From:
 John Stewart

 To:
 Water Permits

 Cc:
 Kyle Miller

Subject: [EXTERNAL] Albemarle NPDES Renewal Application

Date: Friday, December 2, 2022 10:26:34 PM

Attachments: <u>image001.png</u>

*** This is an EXTERNAL email. Please exercise caution. DO NOT open attachments or click links from unknown senders or unexpected email - STS-Security. ***

Dear Sir or Madam,

Attached to this email you find Albemarle's New Johnsonville Plant 2022 NPDES Renewal Application. We certify that all the data used in the completion of this application is accurate to the best of our ability and knowledge. If you need anymore information, or maybe have any follow-up questions, please do not hesitate to reach out to either Kyle Miller, Phone (931)535-6201 E-mail Kyle.Miller@Albemarle.com or myself. Thanks!

John Stewart | ▲ ALBEMARLE | Lab Manager / Environmental Professional 2: (931) 535-6209 Cell (931) 209-8553 | 856 Foote Lane, New Johnsonville, TN 37134

www.albemarle-lithium.com

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Submitted electronically to water.permits@tn.gov

Tennessee Department of Environment and Conservation Division of Water Resources William R. Snodgrass Tennessee Tower 312 Rosa L. Parks Avenue, 11th Floor Nashville, TN 37243

Subject: NPDES Permit No. TN0062537 Renewal Application

Albemarle U.S., Inc. | New Johnsonville, Tennessee

To Whom It May Concern:

Please find enclosed the National Pollutant Discharge Elimination Systems (NPDES) permit renewal application for the Albemarle U.S., Inc. (Albemarle) facility located in New Johnsonville, Tennessee.

The NPDES permit application consists of the following:

- 1. This transmittal letter
- 2. TDEC Form CN-1090 Permit Contact Information
- 3. EPA Form 1 General Information
- 4. Alternatives Analysis
- 5. Figures 1, 2, and 3
- 6. EPA Form 2C Wastewater Discharge Information
- 7. EPA Form 2F Storm Water Discharges Associated with Industrial Activity

All facility process wastewater is collected in a retention basin and discharged through Outfall 001. The batch discharge from Outfall 001 includes a commingled flow of process wastewater and storm water that is treated by a simple pH adjustment system. EPA Form 2C summarizes the process wastewater streams located at the facility. Process wastewater from the North Plant is generated from process equipment rinsing. Process wastewater from the South Plant is generated by the following operations:

- Filter Tank & Cylinder Cleaning;
- Casting Operations Lithium Drum rinsing;
- Dewatering of the co-product solvent process;
- Tanker rinsing;
- Shipping container deactivation; and
- Cylinder and process equipment rinsing.

EPA Form 2F describes the storm water discharges associated with the industrial activities at the New Johnsonville facility. The facility has one storm water outfall, SW2. Drainage from former outfall SW1 is incorporated into Outfall 001.

The area that drains to Outfall 001 encompasses the North Plant and South Plant production areas and finished product storage areas. The process and storm water from the North Plant production and finished product storage areas drain into a lift station that is pumped to the retention pond. All storm water from the South Plant is collected in a catch

basin and pumped to the retention pond, commingled with the facility process wastewater. As previously noted, the water in the retention pond is treated by a simple pH adjustment system before discharging through outfall 001. During peak storm events, storm water may be discharged without pH adjustment.

The area that drains to SW2 encompasses the rail sidings into the plant, raw material loading and unloading areas located at the North Plant, storm water from the vegetative area to the north of the industrial areas, and storm water from the eastern portion of the facility that flows through a ditch into SW2. All storage and process areas of the North Plant are contained by dikes so that contaminated storm water may be pumped to the retention pond. An undeveloped area also discharges to SW2.

Due to lack of recent storm events, we do not have lithium data on the discharge at SW2. Volatiles are used as solvents in products and raw materials. The low concentration of volatiles (cyclohexane, toluene, and naphthalene) indicate that lithium will also be low concentration. We will analyze for lithium with the next round of samples from SW2.

If you have any questions concerning this permit application, please do not hesitate to call me at (540) 230-3745 or email at kyle.miller@albemarle.com.

Sincerely, Kyle Miller Plant Manager



STATE OF TENNESSEE **DEPARTMENT OF ENVIRONMENT AND CONSERVATION DIVISION OF WATER RESOURCES**

Water-Based Systems
William R. Snodgrass - Tennessee Tower
312 Rosa L. Parks Avenue, 11th Floor
Nashville, TN 37243-1102

PERMIT CONTACT INFORMATION

Please complete all sections. If one person serves multiple functions	s, please repeat this information in each section.					
PERMIT NUMBER: TN0062537	DATE: 12/1/2022					
PERMITTED FACILITY: Albemarle U.S., Inc.	county: Humphreys					
OFFICIAL PERMIT CONTACT:						
(The permit signatory authority, e.g. responsible corporate officer, principle exe						
Official Contact: Kyle Miller	Title or Position: Plant Manager					
Mailing Address: 856 Foote Lane	New Johnsonville State: TN Zip: 37134					
Phone number(s): (540)230-3745	E-mail: kyle.miller@albemarle.com					
PERMIT BILLING ADDRESS (where invoices should be sent):						
Billing Contact: Kyle Miller	Title or Position: Plant Manager					
Mailing Address: 856 Foote Lane	City: New Johnsonville State: TN Zip: 37134					
Phone number(s): (540)230-3745	E-mail: kyle.miller@albemarle.com					
FACILITY LOCATION (actual location of permit site and local con	tact for site activity):					
Facility Location Contact: Kyle Miller	Plant Manager					
Facility Location (physical street address): 856 Foote Lane	New Johnsonville State: TN Zip: 37134					
Phone number(s): (540)230-3745	kyle.miller@albemarle.com					
Alternate Contact (if desired):	Title or Position:					
Mailing Address:	City: State: Zip:					
Phone number(s):	E-mail:					
FACILITY REPORTING (Discharge Monitoring Report (DMR) or o	ther reporting):					
Cognizant Official authorized for permit reporting:	Title or Position:					
Kyle Miller	Plant Manager					
Mailing Address: 856 Foote Lane	New Johnsonville TN Zip: 37134					
Phone number(s): (540)230-3745	E-mail: kyle.miller@albemarle.com					
Fax number for reporting:	Does the facility have interest in starting electronic DMR reporting? Yes No					

CN-1090 (Rev. 11-14) RDA 2366

Form An	nroved (2MR	Nο	2040-0086

	ype in the unshad	· · · · · · · · · · · · · · · · · · ·							Approved. OMB No. 2040-0	086.			
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III. FACILIT	T INAIVIE	PLEASE	PLAC	JE LAI	BEL IN THIS	S SI	PAGE	information that should appear), please provide it in the proper fill-in area(s) below. If the label is complete and correct, you					
	Y MAILING							nee	d not complete Items I, III, V, a t be completed regardless). Cor	nd VI (except	VI-B v	vhich label
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VI. FACILITY	LOCATION								criptions and for the legal author is collected.	rization	s unde	wnicr	1 this
II. POLLUTAN	CHARACTERIS	TICS											
submit this for you answer "n	m and the supple o" to each questio	nrough J to determine whethe mental form listed in the pare on, you need not submit any o o of the instructions for definiti	nthesi f these	s follov forms	wing the qu s. You may faced terms	esti ans	on. Mark "X" in the box in the	he tl	nird column if the supplemen	ntal for	m is a	ttache n C o	ed. If
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O la Haia a fac	. Ultra and a landar and a same and		16	17	18	_	discharge to waters of the		, ,	19	20	2	1
		ntly results in discharges to an those described in A or B	X		X	D.	Is this a proposed facility (or B above) which will resu		r than those described in A		X		
above? (FO	RM 2C)		22	23	24	1	the U.S.? (FORM 2D)		ŭ	25	26	2	7
		reat, store, or dispose of				F.			t this facility industrial or				
hazardous	wastes? (FORM	3)		X					the lowermost stratumer mile of the well bore,		X		
			28	29	30	-	underground sources of dri			31	32	3:	3
		is facility any produced water				Н.	Do you or will you inject	at th	nis facility fluids for special				
		brought to the surface in					processes such as mining of sulfur by the Frasch process, solution mining of minerals, in situ combustion of fossil fuel, or recovery of geothermal energy? (FORM 4)						
		oil or natural gas production, ed recovery of oil or natural		$ \wedge $							X		
gas, or inje		age of liquid hydrocarbons?											
(FORM 4)			34	35	36	1				37	38	3!	9
I. Is this facilit	y a proposed stat	tionary source which is one slisted in the instructions and				J.	Is this facility a proposed	d st	ationary source which is all categories listed in the		ا , ا		
		00 tons per year of any air		X			instructions and which will	l po	tentially emit 250 tons per		X		
		Clean Air Act and may affect	40	41	42	-			ted under the Clean Air Act	43	44	4	-
or be locate	d in an attainment	t area? (FORM 5)	40	41	42		(FORM 5)	r be located in an attainment area?				4:	,
III. NAME OF	FACILITY		!										
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15 16 - 29 30										69			
IV. FACILITY	CONTACT												
		A. NAME & TITLE (last	, first, (& title)				E	3. PHONE (area code & no.)				
2 MILLER	R, KYLE, P	LANT MANAGER '	' '	' '	1 1 1		_ ' ' ' ' ' ' ((54	:0)'230-3745 ' '				
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V.FACILTY MA	AILING ADDRESS	3											
		A. STREET OR P.	O. BO	X									
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O NEW ITC	HNSONVILL						TN 37	713	4				
6 NEW JC		· -					10 11 10 17		- 51				

CONTINUED FROM THE FRONT		
VII. SIC CODES (4-digit, in order of priority)		
A. FIRST	ere (specify)	B. SECOND
(specify) Industrial Organic Chemicals, Not Elsewhole Classified	ere (specify)	
15 16 - 19	15 16 - 19	
C. THIRD		D. FOURTH
c (specify)	c (specify)	
7		
15 16 - 19	15 16 - 19	
VIII. OPERATOR INFORMATION	THE REAL PROPERTY AND LINES.	B.Is the name listed in Item
	NAME TO THE TOTAL PROPERTY OF THE PROPERTY OF	VIII-A also the owner?
8 ALBEMARLE U.S., INC.		☑ YES ☐ NO
15 16		55 66
C. STATUS OF OPERATOR (Enter the appropri	ate letter into the answer hor: if "Other" specify)	D. PHONE (area code & no.)
	(specify)	
F = FEDERAL S = STATE M = PUBLIC (other than federal or st	ate) P specify)	A (540) 230-3745
P = PRIVATE O = OTHER (specify)		
THINK	56	15 6 - 18 19 - 21 22 - 26
E. STREET OR P.O. BOX		
856 FOOTE LANE		
26	56	
F, CITY OR TOWN	G. STATE	H, ZIP CODE IX, INDIAN LAND
C		Is the facility located on Indian lands?
B NEW JOHNSONVILLE	TN :	37134 □ YES ☑ NO
15 16	40 41 42	52
X. EXISTING ENVIRONMENTAL PERMITS		กลงเราที่สีก็เหมาน ของนายกราชานิก เก
A. NPDES (Discharges to Surface Water)	D. PSD (Air Emissions from Proposed Sources)	
C T I C T	D. (OB) All Editional John 1 republic Betti eta)	
9 N TN0062537 9 P	- N 140 131 M	JOSEPH AND THE RESIDENCE OF THE PARTY OF THE
15 16 17 18 30 15 16		30
B. UIC ((Inderground Injection of Fluids)		R (specify)
C T I C T		(specify)
9 U 9	570978	11.
15 16 17 18 30 15 16	17 18	Title V Permit
C. RCRA (Hazardous Wastes)		R (specify)
CTICT		(specify)
9 R TND981014962 9		17-207
15 16 17 18 30 15 16	17 18	30
XI, MAP		
Attach to this application a topographic map of the area extending	to at local and mile havened property houndari	as The man must show the outline of the facility the
location of each of its existing and proposed intake and discharge s	tructures, each of its hazardous waste treatmen	it storage or disposal facilities and each well where it
injects fluids underground. Include all springs, rivers, and other surface	ce water bodies in the map area. See instruction	s for precise requirements.
VII NATURE OF BURINESS (securido a brief description)	STATE OF THE STATE	C TRANSPORTED A STATE OF THE
XII. NATURE OF BUSINESS (provide a brief description)		the state of the s
Albemarle operates an organometallic compound	manufacturing facility located	in an industrial portion of New
Johnsonville, Tennessee. The facility consis facility is primarily a lithium alkyl product	ts of two similar plants (North	other organometallic materials
racility is primarily a lithium alkyl product	ion facility that also produces	other organometallic materials.
XIII. CERTIFICATION (see instructions)	ADAM SHOW LOND WITH AND	
I certify under penalty of law that I have personally examined and a	m familiar with the information submitted in this	application and all attachments and that, based on my
inquiry of those persons immediately responsible for obtaining the in	nformation contained in the application, I believe	e that the information is true, accurate, and complete. I
am aware that there are significant penalties for submitting false info		
A. NAME & OFFICIAL TITLE (type or print)	B. SIGNATURE /	C. DATE SIGNED
Kyle Miller, Plant Manager	B. SIGNATURE	/ /
1	ILANI! Und	12-1-22
		14
COMMENTS FOR OFFICIAL USE ONLY	ACCUMULATION OF THE PERSON OF	
COMMENTS FOR OFFICIAL USE ONLY	THE RESIDENCE OF THE PARTY OF T	

