COMMONWEALTH of VIRGINIA

Substance Abuse Services Council
P. O. Box 1797
Richmond, Virginia 23218-1797

March 16, 2020

To: The Honorable Ralph Northam, Governor

and

Members, Virginia General Assembly

The 2004 Session of the General Assembly amended §2.2-2697.B. of the *Code of Virginia*, to direct the Substance Abuse Services Council (referred to as the Council in this report) to collect information about the impact and cost of substance use disorder treatment provided by public agencies in the Commonwealth. In accordance with that language, please find attached the *Substance Abuse Services Council Report on Treatment Programs for FY 2020*.

Sincerely,

Mary Gresham McMasters, MD, DFASAM, Addiction Medicine

xc: The Honorable Daniel Carey, M.D., Secretary of Health and Human Resources
The Honorable Brian J. Moran, Secretary of Public Safety
Alison Land, Commissioner, Department of Behavioral Health and Developmental Services
Harold W. Clarke, Director, Department of Corrections
Valerie Boykin**,** Director, Department of Juvenile Justice
Karen Kimsey, Director, Department of Medical Assistance Services

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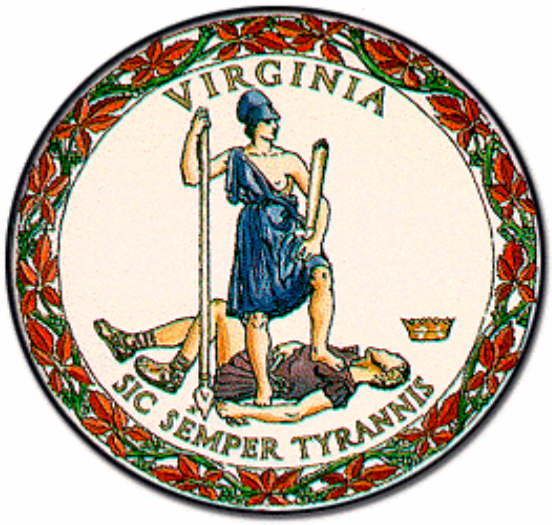
SUBSTANCE ABUSE SERVICES COUNCIL REPORT ON TREATMENT PROGRAMS FOR FY 2020 (Code of Virginia § 2.2-2697)

to the Governor and

the

General Assembly



COMMONWEALTH OF VIRGINIA

December 1, 2020 – revised on March 16, 2021

Preface

Section 2.2-2697.B of the Code of Virginia directs the Council to report by December 1 to the Governor and the General Assembly information about the impact and cost of substance use disorder treatment provided by each agency in state government. The specific requirements of this section are below:

§ 2.2-2697. Review of state agency substance abuse treatment programs.

B. Beginning in 2006, the Comprehensive Interagency State Plan shall include the following analysis for each agency-administered substance abuse treatment program:

(i). the amount of funding expended under the program for the prior fiscal year;
(ii). the number of individuals served by the program using that funding;
(iii). the extent to which program objectives have been accomplished as reflected by an evaluation of outcome measures;
(iv). identifying the most effective substance abuse treatment, based on a combination of per person costs and success in meeting program objectives;
(v). how effectiveness could be improved;
(vi). an estimate of the cost effectiveness of these programs; and
(vii). recommendations on the funding of programs based on these analyses.

SUBSTANCE ABUSE SERVICES COUNCIL REPORT ON TREATMENT PROGRAMS FOR FY 2020

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Introduction

This report summarizes information from the four executive branch agencies that provide substance use disorder treatment services: The Department of Behavioral Health and Developmental Services (DBHDS), the Department of Juvenile Justice (DJJ), the Department of Corrections (DOC) and the Department of Medical Assistance Services (DMAS). These agencies share the common goals of increasing the health and wellness of Virginia's individuals, families, and communities, increasing access to substance use disorder treatment and recovery services, and reducing the impact of those with a substance use disorder and involvement in the criminal justice system. All of the agencies included in this report are invested in providing evidenced-based treatment and recovery services to their populations within the specific constraints each has on its ability to provide these services. In this report, the following information is detailed concerning each of these four agencies' substance use disorder treatment programs:

1. Amount of funding spent for the program in FY 2020;
2. Unduplicated number of individuals who received services in FY 2020;
3. Extent to which program objectives have been accomplished as reflected by an evaluation of outcome measures;
4. Identifying the most effective substance use disorder treatment;
5. How effectiveness could be improved;
6. An estimate of the cost effectiveness of these programs; and
7. Funding recommendations based on these analyses.

