



Meeting with Rutherford County Commissioners



Harvey Gershman, President
Gershman, Brickner & Bratton, Inc.



April 12, 2018
Historic Rutherford County Courthouse



Agenda

- GBB Team Overview
- Solid Waste Feasibility Study
- Notes on a Solid Waste Authority
- Thoughts on an Access Agreement
- Questions from the Commissioners



2



Gershman, Brickner & Bratton, Inc. Quality – Value – Ethics – Results



- Established in 1980
- Solid Waste Management and Technology Consultants
- Helping Clients Turn Problems into Opportunities



3



GBB's Waste Consulting Services

- Economic, technical and environmental reviews
- Procurements
- Due diligence third-party reviews
- Waste characterization and sourcing
- Process planning and conceptual designs
- Independent feasibility consultant



4



Solid Waste Management Planning

**Guam Receivership,
U.S. District Court Receiver**

- New landfill opened on September 1, 2011, \$32M under budget
- Ordot Dump closed on August 31, 2011
- Ordot Dump Environmental Closure on March 26, 2016
- Trash collections which were haphazard and undependable now dependable
- Streamlined operations with 43% reduction in staff; more efficient
- Customer complaints dramatically reduced
- Rolled out new cart based collection system for refuse and recycling
- Administer \$20 million program and 56 employees
- Recycling programs initiated and successful

Metro Nashville & Davidson County

- Solid waste management long-term strategic plan
- Full cost accounting identifying savings
- Rolled out "Curby," new curbside recycling mascot and brand
- Procurements for district energy, transfer & disposal, yard waste & refuse collection and trucks/carts for new curbside recycling program
- Demolition of Nashville Thermal plant
- Long term contracting for disposal saves 65%
- Award-winning District Energy System that operates at high reliability and predictable/reasonable costs



5






Best in Class Team



*National expertise, local presence, complementary skills,
and an understanding of the local
solid waste management landscape.*



6




Harvey Gershman


GBB President
Officer-in-Charge

National-profile thought leader, recipient of SWANA's 2013 Robert L. Lawrence Distinguished Service Award for significant contribution to the solid waste profession

- 40 years of industry experience
- Provides strategic guidance
- Instrumental in major system turnarounds
- Ability to visualize entire system as it is and as it could be
- Led major planning projects:
 - Metro Nashville, TN
 - City of Plano, TX
 - County of Maui, HI
 - City of Baltimore, MD
 - Guam Solid Waste Receiver
 - Solid Waste Authority of Palm Beach County
 - City of Fort Worth, TX
 - San Bernardino County, CA



7



Jeff Postell, P.E.



TriAD Senior Engineer

Has developed and aided in the development of numerous Solid Waste and Hazardous Waste Management Plans, Storm Water Pollution Prevention Plans, Spill Prevention, Control, and Countermeasures Plans, and Phase I Environmental Site Assessments

- 21 years of experience
- For Rutherford County: Project Manager / Senior Engineer for ongoing groundwater and methane monitoring activities at the co-located closed Class I landfill and open Class IV landfill facility.




8




Dave Cooley, CPS

Cooley Public Strategies Principal




40 years of experience in both public and private sectors. Has been a consultant on major economic recruiting/siting projects and has a strong record of success in government procurement

- Has crafted a number of public-private partnerships where projects hinged on innovative financing
- On controversial land use issues, led successful efforts in favor of and in opposition to projects
- As Deputy Governor for former Tennessee Governor Phil Bredesen, was lead strategist for the Administration's agenda and chief political strategist to the governor in projects that crisscrossed the state




9



Other Key Senior Team Members

- Lori Scozzafava – GBB Vice President
Former Deputy Executive Director of Solid Waste Association of North America
- Steve Simmons – GBB Vice President
30 years of renewable energy experience
- Nancy B. Sullivan, P.E. – TriAD Senior Project Manager
Responsible for the preparation of Solid Waste Management Plans serving Metro Nashville and Davidson County
- Kate Vasquez – GBB Senior Consultant
Certified Recycling Systems Manager with more than 16 years experience in public sector systems
- Terry Quillen – Cooley Public Strategies
32-year veteran journalist, news and editorial editor for The Tennessean and its sister national news service; communication specialist
- Martin Penny – Cooley Public Strategies
6 years specializing in community organizing; Master's Degree in Sustainability, currently a PhD candidate




