

Stormwater Management in North Carolina



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Agenda

- Statewide survey
- Results related to local government interactions with entities that construct, own and maintain BMPs
- Discussion of administration techniques

Public Administration Challenge

- BMPs are an engineering solution
- Decentralized and often on private property
- Public sector responsible for “adequate long-term operation and maintenance”
- We don’t know what the best practices are

Statewide Survey

- All 164 known stormwater systems
- Data from 2006 operations
- 36 percent response rate
 - 70 percent of population
 - 48 percent of land area
- Survey answered the “what” question only

**Survey of Structural Post-Construction
Stormwater BMP Maintenance and Enforcement**

Conducted by the Triangle J Council of Governments and the UNC School of Government

Instructions and Consent

Many NC local governments are managing post-construction stormwater runoff using stormwater best management practices. The purpose of this survey is to document the practices and strategies local governments use in North Carolina to implement, finance, manage, and enforce post-construction, engineered,

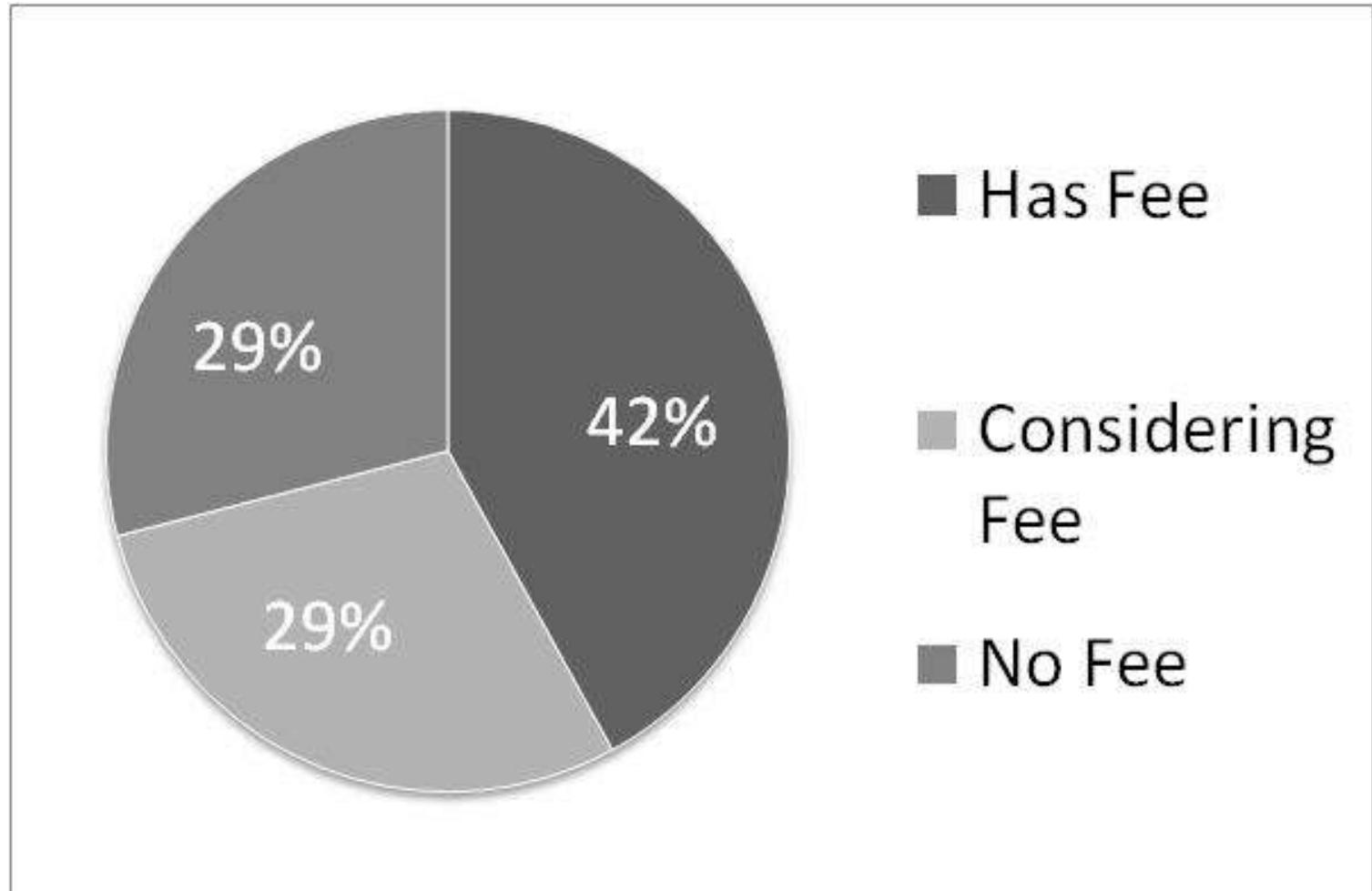
Continuing the Research

- Why have local governments made the choices they have made?
- Is there a public administration “best practice” for stormwater management?

Three Broad Strategies

- Ensuring that the planned BMP is appropriate for the site
- Ensuring that the BMP is correctly built
- Ensuring that the BMP is maintained properly and continues to operate satisfactorily