As used in this document, treatment means those services directed toward individuals with identified substance use disorders and does not include prevention services. This report provides information for Fiscal Year 2020, which covers the period from July 1, 2019 through June 30, 2020.

Treatment Programs for FY 2020

This report provides focused data on specific outcomes. Every opioid overdose death represents many affected individuals (see Figure 1), and every individual who commits a crime associated with substance misuse represents many others who are also involved. Many of these individuals are struggling with functional impairment and this is reflected in decreased workforce participation,[1] negative impact on the economy,[2] the potential for dissemination of blood borne diseases,[3] and recidivism.

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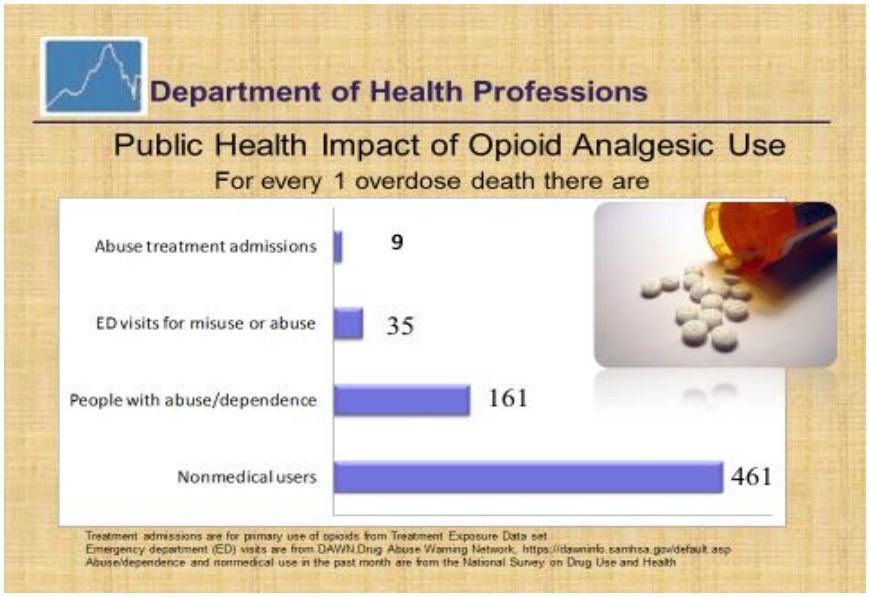
[1] Over the last 15 years, LFP fell more in counties where more opioids were prescribed." Alan B. Krueger; BPEA Article; Brookings Institute; Thursday, September 7, 2017; "Where have all the workers gone? An inquiry into the decline of the U.S. labor force participation rate"; https://www.brookings.edu/bpea-articles/where-have-all-the-workers-gone-an-inquiry-into-the-decline-of-the-u-s-labor-force-participation-rate/

[2] Midgette, Gregory, Steven Davenport, Jonathan P. Caulkins, and Beau Kilmer, What America's Users Spend on Illegal Drugs, 2006–2016. Santa Monica, CA: RAND Corporation, 2019. https://www.rand.org/pubs/research_reports/RR3140.html. Also available in print form.

[3] County-Level Vulnerability Assessment for Rapid Dissemination of HIV or HCV Infections Among Persons Who Inject Drugs, United States; Buchanan et. al. MJAIDS Journal of Acquired Immune Deficiency Syndromes: November 1, 2016 - Volume 73 - Issue 3 - p 323–331 doi: 10.1097/QAI.0000000000001098 Epidemiology and Prevention

While we are thankful for the inclusion of Methamphetamine treatment in the monies allocated for 2020, it should be noted that singling out specific substances such as opioids, methamphetamines, or other "unfunded" substances, fails to recognize substance use disorder as being non-substance specific. In turn, this leads to "chasing" one drug or another similar to squeezing a balloon – if it gets small on one end, it will get bigger on the other. This results in duplicated services, wasted money, and poor outcomes.

Figure 1: Public Impact of Opioid Analgesic Use



Department of Behavioral Health and Developmental Services (DBHDS)

The publicly funded behavioral health and developmental services system provides services to individuals with mental illness, substance use disorders, developmental disabilities, or co-occurring disorders through state hospitals and training centers operated by DBHDS, as well as 40 community services boards (CSBs). CSBs were established by Virginia's 133 cities or counties pursuant to Chapters 5 or 6 of Title 37.2 of the Code of Virginia. CSBs provide services directly to their population and through contracts with private providers, which are vital partners in delivering services.