Alternatives Analysis

RE: Albemarle U.S., Inc., NPDES Permit No. TN0062537

Alternate #1: Connection to a Publically Owned Treatment Works

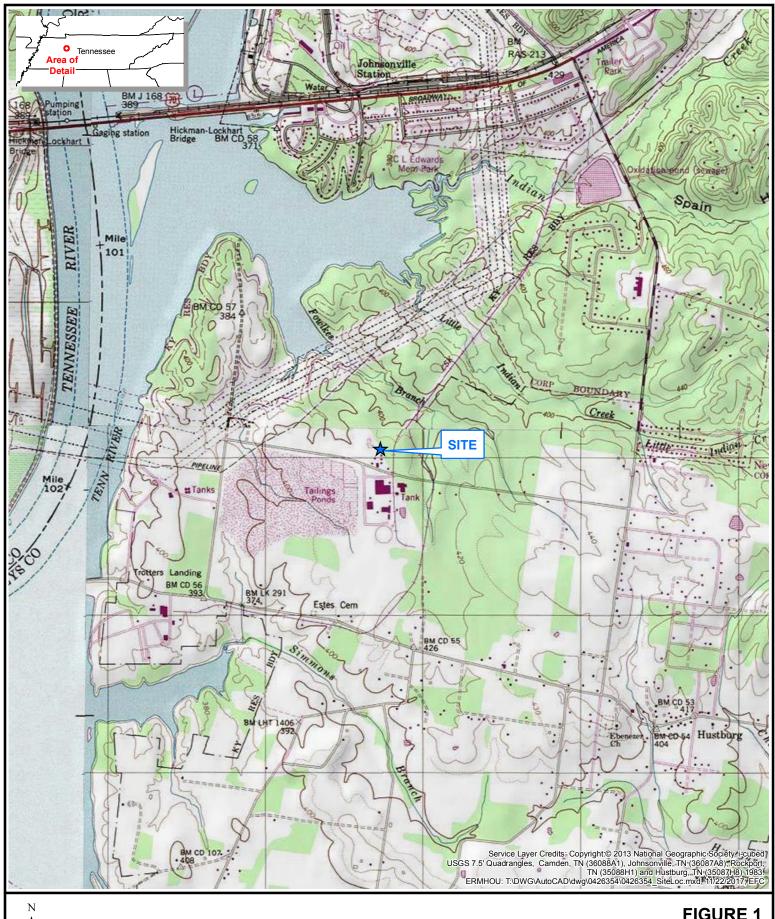
The nearest sanitary sewer line, maintained by the City of New Johnsonville, is approximately a quarter mile from the Albemarle property. In addition, the current discharge contains storm water, which is not permitted to be discharged into the sanitary sewer system. The alternative is deemed to be not feasible.

Alternate #2: Onsite Land Application

Albemarle does not own sufficient undeveloped land for the land application of the effluent. As noted in Alternative #1, the effluent also contains storm water in addition to process wastewater. This alternative is deemed to be not feasible.

Alternative #3: Water Re-Use / Recycling

The operations at Albemarle consume relatively low amounts of water. Re-use of the process wastewater alone would require extensive, costly treatment. In addition, there would be no possibility of onsite reuse of the storm water collected in the discharge pond. This alternative is deemed to be not feasible.



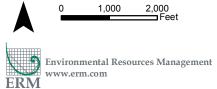
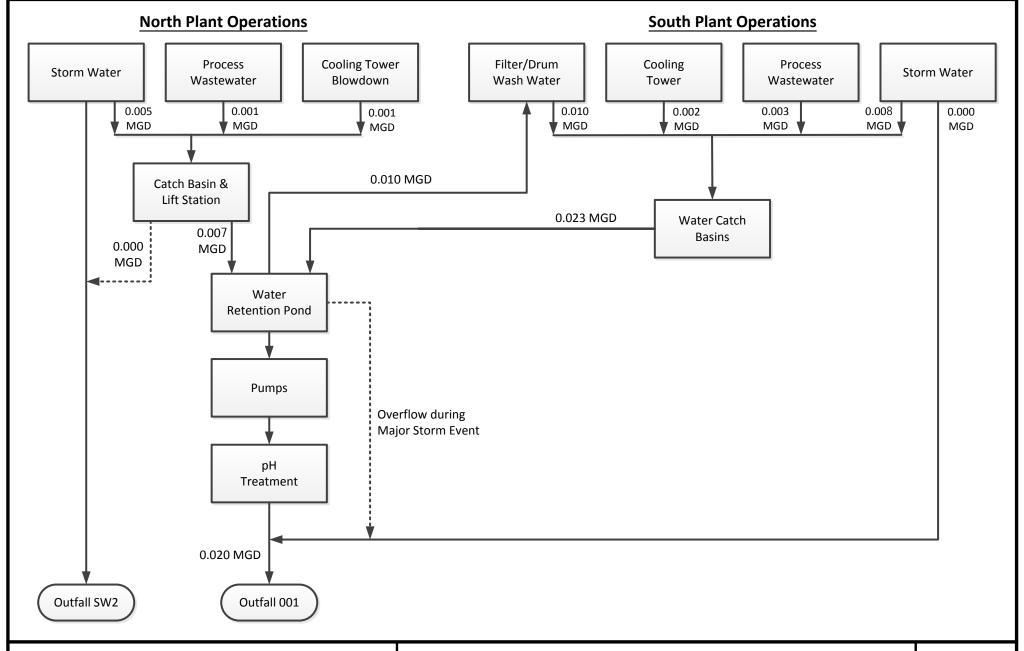


FIGURE 1 SITE LOCATION MAP

Albemarle U.S., Inc. New Johnsonville, Tennessee

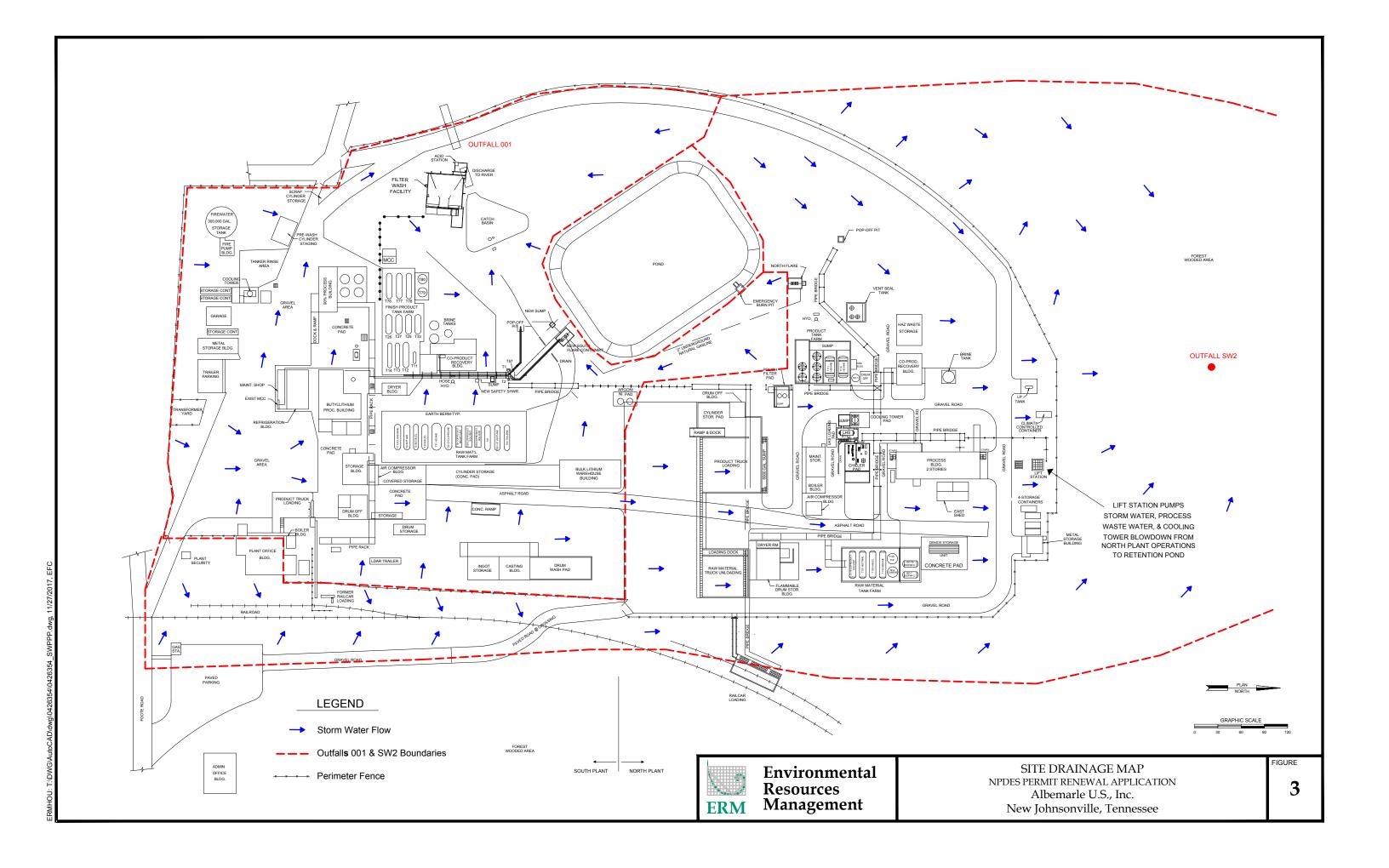


Environmental Resources Management

DESIGN:	L. Bagby	DRAWN:	EFC	CHKD.:				
DATE:	12/18/2017	SCALE:	None	REV.:	0			
HTX: T:\DWG\AutoCAD\dwg\0426354\0426354_WaterFlowDiagram.vsd								

FIGURE 2 WATER FLOW DIAGRAM Albemarle U.S., Inc. New Johnsonville, Tennessee





Form	O EDA		S. Environmental Protection Agend	•
Т	ND981014962	TN0062537	Albemarle U.S., Inc.	
EPA Identification Number		NPDES Permit Number	Facility Name	

Form Approved 03/05/19 OMB No. 2040-0004

Form 2C NPDES	9	EPA		ation for NPDES	onmental Protection Agency DES Permit to Discharge Wastewater IERCIAL, MINING, AND SILVICULTURE OPERATIONS					
SECTIO	N 1. OUT		ION (40 CFR 122.21(g)(1)) mation on each of the facility's	outfalls in the tah	ale helow					
ation	1.1	Outfall Number	Receiving Water Name		Longitude					
l Loc		001	Retention pond to Outfall	35° 59	9' 50″	N	87°	58′	54"	W
Outfall Location			001 to unnamed ditch	o	, "		o	,	"	
				o	, "		o	,	"	
		,	40 CFR 122.21(g)(2))							
Line Drawing	2.1		ached a line drawing to this appee instructions for drawing requ							
Li Dra		✓ Yes	☐ No							
SECTIO	N 3. AVE		S AND TREATMENT (40 CFR							
	3.1	For each out necessary.	fall identified under Item 1.1, pr	ovide average flo	ow and trea	tment informat	tion. Add a	additional	sheets	if
				*Outfall Numbe						
			Operations Contributing to Flow Operation Average Flow							
			Storm water runoff							
ent					0.013 mgd					
eatm			Cooling water		0.003 mgc					
nd Tr			Process wastewater						0.00	04 mgd
ws al			Filter/drum wastewater						0.01	LO mgd
E E			Description	Treatmer	nt Units		Final	Disposa	of So	lid or
Average Flows and Treatment		(include s	size, flow rate through each trea retention time, etc.)	atment unit,		de from de 2C-1		d Wastes by Disc	S Other	
			Evaporation			1-F		Not app	licable	
		Flocculation - Sedimentation			1-G, 1-U Dredge, dry, landfill as no				needed	
			Neutralization		2-K Not applicable					
	ı						1			

EPA	Identificatio	n Number	NPDES Permit Number	Facility Na	me	Form Approved 03/05/19						
Т	ND98101	4962	TN0062537	Albemarle U	S., Inc.	OMB No. 2040-0004						
	3.1		**Ou	fall Number** N/A								
	cont.	Operations Contributing to Flow										
			Operation		A۱	verage Flow						
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		(include	Description size, flow rate through each treatme retention time, etc.)		de from ble 2C-1	Final Disposal of Solid or Liquid Wastes Other Than by Discharge						
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nd Tre		**Outfall Number** N/A										
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System Users	3.2	Are you app	Operation Description size, flow rate through each treatme retention time, etc.)	Treatment Units nt unit, c a privately owned tree	de from ble 2C-1 atment works? → SKIP to Se	mgd mgd mgd mgd mgd Final Disposal of Solid or Liquid Wastes Other Than by Discharge						

	Identification		NPDES Permit		Facility Name Albemarle U.S., Inc.		Form Approved 03/05/19 OMB No. 2040-0004			
					Albernarie 0.5., in	ic.				
SECTIO			FLOWS (40 CFR 122.2	· - · · · · · · · · · · · · · · · · · ·	annaa daaanibad in Caa	tions 1 and 2 int	anneitte at en eee			
	4.1	Except for Yes	storm runoff, leaks, or s	spilis, are any disch	•	SKIP to Section 5		sonai?		
	4.2		formation on intermittent	t or soasonal flows			litional pages, if necessary.			
	4.2				quency	Flow		ecessary.		
		Outfall Number	Operation (list)	Average Days/Week	Average Months/Year	Long-Term Average	Maximum Daily	Duration		
				days/week	months/year	mgd	mgd	days		
Flows				days/week	months/year	mgd	mgd	days		
Intermittent Flows				days/week	months/year	mgd	mgd	days		
ıtermi				days/week	months/year	mgd	mgd	days		
=				days/week	months/year	mgd	mgd	days		
				days/week	months/year	mgd	mgd	days		
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				days/week	months/year	mgd	mgd	days		
				days/week	months/year	mgd	mgd	days		
SECTIO			40 CFR 122.21(g)(5))							
	5.1	l *	luent limitation guideline	es (ELGs) promulga				ur facility?		
		☐ Yes				SKIP to Section 6	Section 6.			
gs	5.2		e following information of	on applicable ELGs.		Pagulatam, Citation				
日		EI	LG Category			Regulatory Citation				
Applicable ELGs										
Арр										
	5.3	Are any of	the applicable ELGs ex	pressed in terms of	f production (or other m	neasure of operat	lion)?			
suc		☐ Yes			No → S	SKIP to Section 6				
itati	5.4	Provide an	actual measure of daily	production expres	sed in terms and units	of applicable EL	Gs.			
d Lim		Outfall Number	Opera	tion, Product, or M	Material	Quantity p	or Hav	Unit of leasure		
-Base										
Production-Based Limitations										
Prod										

