## \*online appendix material due to page limits

## Table 1. Characteristics of ACEs activities in OD2A by jurisdiction

Jurisdiction	Description of ACEs-related activities	ACEs prevention	SEM level	OD2A strategy	Populations of focus	Implementing	NAS-related
		strategy				sector	activities
STATES		I	I		1		1
Alabama	- Providing peer navigation and warm	Intervene to	Individual	Linkages to Care	Disproportionately	СВО	NAS (1)
	handoff for parenting women with	lessen harms			affected populations	Government	
	infants with NAS in neonatal unit					Healthcare	
Alaska	- Increasing awareness of ACEs	Promote social	Community (2)	Public Safety	First responders	СВО	
	prevention and resiliency building for	norms (2)		Partnerships	Health workers	Government	
	public safety			Innovative		Healthcare	
	- TIC training for public health,			Prevention			
	healthcare, and community partners						
Arizona	- Increasing TIC capacity in schools	Promote social	Community (3)	Linkages to Care	Educators	Education	
	- Conducting outreach to increase	norms (3)		(3)	PWUD	Government	
	corollary services in schools so				Public safety	Healthcare	
	children with trauma can be connected						
	to appropriate services and support						
	- Improving rural organizations' linkage						
	to care capacity						
Colorado	- Addressing barriers to accessing food	Strengthen	Community	Innovative	CBO staff	Government	
	assistance and childcare programs	economic		Prevention	Government staff		
		supports					

Florida	- Assessing and identifying ACEs risk	Promote social	Community	Public Safety	Public safety	Government	
	using a TIC approach through	norms		Partnerships			
	partnerships between public safety,						
	first responders, schools, and						
	community partners						
Indiana	- Implementing a school-based ACEs	Intervene to	Individual	State-Local	Children ages 5–18	Education	
	program that provides coaching with	lessen harms		Integration		Government	
	mental health supports to youth						
Kansas	- Enrolling infants with NAS and their	Ensure strong	Relationship	Innovative	Caregivers/families	Government	NAS (1)
	families in enhanced home visitation	start		Prevention	Pregnant/parenting	Healthcare	
	pilot program				women with SUD		
					Substance-exposed infants		
Kentucky	- Training hospital staff on SBIRT and	Connect youth to	Community (4)	State-Local	Children ages 5–18	Government	NAS (3)
	other screening tools for pregnant	caring adults		Integration	Health workers	Healthcare	
	women with SUD	Intervene to		Provider-Health	Justice-involved		
	- Updating protocols for infants with	lessen harms		Systems	populations		
	NAS in neonatal unit	(2)		Support (3)	Pregnant/parenting		
	- Using TIC and school-based	Promote social			women with SUD		
	programming to address ACEs risk and	norms			Substance-exposed infants		
	protective factors among middle-school						
	aged children						
	- Addressing the burden of NAS and						
	maternal mortality through healthcare						
	provider education						

Louisiana	- Increasing naloxone administration and	Ensure strong	Community (2)	State-Local	Caregivers/families	Government	NAS (1)
	other SUD interventions for justice-	start		Integration	Health workers		
	involved populations through trainings	Intervene to		Empowering	Justice-involved		
	for drug courts	lessen harms		Safer Choices	populations		
	- Improving home visitation programs				Pregnant/parenting		
	and parenting programs for low-				women with SUD		
	income pregnant women and families						
	through improved screening and						
	linkages to care						
Maryland	- Increasing linkages to care for infants	Intervene to	Community (2)	Linkages to Care	Disproportionately	СВО	NAS (1)
	with NAS, parenting women with	lessen harms		(2)	affected populations	Government	
	SUD, and women with SUD by	Promote social			PWUD		
	engaging community partners	norms					
	- Developing training curriculum on						
	trauma-informed services for general						
	public						
Mississippi	- Utilizing syndromic surveillance to	Intervene to	Community (5)	Innovative	Health workers	СВО	NAS (4)
	coordinate care for parenting women	lessen harms		Surveillance	Pregnant/parenting	Government	
	with SUD	(4)		Linkages to Care	women with SUD		
	- Providing care for parenting women	Promote social		Provider-Health	Substance-exposed infants		
	with SUD through case management	norms		Systems			
	and community partnership			Support (2)			
	development			Empowering			
	- Providing peer navigation and referrals			Safer Choices			
	to treatment for parenting women with						