10



SOLID WASTE FEASIBILITY STUDY



11



Staff Working Group

Rutherford County, TN
Jeff Davidson – Deputy Mayor
Mac Nolen – Solid Waste / Landfill Director

City of Murfreesboro
Paul Boyer – City Purchasing Director
Michael Browning – Public Information Officer
Jim Crumley – Assistant City Manager
Joey Smith – Solid Waste Director




12



Solid Waste Feasibility Study Tasks

1. Project Management and Kickoff
2. Workshops with Potential Public Partners
3. Public Input Process
4. Development of a Strategic Plan
5. Implementation Assistance (future)



13




Founding and Staffing of SWAC

- Proposal submitted May 2016; contract awarded August 2016
- SWAC created; workshops held December 2016, February 2017, and February 2018
- Resolutions passed by the SWAC
 - Recommended creation of County-based Solid Waste Authority
 - Recommended granting Republic Services (BFI) access to collect samples at Rutherford County Landfill




14



SWAC Membership

Name	Affiliation
Ernest Burgess, Mayor	Rutherford County
Mike Kusch, County Commissioner	Rutherford County
Lynnisse Roehrich-Patrick, former Executive Director at TACIR	Rutherford County
Dr. Kathy Mathias, Associate Professor, MTSU	Rutherford County
Merry Hickerson, County Highway Department Coordinator	Rutherford County
Shane McFarland, Mayor	City of Murfreesboro
Kirk Wade, City Council Member	City of Murfreesboro
Paul Latture, Chamber of Commerce	City of Murfreesboro
Joe Whitefield, Vice President for Facilities, MTSU	City of Murfreesboro
<i>Jeremy Harrison, All in One Recycling</i>	<i>City of Murfreesboro</i>
Kyle Brown, Assistant City Administrator	City of La Vergne
Garland Russell, Public Works Manager	City of La Vergne
Harry Gill, Town Manager	Town of Smyrna
H.G. Cole, City Council Member	Town of Smyrna
Travis Brown, City Mayor	City of Eagleville



15




Workshop 1 Agenda: 12/12/16

- Introductions (5 min)
- Committee Organization and Bylaws (15 min)
- Purpose of Project (15 min)
- Comprehensive Planning (20 min)
- Current Status (25 min)
- Break (10 min)




16



Workshop 1 Agenda (continued)

- Initial Identification of Future Needs (15 min)
- Technology and Management Options (15 min)
- Public Education and Outreach (10 min)
- Proposed Schedule (5 min)
- Questions, Comments, Answers & Discussion (15 min)



17



SWAC Site Visits

		
Huntsville Solid Waste to Energy Facility Huntsville, AL www.covanta.com/Our-Facilities/Covanta-Huntsville	WastAway Morrison, TN www.wastaway.com/	PHG Energy (now Aries) Lebanon, TN www.protonpower.com



18



SWAC Site Visits



Huntsville




Lebanon



19




Workshop 2 Agenda: 2/27/17

-  Welcome and Project Update (15 min)
-  Analysis of Future Needs (15 min)
-  Technology and Management Options (40 min)
-  Defining Scenarios for Evaluation – Part I (10 min)
-  Break (10 min)




20




Workshop 2 Agenda (continued)

- Organizational Possibilities (20 min)
- Paying for Your System (10 min)
- Defining Scenarios for Evaluation – Part II (30 min)
- Next Steps (10 min)
- Questions, Comments, Answers & Discussion (20 min)




21




Priorities Exercise at Workshop 2

SYSTEM OPTION	RESPONSES
Policy and Program Options	
Source Reduction	14
Education and Outreach	10
Collection	
County Contracted or Franchised Collection for Unincorporated Areas	2
Recycling	
Residential Curbside Recycling in the Cities	16
Residential Curbside Recycling in the County	9
Additional Recycling Centers in the County	6
Organics	
Collection and Composting	9
Collection and Anaerobic Digestion (AD)	2
Transfer Stations	
One or More in Rutherford County	9
Materials Recovery Facility (MRF)	
New MRF in Rutherford County	12
Mixed Waste Processing (MWP)	
New MWP in Rutherford County	9
Landfill Disposal	
Expanding Middle Point Landfill (if possible)	9
New Landfill in Rutherford County	5
Landfill Disposal Out-of-County	9
Waste-to-Energy	
Conventional Waste-to-Energy	12
Advanced Conversion Technologies	9
Other (Please Specify)	0




22



SWAC Survey – Summary

- The management option chosen to address the immediate situation should allow time to develop and implement other elements of a sustainable solid waste system, and to find to provide cost-effective recycling programs and services;
- The County can re-evaluate existing and emerging technologies, such as WTE, when the chosen management option begins to reach capacity, perhaps in about ten years from now;
- SWAC members generally favor disposal outside of the county as opposed to within; and,
- The SWAC members concur that increasing participation in and availability of curbside recycling is an important part of achieving waste reduction goals.