EPA	Identification	on Number	NPDES Permit Number		Facility Nar	ne		Approved 03/05/19			
Т	ND98101	14962	TN0062537	A	Albemarle U.	S., Inc.	Ol	MB No. 2040-0004			
SECTIO	N 6. IMPI	ROVEMENTS	(40 CFR 122.21(g)(6))								
	6.1	upgrading, or	ently required by any federal, s r operating wastewater treatme charges described in this appli	ent equipment o							
		☐ Yes			✓ No	→ SKIP to It	em 6.3.				
Ø	6.2	Briefly identif	y each applicable project in the								
nent		Brief Identi	fication and Description of	Affected Outfalls	9,	ource(s) of	Final Comp	liance Dates			
ıproven		Project		(list outfall number)		Discharge	Required	Projected			
Upgrades and Improvements											
	6.3		ached sheets describing any a ct your discharges) that you no				tèm)	ental projects			
SECTIO	N.Z. CCC		NTAKE CHARACTERISTICS ((a)(7)\		1 tot applicable				
	comple	See the instructions to determine the pollutants and parameters you are required to monitor and, in turn, the tables you must complete. Not all applicants need to complete each table. Table A. Conventional and Non-Conventional Pollutants									
	7.1	Are you requ	esting a waiver from your NPD		authority for c	ne or more o	f the Table A polluta	nts for any of			
	7.1	Are you reques your outfalls?	esting a waiver from your NPD	ES permitting a	✓ No -	➤ SKIP to Ite	m 7.3.				
		Are you reques your outfalls?	esting a waiver from your NPD	ES permitting a	✓ No -	SKIP to Ite	m 7.3.				
	7.1	Are you requiyour outfalls? Yes If yes, indicate	esting a waiver from your NPD	ES permitting a	✓ No =	SKIP to Ite	m 7.3. d information to the a	application.			
ristics	7.1	Are you requivour outfalls? Yes If yes, indicate Outfall Have you contained.	esting a waiver from your NPD te the applicable outfalls below all Number mpleted monitoring for all Table d attached the results to this a	ES permitting a Attach waiver Outfall Nu A pollutants a	request and mbert each of you age?	➤ SKIP to Ite other required routfalls for v	m 7.3. d information to the a Outfall Number which a waiver has n	application. ——— oot been			
racteristics	7.1	Are you requivour outfalls? Yes If yes, indicate Outfall Have you contained.	esting a waiver from your NPD te the applicable outfalls below all Number mpleted monitoring for all Table	ES permitting a Attach waiver Outfall Nu A pollutants a	request and mbert each of you age?	SKIP to Ite other required or outfalls for value waiver has I	m 7.3. d information to the a Outfall Number which a waiver has no	application. not been my NPDES			
Characteristics	7.1	Are you requivour outfalls? Yes If yes, indicate Outfall Have you contrequested and Yes	esting a waiver from your NPD te the applicable outfalls below all Number mpleted monitoring for all Table d attached the results to this a	ES permitting a . Attach waiver Outfall Nu e A pollutants a pplication packa	request and mber t each of you age? No; a perm	SKIP to Ite other required r outfalls for value waiver has I	m 7.3. d information to the a Outfall Number which a waiver has n	application. not been my NPDES			
Intake Characteristics	7.1	Are you requested and your outfalls? Yes If yes, indicated the properties of the your confequested and yes. Yes Toxic Metals.	esting a waiver from your NPD te the applicable outfalls below all Number mpleted monitoring for all Table d attached the results to this a	Attach waiver Outfall Nu e A pollutants a pplication packa	request and mber t each of you age? No; a perm	SKIP to Ite other required or outfalls for value waiver has I itting authorits	m 7.3. d information to the a Outfall Number which a waiver has n been requested from by for all pollutants at	application. not been my NPDES t all outfalls.			
and Intake Characteristics	7.1 7.2 7.3 Table E	Are you requested and your outfalls? Yes If yes, indicated the properties of the your confequested and yes. Yes Toxic Metals.	esting a waiver from your NPD te the applicable outfalls below all Number mpleted monitoring for all Table d attached the results to this a s, Cyanide, Total Phenols, ar e facility's processes that contri	Attach waiver Outfall Nu e A pollutants a pplication packa	request and mber t each of you age? No; a permisic Pollutant er fall into one	SKIP to Ite other required or outfalls for value waiver has I itting authorits	m 7.3. d information to the a Outfall Number which a waiver has n been requested from by for all pollutants at the primary industry of	application. not been my NPDES t all outfalls.			
uent and Intake Characteristics	7.1 7.2 7.3 Table E	Are you requested and state of the listed in Exhill In Section 2 of the listed 2 of the listed 2 of the listed 2 of the listed 3	esting a waiver from your NPD te the applicable outfalls below all Number mpleted monitoring for all Table d attached the results to this a s, Cyanide, Total Phenols, ar e facility's processes that contri	ES permitting a Attach waiver Outfall Nu e A pollutants a pplication packa ond Organic Tox bute wastewate ons for exhibit.)	request and mber t each of you age? No; a perm tic Pollutant er fall into one	SKIP to Ite other required or outfalls for various a waiver has be initing authorities or more of the	m 7.3. d information to the a Outfall Number which a waiver has not been requested from by for all pollutants at the primary industry of m 7.8.	application. and been any NPDES all outfalls. categories			
Effluent and Intake Characteristics	7.1 7.2 7.3 Table E	Are you requested and state of the listed in Exhill In Section 2 of the listed 2 of the listed 2 of the listed 2 of the listed 3	te the applicable outfalls below all Number mpleted monitoring for all Table attached the results to this a second of instruction in the contract of the	ES permitting a Attach waiver Outfall Nu e A pollutants a pplication packa ond Organic Tox bute wastewate ons for exhibit.)	request and mber t each of you age? No; a perm tic Pollutant er fall into one	SKIP to Ite other required or outfalls for various a waiver has be initing authorities or more of the	m 7.3. d information to the a Outfall Number which a waiver has not been requested from by for all pollutants at the primary industry of m 7.8.	application. and been any NPDES all outfalls. categories			
Effluent and Intake Characteristics	7.1 7.2 7.3 Table E	Are you requivour outfalls? Yes If yes, indicate Outfall Have you contrequested and Yes Toxic Metals Do any of the listed in Exhile Yes Have you che Yes	te the applicable outfalls below all Number mpleted monitoring for all Table attached the results to this a second for all Table attached the results to this a second for all Table attached the results to this a second for all Table attached the results to this a second for all Table attached the results to this a second for all Table attached the results to this a second for all Table attached the results to this a second for all Table attached the results at a second for all Table attached the results at a second for a second for a second for all Table attached the results at a second for	. Attach waiver Outfall Nu e A pollutants a pplication packa and Organic Tox bute wastewate ons for exhibit.)	request and mber t each of you age? No; a permitic Pollutant er fall into one cyanide, and No	SKIP to Ite other required or outfalls for variety as waiver has I nitting authorit s or more of t SKIP to Ite total phenols	m 7.3. d information to the a Outfall Number which a waiver has not been requested from by for all pollutants at the primary industry of m 7.8. in Section 1 of Table	application. ot been my NPDES t all outfalls. categories			
Effluent and Intake Characteristics	7.1 7.2 7.3 Table E 7.4 7.5	Are you requivour outfalls? Yes If yes, indicate Outfall Have you contrequested and Yes Toxic Metals Do any of the listed in Exhile Yes Have you che Yes List the applie	te the applicable outfalls below all Number mpleted monitoring for all Table attached the results to this a second for all Table attached the results to this a second for all Table attached the results to this a second for all Table attached the results to this a second for all Table attached the results to this a second for all Table attached the results to this a second for all Table attached the results to this a second for all Table attached the results at a second for all Table attached the results at a second for a second for a second for all Table attached the results at a second for	. Attach waiver Outfall Nu e A pollutants a pplication packa and Organic Tox bute wastewate ons for exhibit.)	request and mber t each of you age? No; a permitic Pollutant er fall into one cyanide, and No	SKIP to Ite other required or outfalls for v a waiver has I nitting authorit s e or more of ti SKIP to Ite total phenols cating the rec Required	m 7.3. d information to the a Outfall Number which a waiver has not been requested from by for all pollutants at the primary industry of m 7.8. in Section 1 of Table	application. oot been my NPDES tall outfalls. categories e B?			
Effluent and Intake Characteristics	7.1 7.2 7.3 Table E 7.4 7.5	Are you requested and listed in Exhibit 2C.	te the applicable outfalls below all Number mpleted monitoring for all Table attached the results to this a second of instruction and attached the results to the facility's processes that contribit 2C-3? (See end of instruction ecked "Testing Required" for a cable primary industry categorica.	ES permitting a Attach waiver Outfall Nu e A pollutants a pplication packa and Organic Tox bute wastewate ons for exhibit.) Il toxic metals, of	request and mber t each of you age? No; a permitic Pollutant er fall into one cyanide, and No	SKIP to Ite other required or outfalls for v a waiver has I nitting authorit s e or more of ti SKIP to Ite total phenols cating the rec Required	m 7.3. d information to the a Outfall Number which a waiver has not been requested from many for all pollutants at the primary industry of m 7.8. in Section 1 of Table quired GC/MS Fraction(s)	application. oot been my NPDES tall outfalls. categories e B?			
Effluent and Intake Characteristics	7.1 7.2 7.3 Table E 7.4 7.5	Are you requested and Interest of the Are you controlled and Interest of the Area of the A	te the applicable outfalls below all Number mpleted monitoring for all Table attached the results to this a second for all Table attached the results to this a second for all Table attached the results to this a second for a second f	ES permitting a Attach waiver Outfall Nu e A pollutants a pplication packa and Organic Tox bute wastewate ons for exhibit.) Il toxic metals, c es and check the	request and mber	SKIP to Ite other required or outfalls for various a waiver has be initting authorities or more of the SKIP to Ite total phenols cating the recommendation of the cating the cat	m 7.3. d information to the a Outfall Number which a waiver has not been requested from my for all pollutants at the primary industry of m 7.8. in Section 1 of Table quired GC/MS fraction (s) applicable boxes.)	application. oot been my NPDES tall outfalls. categories e B?			

EPA	EPA Identification Number		NPDES Permit Number	Fac	cility Name	Form Approved 03/05/19						
Т	ND98101	14962	TN0062537		arle U.S., Inc.	OMB No. 2040-0004						
	7.7		ecked "Testing Required" for all requi ions checked in Item 7.6?	red pollutants in	n Sections 2 through	5 of Table B for each of the						
		✓ Yes			No							
	7.8	where testing	ecked "Believed Present" or "Believed g is not required?	d Absent" for all	pollutants listed in S	Sections 1 through 5 of Table B						
		✓ Yes			No							
	7.9	Have you provided (1) quantitative data for those Section 1, Table B, pollutants for which you have indicated testing is required or (2) quantitative data or other required information for those Section 1, Table B, pollutants that you have indicated are "Believed Present" in your discharge? Yes										
	- 10		<u> </u>									
	7.10	Does the applicant qualify for a small business exemption under the criteria specified in the instructions?										
pel		☐ Yes →	Note that you qualify at the top of Tathen SKIP to Item 7.12.	able B,	No							
Effluent and Intake Characteristics Continued	7.11	determined t	ovided (1) quantitative data for those esting is required or (2) quantitative du have indicated are "Believed Prese	lata or an expla	nation for those Sec narge?							
	Table (westional and New Conventional D	An III at a mate	No							
	7.12		nventional and Non-Conventional P dicated whether pollutants are "Believ		"Policyod Absort" fo	r all pollutants listed on Table C						
	1.12	for all outfalls	•	ed Present of	No	r all pollutarits listed on Table C						
take	7.10		replated Table Characteristics (1) and		-	et and limited with an dimenth, an						
nt and In	7.13	indirectly in a "Believed Pre	mpleted Table C by providing (1) qua an ELG and/or (2) quantitative data or esent"?									
luer		✓ Yes			No							
E#	Table D. Certain Hazardous Substances and Asbestos											
	7.14	Have you inc	dicated whether pollutants are "Believ	ed Present" or '	"Believed Absent" fo	r all pollutants listed in Table D for						
		✓ Yes			No							
	7.15		mpleted Table D by (1) describing the oviding quantitative data, if available		oplicable pollutants a	are expected to be discharged						
		✓ Yes			No							
	Table E	. 2,3,7,8-Tetra	achlorodibenzo-p-Dioxin (2,3,7,8-T	CDD)								
	7.16		ility use or manufacture one or more e reason to believe that TCDD is or m			ed in the instructions, or do you						
		☐ Yes →	Complete Table E.	7	No → SKIP to Se	ction 8.						
	7.17	Have you co	mpleted Table E by reporting qualitat	ive data for TCI	DD?							
		☐ Yes			No							
SECTIO	N 8. USE	D OR MANUF	ACTURED TOXICS (40 CFR 122.21	(g)(9))								
	8.1	Is any polluta	ant listed in Table B a substance or a ate or final product or byproduct?		a substance used or	manufactured at your facility as						
tur		☐ Yes		\checkmark	No → SKIP to S	ection 9.						
ufac s	8.2	List the pollu	tants below.									
· Manufa Toxics		1.	4.		7.							
Used or Manufactured Toxics		2.	5.		8.							
ž		3.	6.		9.							