		1					
	infants with NAS and those with						
	SUD/OUD						
	- Training clinicians on SBIRT and						
	MOUD for pregnant women, and care						
	of infants with NAS						
	- Increasing awareness of the risks of						
	pregnant women with SUD through						
	communications campaign						
Missouri	- Training birthing hospital staff on	Intervene to	Community (2)	Innovative	General population	Government	NAS (2)
	diagnosis and treatment of NAS	lessen harms		Surveillance (2)	Health workers		
	- Providing resources to healthcare	(2)					
	providers to improve care for pregnant						
	women at risk of or with infants with						
	NAS						
Nevada	- Educating communities on ACEs and	Promote social	Community	Empowering	General population	СВО	
	SBIRT and on health risk behavior	norms		Safer Choices			
	tools						
New	- Supporting full-time caregivers of	Intervene to	Relationship (2)	State-Local	Caregivers and parents	СВО	
Hampshire	children affected by parental SU	lessen harms	Community	Integration (3)	Children ages 0-4	Government	
	through case management	(2)			Children ages 5–18	Public safety	
	- Providing referrals to services to	Teach skills			Justice-involved		
	caregivers of children affected by				populations		
	parental SU				PWUD		
	- Providing families separated by						
	parental SUD with education and						

	linkages to care through family						
	resource programs						
New Jersey	- Implementing TIC among first	Promote social	Community	Provider-Health	Health workers	СВО	NAS (1)
	responders and healthcare workers	norms (2)	Societal (2)	Systems	Pregnant/parenting	Education	
	- Promoting TIC in harm reduction	Intervene to		Support	women with SUD	Government	
	settings	lessen harms		Empowering	Substance-exposed infants		
	- Developing state-level guidelines for			Safer Choices			
	NAS screening			(2)			
New Mexico	- Developing education materials for	Intervene to	Community (2)	Innovative	Pregnant/parenting	Government	NAS (2)
	NAS prevention, treatment and care for	lessen harms		Prevention	women with SUD		
	pregnant women with SUD	(2)					
	- Develop resources to support referrals						
	and linkage to care for pregnant						
	women						
New York	- Addressing opioid use among pregnant	Intervene to	Community (2)	State-Local	Government staff	СВО	NAS (2)
	and postpartum women through	lessen harms		Integration	PWUD	Government	
	implementation guides for local health	(2)		Provider-Health			
	departments			Systems			
	- Providing education and support on			Support			
	MOUD, harm reduction, and						
	buprenorphine waiver trainings to						
	providers who work with pregnant and						
	parenting women with SUD						

Oklahoma	- Training first responders on trauma-	Intervene to	Community	Public Safety	First responders	Government	
	informed approaches, ACEs, and local	lessen harms		Partnerships			
	treatment resources						
Rhode Island	- Updating ED protocols for MOUD	Intervene to	Community	Linkages to Care	Children ages 5–18	Healthcare	NAS (1)
	services to include adolescent and	lessen harms			Pregnant/parenting		
	pregnant women				women with SUD		
South	- Implementing skills-based programs to	Teach skills	Relationship	State-Local	Caregivers/families	СВО	
Carolina	improve family relationships and social			Integration	Children ages 5–18	Government	
	skills to reduce ACEs risk						
Utah	- Providing resources and education on	Promote social	Individual (3)	Innovative	Pregnant/parenting	Government	NAS (4)
	safer choices for women	norms	Community	Surveillance (3)	women with SUD	Healthcare	
	- Providing obstetric care sessions for	Intervene to		Provider-Health	Substance-exposed infants		
	women, including pregnant women,	lessen harms		Systems			
	with OUD through telehealth services	(3)		Support			
	- Providing linkages to care through						
	treatment options for high-risk						
	parenting women with SUD						
	- Providing linkages to care through						
	referrals for infants with NAS						
Vermont	- Training both hospital and birthing	Connect youth to	Community (3)	Linkages to Care	Caregivers/ families	СВО	NAS (1)
	staff on NAS, PoSC, and referral	caring adults		Provider-Health	Health workers	Government	
	protocols for women with SUD,	Intervene to		Systems	Pregnant/parenting	Healthcare	
	pregnant and/or parenting women with	lessen harms		Support	women with SUD		
	SUD, and infants with NAS	(2)		Empowering	PWUD		
				Safer Choices	Substance-exposed infants		

	- Implementing family screening and						
	linkages to care for substance use						
	through pediatric offices						
	- Implementing school-based programs						
	to educate youth on SUD prevention						
Virginia	- Training public safety and regional	Promote social	Community	Public Safety	Government staff	Government	NAS (1)
	staff on incorporating ACEs, TIC, and	norms		Partnerships	Public safety		
	NAS into prevention and response						
	efforts						
West Virginia	- Developing protocols for rapid	Intervene to	Community (2)	Public Safety	Children ages 5–18	Government	
	response teams for addressing patient	lessen harms		Partnerships (2)	Health workers		
	care impaired by public safety	(2)			Public safety		
	interactions with their provider,						
	including identification and treatment						
	of ACEs						
	- Evaluating the effectiveness of						
	implementing Handle with Care						
	program through school and public						
	safety partnerships						
Wisconsin	- Training providers and home visitors	Intervene to	Community (3)	State-Local	CBO staff	СВО	NAS (1)
	on care coordination, referrals, and	lessen harms		Integration	Disproportionately	Government	
	monitoring of pregnant or parenting	(2)		Linkages to Care	affected populations	Healthcare	
	women with SUD	Promote social		Public Safety	First responders	Public safety	
		norms		Partnerships	Governmental staff		
					Health workers		