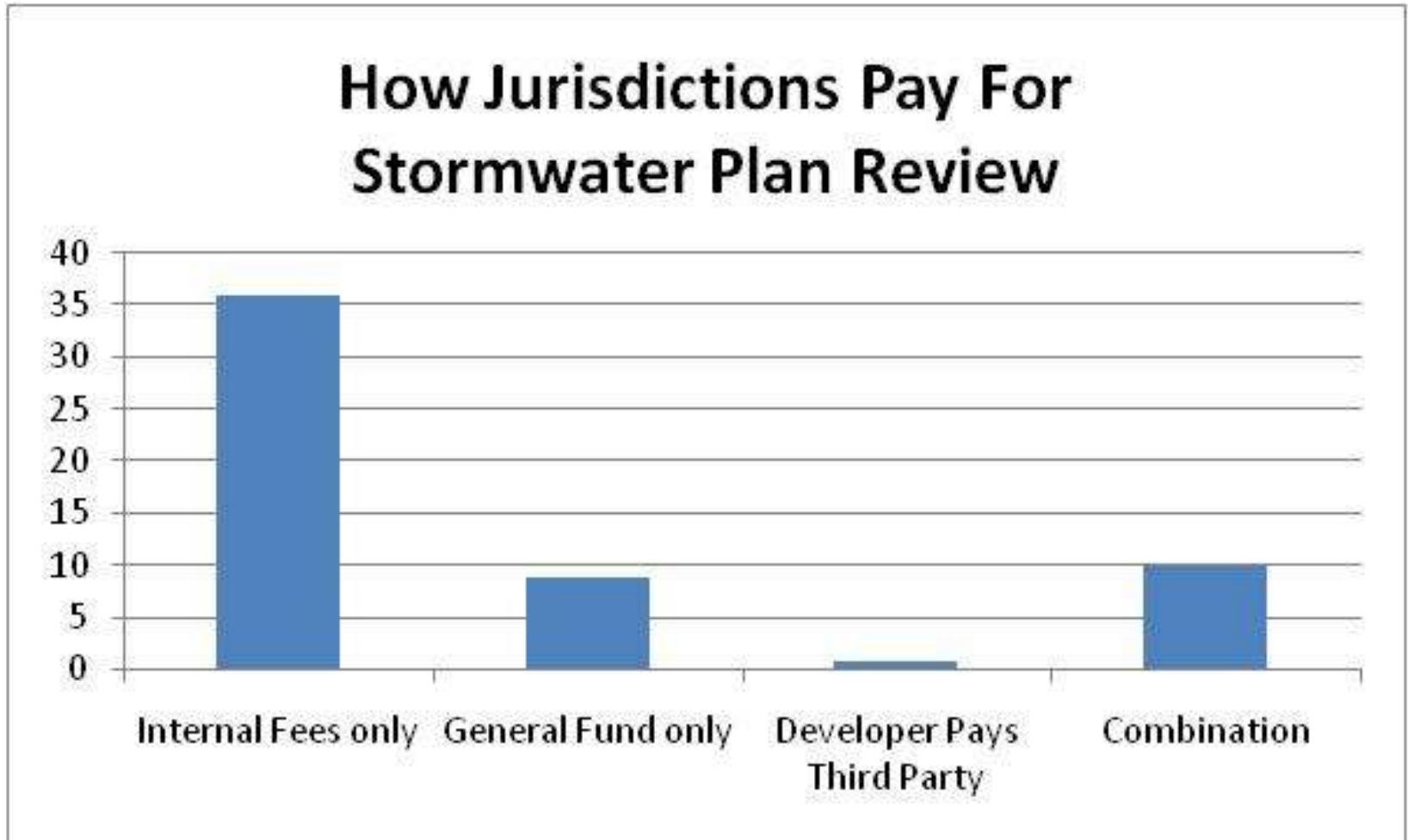
Fee on developed properties



Ensuring that the Planned BMP Is Appropriate for the Site

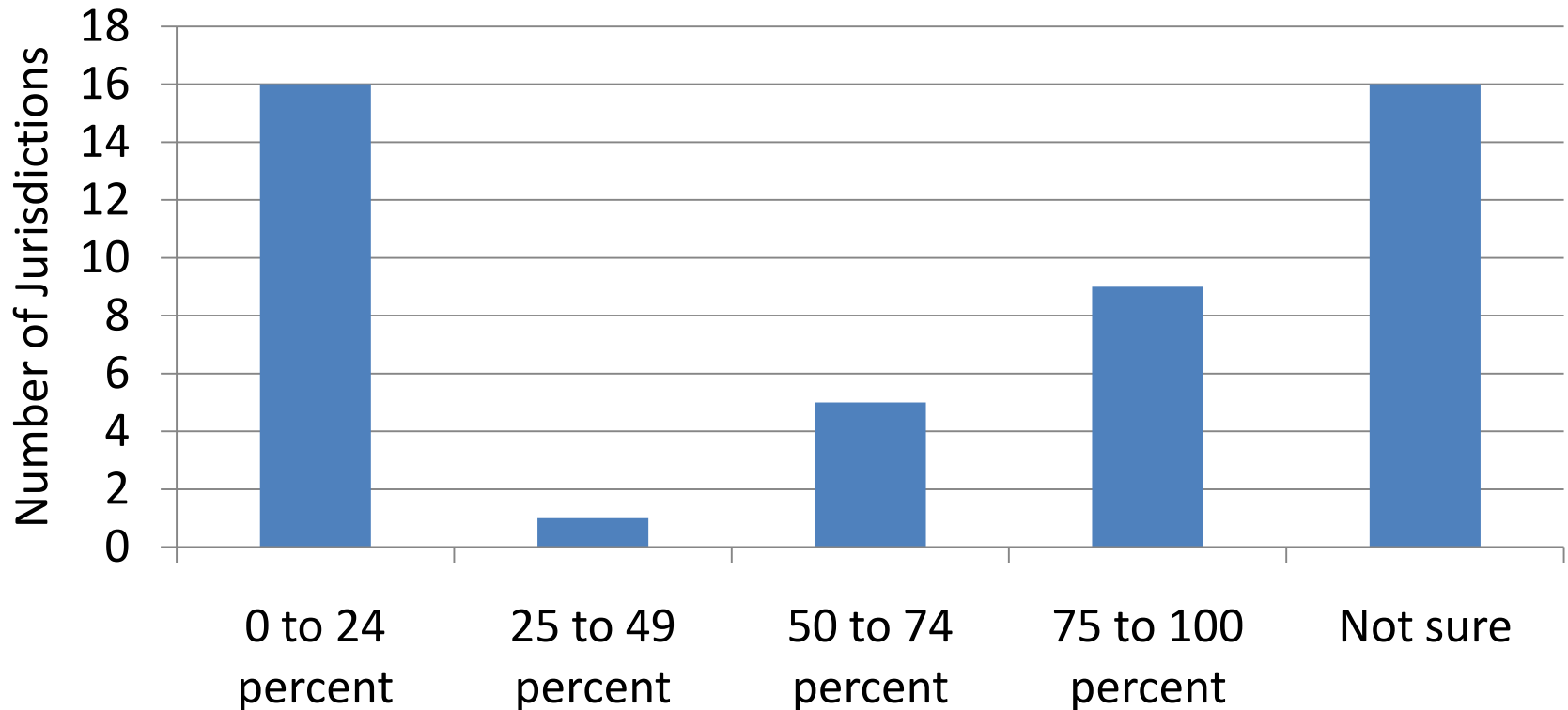
- Stormwater plan from developers (66 percent)
- Approving stormwater BMP designs with site plans (74 percent)
- Issuing a local stormwater permit (38 percent)