EPA	Identification	on Number	NPDES Permit Number	Facilit	ty Name	Form Approved 03/05/19					
Т	ND98101	14962	TN0062537	Albemar	le U.S., Inc.	OMB No. 2040-0004					
SECTION	N 9. BIOI	LOGICAL TOXICITY	TESTS (40 CFR 122.21(g)(1	1))							
	9.1	Do you have any knowledge or reason to believe that any biological test for acute or chronic toxicity has been made within the last three years on (1) any of your discharges or (2) on a receiving water in relation to your discharge? ☐ Yes ☐ No → SKIP to Section 10.									
lest	9.2	Identify the tests a	nd their purposes below.								
xicity	V. =	Test(s)	Purpose of Test(er i	nitted to NPDES tting Authority?	Date Submitted					
Biological Toxicity Tests				□ Y	res 🗆 No						
Biolo				□ Y	res 🗆 No						
				□ Y	res 🗆 No						
SECTIO	N 10. CO		ES (40 CFR 122.21(g)(12))								
	10.1	Were any of the ar	nalyses reported in Section 7 p	erformed by a con	itract laboratory or o	consulting firm?					
		✓ Yes			No → SKIP to Se	ction 11.					
Ī	10.2	Provide information for each contract laboratory or consulting firm below.									
Contract Analyses		Laboratory Number 1 Laboratory Number 2 Laboratory Nu									
		Name of laboratory	//firm Pace Analytical								
		Laboratory address	S 12065 Lebanon Rd. Mt. Juliet, TN 37122								
Contr		Phone number	(615) 758-5858								
		Pollutant(s) analyz	ed all								
SECTIO	N 11. AD	DITIONAL INFORM	ATION (40 CFR 122.21(g)(13)))							
	11.1		ermitting authority requested a		on?						
ion		☐ Yes		V	No → SKIP to Se	ection 12.					
mat	11.2	List the information	requested and attach it to this	s application.							
nal Infor		1.		4.							
Additional Information		2.		5.							
		3.		6.							

EPA Identification Number NPDES Permit Number Facility Name Form Approved 03/05/19
TND981014962 TN0062537 Albemarle U.S., Inc.

SECTIO	N 12. CH	ECKL	IST AND CERTIFICATION STATEM	IENT (40 CFR 122.22(a) and (d))	JUA : 15	
	12.1	For	olumn 1 below, mark the sections of I each section, specify in Column 2 any not all applicants are required to com	y attac	hments that you are enclosing	g to alert the p	
			Column 1	0-11		Column 2	
	i	V	Section 1: Outfall Location	Ø	w/ attachments		
		Ø	Section 2: Line Drawing	Ø	w/ line drawing		w/ additional attachments
		Ø	Section 3: Average Flows and Treatment		w/ attachments		w/ list of each user of privately owned treatment works
		Ø	Section 4: Intermittent Flows		w/ attachments		
		Ø	Section 5: Production		w/ attachments		
		V	Section 6: Improvements		w/ attachments		w/ optional additional sheets describing any additional pollution control plans
ı,					w/ request for a waiver and supporting information		w/ explanation for identical outfalls
temer					w/ small business exemption request	n 🗆	w/ other attachments
n Sta		Ø	Section 7: Effluent and Intake Characteristics	Ø	w/ Table A	7	w/ Table B
licatio				Ø	w/ Table C	7	w/ Table D
Certif				Ø	w/ Table E	7	w/ analytical results as an attachment
st and		Ø	Section 8: Used or Manufactured Toxics		w/ attachments		
Checklist and Certification Statement		Ø	Section 9: Biological Toxicity Tests		w/ attachments		
3		Ø	Section 10: Contract Analyses		w/ attachments		
4		Ø	Section 11: Additional Information		w/ attachments		
F ()		V	Section 12: Checklist and Certification Statement		w/ attachments		
Nie.	12.2	Cert	ification Statement				
		acco subi resp acco	tify under penalty of law that this doc ordance with a system designed to as nitted. Based on my inquiry of the per onsible for gathering the information, urate, and complete. I am aware that is sibility of fine and imprisonment for kn	sure the rson of the int there a	hat qualified personnel proper r persons who manage the sy formation submitted is, to the are significant penalties for su	ly gather and stem, or thos best of my kn	evaluate the information e persons directly owledge and belief, true,
		Nam	e (print or type first and last name)			Official title	
		Kyle	Miller			Plant Manag	ger
		Sign	ature MT. U	l	K	Date signed	1-22
		l	10			l:	

	EPA Identification Number	NPDE	S Permit Number		Facility Name			Outfall Number		Form	Approved 03/05/19 MB No. 2040-0004
	TND981014962	TN	0062537	А	lbemarle U.S., Inc	С.				0	WIB INO. 2040-0004
TAE	LE A. CONVENTIONAL AND N	ON CONVEN	TIONAL POLLUTA	NTS (40 CF	R 122.21(g)(7)(ii	i)) ¹					
							Effl	uent		Inta (Optio	
	Pollutant	Waiver Requested (if applicable)	Units (specify)		Maximum Daily Discharge (required)	Maxir Mont Disch (if avai	thly arge	Long-Term Average Daily Discharge (if available)	Number of Analyses	Long-Term Average Value	Number of Analyses
	Check here if you have applied	to your NPDE	S permitting author	ity for a wai	ver for all of the p	ollutants li	sted on t	this table for the no	ted outfall.		
1.	Biochemical oxygen demand		Concentration	mg/L	22.3			8.39	34		
	(BOD₅)		Mass	lb/day	7.25			1.73	34		
2.	Chemical oxygen demand		Concentration	mg/L	40.7				1		
۷.	(COD)		Mass	lb/day	8.42				1		
3.	Total organic carbon (TOC)		Concentration	mg/L	9.29				1		
J.	Total organic carbon (100)		Mass	lb/day	1.92				1		
4.	Total suspended solids (TSS)		Concentration	mg/L	26.3			12.61	33		
4.	Total suspended solids (133)		Mass	lb/day	10.52			2.74	33		
5.	Ammonia (as N)		Concentration	mg/L	<0.25				1		
J.	Allillollia (as N)		Mass	lb/day	<0.072				1		
6.	Flow		Rate	mgd	0.048			0.02	33		
7.	Temperature (winter)		°C	°C					1		
١.	Temperature (summer)		°C	°C	66				1		
8.	pH (minimum)		Standard units	s.u.	6.30			7.06	34		
0.	pH (maximum)		Standard units	s.u.	7.80			7.06	34		

¹ Sampling shall be conducted according to sufficiently sensitive test procedures (i.e., methods) approved under 40 CFR 136 for the analysis of pollutants or pollutant parameters or required under 40 CFR chapter I, subchapter N or O. See instructions and 40 CFR 122.21(e)(3).

	EPA Identification Number		Permit Number		Facility Name		С	Outfall Number				ved 03/05/19
	TND981014962	TNOO	62537		Albemarle U.S., I	nc.					OIVIB IN	o. 2040-0004
TABL	E B. TOXIC METALS, CYANIDE,	TOTAL PHE			OXIC POLLUTAN	TS (40 CFI	R 122.21(g)(7)	(v)) ¹				
				or Absence ck one)	_			Efflo	uent			take tional)
	Pollutant/Parameter (and CAS Number, if available)	Testing Required	Believed Present	Believed Absent	Units (specify)		Maximum Daily Discharge (required)	Maximum Monthly Discharge (if available)	Long-Tern Average Daily Discharge (if available)	Number of	Long- Term Average Value	Number of Analyses
	Check here if you qualify as a sr 2 through 5 of this table. Note, h											
Section	n 1. Toxic Metals, Cyanide, and Total Phenols											
1.1	Antimony, total	Ø		Ø	Concentration	mg/L	<0.005			1		
1.1	(7440-36-0)			V	Mass	lb/day	<0.0010			1		
1.2	Arsenic, total			I ✓ M	Concentration	mg/L	0.00156			1		
1.2	(7440-38-2)				Mass	lb/day	0.0003			1		
1.3	Beryllium, total		Ιп		Concentration	mg/L	<0.002			1		
	(7440-41-7)				Mass	lb/day	<0.0004			1		
1.4	Cadmium, total			✓	Concentration	mg/L	<0.002			1		
<u> </u>	(7440-43-9)			_	Mass	lb/day	<0.0004			1		
1.5	Chromium, total (7440-47-3)			✓	Concentration	mg/L	<0.010			1		
<u> </u>	,				Mass	lb/day	<0.0021			1		
1.6	Copper, total (7440-50-8)	✓		✓	Concentration Mass	mg/L	<0.010			1		
-	,				Concentration	lb/day	<0.0021			1		
1.7	Lead, total (7439-92-1)	✓		✓	Mass	mg/L lb/day	<0.002 <0.0004			1		
-	Mercury, total				Concentration	mg/L	<0.0004			1		
1.8	(7439-97-6)			☑	Mass	lb/day	<0.0002			1		
	Nickel, total				Concentration	mg/L	<0.010			1		
1.9	(7440-02-0)				Mass	lb/day	<0.0021			1		
1.46	Selenium, total				Concentration	mg/L	<0.010			1		
1.10	(7782-49-2)				Mass	lb/day	<0.0021			1		
1 11	Silver, total		П		Concentration	mg/L	<0.005			1		
1.11	(7440-22-4)				Mass	lb/day	<0.0010			1		

	EPA Identification Number NPDES Permit Number TND981014962 TN0062537			Facility Name		C	outfall Number				ved 03/05/19 b. 2040-0004	
	TND981014962				Albemarle U.S., I						O.II.D.I.V	3. 20 10 000 1
TABL	E B. TOXIC METALS, CYANID	E, TOTAL PHE	Presence	ORGANIC 1 or Absence ck one)	OXIC POLLUTAN	TS (40 CF)	R 122.21(g)(7)	(v)) ¹ Efflue	ent			take tional)
	Pollutant/Parameter (and CAS Number, if available)	Testing Required	Believed Present	Believed Absent	Units (specify)		Maximum Daily Discharge (required)	Maximum Monthly Discharge (if available)	Long-Term Average Daily Discharge (if available)	Number of Analyses	Long- Term Average Value	Number of Analyses
1.12	Thallium, total			Ø	Concentration	mg/L	<0.001			1		
	(7440-28-0)				Mass	lb/day	<0.0002			1		
1.13	Zinc, total			✓	Concentration	mg/L	<0.050			1		
	(7440-66-6)				Mass	lb/day	<0.0103			1		
1.14	Cyanide, total			✓	Concentration	mg/L	<0.005			1		
	(57-12-5)		_	_	Mass	lb/day	<0.0010			1		
1.15	Phenols, total			✓	Concentration	mg/L	<0.040			1		
2 (n 2. Organic Toxic Pollutants (GC/MS Fraction—Volatile			Mass	lb/day	<0.0083			1			
Section		(GC/MS Fract	ion—Volatii	e Compound								I
2.1	Acrolein (107-02-8)	✓		✓	Concentration	ug/L	<50			1		
	,				Mass Concentration	lb/day	<0.0103			1		
2.2	Acrylonitrile (107-13-1)			✓	Mass	ug/L	<10			1		
	,				Concentration	lb/day	<0.0021			1		
2.3	Benzene (71-43-2)	✓		✓	Mass	ug/L lb/day	<0.0002			2 2		
	, ,				Concentration	- '	<0.0002			2		
2.4	Bromoform (75-25-2)			✓	Mass	ug/L lb/day	<0.0002			2		
	Carbon tetrachloride				Concentration	ug/L	<1			2		
2.5	(56-23-5)			✓	Mass	lb/day	<0.0002			2		
	Chlorobenzene	<u> </u>	_		Concentration	ug/L	<1			2		
2.6	(108-90-7)			✓	Mass	lb/day	<0.0002			2		
	Chlorodibromomethane		П		Concentration	ug/L	<1			2		
2.7	(124-48-1)				Mass	lb/day	<0.0002			2		
2.8	Chloroethane	Ø			Concentration	ug/L	<5			2		
2.0	(75-00-3)				Mass	lb/day	<0.0010			2		

	EPA Identification Number	NPDES P	ermit Number		Facility Name		C	Outfall Number			Form Appro	ved 03/05/19
	TND981014962	TN00	62537		Albemarle U.S., II	nc.					OMB N	o. 2040-0004
TABL	E B. TOXIC METALS, CYANIDE,	TOTAL PHE	Presence	ORGANIC T or Absence ok one)	OXIC POLLUTAN	TS (40 CFI	R 122.21(g)(7)	(v)) ¹	uent		Int	take
	Pollutant/Parameter (and CAS Number, if available)	Testing Required	Believed Present	Believed Absent	Units (specify)		Maximum Daily Discharge (required)	Maximum Monthly Discharge (if available)	Long-Tern Average Daily Dischargo	Number of	Long- Term Average Value	Number of Analyses
2.9	2-chloroethylvinyl ether			7	Concentration	ug/L	<50			2		
	(110-75-8)		Ш		Mass	lb/day	<0.010			2		
2.10	Chloroform (67-66-3)			✓	Concentration	ug/L	<5			2		
					Mass	lb/day	<0.0010			2		
2.11	Dichlorobromomethane		П	ӣ	Concentration	ug/L	<1			2		
	(75-27-4)				Mass	lb/day	<0.0002			2		
2.12	1,1-dichloroethane			✓	Concentration	ug/L	<1			2		
	(75-34-3)]	Mass	lb/day	<0.0002			2		
2.13	1,2-dichloroethane			✓	Concentration	ug/L	<1			2		
	(107-06-2)		_		Mass	lb/day	<0.0002			2		
2.14	1,1-dichloroethylene		П	ӣ	Concentration	ug/L	<1			2		
	(75-35-4)				Mass	lb/day	<0.0002			2		
2.15	1,2-dichloropropane			7	Concentration	ug/L	<1			2		
	(78-87-5)				Mass	lb/day	<0.0002			2		
2.16	1,3-dichloropropylene		П	ℴ	Concentration	ug/L	<1			2		
	(542-75-6)				Mass	lb/day	<0.0002			2		
2.17	Ethylbenzene			✓	Concentration	ug/L	<1			2		
	(100-41-4)				Mass	lb/day	<0.002			2		
2.18	Methyl bromide			✓	Concentration	ug/L	<5			2		
	(74-83-9)				Mass	lb/day	<0.0010			2		
2.19	Methyl chloride			✓	Concentration	ug/L	<5			2		
ļ	(74-87-3)		_		Mass	lb/day	<0.0005			2		
2.20	Methylene chloride				Concentration	ug/L	<3			2		
L	(75-09-2)				Mass	lb/day	<0.0005			2		
2.21	1,1,2,2- tetrachloroethane		ΙпΙ	X	Concentration	ug/L	<1			1		
	(79-34-5)			1	Mass	lb/day	<0.0002			1		

