



# Board of Directors Meeting

July 25, 2023

2:00pm



## BOARD OF DIRECTORS

### Regular Meeting of the Board of Directors of the Rivanna Solid Waste Authority

**DATE:** July 25, 2023

**LOCATION:** Conference Room, Administration Building  
695 Moores Creek Lane, Charlottesville, VA

**TIME:** 2:00 p.m.

### AGENDA

1. **CALL TO ORDER**
2. **AGENDA APPROVAL**
3. **MINUTES OF PREVIOUS BOARD MEETING ON MAY 23, 2023**  
**MINUTES OF SPECIAL BOARD MEETING ON JUNE 22, 2023**
4. **RECOGNITION**  
*Resolution of Appreciation for Mr. Michael Rogers*
5. **EXECUTIVE DIRECTOR'S REPORT**
6. **ITEMS FROM THE PUBLIC**  
*Matters Not Listed for Public Hearing on the Agenda*
7. **RESPONSES TO PUBLIC COMMENTS**
8. **CONSENT AGENDA**
  - a. *Staff Report on Finance*
  - b. *Staff Report on Ivy Material Utilization Center/Recycling Operations Update*
  - c. *Approval of Resolution to Adopt the 2023 TJPDC Regional Natural Hazard Mitigation Plan.*
9. **OTHER BUSINESS**

*(Motion and vote to Recess the RSWA Board Meeting)*

*(Motion and vote to Reconvene the RSWA in a Joint Session with the RWSA)*

- a. Presentation: Strategic Plan Update  
Deborah Anama, Executive Assistant*

**10. OTHER ITEMS FROM BOARD/STAFF NOT ON THE AGENDA**

**11. CLOSED MEETING - SECURITY UPDATE and PERSONNEL REVIEW**

*(Motion, second and roll call vote to enter into a joint closed session to discuss confidential information related to cybersecurity and the security of the authorities' physical premises as permitted by the public safety exemptions at Section 2.2-3711-A(19) of the Code of Virginia and confidential performance evaluations, goals and objectives of specific personnel as permitted by the personnel exemption at Section 2.2-3711-A(1) of the Code of Virginia).*

*Motion:*

*I move that the Rivanna Solid Waste Authority enter into a joint closed session with the Rivanna Water & Sewer Authority to discuss confidential information related to cybersecurity and the security of the authorities' physical premises as permitted by the public safety exemptions at Section 2.2-3711-A(19) of the Code of Virginia and confidential performance evaluations, goals and objectives of specific personnel as permitted by the personnel exemption at Section 2.2-3711-A(1) of the Code of Virginia.*

*(Motion, second and roll call vote to certify the closed session)*

*Motion:*

*The Rivanna Solid Waste Authority hereby certifies by recorded vote that, to the best of each member's knowledge, only public business matters lawfully exempted from the open meeting requirements of the Virginia Freedom of Information Act and identified in the motion authorizing the closed meeting were heard, discussed or considered in the closed meeting to which this certification resolution applies.*

*(Complete and close the RWSA meeting, then complete and close the RSWA meeting)*

**12. ADJOURNMENT**

## GUIDELINES FOR PUBLIC COMMENT AT RIVANNA BOARD OF DIRECTORS MEETINGS

If you wish to address the Rivanna Board of Directors during the time allocated for public comment, please raise your hand or stand when the Chairman asks for public comments.

Members of the public requesting to speak will be recognized during the specific time designated on the meeting agenda for “Items From The Public, Matters Not Listed for Public Hearing on the Agenda.” Each person will be allowed to speak for up to three minutes. When two or more individuals are present from the same group, it is recommended that the group designate a spokesperson to present its comments to the Board and the designated speaker can ask other members of the group to be recognized by raising their hand or standing. Each spokesperson for a group will be allowed to speak for up to five minutes.

During public hearings, the Board will attempt to hear all members of the public who wish to speak on a subject, but it must be recognized that on rare occasion comments may have to be limited because of time constraints. If a previous speaker has articulated your position, it is recommended that you not fully repeat the comments and instead advise the Board of your agreement. The time allocated for speakers at public hearings are the same as for regular Board meetings, although the Board can allow exceptions at its discretion.

Speakers should keep in mind that Board of Directors meetings are formal proceedings and all comments are recorded on tape. For that reason, speakers are requested to speak from the podium and wait to be recognized by the Chairman. In order to give all speakers proper respect and courtesy, the Board requests that speakers follow the following guidelines:

- Wait at your seat until recognized by the Chairman.
- Come forward and state your full name and address and your organizational affiliation if speaking for a group;
- Address your comments to the Board as a whole;
- State your position clearly and succinctly and give facts and data to support your position;
- Summarize your key points and provide the Board with a written statement, or supporting rationale, when possible;
- If you represent a group, you may ask others at the meeting to be recognized by raising their hand or standing;
- Be respectful and civil in all interactions at Board meetings;
- The Board may ask speakers questions or seek clarification, but recognize that Board meetings are not a forum for public debate; Board Members will not recognize comments made from the audience and ask that members of the audience not interrupt the comments of speakers and remain silent while others are speaking so that other members in the audience can hear the speaker;
- The Board will have the opportunity to address public comments after the public comment session has been closed;
- At the request of the Chairman, the Executive Director may address public comments after the session has been closed as well; and
- As appropriate, staff will research questions by the public and respond through a report back to the Board at the next regular meeting of the full Board. It is suggested that citizens who have questions for the Board or staff submit those questions in advance of the meeting to permit the opportunity for some research before the meeting.

The agendas of Board meetings, and supporting materials, are available from the RWSA/RSWA Administration office upon request or can be viewed on the Rivanna website.

Rev. September 7, 2022



1  
2  
3 **RSWA BOARD OF DIRECTORS**  
4 **Minutes of Regular Meeting**  
5 **May 23, 2023**

6 A regular meeting of the Rivanna Solid Waste Authority (RSWA) Board of Directors was held  
7 on Tuesday, May 23, 2023, at 2:00 p.m. in the 2<sup>nd</sup> floor conference room, Administration  
8 Building, 695 Moores Creek Lane, Charlottesville, Virginia.  
9

10 **Board Members Present:** Mike Gaffney, Michael Rogers, Brian Pinkston, Jim Andrews, Stacey  
11 Smalls, Lance Stewart.

12  
13 **Board Members Absent:** Jeff Richardson.

14  
15 **Rivanna Staff Present:** Bill Mawyer, Phil McKalips, Lonnie Wood, Jennifer Whitaker,  
16 Deborah Anama, Jacob Woodson, Katie McIlwee, Betsy Nemeth, Santino Granato.

17  
18 **Attorney(s) Present:** Carrie Stanton.  
19

20 ***1. CALL TO ORDER***

21 Mr. Gaffney convened the May 23, 2023 regular meeting of the Board of Directors of the Rivanna  
22 Solid Waste Authority at 2:00 p.m.  
23

24 ***2. AGENDA APPROVAL***

25 There were no comments on, changes to, or questions regarding the agenda.  
26

27 **Mr. Pinkston moved that the Board adopt the agenda as presented. The motion was seconded**  
28 **by Mr. Rogers, and passed unanimously (6-0).**  
29

30 ***3. MINUTES OF PREVIOUS BOARD MEETING ON MARCH 28, 2023***

31  
32 **Mr. Pinkston moved that the Board approve the minutes of the March 28, 2023 meeting. The**  
33 **motion was seconded by Mr. Andrews and passed unanimously (6-0).**  
34

35 ***4. RECOGNITIONS***

36 There were no recognitions.  
37

38 ***5. EXECUTIVE DIRECTOR'S REPORT***

39 Mr. Mawyer stated that the Richmond Times-Dispatch reported that the State Corporation  
40 Commission approved a package of solar projects, and one of them was the RSWA's. He said that  
41 they anticipated that the project would be completed by next calendar year at the Ivy MUC. He said  
42 that another construction project, the Southern Albemarle Convenience Center, continued to move  
43 forward, and they hoped to have a grand opening on June 22, 2023. He said that they would be  
44 doing an evaluation later this week to see what the progress was with the contractor, then would  
45 make an announcement of the grand opening.  
46

47 ***6. ITEMS FROM THE PUBLIC***

48 There were no items from the public.

49

## 50 **7. RESPONSES TO PUBLIC COMMENTS**

51 There were no items from the public, so there were no responses.

52

## 53 **8. CONSENT AGENDA**

54 a. *Staff Report on Finance*

55 b. *Staff Report on Ivy Material Utilization Center/Recycling Operations Update*

56 c. *Approval of Fiscal Year 2023-2024 Pay Scale Adjustment, Restructuring and Regrading*

57 d. *Approval of Engineering Services – Baling Facility, Ivy MUC – TRC Companies*

58 e. *Approval of Engineering Services for FY 2024 Environmental Monitoring at the Ivy*  
59 *MUC-TRC Companies*

60 f. *Approval of Contract for Municipal Solid Waste Transportation and Disposal, Ivy*  
61 *MUC-BFI*

62 g. *Approval of Contract for FY 2024 Vegetative Waste Grinding – Royal Oak Farm, LLC*

63 h. *Approval of Fiscal Year 2023 – 2024 Personnel Management Plan Update*

64

65 **Mr. Smalls moved that the Board approve the Consent Agenda. The motion was seconded by**  
66 **Mr. Pinkston and passed unanimously (6-0).**

67

## 68 **9. OTHER BUSINESS**

69 a. *Presentation, Public Hearing, and Vote to Consider Approval of the Resolution to*  
70 *Adopt the FY 2023-2024 Rate Schedule, and Approval of the FY 2023-2024 Budget*

71

72 Mr. Mawyer said that today would be a brief review of the proposed rate schedule and budget  
73 followed by a public hearing and vote to consider approval. He said that the budget was guided by  
74 the priorities of the 2023-2028 Strategic Plan and totaled \$7.9M in expenses, with \$4.37M in  
75 revenues, for a net budget deficit of \$3.57M, or a 7.9% increase from last year's operating deficit.  
76 He said that by virtue of the agreements in place between the City, UVA, and the County, they  
77 allocated the deficit in the amounts of \$2.9M to the County, \$594,032 to the City, and \$79,982 to  
78 UVA.

79

80 Mr. Mawyer said that they looked forward to operating the Southern Albemarle Convenience  
81 Center. He said that they would soon have complete design of the new baling facility at the Ivy  
82 MUC, as well as installation of solar panels on 17 acres at the landfill by Dominion Energy. He said  
83 that they continued to manage the free mulch program, which currently was out of mulch but would  
84 be making more soon. He said that for the FY 2024 budget, 49% of the budget or \$3.86M, was the  
85 cost of the Ivy Transfer program.

86

87 Mr. Mawyer said that environmental services, which included groundwater treatment, gas  
88 remediation, household hazardous waste, e-waste, and paint disposal, comprised 16% or \$1.2M of  
89 the budget. He said that Ivy operations, which included the vegetative debris and mulch program,  
90 furniture recycling, tires, and clean fill program, were 14% of the budget or \$1.13M. He said that  
91 recycling was 12% of the budget or \$912,119, and the convenience centers at Ivy and Southern  
92 Albemarle were 9% or \$730,706.

93

94 Mr. Mawyer said that strategic investments were being made in the RSWA workforce, with a 6%  
95 cost of living adjustment plus a 2% merit pool for eligible employees. He said that the Authority  
96 would continue to absorb health insurance premiums if they went up, and they had proposed two  
97 additional positions for operator attendants at the Ivy MUC transfer station. He said in FY23, the

98 Board approved three positions for the Southern Albemarle Convenience Center, which were  
99 funded for half of FY 23, and the second half was an effective increase in the budget for FY 24 for a  
100 full year.

101  
102 Mr. Mawyer said that they also had operations and maintenance expenses including vehicle and  
103 equipment maintenance, fuel, and wood grinding costs, as well as transfer of refuse and hauler  
104 increases. He noted that the hauler increase was presented as \$90,000 but would actually be  
105 \$125,000 per the update received from the hauler. He said that information technology and  
106 administration continued to be a growing component of the Solid Waste budget, and all positions  
107 were jointly shared by the RWSA and RSWA. He said that infrastructure investments for buildings  
108 and equipment depreciation were included as part of their operating expenses.

109  
110 Mr. Mawyer said that central staff (Human Resources, Finance, Information Technology,  
111 Administration.) were allocated to Solid Waste and to Water and Sewer. The total number of FTE  
112 positions in Water and Sewer allocated by expense to the Solid Waste Authority was 5.4 positions.  
113 He said that the number of RSWA employees had varied in the last 18 years, beginning with 21  
114 employees in 2007, a low of nine employees in the mid-2010s, but now was up to 26.5 employees.  
115 He said that this was due to the support of the City and County in approving their programs and  
116 their dedication to the transfer operation and recycling programs that were expanding at the  
117 convenience centers.

118  
119 Mr. Gaffney opened the public hearing for the proposed FY 2023-2024 Rate Schedule and FY  
120 2023-2024 Budget. He asked speakers to identify themselves and to be mindful of the three-minute  
121 time limit.

122  
123 Seeing no speakers, Mr. Gaffney closed the public hearing.

124  
125 **Mr. Rogers moved that the Board approve the FY 2023-2024 Rate Schedule and FY 2023-**  
126 **2024 Budget. The motion was seconded by Mr. Andrews and passed unanimously (6-0).**

127  
128 *b. Presentation: Review of Special Collection Events*

129  
130 Mr. Phil McKalips, Director of Solid Waste, said that the special collection events were run twice  
131 per year. He said that the household hazardous waste (HHW), furniture/mattresses, appliances, and  
132 tires had been collected since the year 2000, with HHW beginning in 1999. He said that e-waste  
133 was regularly collected beginning in 2019, with periodic events held throughout the late 1990s and  
134 early 2000s. He said that they recently brought online a very small quantity generator program.

135  
136 Mr. McKalips said that household hazardous waste was a federal designation that was set up to  
137 allow the general public a mechanism to dispose of household hazardous waste that had no other  
138 mechanism of disposal, so the legislation allowed this for residents. He said that RSWA had offered  
139 these events twice a year since 2000. He said that since August 2016, paint had been accepted every  
140 day at the Ivy MUC. He said that the HHW costs were \$30,000 to \$50,000 per event, and the paint  
141 disposal costs were \$20,000 per year.

142  
143 Mr. McKalips said that they averaged about 500 customers per day and disposed of about 20 tons of  
144 hazardous waste from each event, which was meaningful diversion from the landfill. He said that  
145 they used a contractor company to do this, who brought people, equipment, boxes, and the  
146 knowledge of how to consolidate these materials so they could be hauled away. He said that where

147 possible, the materials were recycled for energy use, the paint sometimes was reconstituted back  
148 into paint for sale, and the others were stabilized or disposed of to limit environmental hazards.

149  
150 Mr. McKalips said that they had collected furniture and mattresses since 1999, which according to  
151 Board reports was begun partially to curb the amount of mattresses appearing in rural parts of the  
152 County. He said that both the City and the County supported these events by paying the disposal  
153 costs proportioned through customer counts. He said that these materials are charged to the City and  
154 County at the transfer station tipping fee, which would be \$54 per ton on July 1. He said that they  
155 did not know the reason for trends in furniture drop offs, but they averaged about 150 to 200  
156 customers per event and collected about 10 to 15 tons of material that was disposed of in the  
157 landfill.

158  
159 Mr. McKalips said that the appliance collection events began in the late 1990s with the purpose of  
160 diverting the materials from landfills, to increase recycling, and to minimize illegal dumping. He  
161 said that both the City and County supported the appliance events by paying charges proportionally  
162 based on customer counts. He said that events averaged 150 to 200 customers and approximately 15  
163 tons of waste collected. He said that starting July 1, 2023, the disposal fee would be reduced to the  
164 MSW disposal fee of \$54 per ton plus Freon recovery. He said that where possible, these materials  
165 were recycled.

166  
167 Mr. McKalips said that tire collection events began in the late 1990s. He said that whole tires could  
168 not be landfilled and became a disposal problem and a common item for illegal dumping. He said  
169 that both the City and County supported this program by paying charges proportionally based on  
170 customer counts. He said that tires were transported to Emanuel Tire in Appomattox, Virginia, and  
171 Emanuel Tire charged \$150 per ton and used the tires for playground surface material, rubber  
172 matting, and energy production. He said that there had been a general increase in the amount of tires  
173 collected over the years, but still varied per event. He said that they recently had been getting about  
174 75 tons per event and 100 to 175 customers per event.