23




Plan Development Activity: Working Group

- Discussing and developing interest with Mayors
- Evaluating Rutherford County Landfill
- Working with Consultants on developing data for the Operations




24



Plan Development Activity: Consultants

- Gathering and processing data regarding the operations options
 - Landfill life
 - Waste generation
 - Costs models
- Discussing term sheets with Republic Services
- Working with Working Group on developing draft Development Plan



GBB
SOLID WASTE
MANAGEMENT
CONSULTANTS

25



Output: Draft Development Plan



Draft -- February 21, 2018


Analysis of Solid Waste Options & Development Plan

Project blog site
www.renewalrutherford.com




GBB
SOLID WASTE
MANAGEMENT
CONSULTANTS

26



Output: Draft Development Plan

- Strategic Planning Project
 - Background
 - Current Solid Waste Management System and Services
 - Workshops
- Organizational Options for Effective Solid Waste System Implementation and Oversight in Rutherford County
 - Why do Solid Waste Systems need Management?
 - What are the Management Options?
 - Organizational Options: Consultant Analysis
- Management Options for the Solid Waste Strategic Plan
 - Proposed Future Solid Waste System Options
 - Option Comparison: Costs, Diversion, Environmental Impact, and Implementation
 - Management Options: Consultant Analysis
- Recommended Development Plan
 - Creating a Solid Waste Authority
 - Working with Metro Nashville and Other Partners
 - Suggested Schedule for Implementation
- Conclusion and Next Steps
 - Prerequisites
 - Timeframe for Action



27



Workshop 3 Agenda: 2/27/18

- Introduction, Review of Agenda, & Project Update (:25)
- Break (:30)
- Review of Organization Options Input (:30)
- Discussion: Preferred Organization (:30)
- Review of System Options Input (:35)
- Discussion: Preferred System (:45)
- Discussion: Action Items (:40)
- Adjourn and Thanks (:05)



28




Organizational Options

No Action/Go it Alone	Interlocal Agreements
Solid Waste Authority	Regional SW Authority




GBB
SOLID WASTE
MANAGEMENT
CONSULTANTS

29



Recommendation of the Consultants

- Having an autonomous authority to be responsible for waste management will remove some of the politics from day-to-day and long-term decision making.
- Debt and assets not on the members' balance sheets
- Flow control from outside the authority and within



GBB
SOLID WASTE
MANAGEMENT
CONSULTANTS

30



Management Options

No Assets,
No Programs


Middle Point
2.0

Max-Flex

Regional
WTE

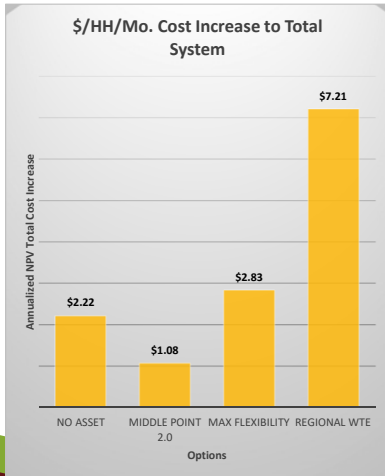


31



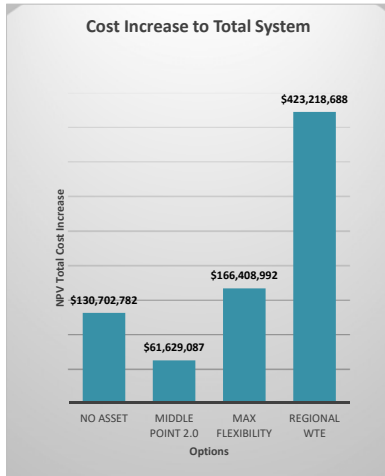
Costs for Each Management Option

\$/HH/Mo. Cost Increase to Total System




Options	Annualized NPV Total Cost Increase
NO ASSET	\$2.22
MIDDLE POINT 2.0	\$1.08
MAX FLEXIBILITY	\$2.83
REGIONAL WTE	\$7.21