	EPA Identification Number TND981014962		ermit Number 62537		Facility Name	nc	C	Outfall Number				ved 03/05/19 b. 2040-0004
TADI	E B. TOXIC METALS, CYANIDE,			ODCANIC T	<u> </u>		2 422 24(~)/7)	(s.c)\1				
TABL	E.B. TOXIC WETALS, CTANIDE,	TOTAL PHE	Presence	or Absence k one)	OXIC POLLUTAN	13 (40 CF)	(122.21(g)(7)	Efflu	uent			ake ional)
	Pollutant/Parameter (and CAS Number, if available)	Testing Required	Believed Present	Believed Absent	Units (specify)		Maximum Daily Discharge (required)	Maximum Monthly Discharge (if available)	Long-Term Average Daily Discharge (if available)	Number of Analyses	Long- Term Average Value	Number of Analyses
2.22	Tetrachloroethylene			✓	Concentration	ug/L	<1			2		
2.22	(127-18-4)				Mass	lb/day	<0.0002			2		
2.23	Toluene			V	Concentration	mg/L	0.118		0.01	33		
2.23	(108-88-3)				Mass	lb/day	0.019		0.001	33		
2.24	1,2-trans-dichloroethylene			☑	Concentration	ug/L	<1			2		
2.24	(156-60-5)			V.	Mass	lb/day	<0.0002			2		
2.25	1,1,1-trichloroethane			✓	Concentration	ug/L	<1			2		
2.23	(71-55-6)			Ľ	Mass	lb/day	<0.0002			2		
2.26	1,1,2-trichloroethane			✓	Concentration	ug/L	<1			2		
2.20	(79-00-5)			<u> </u>	Mass	lb/day	<0.0002			2		
2.27	Trichloroethylene		п	✓	Concentration	ug/L	<1			2		
2.21	(79-01-6)			<u>V</u>	Mass	lb/day	<0.0002			2		
2.28	Vinyl chloride			✓	Concentration	ug/L	<1			2		
	(75-01-4)	_			Mass	lb/day	<0.0002			2		
Section	on 3. Organic Toxic Pollutants (C	C/MS Fracti	on—Acid C	ompounds)						,	,	
3.1	2-chlorophenol	✓		✓	Concentration	ug/L	<10			1		
Ŭ.,	(95-57-8)				Mass	lb/day	<0.0021			1		
3.2	2,4-dichlorophenol		п	✓	Concentration	ug/L	<10			1		
0.2	(120-83-2)				Mass	lb/day	<0.0021			1		
3.3	2,4-dimethylphenol		п	V	Concentration	ug/L	<10			1		
0.0	(105-67-9)				Mass	lb/day	<0.0021			1		
3.4	4,6-dinitro-o-cresol				Concentration	ug/L	<10			1		
J.7	(534-52-1)			14.	Mass	lb/day	<0.0021			1		
3.5	2,4-dinitrophenol		п	X	Concentration	ug/L	<10			1		
0.0	(51-28-5)]	£	Mass	lb/day	<0.0021			1		

	EPA Identification Number	NPDES F	ermit Number		Facility Name		C	Outfall Number				ved 03/05/19
	TND981014962	TN00	62537		Albemarle U.S., I	nc.					OMB N	o. 2040-0004
TABL	E B. TOXIC METALS, CYANIDE	E, TOTAL PHE	Presence	ORGANIC T or Absence ck one)	OXIC POLLUTAN	TS (40 CFI	R 122.21(g)(7)	(v))¹ Efflu	ent			take
	Pollutant/Parameter (and CAS Number, if available)	Testing Required	Believed Present	Believed Absent	Units (specify)		Maximum Daily Discharge (required)	Maximum Monthly Discharge (if available)	hly Daily arge Discharge An		Long- Term Average Value	Number of Analyses
3.6	2-nitrophenol	V		Ø	Concentration	ug/L	<10			1		
0.0	(88-75-5)				Mass	lb/day	<0.0021			1		
3.7	4-nitrophenol	✓			Concentration	ug/L	<10			1		
• • • • • • • • • • • • • • • • • • • •	(100-02-7)				Mass	lb/day	<0.0021			1		<u> </u>
3.8	p-chloro-m-cresol				Concentration	ug/L	<10			1		
	(59-50-7)				Mass	lb/day	<0.0021			1		
3.9	Pentachlorophenol (87-86-5)				Concentration	ug/L	<10			1		
	,				Mass	lb/day	<0.0021			1	-	<u> </u>
3.10	Phenol (108-95-2)	✓		✓	Concentration Mass	ug/L	<10 <0.0021			1		
	(/				Concentration	lb/day	<10			1		
3.11	2,4,6-trichlorophenol (88-05-2)	✓		✓	Mass	ug/L lb/day	<0.0021			1		
Section	on 4. Organic Toxic Pollutants	(GC/MS Fract	ion—Base /	Neutral Com		Ib/day	V0.0021			<u> </u>		
	Acenaphthene	`			Concentration	ug/L	<1			1		
4.1	(83-32-9)			✓	Mass	lb/day	<0.0002			1		
4.0	Acenaphthylene				Concentration	ug/L	<1			1		
4.2	(208-96-8)				Mass	lb/day	<0.0002			1		
4.3	Anthracene				Concentration	ug/L	<1			1		
4.3	(120-12-7)		⊔		Mass	lb/day	<0.0002			1		
4.4	Benzidine	Ø		Ø	Concentration	ug/L	<10			1		
4.4	(92-87-5)			Ŭ.	Mass	lb/day	<0.0021			1		
4.5	Benzo (a) anthracene				Concentration	ug/L	<1			1		
7.0	(56-55-3)				Mass	lb/day	<0.0002			1		
4.6	Benzo (a) pyrene		П		Concentration	ug/L	<1			1		
	(50-32-8)]]	Mass	lb/day	<0.0002			1		

	EPA Identification Number NPDES Permit Number TND981014962 TN0062537				Facility Name Albemarle U.S., I	nc.	C	Outfall Number				Form Appro OMB N	o. 2040-0004
TABL	E B. TOXIC METALS, CYANIDE	, TOTAL PHE	NOLS, AND	ORGANIC	TOXIC POLLUTAN	TS (40 CFI	R 122.21(g)(7)	(v)) ¹					
			Presence	or Absence ck one)				Efflu	ient				take tional)
	Pollutant/Parameter (and CAS Number, if available)	Testing Required	Believed Present	Believed Absent	Units (specify)		Maximum Daily Discharge (required)	Maximum Monthly Discharge (if available)	Long-T Avera Dail Discha	ige y irge	Number of Analyses	Long- Term Average Value	Number of Analyses
4.7	3,4-benzofluoranthene				Concentration	ug/L	<1				1		
	(205-99-2)				Mass	lb/day	<0.0002				1		
4.8	Benzo (ghi) perylene				Concentration	ug/L	<1				1		
	(191-24-2)				Mass	lb/day	<0.0002				1		
4.9	Benzo (k) fluoranthene				Concentration	ug/L	<1				1		
	(207-08-9)				Mass	lb/day	<0.0002				1		
4.10	Bis (2-chloroethoxy) methane				Concentration	ug/L	<10				1		
10	(111-91-1)				Mass	lb/day	<0.0021				1		
4.11	Bis (2-chloroethyl) ether				Concentration	ug/L	<10				1		
	(111-44-4)				Mass	lb/day	<0.0021				1		
4.12	Bis (2-chloroisopropyl) ether				Concentration	ug/L	<10				1		
	(102-80-1)				Mass	lb/day	<0.0021				1		
4.13	Bis (2-ethylhexyl) phthalate				Concentration	ug/L	<3				1		
7.10	(117-81-7)				Mass	lb/day	<0.0006				1		
4.14	4-bromophenyl phenyl ether		П		Concentration	ug/L	<10				1		
7.17	(101-55-3)			<u> </u>	Mass	lb/day	<0.0021				1		
4.15	Butyl benzyl phthalate				Concentration	ug/L	<3				1		
4.13	(85-68-7)				Mass	lb/day	<0.0006				1		
4.16	2-chloronaphthalene				Concentration	ug/L	<1				1		
4.10	(91-58-7)				Mass	lb/day	<0.0002				1		
4.17	4-chlorophenyl phenyl ether			Ø	Concentration	ug/L	<10				1		
4.17	(7005-72-3)		<u> </u>		Mass	lb/day	<0.0021				1		
4.18	Chrysene			Ø	Concentration	ug/L	<1				1		
4.10	(218-01-9)				Mass	lb/day	<0.0002				1		
4.19	Dibenzo (a,h) anthracene				Concentration	ug/L	<1				1		
4.13	(53-70-3)		▎		Mass	lb/day	<0.0002				1		

	EPA Identification Number	NPDES P	ermit Number		Facility Name		C	Outfall Number				ved 03/05/19
	TND981014962	TN00	62537		Albemarle U.S., Ir	nc.					OMB N	o. 2040-0004
TABL	E B. TOXIC METALS, CYANIDE,	TOTAL PHE	NOLS, AND	ORGANIC T	OXIC POLLUTAN	TS (40 CFI	R 122.21(g)(7)	(v)) ¹				
				or Absence ck one)				Efflo	uent			take tional)
	Pollutant/Parameter (and CAS Number, if available)	Testing Required	Believed Present	Believed Absent	Units (specify)		Maximum Daily Discharge (required)	Maximum Monthly Discharge (if available)	Long-Term Average Daily Discharge (if available)	Number of Analyses	Long- Term Average Value	Number of Analyses
4.20	1,2-dichlorobenzene	Ø		✓	Concentration	ug/L	<1			2		
4.20	(95-50-1)	Ľ .		<u> </u>	Mass	lb/day	<0.0002			2		
4.21	1,3-dichlorobenzene			✓	Concentration	ug/L	<1			2		
4.21	(541-73-1)				Mass	lb/day	<0.0002			2		
4.22	1,4-dichlorobenzene			✓	Concentration	ug/L	<1			2		
7.22	(106-46-7)				Mass	lb/day	<0.0002			2		
4.23	3,3-dichlorobenzidine			✓	Concentration	ug/L	<10			1		
7.20	(91-94-1)				Mass	lb/day	<0.0021			1		
4.24	Diethyl phthalate			✓	Concentration	ug/L	<3			1		
	(84-66-2)				Mass	lb/day	<0.0006			1		
4.25	Dimethyl phthalate			☑	Concentration	ug/L	<3			1		
	(131-11-3)				Mass	lb/day	<0.0006			1		
4.26	Di-n-butyl phthalate			✓	Concentration	ug/L	<3			1		
	(84-74-2)				Mass	lb/day	<0.0006			1		
4.27	2,4-dinitrotoluene			ӣ	Concentration	ug/L	<10			1		
	(121-14-2)				Mass	lb/day	<0.0021			1		
4.28	2,6-dinitrotoluene			V	Concentration	ug/L	<10			1		
	(606-20-2)				Mass	lb/day	<0.0021			1		
4.29	Di-n-octyl phthalate			✓	Concentration	ug/L	<3			1		
	(117-84-0)				Mass	lb/day	<0.0006			1		
4.30	1,2-Diphenylhydrazine			V	Concentration	ug/L	<10			1		
	(as azobenzene) (122-66-7)				Mass	lb/day	<0.0021			1		
4.31	Fluoranthene	☑		✓	Concentration	ug/L	<1			1		
	(206-44-0)				Mass	lb/day	<0.0002			1		
4.32	Fluorene	\sqcap	п		Concentration	ug/L	<1			1		
	(86-73-7)]		Mass	lb/day	<0.0002			1		

	EPA Identification Number	NPDES P	ermit Number		Facility Name			Outfall Number				ved 03/05/19
	TND981014962	TN00	62537		Albemarle U.S., II	nc.					OMB N	o. 2040-0004
TABL	E B. TOXIC METALS, CYANIDE,	TOTAL PHE	Presence	ORGANIC T or Absence ck one)	OXIC POLLUTAN	TS (40 CFI	R 122.21(g)(7)		uent			t ake
	Pollutant/Parameter (and CAS Number, if available)	Testing Required	Believed Present	Believed Absent	Units (specify)		Maximum Daily Discharge (required)	Maximum Monthly Discharge (if available)	Long-Tern Average Daily Discharge (if available)	Number of	Long- Term Average Value	Number of Analyses
4.33	Hexachlorobenzene	☑		7	Concentration	ug/L	<1			1		
4.00	(118-74-1)				Mass	lb/day	<0.0002			1		
4.34	Hexachlorobutadiene			V	Concentration	ug/L	<10			1		
1.01	(87-68-3)]	Mass	lb/day	<0.0021			1		
4.35	Hexachlorocyclopentadiene		П	☑	Concentration	ug/L	<10			1		
1.00	(77-47-4)]	Mass	lb/day	<0.0021			1		
4.36	Hexachloroethane			✓	Concentration	ug/L	<10			1		
	(67-72-1)				Mass	lb/day	<0.0021			1		
4.37	Indeno (1,2,3-cd) pyrene			✓	Concentration	ug/L	<1			1		
	(193-39-5)		_		Mass	lb/day	<0.0002			1		
4.38	Isophorone			V	Concentration	ug/L	<10			1		
	(78-59-1)		_		Mass	lb/day	<0.0021			1		
4.39	Naphthalene				Concentration	ug/L	2.7			1		
	(91-20-3)		_		Mass	lb/day	0.559			1		
4.40	Nitrobenzene		П	ℴ	Concentration	ug/L	<10			1		
	(98-95-3)	<u> </u>	_		Mass	lb/day	<0.0021			1		
4.41	N-nitrosodimethylamine			✓	Concentration	ug/L	<10			1		
	(62-75-9)		_	_	Mass	lb/day	<0.0021			1		
4.42	N-nitrosodi-n-propylamine			✓	Concentration	ug/L	<10			1		
	(621-64-7)		_	_	Mass	lb/day	<0.0021			1		
4.43	N-nitrosodiphenylamine			✓	Concentration	ug/L	<10			1		
<u> </u>	(86-30-6)	 	_		Mass	lb/day	<0.0021			1		
4.44	Phenanthrene			√ ⊢	Concentration	ug/L	<1			1		
	(85-01-8)		_		Mass	lb/day	<0.0002			1		
4.45	Pyrene		ΙпΙ	ℴ	Concentration	ug/L	<1			1		
	(129-00-0)			1	Mass	lb/day	<0.0002			1		