175  
176 Mr. McKalips said that the e-waste events began more recently with the purpose of diverting “high-  
177 tech” electronics such as computers, cell phones, and stereo equipment from landfills so that  
178 hazardous chemicals and minerals can be recovered. He said that efforts were made to recover or  
179 recycle as much of the material in the wastes as possible . He said that from 2019 to 2023, the  
180 amount of e-waste collected had doubled during the two semiannual events. He said that there was  
181 strong customer support for the programs, and some interest had been expressed in including  
182 additional days in the year. He said that the cost per event was between \$14,000 and \$17,000.

183  
184 Mr. McKalips said that the very small quantity generator (VSQG) events allowed businesses the  
185 opportunity to dispose of business hazardous waste, including fluorescent light bulbs, batteries,  
186 aerosol cans, cleaning agents, solvents, acids, and bases. He said that businesses could not utilize the  
187 household hazardous waste exemption, and RSWA offered access to the same household hazardous  
188 waste contractor so that businesses could save on mobilization and shipping costs of hiring their  
189 own contractor.

190  
191 Mr. McKalips said that businesses paid their own disposal costs directly to the contractor, so the  
192 program cost the Authority \$0 per year. He said that three or four companies used the program each  
193 year, but for those interested in managing their waste most appropriately, it was a valuable program.  
194 He stated that the total cost of all special collection programs was \$150,000 per year, with \$30,000  
195 allocated to the City and \$120,000 to the County.

196



197 Mr. Andrews asked if springtime saw more tonnage than other times of the year due to people  
198 getting rid of belongings as part of spring cleaning.

199  
200 Mr. McKalips said that there had been some inexplicable fluctuations in tonnage, and he was  
201 unaware if seasonal changes were a part of what was driving the recent trends.

202  
203 Mr. Andrews said that it would be worth looking into why some days fared differently than others.

204  
205 Mr. McKalips said that more questions could be asked of the customers to understand why.

206  
207 Mr. Mawyer said that they tried to keep the collection dates strategically away from other  
208 community events to ensure the community members had an opportunity to use the program. He  
209 said that they would have to look at the spring and fall events in comparison to see if there was a  
210 spring-cleaning phenomenon.

211  
212 *(Motion and vote to Recess the RSWA Board Meeting)*

213  
214 **Mr. Pinkston moved to Recess the RSWA Board meeting. The motion was seconded by Mr.**  
215 **Andrews and passed unanimously (6-0).**

216  
217 *(Motion and vote to Reconvene the RSWA in a Joint Session with the RWSA)*

218  
219 **Mr. Andrews moved to Reconvene the RSWA in a Joint Session with the RWSA. The motion**  
220 **was seconded by Mr. Pinkston and passed unanimously (6-0).**

221  
222 *(Joint Session with the RWSA)*

223  
224 *a. Presentation: Asset Management Program Update*  
225 *Katie McIlwee, Asset Management Coordinator*

226  
227 Ms. Katie McIlwee, Asset Management Coordinator, stated that the Strategic Plan guided all of  
228 the Authority projects, and the Asset Management Project was no different, and that this project  
229 falls under the goals of the Planning and Infrastructure team. She stated that the Asset  
230 Management Policy linked to the Strategic Plan to aid in setting goals for asset investment and  
231 development. She stated that asset management was a long-term program to attain and sustain  
232 the chosen level of service for the life of an asset in the most cost-effective manner. She stated  
233 there was a framework of five core questions, developed by the EPA that aids in the  
234 development of a comprehensive asset management program. She stated the questions helped to  
235 determine the current state of assets, required level of service, business risks, best  
236 operations/maintenance practices and CIP investment strategies, and the best long-term funding  
237 strategy.

238  
239 Ms. McIlwee stated that the Authorities had approximately \$320M in total assets, which  
240 included horizontal and vertical assets. She stated that horizontal assets mainly encompass  
241 underground assets, such as manholes, water and sewer lines, system valves, and other related  
242 devices. She stated that there were approximately 764 horizontal wastewater assets and  
243 approximately 1,644 horizontal water assets. She stated that vertical assets were those that were  
244 at the WTPs including buildings and contained within infrastructure. She stated that for  
245 wastewater, there were about 1,858 vertical assets, and for water, that were about 1,426 assets.

246

247 Ms. McIlwee stated they reviewed the benefits of the program and determined that it would  
248 prolong the life of assets and improve decisions about asset rehabilitation, repair, and  
249 replacement. She stated that the program would reduce the overall cost for operational and  
250 capital expenditures, and it would help meet customer demands. She stated that they would be  
251 able to set rates based on operational planning, and the budget could focus on critical activities.  
252 She stated the program would improve emergency response and improve the security, safety, and  
253 reliability of all assets.

254  
255 Ms. McIlwee stated that the goals of the program were to integrate information across the  
256 Authorities, monitor asset lifecycle, quantify asset condition and risk, achieve consistent and  
257 accurate performance monitoring, compare and prioritize potential capital project and  
258 maintenance activities, achieve benefit/cost efficiencies for customers, and increase and retain  
259 institutional knowledge.

260  
261 Ms. McIlwee stated that there were four phases of the asset management program. She stated  
262 that the first phase, developing an asset management framework, had been completed, which  
263 included conducting a gap assessment, developing a Strategic Asset Management Plan, and  
264 identification of software requirements. the initial development of the asset management  
265 framework. She stated that the second phase, Test AM Framework, included development of the  
266 asset register and completing a Tactical Asset Management Pilot plan for the Rivanna Pump  
267 Station. She stated that the third phase was nearly complete, and it was the Cityworks software  
268 implementation phase. She stated that the fourth phase was full asset management program  
269 implementation.

270  
271 Ms. McIlwee noted several major milestones throughout the project. The first milestone was the  
272 start of Phase 1 in 2018 with the asset plan development. She stated that in 2019, Phase 2 began  
273 and included asset hierarchy development. She stated in 2020, they completed the strategic asset  
274 management plan and the tactical asset management plan. She stated in 2021, they began Phase 3  
275 with the asset register development and Cityworks configuration. She stated in 2022, the full  
276 asset management program implementation began, and in 2023, Cityworks had gone online.

277  
278 Ms. McIlwee stated that Phase 3 was a large part of the project. She stated that Cityworks was  
279 chosen to be the computerized maintenance and management system (CMMS) in September  
280 2020, and implementation began December of that year. She stated that configuration and  
281 systems testing were completed in March 2023. She stated that on May 8, Cityworks went live.  
282 She stated that the program maximized preventative maintenance. She stated that Cityworks was  
283 an Authority-wide initiative to provide tangible benefits for asset management. She stated that  
284 the system had all asset information in one location and it was linked to the GIS. She stated that  
285 the system allowed work order tracking across departments.

286  
287 Ms. McIlwee stated that the asset management program budget was about \$1.18M. She stated  
288 that the largest portion of the budget was Phase 3. She stated that as part of Phase 4, they were  
289 looking to complete the Level 1 and Level 2 condition assessments, and after completion, they  
290 would assign consequence of failure scores and mitigation factor scores to the vertical assets.  
291 She stated the consequence of failure scores would be assigned to the linear assets, and those  
292 would be used to calculate risk. All of this information would then be used in conjunction with a  
293 decision support tool to help make well-informed planning and financial decisions.

294  
295 Ms. McIlwee stated long-term goals included full implementation of the program. She stated  
296 they would develop capital investment needs and a business case evaluation process. She stated

297 that they would develop tactical asset plans for all assets, and they would refine the level of  
298 service performance standards. She stated that they would seek to reduce maintenance costs,  
299 implement performance monitoring processes, and implement an asset management program  
300 with the RSWA.

301  
302 Mr. Pinkston asked if a consultant helped in the implementation of Cityworks.

303  
304 Ms. McIlwee stated they hired a consultant (GHD) to implement Cityworks and the asset  
305 management program. She stated the consultant helped with the procurement of Cityworks.

306  
307 Mr. Smalls asked how they selected Cityworks.

308  
309 Ms. McIlwee stated that when they began looking for a system, neighboring localities and  
310 municipalities were using Cityworks. She stated that they issued an RFP, and by that time,  
311 Cityworks had transitioned its platform. She stated once the vendor had transitioned, they were  
312 able to provide 95% of the Authority's request at the lowest cost.

313  
314 Mr. Smalls asked whether RSWA assets were included.

315  
316 Ms. McIlwee stated they were not yet included.

317  
318 Mr. Mawyer responded that they would be in the near future.

319  
320 Mr. Pinkston asked if the consultant helped develop and identify the risk assessments and points  
321 of failure.

322  
323 Ms. McIlwee stated that they had developed several metrics to aid in decision making. She stated  
324 that the usage and surrounding infrastructure influenced the risk of failure score.

325  
326 Mr. Mawyer asked what all the metrics added together would indicate.

327  
328 Ms. McIlwee stated that it indicated the business risk exposure.

329  
330 Mr. Gaffney stated he supported the program. He asked if there was a method to sell assets that  
331 were no longer needed or used by the Authority.

332  
333 Ms. McIlwee stated that they currently perform a surplus sale of equipment every year.

334  
335 Mr. O'Connell asked if they would be able to gather enough data for the next CIP process.

336  
337 Ms. McIlwee stated that they hoped to gather enough data. She stated that they were six to eight  
338 months from being able to input the first data into the decision support tool. She stated that the  
339 information would become more robust every year.

340  
341 Mr. Smalls asked for more information about the decision support system.

342  
343 Ms. McIlwee stated that after a decision support tool was implemented, there would be a review  
344 process for the recommendations provided by the software, and no recommendation would be  
345 taken without a review.

346

347 Mr. Mawyer stated that they would integrate maintenance history and opinions about the assets.  
348 He stated that they would have to prioritize the most important assets for repairs or replacement.

349  
350 Mr. Smalls stated that the program was a good way to reduce costs.

351  
352 Ms. Mallek asked whether the 20% priority for site visits was based on age or value.

353  
354 Ms. McIlwee stated that it was based on a calculation using the consequence of failure scores,  
355 condition scores, and the mitigation factors.

356  
357 *b. Presentation: Leadership Development Program*  
358 *Betsy Nemeth, Human Resources Manager*

359  
360 Ms. Betsy Nemeth, Human Resources Manager, stated that she would provide an update on the  
361 organization's succession planning. She stated that the objective of the succession planning  
362 process was to continue organizational growth and development of the Authorities by  
363 recognizing, developing, and retaining leadership talent and strategically planning for the future.  
364 She stated that they developed a leadership development program to develop in-house leadership  
365 at all levels of the organization.

366  
367 Ms. Nemeth stated that there were three groups, and Group 1 encompassed the directors and  
368 high-level managers. She stated that they included the Clifton Strengths assessment tool to  
369 identify leadership strengths. She stated that they had held the first learning session, Strengths-  
370 Based Leadership, and the next sessions would include Emotional Intelligence and Conflict  
371 Management, Managing Change, and Visionary Leadership. She stated that everyone in the  
372 group would develop and present a capstone project in pairs in December. She stated that they  
373 were using an Executive Leadership Coach with Barren Ridge Consulting named Tim Smith.

374  
375 Ms. Nemeth stated that groups 2 and 3 included managers, assistant managers, supervisors, and  
376 other staff. She stated that the groups had four development learning sessions, Strengths-Based  
377 Leadership, Emotional Intelligence and Conflict Management, Effective Communication, and  
378 Managing Change. She stated that the groups had already undergone the strengths-based  
379 leadership session. She stated that the refreshed leadership development program would support  
380 the objectives of the succession management plan. She stated that the structured leadership  
381 program had been successful for the first session, and employees seemed willing to return for  
382 future sessions.

383  
384 Mr. Mawyer asked how many employees were in the program.

385  
386 Ms. Nemeth responded that there were a total of 26 staff members from both Authorities.

387  
388 Mr. Rogers asked who was providing the training.

389  
390 Ms. Nemeth responded that the leadership coach consultant provided training to the executive  
391 group, and she provided training to the other two groups.

392  
393 Mr. Rogers stated that he supported internal executive leadership programs.

394  
395 Ms. Nemeth stated that the programs invested in employees and aided in retention.

396

397 Mr. Pinkston asked how many people had gone through the program and how many they  
398 anticipated.

399  
400 Ms. Nemeth stated that this was the first group of sessions, and there were 26 staff members  
401 participating.

- 402  
403 *c. Presentation: Administration Building Renovation and Addition*  
404 *Santino Granato, P.E., Senior Civil Engineer*  
405 *Steve Davis, AIA, LEED Fellow – Principal, Thrive Architecture*  
406

407 Mr. Santino Granato, Senior Civil Engineer, stated that Brian Bergstrom from Short Elliot  
408 Hendrickson Engineers was also present. He stated that the Moores Creek Administration  
409 Building was constructed in the 1980s and was approximately 12,850 square feet. He stated the  
410 building provided space for 26 staff positions, including the water and wastewater laboratory. He  
411 stated in 2018, a needs assessment was completed and identified the need for an addition of  
412 15,000 square feet for a total building size of 27,850 square feet. He stated the 2018 renovation  
413 was designed to accommodate 48 staff positions, and the project cost estimate at the time was  
414 \$8M.

415  
416 Mr. Granato stated that they aimed to move Engineering staff into the newly renovated building  
417 and out of the trailers they currently used. He stated that the building would provide space for 49  
418 staff positions upon completion in 2026, and there would space for 68 staff positions by 2035.  
419 He stated the building would include offices, a laboratory, a data center, and education,  
420 conference, and support spaces. He stated that it was currently estimated to be 30,400 square  
421 feet. He stated they would implement a phased staffing occupancy approach, and initial  
422 construction would accommodate 58 staff positions by 2030.

423  
424 Mr. Steve Davis, Thrive Architecture, provided an overview of the site plan. He stated that  
425 adjacent to the existing building was the proposed addition. He noted that the proposed addition  
426 would be three stories. He stated that they were designing for 120 on-site parking spaces to  
427 accommodate staff vehicles, fleet vehicles, visitors, and public meeting attendees. He stated that  
428 they were beginning to evaluate some of the other safety features, such as storm water facilities.  
429 He stated that they would preserve as many of the large oak trees along the road as possible. He  
430 stated the master plan specified the location of future facilities, and there would be a new service  
431 drive-in and loading dock to support the lab facilities.

432  
433 Mr. Davis stated that they considered having the board meeting room on the first floor, but there  
434 were constraints regarding space, so they made the decision to host meetings on the top floor. He  
435 stated the first floor included a portion of administrative staff, the receptionist, and a significant  
436 portion of the IT department. He stated that the public circulation areas were secured from the  
437 staff areas with ballistic glass.

438  
439 Mr. Davis stated that the ground floor of the existing building would be connected to the second  
440 floor of the new building. He stated that the labs were located in the same general location, but  
441 they would be entirely renovated. He stated the entirety of the engineering department would be  
442 located on the second floor. He stated that the new boardroom would be located on the third  
443 floor, and the room would be designed for a variety of uses. He stated the board room had an  
444 example configuration to be able to support 14 Board members at the head tables and  
445 accommodate 60 guests. He stated that the remainder of the administrative department would be  
446 located on the third floor along with the leadership suite, the future legal department, and the

447 remainder of the IT department.

448  
449 Mr. Davis stated that while the normal ceiling height would be 9', they had opportunities to  
450 increase the ceiling height for the boardroom. He stated the lowest level of the addition would be  
451 at the parking lot level. He stated that they implemented architectural strategies to reduce the  
452 width and height of the building. He stated that there was no plan to change the exterior of the  
453 existing building, so they selected building materials to match. He stated that they intended to  
454 keep the rooftop as clean as possible to accommodate future renewable energy production. He  
455 stated there would be a narrow connector between the new and the old buildings. He noted that  
456 the rooftops were intended to be similar but not matching.

457  
458 Mr. Davis stated that the engineering team would evaluate low-impact development strategies.  
459 He stated they would look for ways to mitigate stormwater impacts and preserve waterways. He  
460 stated that they wanted to limit the use of glass from an energy-use and glare-reduction  
461 perspective. He stated that they wanted to emphasize the use of natural materials and materials  
462 with low energy requirements.

463  
464 Mr. O'Connell asked whether solar power was included.

465  
466 Mr. Davis stated that they planned to allocate space for a solar system on the rooftop of the  
467 building. He stated that solar panels were not included in the initial project budget.