How do you pay for ensuring that the Planned BMP Is Appropriate for the Site?



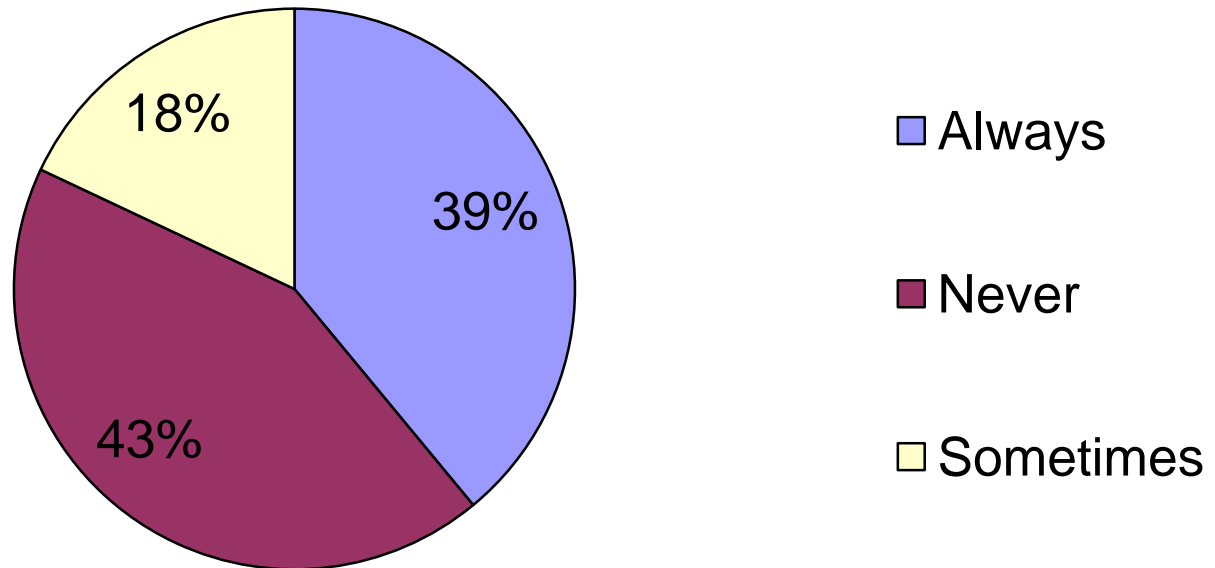
Ensuring that the BMP Is Correctly Built