Summary information regarding these services is presented below.

1. Amount of Funding Spent for the Program in FY 2020.

Expenditures for substance use disorder treatment services totaled $176,832,234. This amount includes state and federal funds, local funds, fees and funding from other sources. The table below provides details about the sources of these funds.

Expenditures for Substance Use Disorder Treatment Services by Source	
State Funds	$52,033,097
Local Funds	$48,432,064*
Medicaid Fees	$19,666,548
Other Fees	$5,964,004*
Federal Funds	$47,036,405
Other Funds	$3,700,116*
Total Funds	**$176,832,234**

*Local Funds and Other Fees may have been utilized to support prevention activities.

2. Unduplicated Number of Individuals Who Received Services in FY 2020.

A total of 28,776 unduplicated individuals received substance use disorder treatment services supported by this funding in FY 2020.

3. Extent Program Objectives Have Been Accomplished as Reflected by an Evaluation of Outcome Measures.

Currently, DBHDS uses the following substance use disorder services quality measures for each CSB:

- **Intensity of Engagement in Substance Use Disorder Outpatient Services**: Intensity of engagement is measured by calculating a percentage. The denominator is the number of adults admitted to the substance use disorder services program area during the previous 12 months who received 45 minutes of outpatient treatment services after admission. The numerator is the number of these individuals who received at least an additional 1.5 hours of outpatient services within 90 days of admission. In FY20, almost two-thirds, 65 percent,

of all adults received at least 1.5 hours of additional outpatient services within 90 days of admission.

- **Retention in Community Substance Use Disorder Services:** Retention is measured by calculating a percentage at two points in time, three months and six months following admission. The denominator is the number of all individuals admitted to the substance use disorder services program area during the 12 months who received at least one valid substance use disorder or mental health service of any type in the month following admission. The numerator for retention at three months is the number of these individuals who received at least one valid mental health or substance use disorder service of any type every month for at least the following two months. The numerator for retention at six months is the number of these individuals who received at least one valid mental health or substance use disorder service of any type every month for at least the following five months. The 2020 three-month percentage for this measure was 61 percent retention. The six-month percentage for this measure was 32 percent retention. In calculating this measure, valid substance use disorder services do not include residential detoxification services or those services provided in jails or juvenile detention centers.

4. Identifying the Most Effective Substance Use Disorder Treatment.

Due to the sometimes chronic, relapsing nature of substance use disorder, often resulting in non-linear pathways to sustained recovery identifying the most effective type of treatment can be difficult. Evidence-based treatment for substance use disorders consists of an array of modalities and interventions. Additionally, these modalities are presented and used through a lens of person centered treatment planning and therefore are tailored to the specific needs of each individual seeking treatment, coupled with their ASAM criteria (assessment of level of need) and partnered with their willingness to participate. This further complicated by the lack of a consistently available array of services across Virginia. The factors mentioned above can make it difficult to match individuals to the appropriate level of care. Virginia continues to work on system transformation through initiatives such as STEP VA and Behavioral Health Enhancement in order to address and correct the inconsistency of available services and support individuals in care by ensuring appropriate reimbursement and coverage rates with Medicaid expansion.

The deadly opioid overdose epidemic that began in the mid-2000s and resulted in 1,230 deaths in calendar year 2017[4] continues to drive home the need for comprehensive, expansive, and evidenced based treatment for all individuals and their families. Current information indicate a rise in opioid related overdoses across Virginia within the last year. While this data is still being collected and reviewed DBHDS continues to actively support our CSB partners in providing medication-assisted treatment (MAT), the evidence-based standard of care for opioid use disorder through time-limited federal grant funding, as it is costly to provide.

The inclusion of Methamphetamine treatment in the monies allocated for 2020 were critical. Still, additional needs exist to treat substance use disorder as a whole, which is not substance-specific.

[4] Office of the Chief Medical Examiner Forensic Epidemiology All Opioids Table available at: http://www.vdh.virginia.gov/medical-examiner/forensic-epidemiology/

Often individuals can cycle between substances, and coordinated treatment depends on the ability to treat the person's addiction, regardless of substance, in order to maximize outcomes and efficiencies.