	EPA Identification Number		Permit Number		Facility Name		C	Outfall Number				ved 03/05/19 b. 2040-0004
	TND981014962		62537		Albemarle U.S., I						OWID IN	J. 2040-0004
TABL	E B. TOXIC METALS, CYANIDE	, TOTAL PHE	Presence	ORGANIC T or Absence ck one)	OXIC POLLUTAN	TS (40 CF	R 122.21(g)(7)	(v)) ¹ Efflu	ent			take
	Pollutant/Parameter (and CAS Number, if available)	Testing Required	Believed Present	Believed Absent	Units (specify)		Maximum Daily Discharge (required)	Maximum Monthly Discharge (if available)	Long-Term Average Daily Discharge (if available)	Number of Analyses	Long- Term Average Value	Number of Analyses
4.46	1,2,4-trichlorobenzene			Ø	Concentration	ug/L	<10			1		
0 "	(120-82-1)				Mass	lb/day	<0.0021			1		
Section	on 5. Organic Toxic Pollutants (GC/MS Fract	ion—Pestic	ides)	Concentration	/1	<0.05	T T		1	Ι	I
5.1	Aldrin (309-00-2)			✓	Mass	ug/L lb/day	<0.0001			1		
	α-BHC				Concentration	ug/L	<0.05			1		
5.2	(319-84-6)				Mass	lb/day	<0.0001			1		
	β-ВНС				Concentration	ug/L	<0.05			1		
5.3	(319-85-7)				Mass	lb/day	<0.00001			1		
- 1	y-BHC				Concentration	ug/L	<0.05			1		
5.4	(58-89-9)				Mass	lb/day	<0.00001			1		
5.5	δ-ВНС	Ø		7	Concentration	ug/L	<0.05			1		
5.5	(319-86-8)				Mass	lb/day	<0.00001			1		
5.6	Chlordane				Concentration	ug/L	<5			1		
0.0	(57-74-9)				Mass	lb/day	<0.0010			1		
5.7	4,4'-DDT				Concentration	ug/L	<0.05			1		
•	(50-29-3)				Mass	lb/day	<0.00001			1		
5.8	4,4'-DDE (72-55-9)	✓		✓	Concentration	ug/L	<0.05			1		
	,				Mass Concentration	lb/day ug/L	<0.0001 <0.05			1		
5.9	4,4'-DDD (72-54-8)	✓		✓	Mass	lb/day	<0.0001			1		
	Dieldrin				Concentration	ug/L	<0.05			1		
5.10	(60-57-1)				Mass	lb/day	<0.00001			1		
5.44	α-endosulfan				Concentration	ug/L	<0.05			1		
5.11	(115-29-7)			✓	Mass	lb/day	<0.00001			1		

	EPA Identification Number		ermit Number		Facility Name		0	utfall Number				ved 03/05/19 o. 2040-0004
	TND981014962				Albemarle U.S., I							
TABL	E B. TOXIC METALS, CYANIDE,	TOTAL PHE	Presence	ORGANIC T or Absence ck one)	OXIC POLLUTAN	TS (40 CF	R 122.21(g)(7)		uent			ake ional)
	Pollutant/Parameter (and CAS Number, if available)	Testing Required	Believed Present	Believed Absent	Units (specify)		Maximum Daily Discharge (required)	Maximum Monthly Discharge (if available)	Long-Term Average Daily Discharge (if available)	Number of	Long- Term Average Value	Number of Analyses
5.12	β-endosulfan	☑		✓	Concentration	ug/L	<0.05			1		
0.12	(115-29-7)			L	Mass	lb/day	<0.00001			1		
5.13	Endosulfan sulfate	✓		✓	Concentration	ug/L	<0.05			1		
0.10	(1031-07-8)				Mass	lb/day	<0.00001			1		
5.14	Endrin	✓		✓	Concentration	ug/L	<0.05			1		
Ŭ	(72-20-8)]	Mass	lb/day	<0.00001			1		
5.15	Endrin aldehyde	\sqcap		V	Concentration	ug/L	<0.05			1		
	(7421-93-4)			1	Mass	lb/day	<0.00001			1		
5.16	Heptachlor	✓		✓	Concentration	ug/L	<0.05			1		
	(76-44-8)		_	_	Mass	lb/day	<0.00001			1		
5.17	Heptachlor epoxide (1024-57-3)	✓		✓	Concentration	ug/L	<0.05			1		
	PCB-1242				Mass	lb/day	<0.00001			1		
5.18	(53469-21-9)	✓		✓	Concentration	ug/L	<0.5			1		
	,				Mass	lb/day	<0.0001			1		
5.19	PCB-1254 (11097-69-1)	✓		✓	Concentration	ug/L	<0.5			1		
	PCB-1221				Mass	lb/day	<0.0001			1		
5.20	(11104-28-2)	✓		V	Concentration	ug/L	<0.5			1		
-	PCB-1232				Mass	lb/day	<0.0001			1		
5.21	(11141-16-5)	✓		✓	Concentration	ug/L	<0.5			1		
	PCB-1248				Mass	lb/day	<0.0001			1		
5.22	(12672-29-6)	✓		✓	Concentration	ug/L	<0.5			1		
-	PCB-1260				Mass	lb/day	<0.0001			1		
5.23	(11096-82-5)	✓		✓	Concentration	ug/L	<0.5			1		
-	PCB-1016				Mass	lb/day	<0.0001			1		
5.24	(12674-11-2)	✓		✓	Concentration Mass	ug/L	<0.5			1		
	,				IVIass	lb/day	<0.0001			1		

	EPA Identification Number TND981014962		ermit Number 62537		Facility Name Albemarle U.S., Inc.		Outfall Number			Form Approved 03/05 OMB No. 2040-0		
TABL	TABLE B. TOXIC METALS, CYANIDE, TOTAL PHENOLS,			ORGANIC T	•		R 122.21(g)(7)	(v)) ¹				
			Presence	or Absence ck one)			13/1	Efflu	ient		-	ake ional)
	Pollutant/Parameter (and CAS Number, if available)	Testing Required	Believed Present	Believed Absent	Units (specify)		Maximum Daily Discharge (required)	Maximum Monthly Discharge (if available)	Long-Term Average Daily Discharge (if available)	Number of Analyses	Long- Term Average Value	Number of Analyses
5.25	Toxaphene			✓	Concentration	ug/L	<0.5			1		
0.20	(8001-35-2)	<u> </u>			Mass	lb/day	<0.0001			1		

¹ Sampling shall be conducted according to sufficiently sensitive test procedures (i.e., methods) approved under 40 CFR 136 for the analysis of pollutants or pollutant parameters or required under 40 CFR chapter I, subchapter N or O. See instructions and 40 CFR 122.21(e)(3).

EPA Identification Number		ber	NPDES Per			Facility Name	(Outfall Number			Form Approved 03/05/19 OMB No. 2040-0004		
	TND981014962		TN0062	2537	Albe	marle U.S., Inc.				Oiv	ID NO. 2040-0004		
TAE	BLE C. CERTAIN CO			NVENTIONAL PO	LLUTANTS	(40 CFR 122.21(c	յ)(7)(vi))¹						
			ce or Absence				Efflu		Inta (Optio				
	Pollutant	Believe Presen				Maximum Daily Discharge (required)	Maximum Monthly Discharge (if available)	Long-Term Average Daily Discharge (if available)	Number of Analyses	Long-Term Average Value	Number of Analyses		
	Check here if you be each pollutant.	elieve all po	ollutants on Table (C to be <i>present</i> in	your discha	rge from the noted	outfall. You need	not complete the "Pr	esence or Abs	ence" column of T	able C for		
	Check here if you b each pollutant.	elieve all po	ollutants on Table (C to be absent in y	our dischar	ge from the noted o	outfall. You need n	ot complete the "Pre	sence or Abse	nce" column of Ta	able C for		
1.	Bromide (24959-67-9)			Concentration Mass									
	Chlorine, total			Concentration	1								
2.	residual			Mass									
			_	Concentration									
3.	Color			Mass									
	Fecal coliform			Concentration									
4.				Mass									
_	Fluoride			Concentration									
5.	(16984-48-8)			Mass									
	Nitrate-nitrite		4	Concentration	mg/L	<0.1			1				
6	Mili ale-minie			Mass	lb/day	<0.0207			1				
7.	Nitrogen, total			Concentration	mg/L	2.25			1				
۲.	organic (as N)			Mass	lb/day	0.466			1				
8.	Oil and grease			Concentration	mg/L	<5.56			1				
0.	On and grouse			Mass	lb/day	<1.15			1				
9.	Phosphorus (as			Concentration	mg/L	<0.1			1				
Ľ.	P), total (7723-14-0)			Mass	lb/day	<0.0207			1				
10.	Sulfate (as SO ₄)			Concentration									
	(14808-79-8)			Mass									
11.	Sulfide (as S)		✓	Concentration									
l · ··	Juniue (as 3)			Mass		1				1			

			0.44.00	F A
EPA Identification Number	NPDES Permit Number	Facility Name	Outfall Number	Form Approved 03/05/19
		· ·		OMB No. 2040-0004
TND981014962	TN0062537	Albemarle U.S., Inc.		0.11.5 11.0: 20 10 000 1

	1110981014902			Albeinatie U.S., inc.															
TAE	BLE C. CERTAIN CO			NVENTIONAL PO	LLUTANTS	6 (40 CFR 122.21(g)(7)(vi)) ¹												
	Presence or Absence (check one)						Efflu		Inta (Optio										
	Pollutant	Believed Present	Believed Absent	Units (specify)		Maximum Daily Discharge (required)	Maximum Monthly Discharge (if available)	Long-Term Average Daily Discharge (if available)	Number of Analyses	Long-Term Average Value	Number of Analyses								
12.	Sulfite (as SO ₃)	П		Concentration															
12.	(14265-45-3)	ш		Mass															
13.	Surfactants			Concentration															
10.	Odriaciants			Mass															
14.	Aluminum, total					Concentration													
17.	(7429-90-5)			Mass															
15.	Barium, total			Concentration															
L'0.	(7440-39-3)			Mass															
16.	Boron, total		П	П	П	П	П	П	П	П		Concentration							
10.	(7440-42-8)			Mass															
17.	Cobalt, total	П		Concentration															
	(7440-48-4)			Mass															
18.	Iron, total			Concentration															
	(7439-89-6)			Mass															
19.	Magnesium, total	☑	Ιп	Concentration	mg/L	3.43			1										
	(7439-95-4)			Mass	lb/day	0.710			1										
20.	Molybdenum, total			Concentration															
20.	(7439-98-7)			Mass															
21.	Manganese, total	П	Ø	Concentration															
21.	(7439-96-5)	Ш	Ŭ.	Mass															
22.	Tin, total			Concentration															
22.	(7440-31-5)			Mass															
23.	Titanium, total			Concentration															
23.	(7440-32-6)			Mass															

EPA Identification Number TND981014962		ber	NPDES Peri TN0062			Facility Name marle U.S., Inc.	(Outfall Number			Form Approved 03/05/19 OMB No. 2040-0004	
TAB	LE C. CERTAIN CO	NVENTION	AL AND NON CO	NVENTIONAL PO	DLLUTANTS	6 (40 CFR 122.21(g)(7)(vi)) ¹					
		Presence or Absence (check one)					Efflu	Intake (Optional)				
	Pollutant	Believe Present		Units (specify)		Maximum Daily Discharge (required)	Maximum Monthly Discharge (if available)	Long-Term Average Daily Discharge (if available)	Number of Analyses	Long-Term Average Value	Number of Analyses	
24.	Radioactivity											
	Alpha, total	П		Concentration								
	Aipria, total			Mass								
	Beta, total	П		Concentration								
	Deta, total			Mass								
	Radium, total	П		Concentration								
	Radium, total			Mass								
	Radium 226, total			Concentration								
	radium 220, lolai	220, 10181		Mass								

¹ Sampling shall be conducted according to sufficiently sensitive test procedures (i.e., methods) approved under 40 CFR 136 for the analysis of pollutants or pollutant parameters or required under 40 CFR chapter I, subchapter N or O. See instructions and 40 CFR 122.21(e)(3).