Percentage of Newly Constructed BMPs That Do Not Comply With Regulations



Ensuring Proper BMP Maintenance and Operation

Percent of Jurisdictions that Require Financial Guarantees

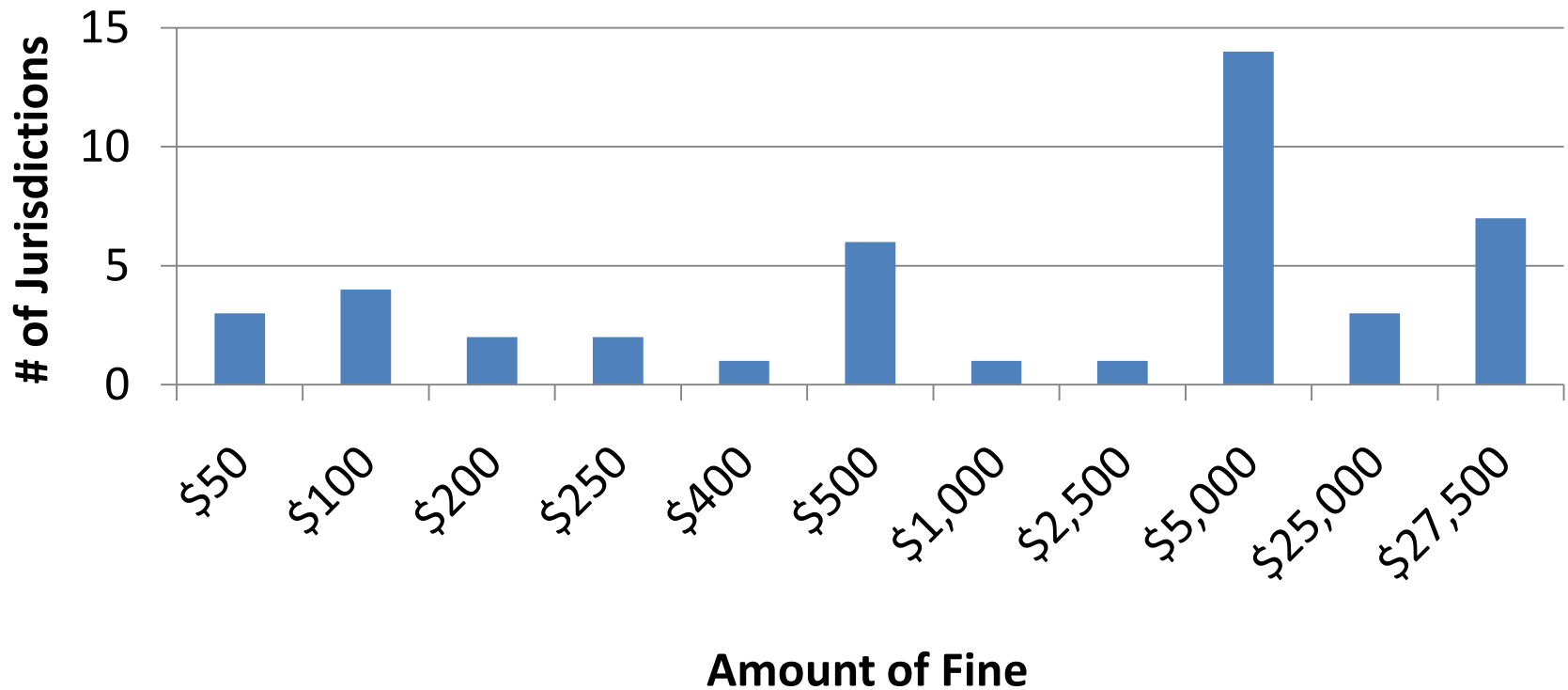


Ensuring Proper BMP Maintenance and Operation

In virtually every jurisdiction we surveyed, landowners are legally responsible for maintaining BMPs on private lands after certificates of occupancy are issued, as well as being responsible for paying for repairs and replacements.

Ensuring Proper BMP Maintenance and Operation

Maximum Fines that Jurisdictions Can Assess Per Day



Ensuring Proper BMP Maintenance and Operation

- Approx. 4,750 BMPs from survey respondents
- In 2006, the total number of fines issued:

Questions?



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The survey results and Glenn's capstone paper on this discussion are available for download on the course page:

<http://www.efc.unc.edu/training/2008/stormwater.htm>