468  
469 Mr. Granato stated they would submit the site plan to the County in June 2023, and they  
470 anticipated to have completed design by December. He stated they planned to award a  
471 construction contract by May 2024. He stated construction was anticipated to begin in June 2024  
472 and be complete by June 2026. He stated that the estimated project costs were done at a  
473 conceptual level, and they would be refined at the 30% design submission. He stated that total  
474 project costs were about \$17.5M, and they included one-time contingencies for inflation and  
475 design.

476  
477 Mr. Granato stated that the total project estimate did not include solar panel installation or  
478 educational outreach. He stated they were working with consultants to determine costs for those  
479 installations. He explained that solar panel installation on the building would be included with  
480 the next cost estimate, and they would try to include it within the project budget.

481  
482 Mr. O'Connell asked whether they were pursuing grant options for solar power.

483  
484 Mr. Mawyer stated no, but they were open to opportunities and suggestions.

485  
486 Mr. Granato stated that the project would renovate 12,850 square feet of the existing building,  
487 and there would be an addition of 17,200 square feet. He stated the engineering staff would be  
488 relocated into the building, and the labs would be modernized. He stated that the renovation and  
489 addition would accommodate staff growth to 68 positions by 2035. He stated that the  
490 construction schedule was June 2024 through June 2026, and the estimated budget was \$17.5M.

491  
492 Mr. Rogers asked for clarification about the projected number of employees.

493  
494 Mr. Mawyer responded that there were currently 26 employees in the existing Administration  
495 building, and there were 16 employees in the trailers who would move into the renovated  
496 Administration building. By 2035, they anticipated 68 employees would be located in the

497 building.  
498  
499 Mr. Pinkston asked whether the project was included in the CIP.  
500  
501 Mr. Mawyer stated yes.  
502  
503 Mr. Pinkston asked whether they received a value engineering (VE) review.  
504  
505 Mr. Mawyer responded yes. He explained that all projects over \$5M received a VE review.  
506  
507 Ms. Hildebrand responded that the \$18M would be at the earlier stages of the CIP.  
508  
509 Mr. Pinkston stated that the renovation seemed to be needed.  
510  
511 Ms. Mallek asked how they would manage energy efficiency in the summer.  
512  
513 Mr. Davis stated that most of the glass was facing north, and it was located on an open floor. He  
514 stated that there was not a lot of direct solar gain on the glass. He stated that some of the glass  
515 panels on the lower levels were opaque panels. He stated that they had to perform more studies  
516 on the east side to mitigate the solar gain. He stated that there were tall trees in the area to reduce  
517 sunlight.  
518  
519 Mr. Smalls asked whether the construction timeline would impact the Board's ability to meet.  
520  
521 Mr. Mawyer stated that they may have to find other locations to meet during construction. He  
522 stated they had considered rotating the meeting to various City and County locations during the  
523 construction, but they had to consider technology logistics.  
524  
525 Mr. Rogers asked whether staff would be relocated.  
526  
527 Mr. Mawyer stated they were working on a staff relocation strategy. He stated that constructing  
528 the new building, relocating staff into the new addition, then renovating the old building would  
529 create two project cycles, lengthen the timeline, and increase costs. He stated that they were  
530 considering a trailer for the laboratory. He stated that they would look to integrate a work-from-  
531 home program, as well.  
532  
533 Mr. Pinkston asked whether the cost estimates included costs for staff phasing and relocation.  
534  
535 Mr. Granato stated that they generated a cost savings by relocating staff out of the building  
536 during construction. He stated that they were looking to finalize the plan, and the costs would be  
537 adjusted. He stated that the relocation costs were not currently incorporated into the total project  
538 estimate.  
539  
540 Ms. Hildebrand asked whether there was consideration for cubicle-type offices in certain areas.  
541  
542 Mr. Granato stated they did consider cubicles in some situations, such as in the engineering  
543 space, the inspector offices, and the interns. He stated the majority of the building was designed  
544 for individual offices.  
545  
546 Mr. Stewart asked if the project would receive a green building certification.

547  
548 Mr. Granato stated that would be discussed within the project team.  
549  
550 Mr. Mawyer asked if there were different levels of certification.  
551  
552 Mr. Stewart responded that there were different ratings. He stated a code change required local  
553 governments to use the system.  
554  
555 Mr. Mawyer stated that they would have to look into it.  
556  
557 Mr. Stewart noted that the building had only one elevator and suggested they add an additional  
558 elevator in case one broke. He stated that it was important to have solar on the building. He  
559 stated that the proposed timelines seemed to be optimistic. He stated that the County site  
560 planning process could take multiple attempts.  
561  
562 Mr. Granato stated that they would do their best to maintain the proposed timeline.  
563  
564 Mr. Mawyer asked whether there was a preference for installing solar panels at the beginning  
565 versus installing them at a later time.  
566  
567 Ms. Mallek asked whether the Authority was allowed to use the contract companies which  
568 installed solar panels at no cost, such as was used with the schools. She stated that the Authority  
569 may not be eligible.  
570  
571 Mr. Stewart stated he believed the Authority was eligible for the programs, but the project was  
572 too small.  
573  
574 Mr. O'Connell asked for clarification about the top needs for the project. He noted that  
575 eliminating the Engineering trailers and renovating the lab were priorities.  
576  
577 Mr. Mawyer stated that the building was the original construction from the 1970s and needed  
578 renovation. Additional space would be needed to accommodate anticipated growth in staffing.  
579 He stated that there were pests in the building that they needed to address.  
580  
581 Mr. O'Connell asked whether there were growing staffing and space needs.  
582  
583 Mr. Mawyer stated that there were growing staff needs with the strategic plan. He stated that  
584 they wanted to build the space to accommodate future staffing needs until 2035.  
585  
586 Mr. Gaffney clarified that there would be increased lab space.  
587  
588 Ms. Mallek asked whether the renovated lab space would double.  
589  
590 Mr. Davis stated there was not significantly more space, but the internal layout was more  
591 efficient.  
592  
593 Mr. Gaffney noted that the manager's office and lab storage had been moved out of the lab space.  
594  
595 Ms. Mallek asked whether there was an enterprise opportunity to use the laboratory resources for  
596 other localities.



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Mr. Mawyer stated that the more local testing they could perform, the most cost effectively they could operate. They would investigate enterprising opportunities.

***10. OTHER ITEMS FROM BOARD/STAFF NOT ON AGENDA***

Mr. Mawyer announced that Ms. Carrie Stanton was leaving the organization and Williams Mullen for a better opportunity. He thanked Ms. Stanton for her work for the Authority.

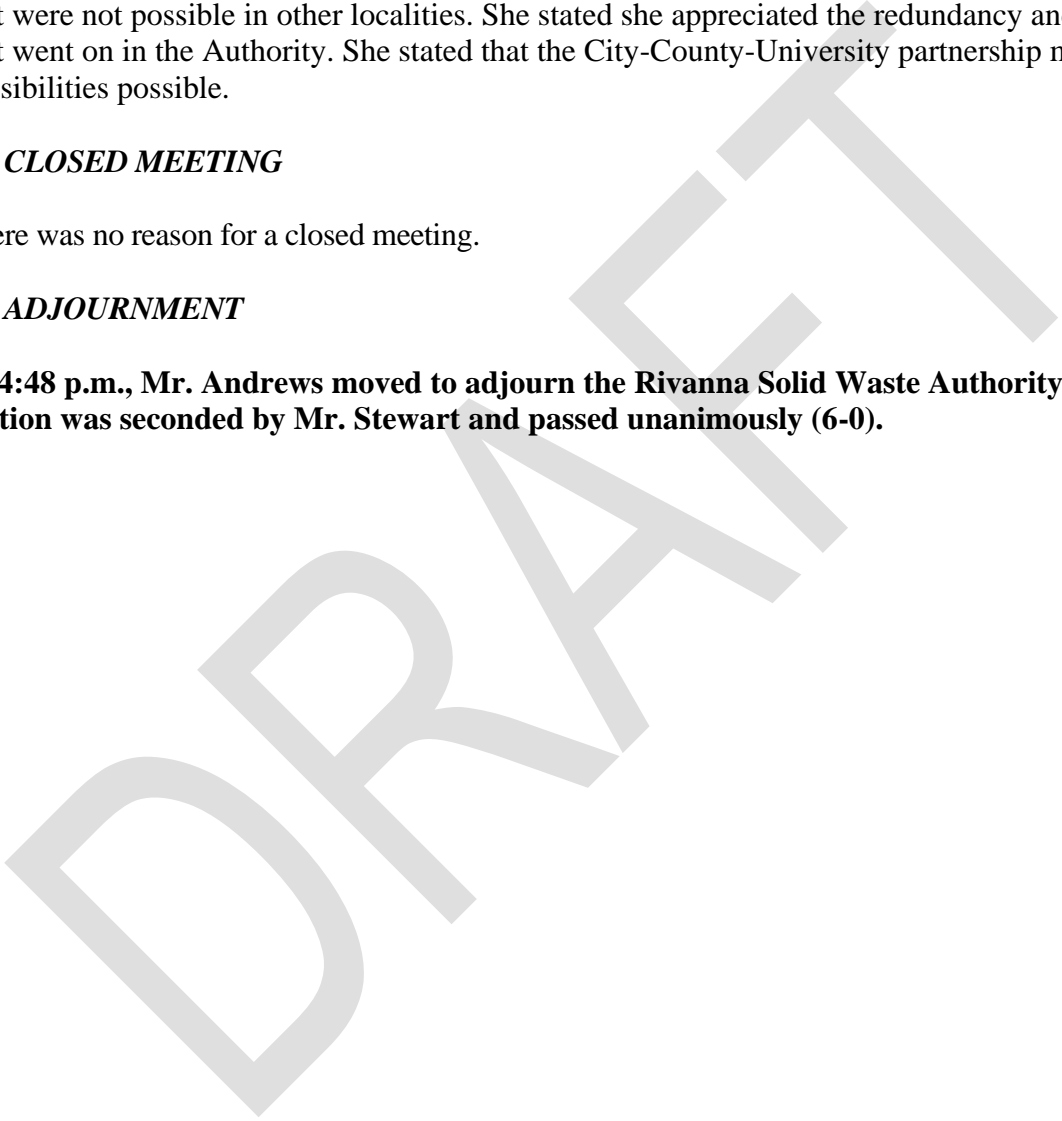
Ms. Mallek stated that the Authority and the County had the resources to accomplish initiatives that were not possible in other localities. She stated she appreciated the redundancy and work that went on in the Authority. She stated that the City-County-University partnership made more possibilities possible.

***11. CLOSED MEETING***

There was no reason for a closed meeting.

***12. ADJOURNMENT***

**At 4:48 p.m., Mr. Andrews moved to adjourn the Rivanna Solid Waste Authority. The motion was seconded by Mr. Stewart and passed unanimously (6-0).**





1  
2  
3 **RSWA BOARD OF DIRECTORS**  
4 **Minutes of Regular Meeting**  
5 **June 22, 2023**

6 A special meeting of the Rivanna Solid Waste Authority (RSWA) Board of Directors was held  
7 on Thursday, June 22, 2023, at 10:00 p.m. at the Southern Albemarle Convenience Center, 6269  
8 Esmont Road, Keene, VA 22946.

9  
10 **Board Members Present:** Mike Gaffney, Jeff Richardson, Jim Andrews, Lance Stewart.

11  
12 **Board Members Absent:** Brian Pinkston, Michael Rogers, Stacey Smalls.

13  
14 **Rivanna Staff Present:** Bill Mawyer, Phil McKalips, Jennifer Whitaker, Deborah Anama,  
15 Santino Granato, Scott Schiller, George Cheape, David Rhoades.

16  
17 **Attorney(s) Present:** none

18  
19 **1. CALL TO ORDER**

20 Mr. Gaffney convened the June 22, 2023 special meeting of the Board of Directors of the Rivanna  
21 Solid Waste Authority at 10:00 a.m.

22  
23 Mr. Gaffney, RSWA Chair, welcomed everyone to celebrate the Grand Opening of the Southern  
24 Albemarle Convenience Center. He stated that the Rivanna Solid Waste Authority and Albemarle  
25 County have placed a significant amount of effort in the past few years into listening to the needs of  
26 the community and expanding our solid waste collection capabilities.

27  
28 Ms. Donna Price, Chair of the Albemarle County Board of Supervisors, expressed her excitement  
29 and appreciation for the new amenity to serve the community. She noted that it had taken many  
30 years of planning and was pleased that this new and beautiful facility was now a reality. Later, she  
31 made the ceremonial first deposit of recyclable materials into the container.

32  
33 Mr. Ed Brooks, Program Coordinator Yancey School Community Center stated that the facility  
34 brings a much-needed recycling center and refuse facility to the southern part of the county. While  
35 some community members may have had initial reservations, now that the beautiful facility is  
36 complete the community is embracing the convenience this facility brings to the area residents.

37  
38 Mr. Bill Mawyer, expressed appreciation to the major contributors for the completion of the  
39 Southern Albemarle Convenience Center:

- 40
- 41 • Albemarle County Board of Supervisors, who provided the vision and funding for the facility;
  - 42 • County Executive Jeff Richardson, Assistant County Executive Trevor Henry, and especially County Director of Facilities and Environmental Services, Lance Stewart;
  - 43 • The Rivanna Solid Waste Authority's Board of Directors who also supported this addition
  - 44 to our recycling and refuse disposal program;
  - 45

- 46 • Rivanna’s engineering and project management team Jennifer Whitaker, Director of  
47 Engineering and Maintenance, Scott Schiller, Engineering Manager, and especially Sr.  
48 Project Manager, Santino Granato and Engineering Inspector, George Cheape;  
49 • Solid Waste Managers, Phil McKalips, David Rhoades and Russ Blankenstein;  
50 • Engineering consultant, Draper Aden, and our competitive bid contractor, Finley Asphalt  
51 and Concrete Company; and  
52 • Deborah Anama for organizing this event.

53

54 Mr. Mawyer invited Mr. Gaffney to proceed with the ribbon cutting.

55

56 Ms. Donna Price, Mr. Jim Andrews, Ms. Bea LaPisto-Kirtley, Ms. Ann Mallek, and Ms. Diantha  
57 McKeel, and Dr. Liz Palmer cut the ceremonial ribbon.

58

59 Mr. Gaffney thanked attendees and invited everyone to tour the facility with Mr. Phil McKalips,  
60 Director of Solid Waste for the Rivanna Solid Waste Authority.

61

62 **2. ITEMS FROM THE PUBLIC**

63 There were no items from the public.

64

65 **3. RESPONSES TO PUBLIC COMMENTS**

66 There were no items from the public, so there were no responses.

67

68 **4. CLOSED MEETING**

69 There was no reason for a closed meeting.

70

71 **5. ADJOURNMENT**

72

73 **At 10:22 a.m., Mr. Andrews moved to adjourn the Rivanna Solid Waste Authority. The**  
74 **motion was seconded by Mr. Richardson and passed unanimously (4-0).**



**RIVANNA SOLID WASTE AUTHORITY  
RIVANNA WATER & SEWER AUTHORITY  
BOARDS OF DIRECTORS**

**Resolution of Appreciation for Mr. Michael Rogers**

**WHEREAS**, Mr. Rogers has served as a member of the Rivanna Water & Sewer Authority and Rivanna Solid Waste Authority Boards of Directors since February 2022; and

**WHEREAS**, over that same period Mr. Rogers has demonstrated leadership in water and sewer, solid waste and recycling services, and has been a valuable member of the Boards of Directors and a resource to the Authorities; and

**WHEREAS**, Mr. Rogers' understanding of the water, sewer, solid waste and recycling operations of the City of Charlottesville, the Water & Sewer Authority and the Solid Waste Authority has supported a strategic decision-making process that provided benefits to the customers served by the City of Charlottesville as well as the community as a whole. During Mr. Rogers' tenure, major initiatives and projects were completed for the Authorities including:

- a 5-year Strategic Plan
- major renovations at the South Rivanna and Observatory Water Treatment Plants
- a plan to increase the community's drinking water supply by accelerating construction of the raw water pipeline to connect the South Rivanna and Ragged Mountain Reservoirs
- a new Southern Albemarle Convenience Center for collection of recyclable materials and household refuse
- approval of a route to construct a major drinking water pipeline through the City, the "Central Water Line" through extensive communications with adjacent neighborhoods

**NOW, THEREFORE, BE IT RESOLVED** that the Rivanna Water & Sewer Authority and the Rivanna Solid Waste Authority Boards of Directors recognize, thank, and commend Mr. Rogers for his distinguished service, efforts, and achievements as a member of the Rivanna Water & Sewer Authority and the Rivanna Solid Waste Authority, and present this Resolution as a token of esteem with best wishes in his future endeavors.