		TN0062537		emarle U.S., Inc.	Outfall Number	Form Approved 03/05/1 OMB No. 2040-000				
TAB	LE D. CERTAIN HAZARDOUS	SUBSTAN	Presence or	Absence	.21(g)(7)(vii)) ¹			Available Quantitative Data		
	Pollutant		Believed Present	Believed Absent	Reason Pollut	ant Believed Present in Discharge		(specify units)		
1.	Asbestos			Ø						
2.	Acetaldehyde									
3.	Allyl alcohol			Ø						
4.	Allyl chloride			V						
5.	Amyl acetate			V						
6.	Aniline			Ø						
7.	Benzonitrile			Ø						
8.	Benzyl chloride			Ø						
9.	Butyl acetate			Ø						
10.	Butylamine			Ø						
11.	Captan			Ø						
12.	Carbaryl			Ø						
13.	Carbofuran									
14.	Carbon disulfide									
15.	Chlorpyrifos			Ø						
16.	Coumaphos			Ø						
17.	Cresol			Ø						
18.	Crotonaldehyde									
19.	Cyclohexane				Used as	solvent in production facility		0.0487 mg/L		

	TND981014962		ES Permit Number TN0062537			Outtail Number	OMB No. 2040-00		
TAE	LE D. CERTAIN HAZARDOUS	SUBSTANC	Presence or	Absence			Available Quantitative Data		
	Pollutant		Believed Present	Believed Absent	Reason Pollut	ant Believed Present in Discharge	(specify units)		
20.	2,4-D (2,4-dichlorophenoxyacet	ic acid)		Ø					
21.	Diazinon			V					
22.	Dicamba								
23.	Dichlobenil			Ø					
24.	Dichlone			Ø					
25.	2,2-dichloropropionic acid			Ø					
26.	Dichlorvos			V					
27.	Diethyl amine			V					
28.	Dimethyl amine			V					
29.	Dintrobenzene			Ø					
30.	Diquat			V					
31.	Disulfoton			V					
32.	Diuron			V					
33.	Epichlorohydrin			Ø					
34.	Ethion			V					
35.	Ethylene diamine			Ø					
36.	Ethylene dibromide			Ø					
37.	Formaldehyde			Ø					
38.	Furfural			7					

				Facility Name emarle U.S., Inc.	Outfall Number	Form Approved 03/05/ OMB No. 2040-00		
TAB	LE D. CERTAIN HAZARDOUS	SUBSTANC	Presence of		.21(g)(7)(vii)) ¹			
	Pollutant		(check Believed Present		Reason Pollut	ant Believed Present in Discharge	Available Quantitative Data (specify units)	
39.	Guthion			Ø				
40.	Isoprene				Products	using isoprene is in portfolio.		
41.	Isopropanolamine			Ø				
42.	Kelthane			Ø				
43.	Kepone			Ø				
44.	Malathion			Ø				
45.	Mercaptodimethur			Ø				
46.	Methoxychlor			Ø				
47.	Methyl mercaptan			Ø				
48.	Methyl methacrylate			Ø				
49.	Methyl parathion			Ø				
50.	Mevinphos			V				
51.	Mexacarbate			Ø				
52.	Monoethyl amine			Ø				
53.	Monomethyl amine			V				
54.	Naled			V				
55.	Naphthenic acid			Ø				
56.	Nitrotoluene			Ø				
57.	Parathion		П	Ø				

					emarle U.S., Inc.	Outfall Number	Form Approved 03/05/19 OMB No. 2040-000
TAE	LE D. CERTAIN HAZARDOUS	SUBSTAN	Presence of	Absence	.21(g)(7)(vii))¹		Aveilable Constitution Pale
	Pollutant		Believed Present	Believed Absent	Reason Pollut	ant Believed Present in Discharge	Available Quantitative Data (specify units)
58.	Phenolsulfonate			Ø			
59.	Phosgene			Ø			
60.	Propargite			V			
61.	Propylene oxide						
62.	Pyrethrins			Ø			
63.	Quinoline			Ø			
64.	Resorcinol			Ø			
65.	Strontium			V			
66.	Strychnine			Ø			
67.	Styrene		V		Product	s using styrene is in portfolio.	
68.	2,4,5-T (2,4,5-trichlorophenox	yacetic		Ø			
69.	TDE (tetrachlorodiphenyl etha			Ø			
70.	2,4,5-TP [2-(2,4,5-trichlorophe propanoic acid]	enoxy)		Ø			
71.	Trichlorofon			Ø			
72.	Triethanolamine			Ø			
73.	Triethylamine			Ø			
74.	Trimethylamine			Ø			
75.	Uranium			Ø			
76.	Vanadium			V			

	EPA Identification Number	NPD	ES Permit Number		Facility Name	Outfall Number		Form Approved 03/05/19 OMB No. 2040-0004
	TND981014962	٦	N0062537	Albe	marle U.S., Inc.			ONID NO. 2040-0004
TAB	LE D. CERTAIN HAZARDOUS	SUBSTANC	ES AND ASBESTO	S (40 CFR 122.	.21(g)(7)(vii))¹			
			Presence or					4 3 1 1 0 4 4 4 5 B
	Pollutant		Believed	Believed	Reason Pollut	ant Believed Present in Discharge		Available Quantitative Data (specify units)
			Present	Absent				
77.	Vinyl acetate			\checkmark				
78.	Xylene			V				
79.	Xylenol			V				
80.	Zirconium			V				

Facility Name

Outfall Number

EPA Identification Number

NPDES Permit Number

¹ Sampling shall be conducted according to sufficiently sensitive test procedures (i.e., methods) approved under 40 CFR 136 for the analysis of pollutants or pollutant parameters or required under 40 CFR chapter I, subchapter N or O. See instructions and 40 CFR 122.21(e)(3).

EPA Identification Number TND981014962				Facility Name Albemarle U.S., Inc.	Outfall Number	Form Approved 03/05/19 OMB No. 2040-0004
TABLE E. 2,3,7,8 TETRACHLORO	DIBENZO P DIOX	(IN (2,3,7,8 T	CDD) (40 CF	R 122.21(g)(7)(viii))		
Pollutant	TCDD Presence or Absence (check one) Used or Manufactured Believed Believed		ence		Results of Screening Pro	cedure
2,3,7,8-TCDD			7			

EPA Identification Number NPDES Permit Number Facility Name Form Approved 03/05/19
TND981014962 TN0062537 Albemarle U.S., Inc.

Form 2F NPDES



U.S Environmental Protection Agency Application for NPDES Permit to Discharge Wastewater

NPDES		-1 /	STORMWA	TER	DISCHARG	ES ASS	SOCIA	TED WITH	I INDUSTRI	AL ACTI	VITY	,
SECTION	N 1. OUTI	FALL LOCA	TION (40 CFR 122.21(g)(1))								
	1.1		ormation on each of the	facility	's outfalls in	the table	below					
		Outfall Number	Receiving Water Na	me		Latitu	de			Longitue	de	
u		SW2	Unnamed ditch to KY	Lake	35°	59	87"	N	87°	58′	45"	w
Outfall Location					0	,	"		o	,	"	
tfall L					o	,	"		o	,	"	
лO					o	,	"		o	,	"	
					o	,	"		o	,	"	
					o	,	"		o	,	"	
SECTION			6 (40 CFR 122.21(g)(6))									
	2.1	upgrading,	esently required by any f or operating wastewated lischarges described in t	r treat	ment equipme							
		☐ Yes					√	No → SKI	P to Section	3.		
	2.2	Briefly iden	tify each applicable proj	ect in	the table belo	W.						
			Identification and		ected Outfalls		Sourc	e(s) of Disc	harge	Final Co	mplia	nce Dates
		Desc	ription of Project	(list	outfall numbers)			-(-, -: -: -:	g-	Require	d	Projected
provements												
prove												
<u> </u>												
		<u> </u>							,	<u> </u>		
	2.3		attached sheets describion fect your discharges) the							environm	ental	projects
		Yes		at you		lo	or piurii	.54. (Opii0				

EPA lo	dentification	n Number	NPDES Permit Number		Facility Name		oved 03/05/19				
TN	ID981014	4962	TN0062537	Albe	marle U.S., Inc.	OMB	No. 2040-0004				
SECTION	3. SITE	DRAINAGE	MAP (40 CFR 122.26(c)(1)(i)(A))								
Site Drainage Map	3.1	specific guid	tached a site drainage map containii dance.)	_	l information to this appli	cation? (See instruction	ons for				
			L	No							
SECTION			JRCES (40 CFR 122.26(c)(1)(i)(B))								
	4.1		rmation on the facility's pollutant sou								
		Outfall Number	Impervious Surface Are (within a mile radius of the fact			urface Area Drained mile radius of the facility)					
				specify units	·	•••	specify units				
		SW2	3	acres	6		acres				
				specify units			specify units				
				specify units			specify units				
				specify units			specify units				
				specify units			specify units				
				specify units			specify units				
Pollutant Sources	4.2	Provide a narrative description of the facility's significant material in the space below. (See instructions for content requirements.) See attached.									
	4.0	Danida Ha	la cattan and a decadation of existing		d		- II 4 4 1 -				
	4.3		location and a description of existing runoff. (See instructions for specific of		a non-structural control i	neasures to reduce po	ollutants in				
			() () () () () () () () () ()	Stormwater T	reatment						
		Outfall Number	Con	ntrol Measures	and Treatment		Codes from Exhibit 2F-1 (list)				
		SW2	Evaporation				1-F				
			Flocculation and sedimentation in	n pond			1-G, 1-U				
			pH adjustment				2-K				
			A Storm Water Pollution Preventi	ion Plan is in p	olace.						
			See Section 4.2 for additional det	ails on contro	l measures.						

EPA	Identificatio	n Number	NPDES Permit Number	Facil	ity Name	Form Approved 03/05/19
Т	ND98101	.4962	TN0062537	Albemai	rle U.S., Inc.	OMB No. 2040-0004
SECTIO	N 5. NO		ER DISCHARGES (40 CFR 122.26(c			
	5.1	presence of discharges a	ler penalty of law that the outfall(s) f non-stormwater discharges. Moreo are described in either an accompanyi or type first and last name)	ver, I certify th	at the outfalls identified a	
		Kyle Miller			Plant Manager	
		Signature	Whit. al	L	Date signed	-22
ge	5.2	Provide the t	esting information requested in the ta	ble below.		
Non-Stormwater Discharges		Outfall Number	Description of Testing Met	hod Used	Date(s) of Testing	Onsite Drainage Points Directly Observed During Test
rmwate		SW2	No flow observed during d	ry weather	11/10/2022	SW2
Non-Sto						
			-			
SECTIO			AKS OR SPILLS (40 CFR 122.26(c)(1		THE REAL PROPERTY.	equal est . E
*	6.1	None.	y significant leaks or spills of toxic or h	azardous polluta	ants in the last three years.	
or Sp						
Leaks						
nificant Leaks or Spills						
Sign						
SECTIO	N 7. DISC	CHARGE INFO	DRMATION (40 CFR 122.26(c)(1)(i)(E	())		1. U'2. (18) V/2
	See the	instructions to	determine the pollutants and parame		uired to monitor and, in turr	n, the tables you must
natio	7.1		source or new discharge?			
Discharge Information			See instructions regarding submissing data.	ion of	No → See instructions reactual data.	garding submission of
arge	Tables	A, B, C, and D				
sch	7.2	Have you co	mpleted Table A for each outfall?			
<u> </u>		✓ Yes			No	

EPA I	Identification	n Number	NPDES Permit Number	Faci	lity Name	Form Approved 03/05/19
TI	ND98101	4962	TN0062537	Albema	rle U.S., Inc.	OMB No. 2040-0004
	7.3	Is the facility wastewater	/ subject to an effluent limitation guide ?	line (ELG) or eff	luent limitations in a	n NPDES permit for its process
		☐ Yes		✓	No → SKIP to Ite	m 7.5.
	7.4		ompleted Table B by providing quantite an ELG and/or (2) subject to effluent li			
		☐ Yes			No	
	7.5	Do you know	w or have reason to believe any polluta	ants in Exhibit 2	F–2 are present in t	he discharge?
		✓ Yes			No → SKIP to Ite	m 7.7.
	7.6		sted all pollutants in Exhibit 2F–2 that yantitative data or an explanation for th			are present in the discharge and
		✓ Yes			No	
	7.7	Do you qua	lify for a small business exemption und	der the criteria s	pecified in the Instru	ctions?
			→SKIP to Item 7.18.	✓	No	
	7.8	l'	w or have reason to believe any pollute	ants in Exhibit 2	·	· ·
		✓ Yes		<u>_</u>	No → SKIP to Ite	
tinued	7.9	Have you list Table C?	sted all pollutants in Exhibit 2F–3 that y	you know or hav	e reason to believe	are present in the discharge in
Con		✓ Yes			No	
ation	7.10	Do you expe	ect any of the pollutants in Exhibit 2F–	3 to be discharg	ed in concentrations	s of 10 ppb or greater?
form		✓ Yes			No → SKIP to Ite	
Discharge Information Continued	7.11		rovided quantitative data in Table C for ons of 10 ppb or greater?	r those pollutant	s in Exhibit 2F–3 tha	at you expect to be discharged in
ischa		✓ Yes			No	
٥	7.12	Do you expo	ect acrolein, acrylonitrile, 2,4-dinitrophor greater?	enol, or 2-methy	d-4,6-dinitrophenol t	o be discharged in concentrations
		☐ Yes		✓	No → SKIP to Ite	m 7.14.
	7.13		rovided quantitative data in Table C for in concentrations of 100 ppb or greate		dentified in Item 7.1	2 that you expect to be
		☐ Yes			No	
	7.14		rovided quantitative data or an explana t concentrations less than 10 ppb (or le			
		✓ Yes			No	
	7.15	Do you know	w or have reason to believe any polluta	ants in Exhibit 2	F–4 are present in t	he discharge?
		☐ Yes		✓	No → SKIP to Ite	m 7.17.
	7.16	Have you lise explanation	sted pollutants in Exhibit 2F–4 that you in Table C?	know or believe	e to be present in the	e discharge and provided an
		☐ Yes			No	
	7.17	Have you pi	rovided information for the storm even	t(s) sampled in	Table D?	
	1	✓ Yes			No	

