

## IV. Workgroup Recommendations

### SECTION A: Develop Common Understandings

#### 1) A chronological history of key Coffin Butte Landfill topics

##### B) Landfill Size and Development History

###### (i) Development Activity

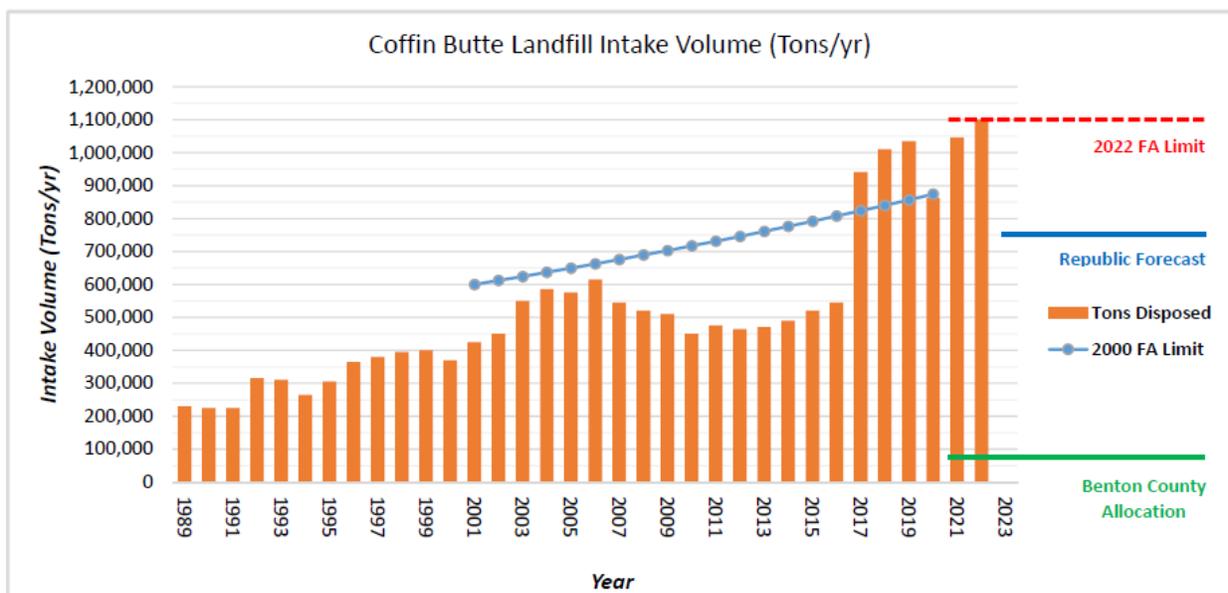
The following table details development history at Coffin Butte Landfill, as reported in various landfill annual reports.

Year	Development Activity Reported
1977	Old burn dump site adjacent to existing quarry officially closed in 1977 (Benton County, 1997)
1993	Asbestos disposal cell west of Cell 1 constructed (5 year capacity) (Benton County, 1994)
	Cell 2B constructed (11 acres) (Benton County, 1994)
1995	Cell 2C constructed (14.4 acres) (Benton County, 1994)
1996	Cell 1A Closed and capped (Benton County, 1997)
	Leachate storage lagoon capacity expanded (Benton County, 1997)
	Landfill Gas pipeline expansion (Benton County, 1997)
1997	Cell 2D constructed (Benton County, 1998)
1999	Replaced Cell 2 12mil plastic interim cover material. (Benton County, 2000)
	Cell 3A constructed (7.5 acres) (Benton County, 2000)
	Landfill Gas main line below ground loop completed (Benton County, 2000)
	Added southbound turn land on Coffin Butte Road and deceleration and acceleration lanes to Hwy 99W. (Benton County, 2000)
2002	Temporary sump infrastructure for Cell 3A installed (Allied Waste Industries, Inc., 2002)
	Public tipping area constructed in 2002 (Allied Waste Industries, Inc., 2002)
	New landfill gas flare installed in 2002, expanding flare capacity to 2000 standard cubic feet per minute (Allied Waste Industries, Inc., 2002)
2004	Cell 3B constructed (Allied Waste Industries, Inc., 2004)
	Final closure of Cell 2 South Slope (Allied Waste Industries, Inc., 2004)
	Leachate storage pond demolished and replaced (Allied Waste Industries, Inc., 2004)
2005	Cell 3C constructed (Valley Landfills, Inc., 2005)
	Major landfill gas system upgrades (Valley Landfills, Inc., 2005)