Cost Increase to Total System



Options	NPV Total Cost Increase
NO ASSET	\$130,702,782
MIDDLE POINT 2.0	\$61,629,087
MAX FLEXIBILITY	\$166,408,992
REGIONAL WTE	\$423,218,688




32




Recommendations of the Consultants

- Recommend that the SWAC communities, united as a solid waste authority, pursue both Middle Point 2.0 and Max-Flex.
- The options are not mutually exclusive, and even Middle Point 2.0 would eventually close, and the current situation would re-emerge.
- Pursuing both simultaneously strengthens the new authority's position.




33



Development Plan Implementation Schedule

Milestone	Date
Workshop 3	February 27, 2018
SWAC Recommendations	On or before April 1, 2018
Final Development Plan Produced	April 30, 2018
Rutherford County Commission and Murfreesboro City Council Resolutions: (A) Authorizing Authority Formation and Initial Funding (B) Appoint Board of Directors (7 members) (C) Advisor contracting authorized	May, 2018
Form Authority Board (A) Hire staff (B) Retain appropriate advisors	June 2019
Begin Authority Services (A) Evaluate Middle Point 2.0 and Max-Flex (see below) (B) Optional – Procure recyclables collection services for 2021	April 2018 – December 2018 January – September 2020



34




Solid Waste Authority Work Schedule

Middle Point 2.0	Timeframe	Max-Flex	Timeframe
Republic reviewing feasibility of Middle Point 2.0	April – July 2018	Explore costs and feasibility for closing the Rutherford County Landfill and building a Transfer Station on the site Project impacts and complexity of a system of two transfer stations Decision Regarding Transfer Station(s): if yes, proceed	July – December, 2018
Negotiate Republic Agreements (A) Processing and Landfill Agreement (B) Host Community Agreements (C) RC LF Purchase, Closure, Post-closure Agreements	July-December, 2018		
Decision Regarding Middle Point 2.0: if yes, proceed		Initiate Closure of Rutherford County Landfill	January 1, 2019
Negotiations of Municipal Service Agreements	January-June 2019	Initiate Planning and Permitting of Southern Transfer Station"	January 1, 2020
Purchase Rutherford County Landfill	July 1, 2019	Start Construction of Southern Transfer Station	±18 months from start
Start Construction of Middle Point 2.0	July 1, 2019	End Construction of Southern Transfer Station	TBD
End Construction of Middle Point 2.0	March, 2020	Initialize Planning and Permitting of Northern Transfer Station at Middle Point or another site	January 1, 2019
Start Construction of Processing Facility	July 1, 2019		
Initiate Planning and Permitting of Southern Transfer Station"	January 1, 2020		
Start Construction of Southern Transfer Station	±18 months from start		
End Construction of Southern Transfer Station	TBD; depending on when Middle Point closes		




35




SWAC Discussion and Resolutions


- The SWAC resolved to recommend that a Rutherford County solid waste authority be formed to determine, plan for, and implement the best way to handle garbage, trash, and recyclables in the future.
 - Informally, the SWAC recommended that the recycling and waste reduction should be an important part of the mission for the authority.
 - The motion noted that an authority would let knowledgeable professionals who are removed from politics make the best decisions for the County as a whole.
 - The discussion by the SWAC members identified the consideration and possible negotiation of extending Middle Point Landfill as a good example of work an authority might handle.
- The SWAC resolved to recommend that Rutherford County allow Republic Services to conduct initial site investigations at the Rutherford County Landfill regarding the engineering project.
 - The intention was to “keep momentum going.”
 - The motion included the reasoning that having more information could only help the decision-making, and resolving to allow the drilling did not constitute decision-making either way.