**BE IT FURTHER RESOLVED** that this Resolution be entered upon both the permanent Minutes of the Rivanna Water & Sewer Authority and the Rivanna Solid Waste Authority.

Michael Gaffney, Chairman  
Jeff Richardson  
Jim Andrews  
Lauren Hildebrand  
Ann Mallek  
Gary O'Connell  
Brian Pinkston  
Stacey Smalls  
Lance Stewart



## MEMORANDUM

**TO: RIVANNA SOLID WASTE AUTHORITY  
BOARD OF DIRECTORS**

**FROM: BILL MAWYER, EXECUTIVE DIRECTOR**

**SUBJECT: EXECUTIVE DIRECTOR'S REPORT**

**DATE: July 25, 2023**

*STRATEGIC PLAN PRIORITY: PLANNING AND INFRASTRUCTURE*

### **New Southern Albemarle Convenience Center Grand Opening**

The Grand Opening of the Southern Albemarle Convenience Center was held on June 22nd with a ribbon cutting ceremony and facility tour. Area residents expressed gratitude for having the facility opened and available to bring their recyclable materials and bagged refuse a short drive from their homes. RSWA Chair, Mr. Mike Gaffney opened the ceremony, followed by remarks from Ms. Donna Price, Albemarle Board of Supervisors Chair; Mr. Ed Brooks, Yancey School Community Center Program Coordinator; and myself. Mr. Phil McKalips, Director of Solid Waste, provided a tour of the facility and discussed recyclable items accepted.



Southern Albemarle Convenience  
Center Ribbon Cutting Ceremony  
June 22, 2023

L to R:  
Supervisor Mallek, Supervisor Price,  
Supervisor Andrews, Dr. Liz Palmer,  
Supervisor LaPisto-Kirtley, and  
Supervisor McKeel

STRATEGIC PLAN PRIORITY: ENVIRONMENTAL STEWARDSHIP

**Spring Refuse Special Collection Days**

Spring 2023 Special Collection Days at Ivy MUC were successful with the following customers participating in the events.

			Albemarle	Charlottesville	
<b><u>eWaste</u></b>	Saturday	4/15/2023			
		Customers	253	84	
<b><u>HHW</u></b>	Friday	4/21/2023			
		Customers	305	70	
	Saturday	4/22/2023			
		Customers	347	90	
<b><u>Bulky Waste:</u></b>	Furniture/Mattresses	- Pounds Collected	23,340	5,820	
		Saturday	4/29/2023		
	Appliances	- Pounds Collected	17,980	3,420	
			- Freon units Collected	121	13
		Saturday	5/6/2023		
	Tires	Participating Vehicles	154	22	
	Saturday	5/13/2023			

**Fall Refuse Special Collection Days**

The Ivy MUC will be the site for Fall 2023 eWaste, Household Hazardous Waste, and Special Collection free disposal days on the following dates:

**eWaste Collection – free disposal of electronic waste**

- Saturday, September 16
- Reservations Required. Please visit: [www.rivanna.org/ewaste](http://www.rivanna.org/ewaste) to register after 10AM on August 16

*Registrations fill up so we encourage you to register early.*



**Residential Household Hazardous Waste Collection**

- Friday and Saturday, September 22 and September 23

**Special Collection Days**

- Furniture/Mattresses: September 30
- Appliances: October 7
- Tires: October 14

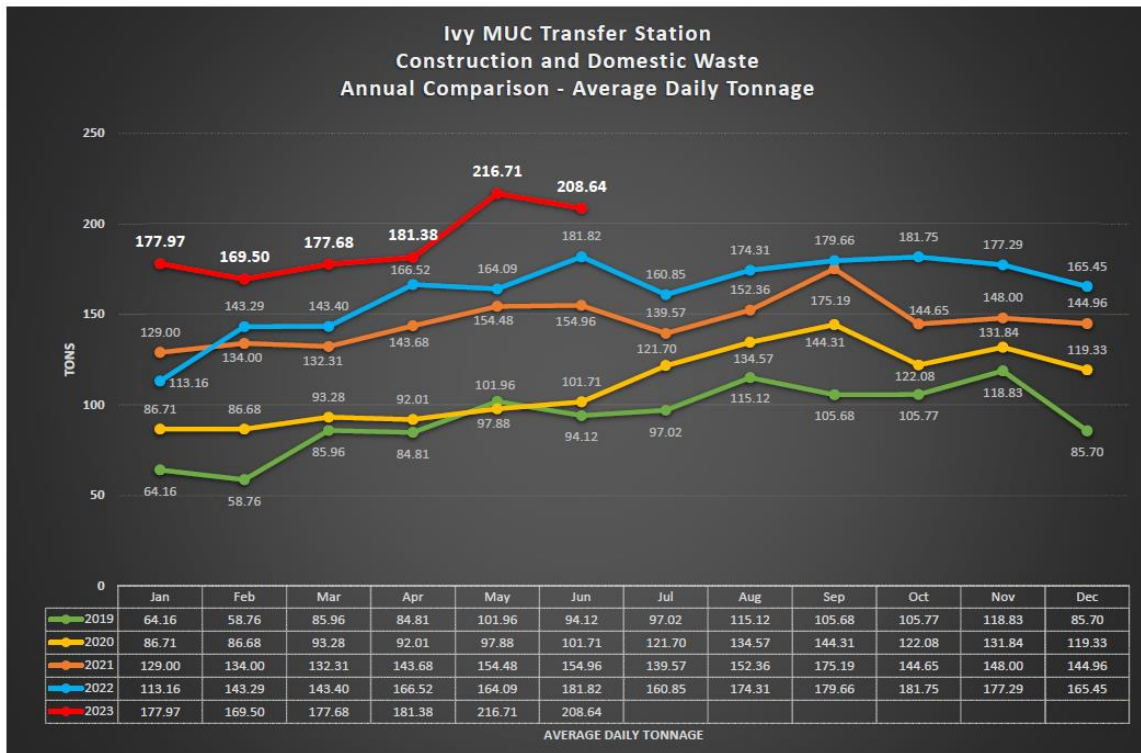


*STRATEGIC PLAN PRIORITY: OPTIMIZATION AND RESILIENCY*

**Use of the Ivy Materials Utilization Center:**

Average daily refuse volume at the Ivy Transfer Station has increased from 94 tons per day in June 2019 to 209 tons per day in June 2023, as shown below:

<b>May 2023</b>	
<u>Vehicles</u>	<u>Avg MSW &amp; CDD Tons/Day</u>
<b>6,945</b>	<b>217</b>
<b>June 2023</b>	
<u>Vehicles</u>	<u>Avg MSW &amp; CDD Tons/Day</u>
<b>7,267</b>	<b>209</b>





**MEMORANDUM**

**TO: RIVANNA SOLID WASTE AUTHORITY  
BOARD OF DIRECTORS**

**FROM: LONNIE WOOD, DIRECTOR OF FINANCE AND INFORMATION  
TECHNOLOGY**

**REVIEWED: BILL MAWYER, EXECUTIVE DIRECTOR**

**SUBJECT: MAY 2023 FINANCIAL SUMMARY**

**DATE: JULY 25, 2023**

Total operating revenue for the first eleven months of this fiscal year was \$4.3 million, and total operating expenses were \$7 million, which resulted in a \$2.7 million net operating loss. This is better than the estimated loss of \$3 million per the prorated budget. Total funding support for operations and remediation through May is \$3,385,000. The Authority has processed 229,362 tons of waste and recycling materials this fiscal year. A breakdown of net revenue or cost per ton, including overhead and administrative support costs and excluding Ivy Environmental results, is shown below.

	<u>Ivy Operations</u>	<u>Ivy Transfer</u>	<u>Recycling</u>	<u>Total</u>
Tonnage	177,296	50,084	1,982	229,362
Net operating revenue (costs)	\$ 282,920	\$ (895,513)	\$ (1,095,830)	\$ (1,708,423)
Net revenue (cost) per ton	\$ 1.60	\$ (17.88)	\$ (552.89)	\$ (7.45)

Some highlighted items are noted below and reference to the appropriate line item in the statement:

- A** – Clean Fill, Vegetative Waste, and MSW continue to bring in higher than expected revenues.
- B** – Wood Grinding costs were the cause for Ivy Operations to be significantly over budget.
- C** – Recycling costs are running over budget primarily due to engineering consulting services for the Baling Facility that were unbudgeted.
- D** – Ivy Transfer Station disposal contract costs are over budget due to high MSW tonnages.
- E** – Vehicle and equipment maintenance costs have exceeded the annual budget for Ivy Operations, Ivy Transfer Station, and Recycling.

Attachments



**Rivanna Solid Waste Authority  
Revenue and Expense Summary Report  
FY 2023**

*For May 2023*

	<b>Budget FY 2023</b>	<b>Budget YTD</b>	<b>Actual YTD</b>	<b>Variance \$</b>	<b>Variance %</b>	
<b>Revenues</b>						
Ivy Operations Tipping Fees	\$ 631,800	\$ 579,150	\$ 1,213,452	\$ 634,302	109.52%	<b>A</b>
Ivy Environmental Revenues	-	-	11,952	11,952		
Ivy MSW Transfer Tipping Fees	2,557,300	2,344,192	2,760,547	416,355	17.76%	<b>A</b>
County Convenience Centers	60,000	55,000	17,158	(37,842)	-68.80%	
Recycling Revenues	265,000	242,917	167,154	(75,762)	-31.19%	
Other Revenues Administration	20,000	18,333	105,313	86,980	474.44%	
<b>Total Revenues</b>	<b>\$ 3,534,100</b>	<b>\$ 3,239,592</b>	<b>\$ 4,275,576</b>	<b>\$ 1,035,985</b>	<b>31.98%</b>	
<b>Expenses</b>						
Ivy Operations	\$ 668,327	\$ 612,633	\$ 733,768	\$ (121,135)	-19.77%	<b>B, E</b>
Ivy Environmental	792,311	726,285	755,543	(29,258)	-4.03%	
Ivy MSW Transfer	3,283,892	3,010,235	3,459,296	(449,061)	-14.92%	<b>D, E</b>
County Convenience Centers	552,593	506,543	456,984	49,559	9.78%	
Recycling Operations	605,713	555,237	667,532	(112,296)	-20.22%	<b>C, E</b>
Administration	940,562	862,182	892,368	(30,186)	-3.50%	
<b>Total Expenses</b>	<b>\$ 6,843,397</b>	<b>\$ 6,273,114</b>	<b>\$ 6,965,491</b>	<b>\$ (692,377)</b>	<b>-11.04%</b>	
<b>Net Operating Income (Loss)</b>	<b>\$ (3,309,297)</b>	<b>\$ (3,033,522)</b>	<b>\$ (2,689,915)</b>	<b>\$ 343,607</b>	<b>11.33%</b>	

**Other Funding Sources**

Local Government Support	\$ 2,240,818	\$ 2,054,083	\$ 2,316,974	\$ 262,891	12.80%
Environmental Support	1,068,480	979,440	1,068,479	89,039	9.09%
<b>Subtotal</b>	<b>\$ 3,309,298</b>	<b>\$ 3,033,523</b>	<b>\$ 3,385,453</b>	<b>\$ 351,930</b>	<b>11.60%</b>

<b>Net Income (Loss)</b>	<b>\$ 1</b>	<b>\$ 1</b>	<b>\$ 695,538</b>	<b>\$ 695,538</b>
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<b>Local Support Detail</b>			<b>Annualized Payments</b>	<b>True-up Est. Due to / (Due from)</b>
County - Ivy Operations	\$ 266,667	\$ 244,445	\$ 244,445	\$ 527,365
County - Ivy Transfer	956,733	877,005	877,005	(18,508)
County - Convenience Centers	492,593	451,543	451,543	11,717
County - Recycling	367,378	336,763	336,763	(122,440)
County - Environmental MOU	637,581	584,449	637,580	-
	<u>\$ 2,720,951</u>	<u>\$ 2,494,205</u>	<u>\$ 2,547,336</u>	<u>\$ 398,134</u>
City - Recycling	\$ 157,448	\$ 144,327	\$ 144,327	(52,474)
City - Environmental MOU	350,917	321,674	350,917	-
	<u>\$ 508,365</u>	<u>\$ 466,001</u>	<u>\$ 495,244</u>	<u>\$ (52,474)</u>
UVa - Environmental MOU	\$ 79,982	\$ 73,317	\$ 79,982	\$ -
<b>Total Local Support</b>	<b>\$ 3,309,298</b>	<b>\$ 3,033,523</b>	<b>\$ 3,122,562</b>	<b>\$ 345,660</b>

Rivanna Solid Waste Authority  
 Fiscal Year 2023 - May 2023  
 Revenue and Expense Summary Report

FY 2023			Variance \$	Variance %
Budget FY 2023	Budget YTD	Actual YTD		

Ivy Operations

**Revenues**

Clean fill material	\$ 200,000	\$ 183,333	\$ 760,975	577,642	315.08%	<b>A</b>
Grindable material	264,000	242,000	321,814	79,814	32.98%	<b>A</b>
Tires whole	22,800	20,900	31,957	11,057	52.90%	
Tires and white good per item	45,000	41,250	37,410	(3,840)	-9.31%	
Material Sales	100,000	91,667	61,296	(30,371)	-33.13%	
<b>Total Operations Revenues</b>	<b>\$ 631,800</b>	<b>\$ 579,150</b>	<b>\$ 1,213,452</b>	<b>\$ 634,302</b>	<b>109.52%</b>	

**Expenses**

Personnel Cost	\$ 274,552	\$ 251,672	\$ 246,587	\$ 5,085	2.02%	
Professional Services	-	-	12,256	(12,256)		
Other Services and Charges	27,700	25,392	29,719	(4,327)	-17.04%	
Communications	1,800	1,650	2,007	(357)	-21.61%	
Information Technology	6,275	5,752	17,514	(11,762)	-204.48%	
Vehicles and Equip. Maintenance	47,000	43,083	71,996	(28,913)	-67.11%	<b>E</b>
Supplies	1,000	917	2,902	(1,985)	-216.58%	
Operations and Maintenance	175,000	160,417	227,037	(66,620)	-41.53%	<b>B</b>
Environmental Remediations	-	-	-	-		
Equipment Replacement	135,000	123,750	123,750	-	0.00%	
<b>Total Operations Expenses</b>	<b>\$ 668,327</b>	<b>\$ 612,633</b>	<b>\$ 733,768</b>	<b>\$ (121,135)</b>	<b>-19.77%</b>	
Allocation of Administration Costs	230,141	210,962	196,764	14,199	6.73%	
<b>Expenses With Admin Allocations</b>	<b>\$ 898,467</b>	<b>\$ 823,595</b>	<b>\$ 930,532</b>	<b>\$ (106,937)</b>	<b>-12.98%</b>	

<b>Net Operating Income (Loss)</b>	<b>\$ (266,667)</b>	<b>\$ (244,445)</b>	<b>\$ 282,920</b>	527,365	-215.74%	<b>527,365</b>
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**Summary of Local Support**

County				
	\$ 266,667	\$ 244,445	\$ 244,445	\$ -
	<b>\$ 266,667</b>	<b>\$ 244,445</b>	<b>\$ 244,445</b>	<b>\$ -</b>

Estimated True-up \$ 527,365

Rivanna Solid Waste Authority  
 Fiscal Year 2023 - May 2023  
 Revenue and Expense Summary Report

FY 2023			Variance \$	Variance %
Budget FY 2023	Budget YTD	Actual YTD		

Ivy Environmental

**Revenues**

Forestry Management Revenue	\$ -	\$ -	\$ 11,952	11,952	
<b>Total Operations Revenues</b>	<b>\$ -</b>	<b>\$ -</b>	<b>\$ 11,952</b>	<b>\$ 11,952</b>	