- Training first responders medical				I		
providers, and other health workers on						
TIC						
- Increasing preparedness and improving						
response efforts among state and local						
partners through TIC						
d CITIES						
- Increasing tracking of peer services use	Intervene to	Individual	Innovative	Caregivers/families	Government	NAS (2)
by pregnant women with SUD in	lessen harms	Relationship (2)	Surveillance	CBO staff	Healthcare	
treatment	(2)	Community (4)	Linkages to Care	First responders		
- Increasing linkages to care for high	Promote social		(2)	Health workers		
ACEs risk families	norms (3)		Public Safety	Government staff		
- Educating first responders and public	Teach skills (2)		Partnerships	Pregnant/parenting		
safety on risks of ACEs			Empowering	women with SUD		
- Providing ACEs-focused training for			Safer Choices	Public safety		
harm reduction and overdose response			(3)			
team						
- Training for linkage coordinators on						
ACEs, overdose, and TIC						
- Supporting outreach for families and						
friends of those with SUD/OD						
- Identifying providers for parenting						
program offerings						
	<ul> <li>Increasing preparedness and improving response efforts among state and local partners through TIC</li> <li><b>ACTITES</b></li> <li>Increasing tracking of peer services use by pregnant women with SUD in treatment</li> <li>Increasing linkages to care for high ACEs risk families</li> <li>Educating first responders and public safety on risks of ACEs</li> <li>Providing ACEs-focused training for harm reduction and overdose response team</li> <li>Training for linkage coordinators on ACEs, overdose, and TIC</li> <li>Supporting outreach for families and friends of those with SUD/OD</li> <li>Identifying providers for parenting</li> </ul>	providers, and other health workers on TICIncreasing preparedness and improving response efforts among state and local partners through TICJurtners through TICACTTIESIncreasing tracking of peer services use by pregnant women with SUD in treatment(2)Increasing linkages to care for high ACEs risk familiesACEs risk familiesIncreasing first responders and public safety on risks of ACEsProviding ACEs-focused training for harm reduction and overdose response teamTraining for linkage coordinators on ACEs, overdose, and TICSupporting outreach for families and friends of those with SUD/ODIdentifying providers for parenting	providers, and other health workers on TICIncreasing preparedness and improving response efforts among state and local partners through TICIncreasing tracking of peer services use by pregnant women with SUD in treatmentIntervene to lessen harmsIndividualCommunity (4)- Increasing linkages to care for high ACEs risk familiesPromote social norms (3)Relationship (2) Community (4)- Educating first responders and public safety on risks of ACEsTeach skills (2)Individual- Providing ACEs-focused training for harm reduction and overdose response teamItel (1)Itel (1)- Training for linkage coordinators on ACEs, overdose, and TICItel (1)Itel (1)- Supporting outreach for families and friends of those with SUD/ODItel (1)Itel (1)- Identifying providers for parentingItel (1)Itel (1)	providers, and other health workers on TICIntereasing preparedness and improving response efforts among state and local partners through TICIntervent to lessen harmsIndividualInnovatived CTTES- Increasing tracking of peer services use by pregnant women with SUD in treatmentIndividualInnovative(2)Community (4)Linkages to Care- Increasing linkages to care for high ACEs risk familiesPromote social norms (3)(2)- Educating first responders and public safety on risks of ACEsTeach skills (2)Partnerships- Providing ACEs-focused training for harm reduction and overdose response teamIntervent to Intervent to Intervent toSafer Choices- Training for linkage coordinators on ACEs, overdose, and TICIntervent to Intervent to Intervent to Intervent toIntervent to Intervent to<	providers, and other health workers on TCImproviders, and other health workers on TCImproviders and improving response efforts among state and local partners through TICImproviders (Improviders	providers, and other health workers on TCIncreasing preparedness and improving response efforts among state and local partners through TCInstruct </td