	identificatio			Permit Number		racility Name		OMB No. 2040-0004
T	ND98101			0062537	Albe	marle U.S., Inc.		ONID 140. 2040-0004
þ		r Manufactur						
tinue	7.18			ibits 2F–2 through 2F fiate or final product o			ent of a substa	nce used or
Con		Manufacture	eu as an intermet	nate or ilital product o	i byproduct?		KIP to Section	. 0
tion	7.40	_		" TODD " "		LI NO 7 3	okip to section	10.
rmai	7.19	List the polit	utants below, incl	uding TCDD if applica	able.			
e Info		1. Cyclohexa	ane	4.			7.	
Discharge Information Continued		2. Toluene		5.			8.	
Dis		3. Napthale	ne	6.			9.	
SECTIO	N 8. BIO	LOGICAL TO	XICITY TESTING	6 DATA (40 CFR 122	.21(g)(11))			
ata	8.1			or reason to believe a receiving water in r				oxicity has been made on ee years?
Biological Toxicity Testing Data		☐ Yes				✓ No →	SKIP to Sectio	n 9.
Tes	8.2	Identify the	tests and their pu	rposes below.				
xicity		T	est(s)	Purpose of To	est(s)	Submitted t Permitting A	-	Date Submitted
al To						☐ Yes	□ No	
ologic						☐ Yes	□ No	
Ä						☐ Yes	□ No	
							— 140	
SECTIO	N 9. CON	 TRACT ANA	LYSIS INFORM	 ATION (40 CFR 122.2	21(g)(12))	l les	— 110	
SECTIO	9.1	Were any of	f the analyses rep	ATION (40 CFR 122.2 ported in Section 7 (or				act laboratory or
SECTIO			f the analyses rep			rough C) perforr		•
SECTIO	9.1	Were any of consulting fi	f the analyses repirm?	ported in Section 7 (or	n Tables A th	rough C) perforr ☐ No →	ned by a contr	•
SECTIO		Were any of consulting fi	f the analyses repirm?	contract laboratory or	n Tables A th	rough C) perforr No → rm below.	ned by a contri	n 10.
SECTIO	9.1	Were any of consulting fi Yes Provide info	f the analyses repairm?	contract laboratory or	n Tables A th	rough C) perforr No → rm below.	ned by a contr	•
	9.1	Were any of consulting fi	f the analyses repairm?	contract laboratory or	n Tables A th	rough C) perforr No → rm below.	ned by a contri	n 10.
	9.1	Were any of consulting fi Yes Provide info	f the analyses repairm?	contract laboratory or	n Tables A th	rough C) perforr No → rm below.	ned by a contri	n 10.
	9.1	Were any of consulting find Yes Provide info	f the analyses repairm? rmation for each poratory/firm	contract laboratory or	n Tables A th	rough C) perforr No → rm below.	ned by a contri	n 10.
	9.1	Were any of consulting fi Yes Provide info	f the analyses repairm? rmation for each poratory/firm	contract laboratory or	Tables A the consulting finds	rough C) perforr No → rm below.	ned by a contri	n 10.
	9.1	Were any of consulting find Yes Provide info	f the analyses repairm? rmation for each poratory/firm	contract laboratory or Laboratory Nur Pace Analytical	r Tables A the consulting finder 1	rough C) perforr No → rm below.	ned by a contri	n 10.
	9.1	Were any of consulting find Yes Provide info	f the analyses repairm? rmation for each poratory/firm	contract laboratory or Laboratory Nur Pace Analytical	r Tables A the consulting finder 1	rough C) perforr No → rm below.	ned by a contri	n 10.
	9.1	Were any of consulting fire of the consulting	f the analyses repairm? rmation for each poratory/firm address	contract laboratory or Laboratory Nur Pace Analytical	r Tables A the consulting finder 1	rough C) perforr No → rm below.	ned by a contri	n 10.
Contract Analysis Information	9.1	Were any of consulting find Yes Provide info	f the analyses repairm? rmation for each poratory/firm address	contract laboratory or Laboratory Nur Pace Analytical	r Tables A the consulting finder 1	rough C) perforr No → rm below.	ned by a contri	n 10.
	9.1	Were any of consulting fire of the consulting	f the analyses repairm? rmation for each poratory/firm address	contract laboratory or Laboratory Nur Pace Analytical 12065 Lebanon Roa Mt. Juliet, TN 37122	r Tables A the consulting finder 1	rough C) perforr No → rm below.	ned by a contri	n 10.
	9.1	Were any of consulting fine Yes Provide info Name of lab Laboratory a	f the analyses repairm? rmation for each poratory/firm address	contract laboratory or Laboratory Nur Pace Analytical 12065 Lebanon Roa Mt. Juliet, TN 37122	r Tables A the consulting finder 1	rough C) perforr No → rm below.	ned by a contri	n 10.
	9.1	Were any of consulting fine Yes Provide info Name of lab Laboratory a	f the analyses repairm? rmation for each poratory/firm address	contract laboratory or Laboratory Nur Pace Analytical 12065 Lebanon Roa Mt. Juliet, TN 37122	r Tables A the consulting finder 1	rough C) perforr No → rm below.	ned by a contri	n 10.
	9.1	Were any of consulting fine Yes Provide info Name of lab Laboratory a	f the analyses repairm? rmation for each poratory/firm address	contract laboratory or Laboratory Nur Pace Analytical 12065 Lebanon Roa Mt. Juliet, TN 37122	r Tables A the consulting finder 1	rough C) perforr No → rm below.	ned by a contri	n 10.

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EPA Identification Number	NPDES Permit Number	Facility Name
TND981014962	TN0062537	Albemarle U.S., Inc.
SECTION 48 CHECKLIST AN	D CERTIFICATION CTATEMENT / 40	CED 122 22/a) and (d))

FF	ND98101	.4962	INU	Ub25:	37	All	ema	irie O.S., inc.			
SECTIO	N 10. CH	ECKLIST AN	D CERTIFICATION	ON ST	ATEMENT (40	O CFR 122.	22(a)	and (d))		18 84 PU 14	
	10.1	In Column 1 each section	below, mark the	sectio nn 2 a	ns of Form 2F any attachment	that you hats that you	ive co are ei	ompleted and are sunclosing to alert the	bmitting with y permitting auth	our application. Fo nority. Note that not	r
		Col	lumn 1					Column 2			
		☑ Section	1		w/ attachmer	nts (e.g., re	spon	ses for additional out	falls)		
= 7/13		☑ Section	2		w/ attachmer	nts					
		☑ Section	3	7	w/ site draina	age map					
		☑ Section	4	Ø	w/ attachmer	nts					
		☑ Section	5		w/ attachmer	nts					
ŧ		☑ Section	6		w/ attachmer	nts					
rteme		☑ Section	17	Ø	Table A			w/ small business e	exemption req	uest	
on Sta				✓	Table B			w/ analytical results	s as an attachi	ment	
Checklist and Certification Statement					Table C		√	Table D			
d Cert		☑ Section	8		w/attachmen	nts					
ist an		☑ Section	9		w/attachmen	nts (e.g., res	pons	ses for additional con	tact laboratori	es or firms)	
heck		☑ Section	10								
8	10.2	Certification	n Statement								
		accordance submitted. E for gathering complete. I	with a system d Based on my inqu g the information.	lesign iry of the ii ere ar	ed to assure t the person or p nformation sub re significant po	that qualifie persons wh omitted is, t	d pe o ma o the subn	nts were prepared ur rsonnel properly gat mage the system or a best of my knowled nitting false informati	ther and evalu those persons Ige and belief,	uate the information directly responsible true, accurate, an	n e d
		Name (print	or type first and I	ast na	ame)		0	fficial title			
		Kyle Miller						ant Manager			
		Signature	Khit.	6	ill	~	D	ate signed / Z - /	1-22		
			/								

EPA Identification Number NPDES Permit Number Facility Name Outfall Number Form Approved 03/05/19
TND981014962 TN0062537 Albemarle U.S., Inc. SW2

TABLE A. CONVENTIONAL AND NON CONVENTIONAL PARAMETERS (40 CFR 122.26(c)(1)(i)(E)(3))¹
You must provide the results of at least one analysis for every pollutant in this table. Complete one table for each outfall. See instructions for additional details.

You	ou must provide the results of at least one analysis for every pollutant in this table. Complete one table for each outfall. See instructions for additional details and requirements.										
		Maximum Dail (specify		Average Daily (specify		Number of Storm Events Sampled	Source of Information				
	Pollutant or Parameter	Grab Sample Taken During First 30 Minutes Flow-Weighted Composite		Grab Sample Taken During First 30 Minutes	During First Composite		(new source/new dischargers only; use codes in instructions)				
1.	Oil and grease	7.58 mg/L		5.43 mg/L		6					
2.	Biochemical oxygen demand (BOD ₅)	10.60 mg/L		6.34 mg/L		6					
3.	Chemical oxygen demand (COD)	72.2 mg/L				1					
4.	Total suspended solids (TSS)	646 mg/L		283.40 mg/L		6					
5.	Total phosphorus	0.200 mg/L				1					
6.	Total Kjeldahl nitrogen (TKN)	0.700 mg/L				1					
7.	Total nitrogen (as N)	1.33 mg/L				1					
8.	pH (minimum)	7.20		8.12		6					
0.	pH (maximum)	8.50		8.12		6					

¹ Sampling shall be conducted according to sufficiently sensitive test procedures (i.e., methods) approved under 40 CFR 136 for the analysis of pollutants or pollutant parameters or required under 40 CFR chapter I, subchapter N or O. See instructions and 40 CFR 122.21(e)(3).

TABLE B. CERTAIN CONVENTIONAL AND NON CONVENTIONAL POLLUTANTS (40 CFR 122.26(c)(1)(i)(E)(4) and 40 CFR 122.21(g)(7)(vi)(A))1

List each pollutant that is limited in an effluent limitation guideline (ELG) that the facility is subject to or any pollutant listed in the facility's NPDES permit for its process wastewater (if the facility is operating under an existing NPDES permit). Complete one table for each outfall. See the instructions for additional details and requirements.

(specify	ly Discharge units)	(specify	y Discharge vunits)	Number of Storm	Source of Information	
Grab Sample Taken During First 30 Minutes	Flow-Weighted Composite	Grab Sample Taken During First 30 Minutes	Flow-Weighted Composite	Events Sampled	(new source/new dischargers only; use codes in instructions)	
no data availble						
	(specify Grab Sample Taken During First 30 Minutes	During First Composite 30 Minutes	(specify units) (specify units) Grab Sample Taken During First 30 Minutes Flow-Weighted Composite Grab Sample Taken During First 30 Minutes	(specify units) Grab Sample Taken During First 30 Minutes Flow-Weighted Composite Grab Sample Taken During First 30 Minutes Flow-Weighted Composite Grab Sample Taken During First 30 Minutes Flow-Weighted Composite	Composite Comp	

¹ Sampling shall be conducted according to sufficiently sensitive test procedures (i.e., methods) approved under 40 CFR 136 for the analysis of pollutants or pollutant parameters or required under 40 CFR chapter I, subchapter N or O. See instructions and 40 CFR 122.21(e)(3).

TABLE C. TOXIC POLLUTANTS, CERTAIN HAZARDOUS SUBSTANCES, AND ASBESTOS (40 CFR 122.26(c)(1)(i)(E)(4) and 40 CFR 122.21(g)(7)(vi)(B) and (vii))1

List each pollutant shown in Exhibits 2F–2, 2F–3, and 2F–4 that you know or have reason to believe is present. Complete one table for each outfall. See the instructions for additional details and requirements.

	Maximum Dai (specify	ly Discharge units)	Average Dail (specify	y Discharge vunits)	Number of Storm	Source of Information (new source/new dischargers only; use codes in instructions)	
Pollutant and CAS Number (if available)	Grab Sample Taken During First 30 Minutes	Flow-Weighted Composite	Grab Sample Taken During First 30 Minutes	Flow-Weighted Composite	Events Sampled		
Cyclohexane	<0.001 mg/L				1		
Nitrate-nitrite	0.633 mg/L				1		
Toluene	<0.001 mg/L				1		
Napthelene	<0.001 mg/L				1		

¹ Sampling shall be conducted according to sufficiently sensitive test procedures (i.e., methods) approved under 40 CFR 136 for the analysis of pollutants or pollutant parameters or required under 40 CFR chapter I, subchapter N or O. See instructions and 40 CFR 122.21(e)(3).

TABLE D. STORM EVENT INFORMATION (40 CFR 122.26(c)(1)(i)(E)(6))

Provide data for the storm event(s) that resulted in the maximum daily discharges for the flow-weighted composite sample.

Date of Storm Event	Duration of Storm Event (in hours)	Total Rainfall During Storm Event (in inches)	Number of Hours Between Beginning of Storm Measured and End of Previous Measurable Rain Event	Maximum Flow Rate During Rain Event (in gpm or specify units)	Total Flow from Rain Event (in gallons or specify units)
07/05/2022					
	1	0.23	> 72 hrs no runoff	4,490 gpm	270,000 gallons

Provide a description of the method of flow measurement or estimate.

Flow rate estimated from width, depth, and horizontal rate of flow during one measurement. Total flow was based on assuming the measured flow was sustained during the period of the storm.

Section 4.2

The area that drains at outfall 001 (formerly SW1) encompasses the North Plant and South Plant production areas and finished product storage sites. The North Plant production area and finished product storage area drain into a lift station that is pumped to the retention pond. Storm water from the South Plant is collected in a catch basin and pumped to the retention pond and comingled with the facility process wastewater. As previously noted, the water in the retention pond is treated by a simple pH adjustment system before discharging through 001. During peak storm events at peak hours, some storm water flow may bypass treatment and will be discharged at outfall 001. The area that drains to SW2 encompasses the rail sidings into the plant, raw material loading & unloading areas located at the North Plant, storm water from the vegetative area to the north of the industrial areas, and storm water from the eastern portion of the facility that flows through a ditch into SW2. All storage and process areas of the North Plant are contained by dikes so that contaminated storm water may be pumped to the retention pond for treatment and discharge at outfall 001. During storm events at peak hours, some discharge occurs to SW2. No pesticides, herbicides, soil conditioners or fertilizers are applied. The products are highly reactive to water, and raw materials and products are protected from exposure to water and storm water to prevent degradation.