**Expenses**

Personnel Cost	\$ 192,711	\$ 176,652	\$ 174,023	\$ 2,628	1.49%
Professional Services	-	-	7,277	(7,277)	
Other Services and Charges	12,700	11,642	3,837	7,805	67.04%
Communications	1,000	917	233	684	74.57%
Information Technology	1,000	917	-	917	100.00%
Vehicles and Equip. Maintenance	19,900	18,242	23,040	(4,798)	-26.30%
Supplies	-	-	8	(8)	
Operations and Maintenance	176,500	161,792	218,776	(56,984)	-35.22%
Environmental Remediations	233,500	214,042	185,235	28,807	13.46%
Equipment Replacement	155,000	142,083	143,114	(1,030)	-0.73%
<b>Total Operations Expenses</b>	<b>\$ 792,311</b>	<b>\$ 726,285</b>	<b>\$ 755,543</b>	<b>\$ (29,258)</b>	<b>-4.03%</b>
Allocation of Administration Costs	276,169	253,155	236,116	17,038	6.73%
<b>Expenses With Admin Allocations</b>	<b>\$ 1,068,479</b>	<b>\$ 979,439</b>	<b>\$ 991,659</b>	<b>\$ (12,220)</b>	<b>-1.25%</b>
<b>Net Operating Income (Loss)</b>	<b>\$ (1,068,479)</b>	<b>\$ (979,439)</b>	<b>\$ (979,707)</b>	<b>(268)</b>	<b>0.03%</b>



Summary of Local Support				
County	\$ 637,581	\$ 584,449	\$ 637,580	\$ (53,131)
City	350,917	321,674	350,917	(29,243)
Uva	79,982	73,317	79,982	(6,665)
	<b>\$ 1,068,480</b>	<b>\$ 979,440</b>	<b>\$ 1,068,479</b>	<b>\$ (89,039)</b>

Rivanna Solid Waste Authority  
 Fiscal Year 2023 - May 2023  
 Revenue and Expense Summary Report

FY 2023			Variance \$	Variance %
Budget FY 2023	Budget YTD	Actual YTD		

**Ivy Transfer Station**

**Revenues**

MSW / Construction Debris	\$ 2,392,000	\$ 2,192,667	\$ 2,645,556	\$ 452,889	20.65%	<b>A</b>
Compostable Material	62,300	57,108	-	(57,108)	-100.00%	
Service Charges / other revenues	103,000	94,417	114,991	20,574	21.79%	
<b>Total Operations Revenues</b>	<b>\$ 2,557,300</b>	<b>\$ 2,344,192</b>	<b>\$ 2,760,547</b>	<b>\$ 416,355</b>	<b>17.76%</b>	

**Expenses**

Personnel Cost	\$ 575,035	\$ 527,116	\$ 504,558	\$ 22,558	4.28%	
Professional Services	-	-	8,369	(8,369)		
Other Services and Charges	111,650	102,346	24,995	77,350	75.58%	
Communications	2,000	1,833	1,773	60	3.30%	
Information Technology	12,500	11,458	2,555	8,904	77.70%	
Vehicles and Equip. Maintenance	55,000	50,417	161,255	(110,839)	-219.85%	<b>E</b>
Supplies	3,000	2,750	8,694	(5,944)	-216.14%	
Operations and Maintenance	2,426,207	2,224,023	2,653,811	(429,788)	-19.32%	<b>D</b>
Environmental Remediations	3,500	3,208	10,786	(7,577)	-236.17%	
Equipment Replacement	95,000	87,083	82,500	4,583	5.26%	
<b>Total Operations Expenses</b>	<b>\$ 3,283,892</b>	<b>\$ 3,010,235</b>	<b>\$ 3,459,296</b>	<b>\$ (449,061)</b>	<b>-14.92%</b>	
Allocation of Administration Costs	230,141	210,962	196,764	14,199	6.73%	
<b>Expenses With Admin Allocations</b>	<b>\$ 3,514,033</b>	<b>\$ 3,221,197</b>	<b>\$ 3,656,059</b>	<b>\$ (434,863)</b>	<b>-13.50%</b>	

**Net Operating Income (Loss)**      \$ (956,733)      \$ (877,005)      \$ (895,513)      (18,508)      2.11%

**Summary of Local Support**

County	\$ 956,733	\$ 877,005	\$ 877,005	\$ -
City	-	-	-	-
	<b>\$ 956,733</b>	<b>\$ 877,005</b>	<b>\$ 877,005</b>	<b>\$ -</b>

Estimated True-up      \$ (18,508)

Rivanna Solid Waste Authority  
 Fiscal Year 2023 - May 2023  
 Revenue and Expense Summary Report

<b>FY 2023</b>				
<i>Budget FY 2023</i>	Budget YTD	Actual YTD	<i>Variance \$</i>	<i>Variance %</i>

**County Convenience Centers**

**Revenues**

Material Sales	\$ 60,000	\$ 55,000	\$ 17,158	\$ (37,842)	-68.80%
<b>Total Operations Revenues</b>	<b>\$ 60,000</b>	<b>\$ 55,000</b>	<b>\$ 17,158</b>	<b>\$ (37,842)</b>	<b>-68.80%</b>

**Expenses**

Personnel Cost	\$ 378,293	\$ 346,768	\$ 343,153	\$ 3,616	1.04%
Professional Services	-	-	-	-	
Other Services and Charges	10,300	9,442	4,166	5,275	55.87%
Communications	-	-	671	(671)	
Information Technology	-	-	-	-	
Vehicles and Equip. Maintenance	105,000	96,250	50,848	45,402	47.17%
Supplies	-	-	17	(17)	
Operations and Maintenance	4,000	3,667	7,713	(4,047)	-110.36%
Environmental Remediations	-	-	-	-	
Equipment Replacement	55,000	50,417	50,417	0	0.00%
<b>Total Operations Expenses</b>	<b>\$ 552,593</b>	<b>\$ 506,543</b>	<b>\$ 456,984</b>	<b>\$ 49,559</b>	<b>9.78%</b>
Allocation of Administration Costs	-	-	-	-	
<b>Expenses With Admin Allocations</b>	<b>\$ 552,593</b>	<b>\$ 506,543</b>	<b>\$ 456,984</b>	<b>\$ 49,559</b>	<b>9.78%</b>
<b>Net Operating Income (Loss)</b>	<b>\$ (492,593)</b>	<b>\$ (451,543)</b>	<b>\$ (439,826)</b>	<b>11,717</b>	<b>-2.59%</b>



<b>Summary of Local Support</b>				
<b>County</b>	\$ 492,593	\$ 451,543	\$ 451,543	\$ -
	<b>\$ 492,593</b>	<b>\$ 451,543</b>	<b>\$ 451,543</b>	<b>\$ -</b>

Estimated True-up \$ 11,717

Rivanna Solid Waste Authority  
 Fiscal Year 2023 - May 2023  
 Revenue and Expense Summary Report

FY 2023			Variance \$	Variance %
Budget FY 2023	Budget YTD	Actual YTD		

**Recycling**  
 McIntire & Paper Sort

**Revenues**

Material Sales & other revenues	\$ 230,000	\$ 210,833	\$ 102,447	\$ (108,386)	-51.41%
Grants	35,000	32,083	64,707	32,624	101.68%

<b>Total Operations Revenues</b>	<b>\$ 265,000</b>	<b>\$ 242,917</b>	<b>\$ 167,154</b>	<b>\$ (75,762)</b>	<b>-31.19%</b>
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**Expenses**

Personnel Cost	\$ 309,413	\$ 283,628	\$ 279,878	\$ 3,750	1.32%
Professional Services	-	-	23,700	(23,700)	C
Other Services and Charges	49,100	45,008	49,861	(4,853)	-10.78%
Communications	2,150	1,971	3,681	(1,710)	-86.77%
Information Technology	-	-	-	-	0.00%
Vehicles and Equip. Maintenance	68,000	62,333	105,602	(43,269)	E -69.41%
Supplies	1,050	963	1,264	(301)	-31.28%
Operations and Maintenance	76,000	69,667	110,095	(40,428)	-58.03%
Environmental Remediations	-	-	-	-	0.00%
Equipment Replacement	100,000	91,667	91,667	0	0.00%
<b>Total Operations Expenses</b>	<b>\$ 605,713</b>	<b>\$ 555,237</b>	<b>\$ 665,747</b>	<b>\$ (110,510)</b>	<b>-19.90%</b>
Allocation of Administration Costs	184,112	168,770	157,411	11,359	6.73%
<b>Expenses With Admin Allocations</b>	<b>\$ 789,825</b>	<b>\$ 724,006</b>	<b>\$ 823,158</b>	<b>\$ (99,152)</b>	<b>-13.69%</b>

<b>Net Operating Income (Loss)</b>	<b>\$ (524,825)</b>	<b>\$ (481,090)</b>	<b>\$ (656,004)</b>	<b>(174,914)</b>	<b>36.36%</b>
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Summary of Local Support				
County	\$ 367,378	\$ 336,763	\$ 336,763	\$ -
City	157,448	144,327	144,327	\$ -
	<b>\$ 524,825</b>	<b>\$ 481,090</b>	<b>\$ 481,090</b>	<b>\$ -</b>

Estimated True-up - County	\$ (122,440)
Estimated True-up - City	\$ (52,474)

Rivanna Solid Waste Authority  
 Fiscal Year 2023 - May 2023  
 Revenue and Expense Summary Report

<b>FY 2023</b>				
<i>Budget FY 2023</i>	Budget YTD	Actual YTD	<i>Variance \$</i>	<i>Variance %</i>

**Administration**

**Revenues**

Interest revenues	\$ 5,000	\$ 4,583	\$ 90,422	\$ 85,839	1872.85%
Late Fees	15,000	13,750	14,891	1,141	8.30%
<i>Total Operations Revenues</i>	<b>\$ 20,000</b>	<b>\$ 18,333</b>	<b>\$ 105,313</b>	<b>\$ 86,980</b>	<b>474.44%</b>

**Expenses**

Personnel Cost	\$ 171,662	\$ 157,357	\$ 162,484	\$ (5,127)	-3.26%
Professional Services	50,000	45,833	45,095	739	1.61%
Other Services and Charges	708,700	649,642	662,314	(12,672)	-1.95%
Communications	5,200	4,767	2,606	2,160	45.32%
Information Technology	3,500	3,208	4,446	(1,238)	-38.58%
Vehicles and Equip. Maintenance	-	-	-	-	
Supplies	1,500	1,375	1,613	(238)	-17.32%
Operations and Maintenance	-	-	2,755	(2,755)	
Environmental Remediations	-	-	-	-	
Equipment Replacement	-	-	11,054	(11,054)	
<i>Subtotal Before Allocations</i>	<b>\$ 940,562</b>	<b>\$ 862,182</b>	<b>\$ 892,368</b>	<b>\$ (30,186)</b>	<b>-3.50%</b>

**Net Operating Income (Loss)**

	<b>\$ (920,562)</b>	<b>\$ (843,849)</b>	<b>\$ (787,055)</b>	56,794	-6.73%
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**Allocation to Cost Centers (per agreement)**

	<b>Allocation %</b>					
Ivy Operations	25%	\$ 230,141	\$ 210,962	\$ 196,764	\$ 14,199	-14.50%
Ivy Environmental	30%	276,169	253,155	236,116	17,038	-14.50%
Ivy Transfer	25%	230,141	210,962	196,764	14,199	-14.50%
County Convenience Centers	0%	-	-	-	-	
Recycling	20%	184,112	168,770	157,411	11,359	-14.50%
<b>Total Allocation to Cost Centers</b>	<b>100%</b>	<b>\$ 920,562</b>	<b>\$ 843,849</b>	<b>\$ 787,055</b>	<b>\$ 56,794</b>	<b>-14.50%</b>



June 1-30, 2023

Days of

Operation: 26

		MSW collected at Transfer Station (tons)					Non-MSW	
		Vehicles	Count	Citizen-Can	Construction	Domestic	MSW Total	Total Tons
06/01/23	Thursday	282	302	0.63	143.05	141.01	284.69	303.24
06/02/23	Friday	224	320	0.59	128.00	91.06	219.65	68.05
06/03/23	Saturday	299	397	0.89	18.00	88.41	107.30	12.64
06/04/23	Sunday						-	
06/05/23	Monday	267	349	0.34	130.91	214.31	345.56	115.43
06/06/23	Tuesday	255	295	0.54	93.00	104.90	198.44	210.40
06/07/23	Wednesday	236	240	0.46	107.03	129.23	236.72	366.96
06/08/23	Thursday	270	285	0.63	110.67	125.94	237.24	435.58
06/09/23	Friday	250	273	0.43	133.39	75.30	209.12	90.19
06/10/23	Saturday	303	392	0.95	66.91	65.73	133.59	31.61
06/11/23	Sunday						-	
06/12/23	Monday	314	425	0.55	114.16	197.98	312.69	892.35
06/13/23	Tuesday	297	335	0.57	74.66	89.05	164.28	959.45
06/14/23	Wednesday	340	384	0.34	71.25	141.56	213.15	1,062.21
06/15/23	Thursday	343	391	0.33	98.14	122.58	221.05	1,188.62
06/16/23	Friday	377	417	0.53	98.80	96.24	195.57	1,409.29
06/17/23	Saturday	274	307	0.65	17.29	80.83	98.77	6.47
06/18/23	Sunday						-	
06/19/23	Monday	311	355	0.42	65.58	184.80	250.80	432.02
06/20/23	Tuesday	259	305	0.64	77.07	89.08	166.79	560.72
06/21/23	Wednesday	218	228	0.41	56.23	135.43	192.07	294.49
06/22/23	Thursday	154	223	0.44	33.64	150.06	184.14	27.09
06/23/23	Friday	211	249	0.53	64.63	138.51	203.67	105.51
06/24/23	Saturday	260	327	0.81	13.07	77.24	91.12	16.56
06/25/23	Sunday						-	
06/26/23	Monday	342	659	1.80	103.89	201.09	306.78	755.28
06/27/23	Tuesday	301	313	0.71	86.19	139.13	226.03	487.40
06/28/23	Wednesday	288	364	0.59	70.55	132.29	203.43	189.90
06/29/23	Thursday	278	289	0.72	74.12	131.97	206.81	153.80
06/30/23	Friday	314	372	0.50	96.04	134.60	231.14	218.09
<b>Total</b>		<b>7,267</b>	<b>8,796</b>	<b>16.00</b>	<b>2,146.27</b>	<b>3,278.33</b>	<b>5,440.60</b>	<b>10,393.35</b>
<i>Average</i>		280	338	0.62	82.55	126.09	209.25	399.74
<i>Median</i>		280	324	0.56	81.63	130.60	207.97	256.29
<i>Maximum</i>		377	659	1.80	143.05	214.31	345.56	1,409.29
<i>Minimum</i>		154	223	0.33	13.07	65.73	91.12	6.47

**Material Type & Description**

**Citizen-Can:** Roll-off container at the Ivy MUC Convenience Center-citizens dispose of prepaid trashbags

**Construction:** Construction/demolition debris (shingles, sheetrock, treated lumber, etc.)

**Count:** Transactions per item (appliances, hauling fees, service fees, tag-bag stickers, tires)

**Domestic:** Business/residential general or household waste

**MSW:** Materials processed/handled at the Transfer Station

**Non-MSW:** Materials processed/handled on-site

**Vehicle:** Transactions or vehicles processed in a day





**May 1-31, 2023**

Days of

Operation: **26**

MSW collected at Transfer Station (tons)