36



ABOUT A COUNTY SOLID WASTE AUTHORITY




37



County Solid Waste Authority

Benefits	Challenges
Does not burden elected officials with solid waste decisions	Overcoming inertia to set up and fund a new authority
Independent revenue, debt and expenses	Administrative staff needed
Provides services on behalf of its member communities	Change from current practice
Potential for economies of scale	Offices needed (could co-locate within County and/or municipal offices)
Negotiated pricing	Public perception of new fees or taxes
Solid waste system costs could be isolated from the County's budget	



38



Suggestions for the Authority

Mission & Vision


- Mission: To provide solid waste management planning and services to the members of the Authority and protect the environmental resources of Rutherford County
- Ambition/vision: to meet and exceed the solid waste goals of the Tennessee State Solid Waste Management Plan on a local level

Organizational Values

- Environmental Conservation
- Excellent Service to Residents and Businesses
- Safe and Secure Solid Waste Capacity Planning
- Dedication to Quality of Life



39




Suggestions for the Authority

Per Tennessee Law

- The name must be inclusive of the County and all political subdivisions.
- These names identify with the county beyond political boundaries, and to calling it a “material management authority” to reflects an integrated approach

Possible Names


- Stones River Material Management Authority
- Cedar Glade Material Management Authority
- Highland Rim Material Management Authority



40

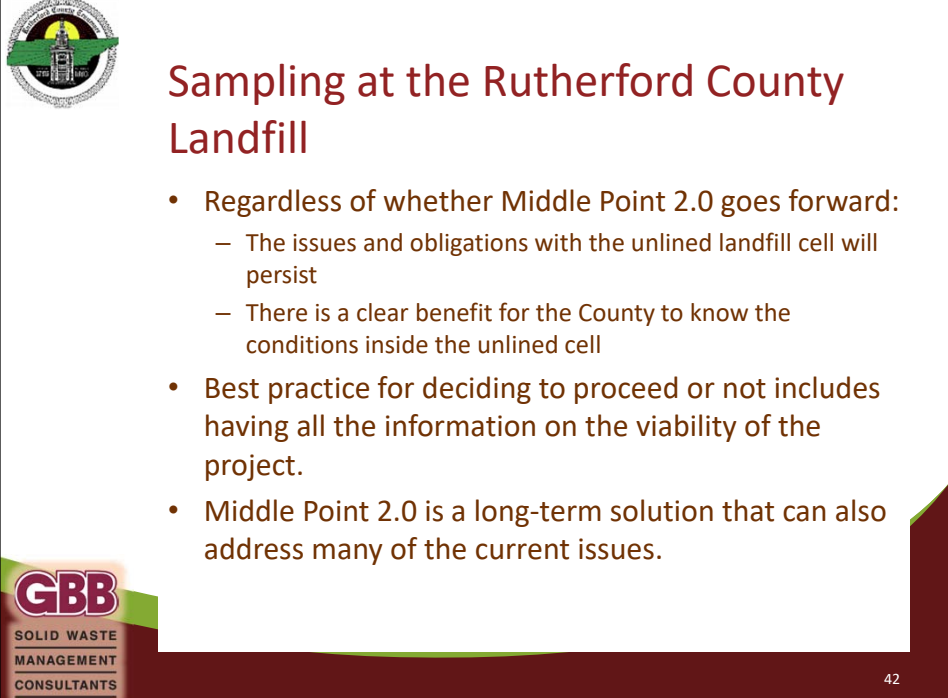



ABOUT SAMPLING AT THE RUTHERFORD COUNTY LANDFILL




GBB
SOLID WASTE
MANAGEMENT
CONSULTANTS

41




Sampling at the Rutherford County Landfill

- Regardless of whether Middle Point 2.0 goes forward:
 - The issues and obligations with the unlined landfill cell will persist
 - There is a clear benefit for the County to know the conditions inside the unlined cell
- Best practice for deciding to proceed or not includes having all the information on the viability of the project.
- Middle Point 2.0 is a long-term solution that can also address many of the current issues.




GBB
SOLID WASTE
MANAGEMENT
CONSULTANTS

42



Creation of a Citizen Community Committee

- Many communities create a local committee to participate in decision-making regarding a landfill, both during activity and after closure.
- Members would include local residents, perhaps joined by county staff, one or more elected officials, and subject matter experts.
- While the committee is not charged with governmental powers, its deliberations and input are considered greatly.



GBB
SOLID WASTE
MANAGEMENT
CONSULTANTS

43



QUESTIONS AND DISCUSSION



GBB
SOLID WASTE
MANAGEMENT
CONSULTANTS

44



Thank you!



45