	Construction of Vegetation visual screen along Hwy 99W completed (Valley Landfills, Inc., 2005)
<b>2006</b>	Cell 3D Phase 1 constructed (Valley Landfills, Inc., 2006)
	Four acres of wetlands developed at southwest corner of Hwy 99W and Coffin Butte rd. to meet Wetland Mitigation Plan requirements (Valley Landfills, Inc., 2006)
	Major landfill gas system upgrades (Valley Landfills, Inc., 2007)
<b>2007</b>	Cell 3 closure phase 1 completed (Valley Landfills, Inc., 2007)
	Wetland development east of Soap Creek, south of Coffin Butte rd. to meet Wetland Mitigation Plan requirements (Valley Landfills, Inc., 2007)
	Gas-to-Energy facility expansion completed (Valley Landfills, Inc., 2007)
<b>2008</b>	Cell 3D phase 2 constructed (Valley Landfills, Inc., 2008)
	Wetland development completed east of Soap Creek, south of Coffin Butte rd. to meet Wetland Mitigation Plan requirements (Valley Landfills, Inc., 2008)
<b>2010</b>	Cell 3 closure phase 2 completed (Valley Landfills, Inc., 2010)
<b>2011</b>	Cell 4 constructed, northern half of 14 acres (Valley Landfills, Inc., 2011)
	Stormwater enhancements, increasing capacity and adding bioswale (Valley Landfills, Inc., 2011)
	Cell 3 South Slope closure completed (Valley Landfills, Inc., 2011)
<b>2012</b>	Cell 4 constructed, southern half of 14 acres (Valley Landfills, Inc., 2012)
	Cell 5A excavation (east Triangle area) (Valley Landfills, Inc., 2012)
	Stormwater sedimentation pond constructed. (Valley Landfills, Inc., 2012)
<b>2013</b>	Cell 5A Construction completed (Republic Services, 2013)
	New public tipping area completed (Republic Services, 2013)
	Landfill entrance resurfaced from Coffin Butte Road to the scale house (Republic Services, 2013)
<b>2014</b>	Cell 2 buttress constructed (Republic Services, 2014)
	Installation of an additional 1,000 standard cubic feet per minute (SCFM) flare (Republic Services, 2014)
	Both incoming and outgoing scales were replaced (Republic Services, 2014)
<b>2015</b>	Cell 5 Excavation – Excavation of approximately 130,000 yards of rock/soil for future cell development (Republic Services, 2015)
<b>2016</b>	Cell 5 Excavation – Excavation of approximately 380,000 yards of rock/soil for future cell development (Republic Services, 2016)
	Construction of additional stormwater settling pond (Republic Services, 2016)
	Planted row of trees along the eastern perimeter of the landfill property to help screen the site from Hwy 99W (Republic Services, 2016)
<b>2017</b>	Cell 5B construction began, 11 acres (Republic Services, 2017)
<b>2019</b>	Cell 5C – Construction of the liner system for the next phase of the landfill. This cell will be approximately 5.5 acres. (Republic Services, 2019)
	Burn Dump Relocation – Begin the first phase of moving historic waste material into a lined portion of the landfill. (Republic Services, 2019)
<b>2020</b>	Burn Dump Relocation – Begin the second phase of moving historic waste material into a lined portion of the landfill. (Republic Services, 2020)

2021	Cell 5D – Construction of the liner system for the next phase of the landfill. This cell will be approximately 4.5 acres. (Republic Services, 2021)
	Burn Dump Relocation – Begin the third and final phase of moving historic waste material into a lined portion of the landfill. (Republic Services, 2021)
2022	Burn Dump Relocation – Complete final phase of moving historic waste material into a lined portion of the landfill. (Republic Services, 2022)
	Paving – Paving of the entrance road from the scale house to the public area. (Republic Services, 2022)

### (ii) Intake Volume History at Coffin Butte Landfill



- Large-scale industrial operation: 1.1 M Tons/year => 7,000,000 lbs/day, 6 days/week
- Dramatic growth starting in 2017 – What happened to cause and sustain this?
- The 2000 Franchise Agreement intake limit was violated in years 2017–2019 – Why no County action?
- 2022 volume is estimated from first half 2022 filings with DEQ.
- Recent years show sustained high demand for landfill volume – Does Republic plan to maintain this level?
- Even a 5,000,000 cubic yard expansion cell would fill in less than 5 years at the current intake rate

This plot shows why we (workgroup, staff, administration, the public and the franchisee) are here:

Large intake volume in the last 6 years is quickly depleting the available Cell 5 volume.

### **(iii) The Quarry Problem**

Problem statement:

Per Republic Services, Coffin Butte landfill intake volume is consuming available space at a rate which will outstrip the capacity of the existing cell (Cell 5) in approximately 4 years, about 4 years before quarry mining (to be used for Cell 6) is complete.

Causes:

- High intake rate (73% Y/Y increase in 2017, continued very high intake from then; why?)
- Lack of planning by franchisee and/or business motivations to maintain high intake even with looming space problem and/or unavoidable or difficult-to-avoid disposal needs. None of these are the responsibility of Benton County government, staff, or citizens.
- Slow quarry excavation – approx. 250k yd<sup>3</sup> per year? Is this additional space actually permitted for landfill?

Options:

1. Lower intake volume until Cell 6 is ready (if deficit is ~1M yd<sup>3</sup>, a decrease to about 750,000 Tons/year over

the next 4 years should work).

2. Accelerate quarry extraction and stockpile.

3. Write off the additional (unmined) Cell 6 space.

4. Expansion cell in current landfill area, similar to the East and West triangles in 2003.

5. Expansion cell south of Coffin Butte road – effectively establishing a new landfill site.

6. Other(s)?