	Vehicles	Count	Citizen-Can	Construction	Domestic	MSW Total	Non-MSW Total Tons
05/01/23 Monday	285	368	0.56	128.98	253.44	382.98	230.70
05/02/23 Tuesday	216	255	0.25	74.40	113.15	187.80	306.14
05/03/23 Wednesday	235	266	0.32	122.03	133.02	255.37	329.31
05/04/23 Thursday	251	254	0.45	89.27	151.93	241.65	567.59
05/05/23 Friday	278	302	0.43	109.97	110.05	220.45	574.98
05/06/23 Saturday	300	406	0.89	27.87	60.57	89.33	13.67
05/07/23 Sunday						-	
05/08/23 Monday	254	294	0.42	66.00	246.04	312.46	417.21
05/09/23 Tuesday	213	230	0.47	107.06	126.05	233.58	226.60
05/10/23 Wednesday	217	234	0.42	59.87	114.54	174.83	139.98
05/11/23 Thursday	265	288	0.50	84.72	188.75	273.97	615.37
05/12/23 Friday	250	252	0.50	97.21	89.65	187.36	378.23
05/13/23 Saturday	232	261	0.75	13.93	55.61	70.29	32.46
05/14/23 Sunday						-	
05/15/23 Monday	275	313	0.42	79.37	250.65	330.44	250.59
05/16/23 Tuesday	241	296	0.47	112.13	103.56	216.16	348.06
05/17/23 Wednesday	249	416	0.33	110.31	115.87	226.51	276.68
05/18/23 Thursday	258	295	0.44	89.96	144.24	234.64	304.82
05/19/23 Friday	255	302	0.42	104.15	93.66	198.23	91.72
05/20/23 Saturday	277	387	0.73	17.76	64.22	82.71	31.37
05/21/23 Sunday						-	
05/22/23 Monday	299	408	0.30	87.75	219.45	307.50	377.38
05/23/23 Tuesday	342	417	0.39	98.13	109.59	208.11	733.46
05/24/23 Wednesday	303	350	0.58	78.10	139.97	218.65	529.87
05/25/23 Thursday	283	347	0.32	81.20	136.11	217.63	385.93
05/26/23 Friday	273	406	0.38	95.89	102.31	198.58	181.85
05/27/23 Saturday	308	340	0.73	17.08	72.31	90.12	19.14
05/28/23 Sunday						-	
05/29/23 Monday						-	
05/30/23 Tuesday	316	337	0.51	84.96	177.66	263.13	244.34
05/31/23 Wednesday	270	338	0.44	105.94	118.00	224.38	245.71
<b>Total</b>	<b>6,945</b>	<b>8,362</b>	<b>12.42</b>	<b>2,144.04</b>	<b>3,490.40</b>	<b>5,646.86</b>	<b>7,853.16</b>
<i>Average</i>	267	322	0.48	82.46	134.25	217.19	302.04
<i>Median</i>	268	308	0.44	88.51	116.94	219.55	290.75
<i>Maximum</i>	342	417	0.89	128.98	253.44	382.98	733.46
<i>Minimum</i>	213	230	0.25	13.93	55.61	70.29	13.67

**Material Type & Description**

**Citizen-Can:** Roll-off container at the Ivy MUC Convenience Center-citizens dispose of prepaid trashbags

**Construction:** Construction/demolition debris (shingles, sheetrock, treated lumber, etc.)

**Count:** Transactions per item (appliances, hauling fees, service fees, tag-bag stickers, tires,

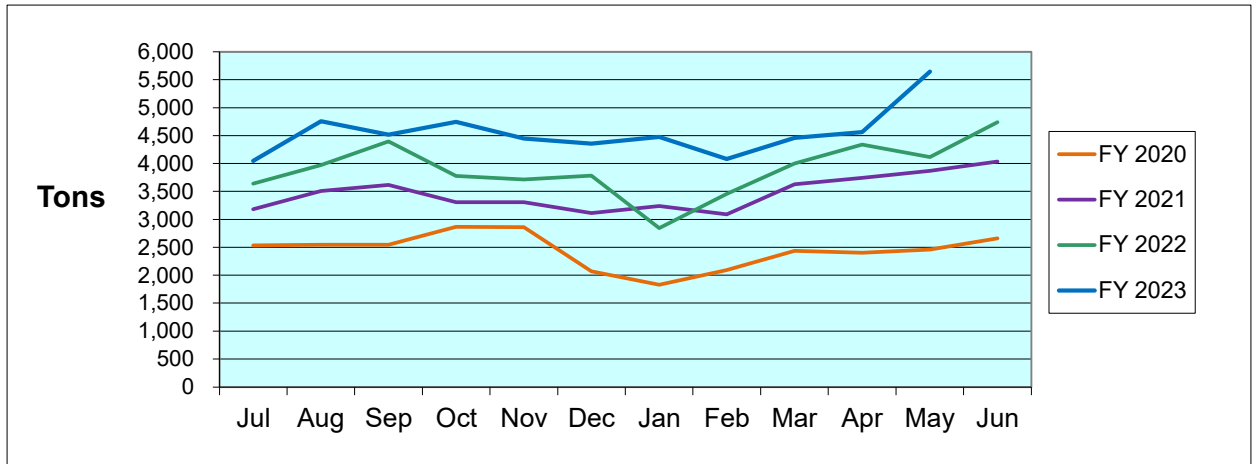
**Domestic:** Business/residential general or household waste

**MSW:** Materials processed/handled at the Transfer Station

**Non-MSW:** Materials processed/handled on-site

**Vehicle:** Transactions or vehicles processed in a day

Rivanna Solid Waste Authority  
Ivy MSW Transfer Tonnages  
FY 2020 - 2023





## MEMORANDUM

**TO: RIVANNA SOLID WASTE AUTHORITY  
BOARD OF DIRECTORS**

**FROM: DAVID RHOADES, SOLID WASTE MANAGER**

**REVIEWED BY: BILL MAWYER, EXECUTIVE DIRECTOR**

**SUBJECT: IVY MATERIAL UTILIZATION CENTER REPORT/  
RECYCLING OPERATIONS UPDATE**

**DATE: July 25, 2023**

### **Ivy Material Utilization Center (IMUC) : DEQ Permit 132: 450 tons/day MSW limit**

#### **May 2023**

- **6,945 vehicles crossed the scales**
- The IMUC transfer station operated for 26 days and received a total of 5,646.86 tons of municipal solid waste (MSW), an average of 217.19 tons per day of operation. The monthly transfer station tonnage figures are attached to this report.
- 7,853.16 tons of non-MSW materials were received
- 13,500.02 tons were received as a combined total tonnage (MSW + non-MSW)

#### **June 2023**

- **7,267 vehicles crossed the scales**
- The IMUC transfer station operated 26 days and received a total of 5,440.60 tons of municipal solid waste (MSW), an average of 209.25 tons per day of operation. The monthly transfer station tonnage figures are attached to this report.
- 10,393.35 tons of non-MSW materials were received
- 15,833.95 tons were received as a combined total tonnage (MSW + non-MSW)

### **Oyster Shell Recycling Program**

In September 2019, RSWA joined with Virginia Commonwealth University's Rice Rivers Center by hosting a container at the McIntire Recycling Center to collect oyster shells from the public and local businesses. These shells are collected to support the Virginia Oyster Shell Recycling program at VCU's Rice Rivers Center. In June 2023, RSWA delivered the third load of shells to the collection center. To put

it briefly, the process is to collect the shells (like we're doing at MRC), cure them outside for a year, then package them and return them to the Rice Center. This is where the shells will be seeded with larvae and placed into the Bay.



### **Recycling Centers Customer Count Survey**

In May 2023, a customer count survey was completed at the McIntire Recycle Center and the Ivy Convenience Center. McIntire's total customer count was 3088 for the week, and Ivy's customer count was 530 customers for the week. McIntire showed a 10% increase in customers and Ivy showed a 7.8% decrease in customers since the last survey taken in 2021.

### **Transfer Station Update**

We are generally receiving about 20% more waste each day than last year. Our average daily tonnages are generally following seasonal trends, as shown on the following figure.

### Ivy MUC Transfer Station Construction and Domestic Waste Annual Comparison - Average Daily Tonnage



0	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec
2019	64.16	58.76	85.96	84.81	101.96	94.12	97.02	115.12	105.68	105.77	118.83	85.70
2020	86.71	86.68	93.28	92.01	97.88	101.71	121.70	134.57	144.31	122.08	131.84	119.33
2021	129.00	134.00	132.31	143.68	154.48	154.96	139.57	152.36	175.19	144.65	148.00	144.96
2022	113.16	143.29	143.40	166.52	164.09	181.82	160.85	174.31	179.66	181.75	177.29	165.45
2023	177.97	169.50	177.68	181.38	216.71	208.64						

AVERAGE DAILY TONNAGE



## MEMORANDUM

**TO: RIVANNA SOLID WASTE AUTHORITY  
BOARD OF DIRECTORS**

**FROM: JENNIFER A. WHITAKER, DIRECTOR OF ENGINEERING AND  
MAINTENANCE**

**REVIEWED BY: BILL MAWYER, EXECUTIVE DIRECTOR**

**SUBJECT: ADOPTION OF THE THOMAS JEFFERSON PLANNING DISTRICT  
COMMISSION'S REGIONAL NATURAL HAZARD MITIGATION PLAN**

**DATE: JULY 25, 2023**

This recommendation is to adopt the 2023 updated Thomas Jefferson Planning District Commission's (TJPDC) Regional Natural Hazard Mitigation Plan.

### **Background**

The Disaster Mitigation Act of 2000 required local governments to develop, implement, and routinely update a Natural Hazard Mitigation Plan compliant with the requirements of the Federal Emergency Management Agency. Over the past year, TJPDC staff have lead staff members from regional municipalities and authorities through the update and public feedback process. Our Director of Engineering and Maintenance, Jennifer Whitaker, is our representative on this committee. To be eligible for FEMA and VDEM emergency response and planning funding, RSWA must officially adopt the updated 2023 Natural Hazard Mitigation Plan.

### **Board Action Requested:**

Approve the attached Resolution to adopt the 2023 TJPDC Regional Natural Hazard Mitigation Plan.

### Attachments:

- Resolution for the Adoption of the TJPDC 2023 Regional Natural Hazard Mitigation Plan by the Rivanna Solid Waste Authority
- Cover and Executive Summary of TJPDC 2023 Regional Natural Hazard Mitigation Plan

# Regional Natural Hazard Mitigation Plan



2023 UPDATE

**Prepared By:**  
Thomas Jefferson Planning District Commission



401 East Water Street  
Charlottesville, VA 22902  
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- Appendix A: Hazard Mitigation Plan Working Group Roster, Meetings, Locality Contacts, Annual Meeting Notes, Town Letters
- Appendix B: Changes from 2018 Plan
- Appendix C: Documentation of Public Participation
- Appendix D: Capability Assessments
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# Executive Summary

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## BACKGROUND

The purpose of the Regional Natural Hazard Mitigation Plan is to prepare for natural disasters before they occur, thus reducing loss of life, property damage, and disruption of commerce. The Federal Emergency Management Agency (FEMA) requires such a plan as a condition for eligibility in certain mitigation grant programs. The plan applies to all jurisdictions in the Thomas Jefferson Planning District – Albemarle County, the City of Charlottesville, Greene County, Louisa County, Fluvanna County, Nelson County, and the Towns of Stanardsville, Louisa, Mineral, Scottsville, and Columbia. The original plan was adopted by all jurisdictions in 2006; the plan was updated in 2012, with FEMA approval on March 14, 2018 and formal adoption by all localities completed in June 2018. This plan was approved by FEMA on January 17, 2023, and its official adoption date is February 1, 2023, after it was adopted by Fluvanna County.

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## SECTIONS OF PLAN

The following sections are included in the plan:

1. **Introduction – overview of hazard mitigation generally.**
  2. **Planning Process – the process through which the plan was developed, including public input.**
  3. **Community Profile – general information about communities in the planning district.**
  4. **Hazard Identification and Analysis – general information about potential hazards in the planning district, the historic record of hazard events, and the probability of future events.**
  5. **Vulnerability Assessment – analysis of the impact hazards could cause, with estimated potential losses for various hazard scenarios.**
  6. **Capabilities Assessment – survey of current local capacity to prepare for natural hazards.**
  7. **Mitigation Strategies – goals, objectives, and action items selected to mitigate hazards identified.**
- 

## PLANNING PROCESS

The lead agency in the preparation of this plan is the Thomas Jefferson Planning District Commission. A Hazard Mitigation Working Group guided the preparation of this plan and will assume responsibility for monitoring the progress of implementation on an annual basis. The Working Group consisted of at least one representative from each locality, as well as state representatives. Working Group members represented the planning department, emergency management department, and/or Administration from each locality.

TJPDC staff organized monthly meetings of the Working Group to refine multiple components of the plan. First, a review of the data needs was conducted in order to determine how TJPDC staff would update information that would be used to update the Hazard Identification and Risk Assessment (HIRA) section and to ask members to promote a public survey that would collect information about community needs. Next, TJPDC staff compiled and presented updated data about the natural hazards that would be ranked according to relative risk in the HIRA. This information was presented, refined, and then sent out to each locality's Working Group member in order to formulate a risk assessment for their respective localities. These assessments were compiled and presented to the working group as the regional HIRA matrix. The Working Group then examined, edited, and finalized the Goals and Objectives used to guide the long and short-term goals for risk mitigation in the region. A public workshop was also held to examine these Goals and Objectives, as well as the regionwide HIRA. Finally, meetings with all locality staff and presentations to Local Emergency Planning Committees (LEPC) were conducted in order to present the 2018 plan's mitigation actions for each locality, the HIRA data, and best practices and example action items for them to formulate new action items and catalogue or update old ones. Staff compiled these into the Mitigation Strategies section of the plan. Staff also presented

to all nine governing bodies that are expected to adopt the approved plan in May, June, and July 2022 to inform these bodies of the planning process, plan contents, and expectations around adoption and grant opportunities available through adoption. During these series of meetings, a public comment period that was advertised in local media and local government communication channels occurred during June 2022. After compiling feedback from elected officials and the public, the draft plan was sent to VDEM in July 2022. Full meeting agendas, sign-in sheets, meeting materials, and recordings are available in Appendix A of all Working Group meetings, public meetings, and survey.

The following sources of stakeholder input were used:

- **Regular meetings of the Hazard Mitigation Working Group.**
- **One public workshop**
- **An online survey**
- **Presentations to Local Emergency Planning Committees and work with local staff**
- **Recommendations from existing plans and documents.**
- **Public comment period of entire draft plan**

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## HAZARD IDENTIFICATION AND ANALYSIS/VULNERABILITY ASSESSMENT

All hazards in the region are ranked by this plan according to overall relative threat, which combines the probability of occurrence with the impact of an event. The matrix The Working Group reviewed the HIRA data and assigned values for each hazard over December 2021. The HIRA matrix, created by Kaiser Permanente, creates a template for hazards can be ranked by relative risk according to probability, human impact, property impact, and business impact. TJPDC staff created a set of data for each hazard and asked each locality to fill out an individual matrix for their locality. Localities used this data, as well as staff input, to assign values for each hazard. TJPDC staff combined these matrices into the below matrix for the region. This matrix can be viewed as the final product of staff deliberation using best available weather data, staff input, and local emergency management information.

The HIRA uses two components to determine relative risk. First, probability is represented as a numeric value (1-3) that represents the likelihood of that the associated hazard will occur in the region in the next 5 years.

Probability Definition:

- 0- 0% probability of occurring in the next 5 years
- 1- 0-33% probability of occurring in the next 5 years
- 2- 34-66% probability of occurring in the next 5 years
- 3- 67-100% probability of occurring in the next 5 years

Severity is defined as the human, economic, and property impact that a hazard will have on the region if it occurs. Severity is separated into 3 distinct types of impact: Human, Property, and Business. For each of these categories, severity is represented as a numeric value (1-3) that represents the impact that an associated hazard would have on each category in the region.

Severity Definition:

- 0- no loss of life, business impact, or property damage
- 1- No loss of life, but non-life threatening injuries, minor property damage, and slightly reduced economic activity
- 2- Some moderate and life-threatening injuries and potential loss of life, moderate to major property damage, moderate to significant disruption of commerce
- 3- Moderate to major injuries and loss of life, major and sustained property damage, major disruption to commerce

EVENT	PROBABILITY	HUMAN IMPACT	PROPERTY IMPACT	BUSINESS IMPACT	RISK
	Likelihood this will occur	Possibility of death or injury	Physical losses and damages	Interruption of services	Relative threat*
<b>SCORE</b>	0 = no possibility 1 = some possibility 2 = very high possibility 3 = certain possibility	0 = no possibility 1 = some possibility 2 = very high possibility 3 = certain possibility	0 = no possibility 1 = some possibility 2 = very high possibility 3 = certain possibility	0 = no possibility 1 = some possibility 2 = very high possibility 3 = certain possibility	0 - 100%
Hurricane/high wind/windstorms	3	2	2	2	74%
Flooding	3	1	2	2	65%
Winter storms/ weather	3	1	1	2	56%
Communicable Disease/Pandemic	2	2	1	2	30%
Lightning	2	1	1	1	22%
Wildfire	2	1	1	1	22%
Drought / Extreme Heat	2	1	1	1	22%
Dam Failure	1	2	2	2	22%
Tornado	2	1	1	1	22%
Earthquake	1	1	2	2	19%
Landslide	1	1	1	1	11%
<b>AVERAGE SCORE</b>	<b>1.88</b>	<b>1.37</b>	<b>1.5</b>	<b>1.58</b>	<b>33%</b>

RISK = PROBABILITY * SEVERITY		
0.32	0.43	0.17

\*Threat increases with percentage.

Most data on hazards are derived from federal and state government sources, and data on development and critical facilities are derived primarily from local government sources. Results are presented in a series of maps and charts.