Cuyahoga	- Training public safety officials on new	Promote social	Community	Public Safety	Public safety	Government	
County, OH	programs, partnerships, and challenges	norms		Partnerships			
	for ACEs						
Duval	- Training school nurses in SBIRT and	Promote social	Individual (2)	Innovative	First responders	Education	NAS (1)
County, FL	TIC	norms	Community	Surveillance	Health workers	Government	
	- Implementing PoSC and tracking	Intervene to		Provider-Health	Public safety		
	linkages to care through case	lessen harms		Systems			
	management for infants with NAS,	(2)		Support			
	parenting women, and families			Public Safety			
	- Training first responders on TIC,			Partnerships			
	SBIRT, identifying ACEs risk, and						
	available resources						
Hamilton	- Training school staff and	Promote social	Community	Provider-Health	Children ages 5–18	Government	
County, OH	administrators, first responders, school	norms (2)		Systems	Educators		
	resource officers, community health	Intervene to		Support	First responders		
	partners, and various service agencies	lessen harms		Public Safety	Public safety		
	to identify and develop interventions			Partnerships (2)			
	for youth affected by trauma						
	- Training hospital employees on TIC,						
	naloxone administration, and						
	community linkages to care						
	- Training public safety officials, first						
	responders, and school staff on SUD,						
	ACEs, TIC, available resources, and						
	Handle with Care program						

Maricopa	- Implementing a taskforce for NAS	Intervene to	Community (7)	State-Local	Caregivers/families	СВО	NAS (6)
County, AZ	prevention with state and community	lessen harms		Integration (6)	Health workers	Government	
	partner input	(6)		Provider-Health	Pregnant/parenting	Healthcare	
	- Developing protocols to improve	Promote social		Systems	women with SUD		
	health outcomes for pregnant and	norms		Support	Substance-exposed infants		
	parenting women with SUD and their						
	partners						
	- Planning for care coordination for						
	pregnant and parenting women with						
	SUD						
	- Training taskforce members on the use						
	of prenatal family care plans						
	- Educating taskforce members on NAS-						
	related topics and implementation of						
	the CHARM model						
	- Informing statewide initiatives for						
	NAS through meetings with partners						
	- Training healthcare providers and						
	community health centers on linkages						
	to care, OUD screening, prescribing						
	guidelines, and ACEs						
Palm Beach	- Providing skills-based education for	Teach skills	Community	State-Local	Children ages 5–18	Government	
County, FL	drug abuse prevention to youth and			Integration			
	parents in schools and community-						
	based settings						

City of	- Providing linkages to care for infants	Intervene to	Community	Linkages to Care	Pregnant/parenting	СВО	NAS (1)
Philadelphia,	with NAS, parenting women, and	lessen harms			women with SUD		
PA	women at risk for SUD						
Riverside	- Training first responders to implement	Promote social	Community	Empowering	First responders	СВО	
County, CA	TIC	norms		Safer Choices		Government	
TERRITORIE	s						
Puerto Rico	- Evaluating evidence-based practices	Promote social	Community (8)	State-Local	Caregivers/families	СВО	NAS (8)
	for both NAS and OUD prevention	norms (5)		Integration (3)	CBO staff	Education	
	among pregnant women	Intervene to		Linkages to Care	Disproportionately	Government	
	- Educating health workers and the	lessen harms		(4)	affected populations	Healthcare	
	public to increase awareness of OUD,	(3)		Provider-Health	General population	Public safety	
	NAS, and fatal and nonfatal overdoses			Systems	Government staff		
	- Implementing interventions for infants			Support	Health workers		
	with NAS through provider education,				Pregnant/parenting		
	referrals, and access to treatment for				women with SUD		
	pregnant women, referrals for chronic				Substance-exposed infants		
	pain patients in EDs, and collaboration						
	with MCH agencies						
	- Increasing awareness among public on						
	NAS and risk of opioid use in						
	pregnancy						
	- Developing implementation guides for						
	referrals and linkages to care						

	- Developing education materials for			
	healthcare providers on alternative pain			
	management alternatives for pregnant			
	women			
	- Developing and disseminating			
	protocols to coordinate joint prevention			
	efforts at the state and local level and			
	strengthen agencies' response to NAS			
	- Establishing protocols and policies for			
	the ED to guide referrals and linkages			
	to care for patients with OUD,			
	including collaboration for newborn			
	care			
TOTAL: 34	84 ACEs-related activities			44 NAS-
states				related
implementing				activities
ACEs-related				
activities				

List of Abbreviations: ACEs = Adverse Childhood Experiences; CBO = Community-based organization; CHARM = Children and Recovering Mothers; ED = Emergency Department; MCH = Maternal and Child Health; MOUD = Medication for Opioid Use Disorder; NAS = Neonatal Abstinence Syndrome; NOWS = Neonatal Opioid Withdrawal Syndrome; OD2A = Overdose Data to Action; OUD = Opioid Use Disorder; PWUD = Persons who use drugs; PoSC = Plans of Safe Care; SBIRT = Screening, Brief Intervention, and Referral to Treatment; SEM = Social Ecological Model; SU = Substance use; SUD = Substance use disorder; TIC = Trauma-informed care