5. How Effectiveness Could be Improved.

Successful healthcare outcomes are dependent on individuals receiving the appropriate level of care for their needs. CSBs continue to experience level funding from federal and state sources. However, these funding streams are currently under review with data from social determinants of health being cross-compared with available funding. The long-standing lack of change in funding levels remains intact in the face of significant information and data that these funds need to increase as need increases in communities. Therefore, stagnation and reduced capacity continue to exist within providers as the expectation related to the use of evidence-based treatment for substance use disorders has expanded. These services require more time and skill to implement successfully and often require the services of medical and counseling staff trained in specific treatment models appropriate for the individual's issues, such as trauma-informed care or co-occurring mental health disorders. Because of this, the costs related to service rise. This coupled with individuals seeking and needing services frequently experiencing other life issues that present barriers to successful recovery such as lack of transportation, lack of childcare, unsafe housing, or serious health or mental health issues create dynamics that may be difficult for providers to address depending on their available service array. Successful treatment programs require personnel and resources to help individuals in care address these problems. Increased access to safe and equitable transportation assistance, opportunities to participate in supportive employment programs, and secure housing options are imperative to successful consumer engagement and sustainment in treatment options as well as helping to bolster a recovery-oriented approach to all services. For providers to remain educated, supported, and clinical efficient ongoing dedicated funding related to continuing clinical training in support of the use of evidenced based practices across the Commonwealth is imperative to provide sustainable support of clinical expertise and goals within the existing workforce already heavily influenced by other factors in Virginia.

To support system change, a data driven, outcomes based approach coupled with quality improvement initiatives at state and provider levels is imperative. DBHDS has developed a quality improvement process for CSBs that is evolving to include technical assistance in a more comprehensive way. A data driven platform to improve program effectiveness can be developed through focusing on quality improvement and funding substance use disorder services at a level adequate to make an expanded continuum of care and array of evidence-based practices available across the state. Additionally, ongoing education and training availability for the existing workforce within substance use disorder services, especially dedicated to the training related to the use of evidenced base practices is imperative.

While the transition to evidence-based treatment of individuals with substance use disorder will initially require more resources, eventually this will result in lowered costs. Like any other disease, incorrect diagnoses result in incorrect treatment resulting in poor outcomes. With the correct diagnoses and treatment, more individuals will achieve recovery resulting in improved functioning in all facets of life. This will also result in improved societal outcomes. With increased access to evidence based treatment for substance use disorder, we expect to see better

functioning workers and increased tax revenues, decreased crime, decreases associated medical costs (HIV, Hepatitis C, endocarditis resulting in valve replacement, Neonatal abstinence syndrome, trauma and accidents, etc.), improved life expectancy and a happier more productive population.

6. An Estimate of the Cost Effectiveness of These Programs.

As access to clinically appropriate levels care is variable across individuals served by the CSB system, it is difficult to measure cost effectiveness. Access to a level of care that does not provide adequate intensity or duration cannot produce cost effective outcomes. However, with a person centered approach and a holistic view of individuals, the choice of the individual seeking services and the level of care that meets their current life circumstances must be evaluated.

7. Funding Recommendations.

The Department of Medical Assistance Services (DMAS) continues to offer a waiver that supports a wide array of treatment services for individuals with substance use disorders, based on criteria developed by the American Society of Addiction Medicine (ASAM). This array included improved access to medication-assisted treatment for individual with opioid use disorder. DBHDS has made use of the SAMHSA SOR funds to support, improve, and develop services that are more comprehensive across prevention, treatment, and recovery services state wide where needed. Thankfully, Virginia was just awarded an additional two years of this funding in 2020, with treatment for stimulant use disorder considered appropriate for grant spending as well as opioid use disorder. These resources, in addition to Medicaid expansion, which became effective January 1, 2019, help support some needed infrastructure development, such as provider training to support implementation of evidence-based practices. However, a significant portion of Virginia's population has income greater than 138 percent of Federal Poverty Level (income eligibility threshold effective January 1, 2019), but cannot afford to purchase private insurance. This population combined with those who do not qualify for Medicaid Expansion remain in need of resources and services. Additionally, treatment related to alcohol use disorder and other substance use disorders remain unsupported by grants such as SOR. Substantive, sustainable resources remain a priority to address these growing issues especially in the face of increased rates of alcohol use disorders within Virginia.

Department of Juvenile Justice (DJJ)

The Department of Juvenile Justice (DJJ) provides and contracts with mental health / substance use disorder treatment providers to conduct substance use disorder treatment services to youth under community supervision and in direct care status who are assessed as needing substance use disorder treatment. Youth in direct care status receive those services in a variety of settings including Bon Air Juvenile Correctional Center (JCC), Community Placement Programs at local detention facilities, and contracted residential treatment centers.

