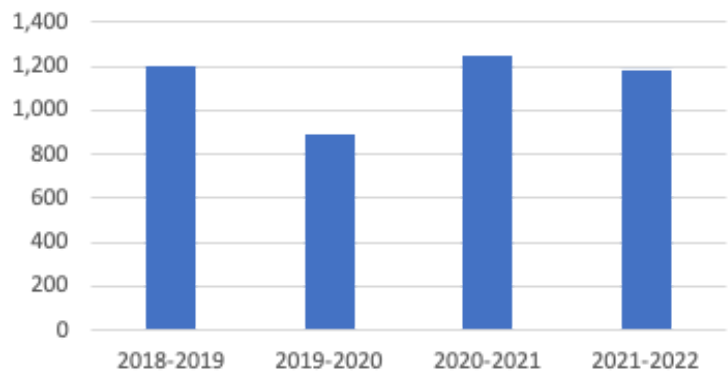


# Pasquotank County

Cost of Disposal Revenue Streams Per Fiscal Year



Total Scrap Tire Tonnage- Pasquotank



Pasquotank County has maintained consistent figures in its annual records, showing no significant increase in scrap tire disposals. Despite receiving a substantial amount of grant funding from the Department of Environmental Quality, the county still finds itself needing to cover expenses with county funds in certain years. It's crucial to highlight that counties incur transportation costs to haul tires from their location to the processing facility. In North Carolina, there exists a primary processing facility situated in Concord. For Pasquotank County, this entails a daunting 600-mile round trip, imposing a substantial financial burden as these transportation expenses aren't covered by funding from the State.

# Case Study Summary



After a thorough examination of the case studies, several conclusions can be drawn concerning the original research questions. These questions aimed to ascertain if there was a significant surge in scrap tire disposals and, if so, to identify the underlying cause. Additionally, the inquiry sought to understand whether legislative changes in the program have made it increasingly challenging for counties to manage their expenses. Furthermore, the research aimed to propose viable solutions to render tire disposal more economically feasible for counties.

It is evident that issues related to funding within the scrap tire disposal program are not universal; instead, they vary significantly from county to county. Numerous nuanced factors impact the funding dynamics on a year-to-year basis, making these challenges individualized and specific to each locality. Despite this, the tonnage of scrap tires disposed of by counties has shown consistency, without a notable increase.

However, the continuous rise in disposal costs due to inflation places an increased financial burden on counties. The fixed allocation of grant funds received from the DEQ fails to adjust with inflation rates, exacerbating the challenge. This stagnant allocation does not align with the escalating costs of disposal, leaving counties to cover more of the disposal expenses themselves.





# Recommendations

After a comprehensive review of the legislative changes implemented throughout the history of the scrap tire disposal program, along with an analysis of case studies and insights from county representatives, it has become evident that several crucial improvements are necessary for the program's enhancement. Among the array of issues, it is imperative to start with a focused approach, addressing the most pressing concern: the financial burden faced by counties in sustaining the program. Primarily, counties struggle to cover the operational costs, aggravated by the insufficiency of grant funding available. Below are three recommendations to increase the affordability of the program for counties.

## **Continuous advocacy for Senate Bill 428, which changes the tax allocation to aid the counties**

- This senate bill proposes that 30% of the net tax proceeds be credited to the Scrap Tire Disposal Account instead of the General Fund

## **Implement New Tire Fees**

- These fees are critical to funding new recycled rubber research and products while also reducing illegal tire dumping
- State governments should enact a fee of at least \$1.50 on all new tires purchased and use the funds generated on recycling and cleanup grant program

## **Impose a tax on the sale of used tires**

- Implementing a tax on used tires would increase the revenue to the Department of Environmental Quality and allow for more funds to be distributed to the counties