## MITIGATION STRATEGY

The following goals and objectives, grouped into five broad categories, are recommended by the plan: Education and Outreach, Infrastructure and Buildings, Whole Community, Mitigation Capacity, Information Data and Development: The five major goals of the plan have been components of all of the Regional Natural Hazard Mitigation Plans prior to this update. The Hazard Mitigation Working Group adjusted language regarding the goals and objectives under each category, in order to better guide the development of new mitigation action items, in early 2022. More information regarding these mitigation categories and their relation to mitigation activities can be found on page MS-1.

### Education and Outreach (E)

- **GOAL: Increase awareness of hazards and encourage action to mitigate the impacts**
  - Ø **OBJECTIVE: Educate families and individuals on disaster mitigation and preparedness options and promote self-sufficient buildings with multiple energy options**
  - Ø **OBJECTIVE: Train key agency staff and volunteer groups in disaster mitigation and preparedness**
  - Ø **OBJECTIVE: Train staff at schools and residential facilities in disaster mitigation and preparedness**
  - Ø **OBJECTIVE: Encourage and equip employers to develop emergency action plans**

## Infrastructure and Buildings (I)

- **GOAL:** Reduce the short and long-term impact of hazard events on buildings and infrastructure
  - ∅ **OBJECTIVE:** Diversify the energy system to provide multiple power source and fuel supply options and promote self-sufficient buildings with multiple energy options
  - ∅ **OBJECTIVE:** Diversify the communications system to provide alternative lines for use during loss of capacity
  - ∅ **OBJECTIVE:** Diversify the transportation system by increasing connectivity and providing modal options
  - ∅ **OBJECTIVE:** Elevate, retrofit and relocate existing structures and facilities in vulnerable locations
  - ∅ **OBJECTIVE:** Construct or upgrade drainage, retention, and diversion elements to lessen the impact of a hazard on an area
  - ∅ **OBJECTIVE:** Protect sensitive areas through conservation practices
  - ∅ **OBJECTIVE:** Ensure that each critical facility has a disaster plan in place
  - ∅ **OBJECTIVE:** Identify high hazard potential dams in the region and consider options to reduce vulnerabilities

## Whole Community (C)

- **GOAL:** Prepare to meet the immediate functional and access needs of the population during natural hazards
  - ∅ **OBJECTIVE:** Effectively communicate with and transport people regardless of their language proficiency and physical needs.
  - ∅ **OBJECTIVE:** Make information available, accessible, and accurate to ensure the entire population can access emergency shelters in a timely manner and have functional needs met, in the event of a natural hazard
  - ∅ **OBJECTIVE:** Updating necessary information consistently and through multiple different outlets through the development an emergency information communication plan

## Mitigation Capacity (M)

- **GOAL:** Increase mitigation and adaptation capacity through planning and project implementation
  - ∅ **OBJECTIVE:** Reduce property risks through planning, zoning, ordinances and regulations
  - ∅ **OBJECTIVE:** Incorporate mitigation planning concepts, climate resilience, and vulnerability planning into local plans and ordinances
  - ∅ **OBJECTIVE:** Pursue funding to implement identified mitigation and resilience strategies
  - ∅ **OBJECTIVE:** Encourage proactive management of hazard prone areas, environmental features, or infrastructure

## Information and Data Development (D)

- **GOAL:** Build capacity with information and data development to refine hazard identification and assessment, mitigation targeting and funding identification
  - ∅ **OBJECTIVE:** Identify data and information needs and develop methods to meet these needs
  - ∅ **OBJECTIVE:** Utilize data to ensure proactive targeting of mitigation efforts

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## MITIGATION ACTION ITEMS

A set of mitigation action items are designated for each locality to substantively further the objectives of the plan. The detailed list of action items includes the supporting goal, hazard to be mitigated, party responsible for implementation, timeframe of implementation, estimated cost, and potential funding sources. Furthermore, all action items are prioritized and listed in order from high, moderate, to low priority.

The following is an abridged list of action items for each jurisdiction and the Thomas Jefferson region

### Activity Code / Activity Description

Thomas Jefferson Region	
RHE1	Provide a copy of the Regional Hazard Mitigation Plan to each library in the Jefferson-Madison Regional Library system
RME1	Conduct a public education program on disaster preparedness, leveraging existing materials and sharing resources regionally

RME2	Engage Working Group and leverage connections to continue mitigation preparedness throughout plan's duration, before next update
RMD1	Identify locations for deposit of debris after a hazard
RME3	Continue to research grant and funding opportunities for regionwide hazard mitigation efforts
RHI1	Promote and educate localities on high hazard dam vulnerability reduction including rehabilitating/removing dams, elevating structures in inundation zones, adding flood protection, such as berms, floodwalls or floodproofing, in inundation zones

Albemarle County	
AHE1	Increase the number of trained emergency responders, both staff and volunteers. Establish a minimum ICS/emergency management training/certification requirement for essential County staff. Train/educate 70% of identified staff to minimum qualifications. Conduct disaster tabletop and/or full-scale scenarios on an annual basis to exercise skills/processes
AHI1	Implement recommendations from the urban Community Water Supply Plan and those for all other public water supplies within the County, including drought monitoring and management
AHI2	Develop an integrated regional security and monitoring system, including access control and intrusion detection
AHI3	Establish a backup Emergency Operations Center (EOC)
AHI4	Establish an Albemarle County specific basic Emergency Operations Plan and annexes for the 3 highest risk natural disasters as defined in the HIRA.
AHM1	Incorporate this Regional Hazard Mitigation Plan into local comprehensive plans and Emergency Operations Plans
AHM2	Install fire mitigation measures, including dry hydrants, fire breaks, and fire rings.
AHM3	Develop continuity-of-operations plan to ensure critical operations are maintained during power failure.
AHD1	Continue to assess resilience of existing critical facilities to natural hazards
AHD2	Mitigate Water and Wastewater System Failure or Contamination through community coordination and information/equipment sharing. Provide planning support for operational and integrated security management (including communications plan and continuity plan, emergency exercises, coordinated committee)
AHC1	Develop a debris management plan (including emergency response access and cleanup) for removal of fallen trees, etc. following a storm, such as hurricane or tornado.
AHC2	Engage in climate resilience and adaptation planning and implement initiatives to prepare for the anticipated hazards and impacts driven by climate change.
AHC3	Implement initiatives to reduce community greenhouse gas emissions as prescribed by the Climate Action Plan adopted in 2020 in order to mitigate climate change.
AME1	Ensure that all schools have regular disaster response drills
AME2	Continue to pursue conservation practices in sensitive areas, including riparian buffers and flood-prone areas.
AME3	Conduct comprehensive residential and business disaster preparedness programs focusing on the ability of residents and businesses to sustain themselves for 72 hours post emergency.
AME4	Define Neighborhoods/communities within the County and identify (using a contact management system) key residents and Non-Governmental organizations (NGOs) within each neighborhood who may connect the County and disaster services to the neighborhood during a crisis.
AMI1	Build or repair bridges so as not to minimize impacts to floodways
AMI2	Upgrade existing bridges to support emergency vehicles
AMI3	Carry out physical security improvements to water and wastewater systems, which may include fencing, door hardening, window hardening, locks, bollards, cameras, signage, lighting, access control and intrusion detection.
AMI4	Procure technology equipment for Water/Wastewater system component inspections.
AMI5	Improve the maintenance and repair of stormwater conveyance systems – in part through better coordination and cooperation with local partners
AMC1	Improve the preparedness of public and private dams within the county to withstand extreme flood events
AMC2	Maintain and update, as needed, the regional and local sheltering plans.

AMC3	Continue to assess designated community shelters for compliance with minimum specifications and best practices.
AMC4	During Comp Plan update, consider loosening restrictions on the types of County improvements in Rural Areas to accommodate community support facilities.
AMM1	Through the development process, discourage or prohibit development in flood-prone areas
AMD1	Expand GIS data and other technologies for the purposes of mitigation planning, preparedness planning, and response activities
ALE1	Encourage property owners and residents to clear storm drain inlets, channels, creek beds, and other conveyances of fallen trees and debris to minimize the potential for flow restrictions and flooding.
ALE2	Ensure all houses and businesses have clear address signs that are visible during snowstorms and other emergencies
ALE3	Continue educational campaign about the benefits of open space and sensitive area protection.
ALE4	Outdoor warning sirens for public use facilities
ALC1	Increase the capacity to shelter in place in public buildings.
ALC2	Promote biodiversity and native plant communities and control invasive species to improve the resilience of native ecosystems
ALC3	Develop communications strategy and protocols (both preparedness and response) using traditional and emerging outlets (local media, social media, etc.); consider languages besides English
ALC4	Improve ability to notify public in the event of extreme storms and/or dam failure, possibly through utilizing river level sensors and a downstream notification system
ALC5	Continue and expand the use of citizen alert systems. Explore use of Social Media platform emergency alert systems. Establish backup procedures/plans for emergency notification/alert when methods relying on power & technology are inoperable
ALI1	Implement Stormwater Management programs and initiatives to reduce flood risk throughout the community
ALI2	Improve the maintenance, repair, and upgrades to public and private stormwater management facilities and impoundments to withstand extreme storms and enhance flood control.
ALI3	Partner with utility companies to keep power lines and other utilities free of vegetation
ALI4	Implement programs and initiatives to reduce pollution discharge via stormwater systems
ALI5	Continue to upgrade security systems
ALI6	Promote increased tree canopy in urban areas to reduce heat island effect.

#### Town of Scottsville

ASMM1	Update the Town's Floodplain Maps to inform decision-making.
ASMM2	Improve Riparian Buffers along parts of Mink Creek and the James River.
ASLM1	Improve Regional Transit for emergency evacuations, prevention, and resiliency.

#### City of Charlottesville

CHE1	Provide training for building inspectors and code officials on mitigation techniques and hazard-resistant buildings.
CHE2	Ensure that all city schools have an emergency and disaster plan and regularly conduct disaster response drills.
CHM1	Complete Flood Resilience Plan
CHM2	Complete Climate Adaptation Plan
CHM3	Update floodplain regulations
CHM4	Incorporate hazard mitigation plan into community plans. Identify senior living/special needs residences in areas vulnerable for flooding.
CHM5	Conduct Community Emergency Response Team (CERT) classes to equip individuals and groups to assist in the event of a disaster.
CHM6	Provide incentives to institutions and homeowners for use of low-flow appliances.

CHM7	Continue to expand use of citizen alert system. (Code RED) Develop community promotion plan for Code RED.
CHM8	Inventory all shelters and public buildings to ensure emergency preparedness supplies and equipment are onsite.
CMD1	Identify vulnerable structures and apply for funding to implement acquisition and demolition, relocation, floodproofing, or structural retrofit projects
CMD2	Conduct a needs survey that identifies special needs population and residences and/or facilities needing attention in the event of emergencies or evacuations
CMI1	Ensure culverts, streams, channels, storm drains, and gutters remain clear of debris
CMI2	Build or repair roadway and pedestrian crossings so as not to impede floodwaters
CMI3	Retrofit emergency service buildings for hazard preparedness and resistance.
CMM1	Support volunteer groups and encourage collaboration on public outreach and education programs on hazard mitigation.
CMM2	Pursue conservation practices in sensitive areas (stream corridor restoration, forest management )
CMM3	Create a strategy for using existing media outlets for communications during a hazard event.
CMM4	Ensure that all critical facilities have updated shelter-in-place plans
CLE1	Provide citizens with literature about flood and drought-smart landscaping and GI. Promote VCAP.
CLE2	Create educational campaign about floodplain locations, the benefits of open space and riparian corridors.
CLI1	Improve the maintenance of stormwater infrastructure.
CLI2	Reduce pollution discharge to and erosive conditions in receiving waters.
CLI3	Increase infiltration capacity and volumetric reductions in runoff via stormwater control measures (SCMs).
CLI4	Improve capture and conveyance capacity of stormwater infrastructure.

Fluvanna County	
FHE1	Increase the number of trained emergency responders, both staff and volunteers
FHI1	Install new fire hydrants along new JRWA water line
FHC1	Conduct regular disaster response drills in schools, and with staff at Assisted Living Facilities and Nursing Homes
FHC2	Continue and expand the use of citizen alert systems
FHC3	Implement community notification protocols before, during, and after a disaster event
FHM1	Develop Continuity of Operations Plans (COOP) for locality departments and update the plans annually
FME1	Carry out a targeted educational campaign in subdivisions at high risk for fire impacts
FME2	Conduct tabletop exercises for damage assessments
FME3	Bring in experts to conduct in-house staff training in best management practices in hazard mitigation and preparedness
FME4	Offer training on post-event inspection and develop a protocol to serve as a mechanism for prioritization
FMI1	Identify vulnerable structures and apply for funding to implement acquisition and demolition, relocation, floodproofing, or structural retrofit projects
FMI2	Install warning signs and develop alternate routes for roads that flood briefly during heavy rains (e.g. Slaters Fork Road, Carysbrook, farm pond dam locations)
FMM1	Identify areas to receive debris from post-event clean-up efforts
FMD1	Expand GIS data for us in mitigation planning, preparedness planning, and response activities
FLE1	Carry out an educational campaign for businesses to develop emergency procedures and shelter-in-place plans
FLI1	Identify repetitive loss properties, develop appropriate mitigation action, and apply for funding
FLI2	Demolish and remove remains of old surface water treatment plant located on TM 58 A 26 & 27(County-owned property)
FLI3	Remove +/-20,000 gallon water storage tank from James River.
FLC1	Develop County agreements (possibly with women's prison) for food services for county-supported shelters (including high school)



FLM1	Develop evacuation plans for dam breaches from Charlottesville-area dams
FLM2	Develop a comprehensive fire safety communication strategy, addressing open space, burn permit, FireWise, and dry hydrants
FLM3	Adopt fire code
FLM4	Incorporate this Regional Hazard Mitigation Plan into local comprehensive plans and Emergency Operations Plans
FLD1	Develop a disaster plan for the Fork Union Sanitary District (FUSD)

### Greene County

GHE1	Conduct Firewise workshops
GHI1	Partner with utility companies to keep power lines free of vegetation
GHI2	Conduct structural evaluations of current and proposed shelters
GHI3	Implement recommendations from Greene County Water Supply plan
GHI4	Enhance dam safety; table tops/exercises
GHI5	Install backup generators in shelters and critical facilities
GHI6	Enhance public safety emergency communications to provides reliable, dependable coverage
GHI7	Enhance access to broadband countywide
GHC1	Assist the schools with regular disaster response drills and disaster planning
GHM1	Conduct CERT classes to equip individuals and groups to assist in the event of a disaster
GHM2	Routinely inspect public and private fire hydrants
GHM3	Ensure all critical facilities have updated shelter-in-place plans
GHM4	Increase number of trained emergency responders and establish recruitment and retention program
GME1	Develop cooperative agreements between all agencies involved in emergency management, provide methods of communication between agencies responsible for being present at the Emergency Operations Center following a disaster, and conduct joint exercises
GME2	Create a community toolbox with tools and information for local homeowners
GMI1	Add signage to roads in locations that frequently flood
GMM1	Develop and implement a drought management plan
GMM2	Create a strategy for using existing media outlets for communications during a hazard event
GMM3	Provide career fire staff
GMI2	Upgrade all area bridges to support emergency vehicles
GMD1	Conduct channel improvement study
GMD2	Create a needs survey that identifies special needs population and residences and/or facilities needing attention in the event of emergencies or evacuations
GLE1	Provide citizens with literature about flood and drought-smart landscaping
GLI1	Build and repair bridges so as not to impede floodwaters
GLI2	Ensure culverts, streams, channels, storm drains, and gutters remain clear of debris
GLI3	Install more dry hydrants in high wildfire risk areas
GLI4	Repair, replace, or relocate septic and drainage fields that leak sewage into bodies of water during flooding events
GLI5	Bury utilities in the county
GLM1	Ensure all structures have clear address signs that are visible

### Town of Stanardsville

GSHM1	Increase water capacity and pressure for the Town of Stanardsville to enable optimal emergency response
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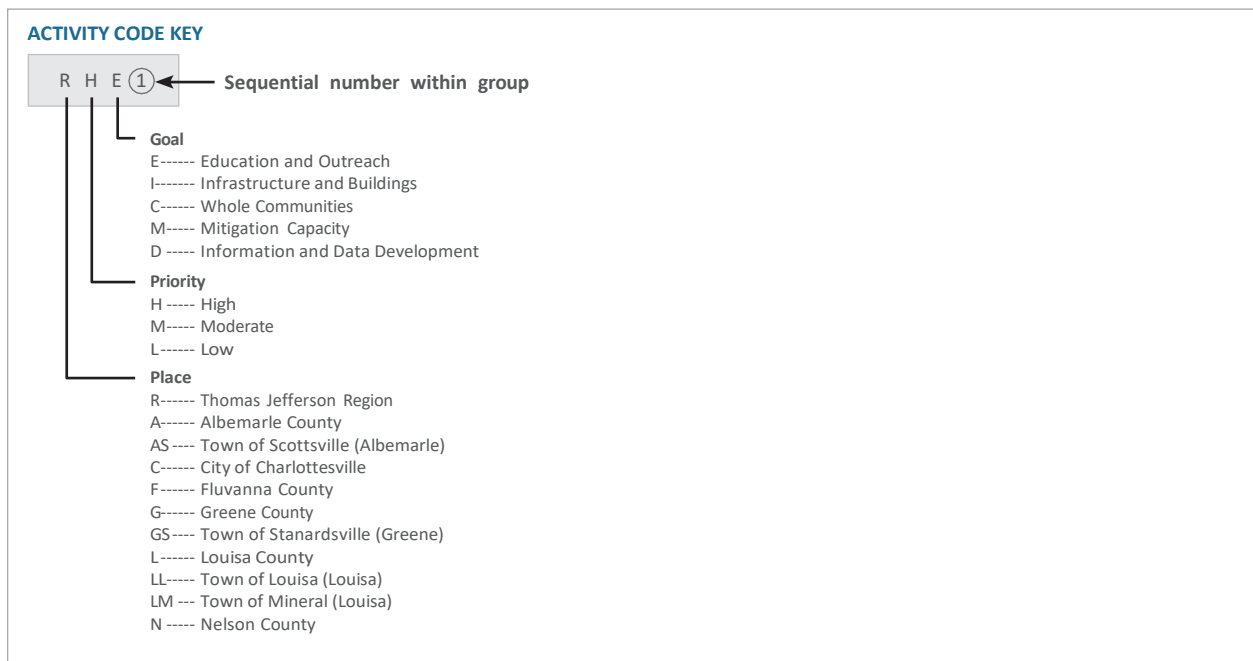
GSMM1	Ensure all houses have clear address signs that are visible
<b>Louisa County</b>	
LHI1	Enhance access to broadband internet in rural areas
LHI2	Install backup generators in shelters and critical facilities
LHI3	Implement recommendations from Water Supply Plan
LHC1	Ensure that all schools have regular disaster response drills
LHM1	Provide training for building inspectors and code officials on mitigation techniques and hazard-resistant building
LHM2	Continue and expand use of citizen alert systems countywide, including within Towns
LHM3	Increase number of trained emergency responders
LHM4	Develop driveway codes to allow emergency vehicle access
LHM5	Work to prevent stormwater and wastewater flooding in water bodies across the County
LMI1	Put high water marks on bridges
LMI2	Investigate, plan, and implement repairs and/or upgrades to Bowlers Mill dam to preserve flood control benefits for the historic Green Springs area.
LMM1	Investigate safety and maintenance of roads in private communities
LMM2	Conduct Community Emergency Response Team (CERT) classes to equip individuals and groups to assist in the event of a disaster
LMM3	Ensure all houses have clear address signs that are visible during storms events
LMM4	Incorporate hazard mitigation plans into community plans
LMM5	Incorporate special needs populations into Hazard Mitigation and Emergency Operations Plans
LLE1	Provide educational outreach about the burn permit process
LLE2	Create an educational program to help residents understand the benefits and costs of earthquake insurance
LLI2	Add signage to roads in locations that frequently flood
LLD1	Track and map space available for pets at local SPCA and other animal shelters. Install generator and place shelter on snow removal priority list.

<b>Town of Louisa</b>	
LLHI1	Install backup generators in shelters and critical facilities – the Town Hall generator will be upgraded to serve as a shelter during emergencies
LLHM1	Incorporate hazard mitigation plans into community plans
LLMM1	Ensure all houses have clear address signs that are visible during snowstorms

<b>Town of Mineral</b>	
LMHM1	Incorporate hazard mitigation plans into community plans
LMMM1	Ensure all houses have clear address signs that are visible during snowstorms
LMMM2	Work with the Louisa County to designate a representative for the County’s Emergency Operations Committee
LMMM3	Develop a system for alerts and other communication with citizens
LMMI1	Mark the fire hydrants with reflective markers for large snow storms
LMMI2	Install emergency generator for wells
LMLI1	Bury utilities underground in town of Mineral

<b>Nelson County</b>	
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NHM1	Continue and expand use of citizen alert systems
NHM2	Provide training for building inspectors and code officials on mitigation techniques and hazard-resistant building
NME1	Conduct Firewise Workshops
NME2	Provide educational instruction and materials to school age youth and their teachers on proper procedures for responding to natural disasters
NMI1	Investigate safety and maintenance of roads in private communities
NMM1	Ensure all houses have clear address signs that are visible during snowstorms
NLE1	Ensure that all homeowners and businesses located in areas prone to landslides are aware of the risks and appropriate responses to an event
NLI2	Maintain and add more fire rings in camping areas for controlled fires





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## RESOLUTION

### ADOPTION OF THE REGIONAL NATURAL HAZARD MITIGATION PLAN BY THE RIVANNA SOLID WASTE AUTHORITY

WHEREAS, the Federal Disaster Mitigation Act of 2000, as amended, requires that local governments develop, adopt and update natural hazard mitigation plans in order to receive certain federal assistance; and,

WHEREAS, the Thomas Jefferson Planning District’s Regional Natural Hazard Mitigation Plan has been prepared in accordance with FEMA requirements at 44C.F.R. 201.6; and,

WHEREAS, Rivanna Solid Waste Authority has been involved in the preparation of the Regional Natural Hazard Mitigation Plan, with RSWA staff representing the Authority on the Working Group and working with TJPDC staff to identify mitigation actions for inclusion in the plan, and,

WHEREAS, the Virginia Department of Emergency Management and the Federal Emergency Management Agency have approved the plan with no changes recommended; and,

WHEREAS, hazard mitigation is essential to protect life and property by reducing the potential for future damages and economic losses resulting from natural disasters;

NOW THEREFORE BE IT RESOLVED, the Rivanna Solid Waste Authority Board of Directors does hereby adopt the Regional Natural Hazard Mitigation Plan.

Michael Gaffney, Chairman  
Jim Andrews  
Brian Pinkston  
Jeff Richardson  
Michael Rogers  
Stacey Smalls  
Lance Stewart

ADOPTED by the Rivanna Solid Waste Authority Board of Directors on this 25th day of July 2023.

SIGNATURE:

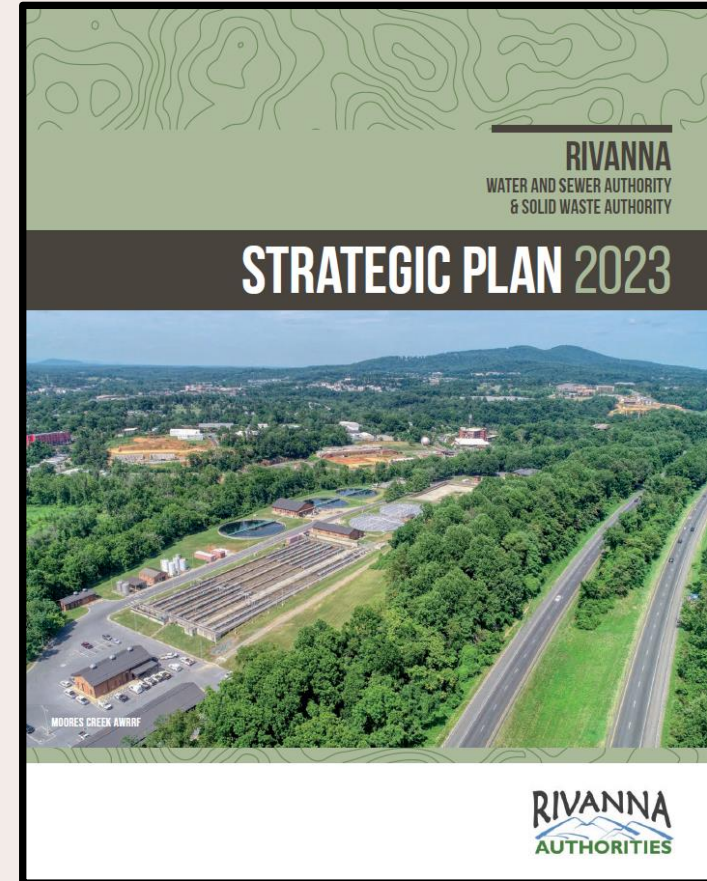
\_\_\_\_\_  
RSWA Executive Director

ATTEST:

\_\_\_\_\_  
Executive Assistant

# Rivanna Authorities Strategic Plan Update

Presented to the RSWA and RWSA Boards of Directors  
By Deborah Anama, Executive Assistant  
July 25, 2023



# Strategic Framework

## Vision

To serve the community as a recognized leader in environmental stewardship by providing exceptional water and solid waste services.

## Mission

Our knowledgeable and professional team serves the Charlottesville, Albemarle, and UVA community by providing high-quality water and wastewater treatment, refuse, and recycling services in a financially responsible and sustainable manner.

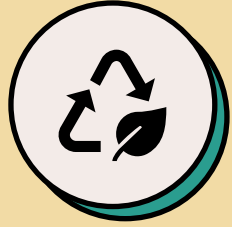
## Values

- Integrity
- Teamwork
- Respect
- Quality

# Priorities



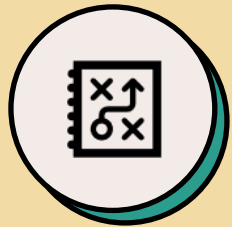
Communication and Collaboration



Environmental Stewardship



Workforce Development



Optimization and Resiliency



Planning and Infrastructure

# Communication and Collaboration

To elevate awareness of the Authorities' impact and value through proactive communication, effective partnerships, and community involvement.



## Outreach and Partnerships

Volunteer Time Off Policy –  
Fix A Leak



## Education

Student Tours – Social Media



## Community Involvement

Grand Opening – Newsletters  
Press Releases



## Communications

Brand Identity – Team Building  
Uniform Staff Signatures



# Environmental Stewardship

To demonstrate and promote best practices in sustainability, resources conservation, and environmental education.



“No Mow”  
Initiative  
Sustainability



Community  
Partnerships  
Relationships – Resources



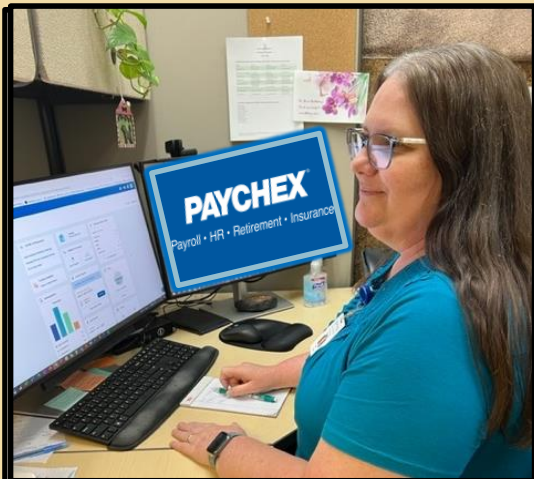
Environmental  
Engagement  
RiverFest



Resource  
Conservation  
Fuel Savings – Solar Options

# Workforce Development

To attract, develop, and retain a professional, highly skilled, engaged, and diverse team.



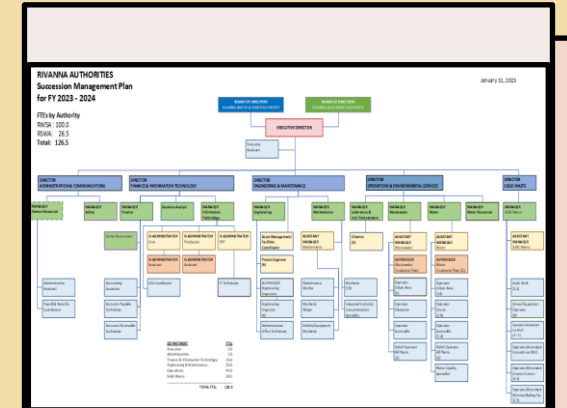
Human Resource Information System  
Expanding HR Recruitment



Professional Training  
Leadership Development Program



Employee Retention  
Less than 10%



Staffing Master Plan  
Updated 5 Year Plan

# Optimization and Resiliency

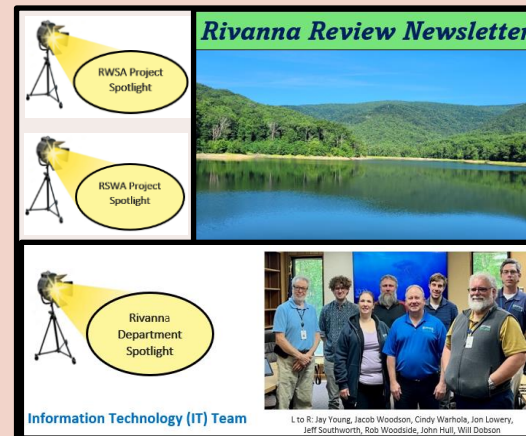
To empower a culture of innovative and collaborative thinking that advances efficient operational processes, technology modernization, and risk mitigation.



Standard Operating Procedures  
44 New Video SOPs



Operational Optimization  
Zeta-Meter



Cross-Departmental Awareness  
Newsletter Spotlight



Employee Safety Training  
CPR - First Aid – Safety Mondays

# Planning and Infrastructure

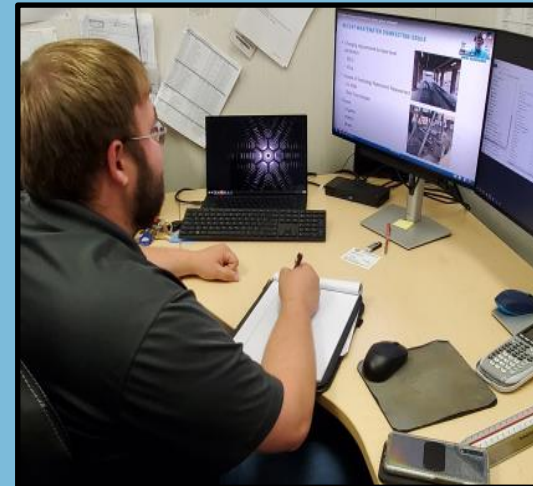
To address evolving needs by planning, delivering, and maintaining dependable infrastructure and facilities in a financially responsible manner.



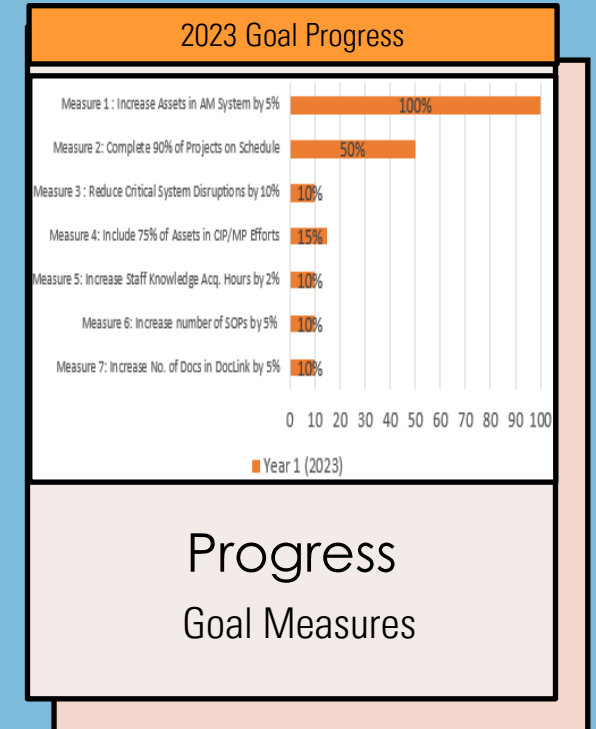
Asset Management  
Planning



Project  
Management  
WorkOtter software – DocLink



Knowledge and  
Education  
Training – SOPs – Conferences



Progress  
Goal Measures



Providing high-quality water, wastewater, refuse and recycling services to the Charlottesville, Albemarle, and UVA community.

[www.rivanna.org](http://www.rivanna.org)

# Questions!