DJJ also manages Virginia Juvenile Community Crime Control Act (VJCCCA) funds, which are administered through a formula grant to all 133 cities and counties in the Commonwealth. Each locality or grouping of localities develop biennial plans for the use of VJCCCA funds that are consistent with the needs of their communities. Code changes that went into effect in July 2019 allow localities to incorporate prevention services into future biennial plans. The next biennial began on July 1, 2020. Of the 76 local VJCCCA plans, during FY 2020, 13 local plans included funds budgeted for programming or services in the category of substance use disorder education.

As in previous annual reports, the information below focuses on the substance use disorder treatment services provided by DJJ to direct care youth meeting the appropriate criteria at Bon Air Juvenile Correctional Center (JCC).

1. The Amount of Funding Expended for the Program in FY 2020.

Bon Air JCC Programs:
Substance Use Disorder Services Expenditures: $478,533
Total Residential Division Expenditures*: $40,160,145

* Total division expenditures exclude closed facilities as well as the Virginia Public Safety Training Center (VPSTC) and all related costs to the VPSTC.

2. The Number of Individuals Served by the Program Using that Funding in FY 2020.

In FY 2020, 188 (80.0%) of the 235 residents admitted to direct care were assigned a substance use disorder treatment need. Youth can be assigned to Track I or Track II to reflect their individual needs. Track I is for juveniles meeting the Diagnostic and Statistical Manual of Mental Disorders (DSM) criteria for substance use disorder and in need of intensive services. Track II is for juveniles who have experimented with substances but do not meet the DSM criteria for substance use disorder. Of the 235 youth admitted, 69.4% were assigned a Track I treatment need, and 10.6% were assigned a Track II treatment.

These youth may have received treatment at Bon Air JCC or at other direct care placements.

3. Extent to Which Program Objectives Have Been Accomplished as Reflected by an Evaluation of Outcome Measures.

DJJ calculates 12-month rearrest rates for residents who had an assigned substance use disorder treatment need. Rates are calculated based on a rearrest for any offense, excluding technical

violations. The substance use disorder treatment need subgroup of direct care releases includes juveniles with any type of substance use disorder treatment need. An assigned treatment need does not indicate treatment completion. The most recent rearrest rates available are for youth released during FY 2018.

Rearrest rates are slightly lower for all juveniles than for those with a substance use disorder treatment need. In FY 2018, 56.9% of residents with a substance use disorder treatment need were rearrested within 12 months of release, as compared to 55.9% of all residents. In FY 2017, 56.5% of residents with a substance use disorder treatment need were rearrested within 12 months of release, as compared to 55.0% of all residents. Rearrest rates for residents with a substance use disorder treatment need reflect rearrests for any offense, not specifically a drug offense.

While recidivism rates provide some insight to the effectiveness of programs, the rates presented here cannot be interpreted as a sound program evaluation due to a number of limitations. DJJ has begun to collect treatment completion data to determine if a juvenile actually completed treatment, but recidivism rates based on treatment completion are not yet available. Additionally, residents with assigned treatment needs may have risk characteristics different from those not assigned a treatment need; because juveniles are assigned treatment needs based on certain characteristics that distinguish them from the rest of the population, there is no control group for treatment need. Finally, data on whether reoffenses are substance-related are not available at this time.

As treatment program completion data matures, DJJ will analyze recidivism rates of program completers compared to non-completers. DJJ is also working with its partners in recidivism data collection (State Police, Virginia Criminal Sentencing Commission, Department of Corrections, and the State Compensation Board) to collect reoffense description data that will allow for analyses based on substance-related reoffenses.

4. Identifying the Most Effective Substance Use Disorder Treatment.

Per person, costs cannot be determined because a large amount of the money allotted to substance use disorder programming goes toward the salaries of staff who act as counselors and facilitators of the program. These staff also administer aggression management and sex offender treatment and perform other tasks within the behavioral services unit (BSU). Staff members perform different sets of duties based on their individual backgrounds and current abilities. Staff do not devote a clear-cut percentage of their time to each duty, but rather adjust these percentages as needed; therefore, there is no way to calculate how much of a staff member's pay goes directly toward substance use disorder programming, and per person cost cannot be determined.

5. How Effectiveness Could be Improved.

DJJ is continuing to implement evidence-based programming, including Cannabis Youth Treatment (CYT) and individualized treatment plans for residents with co-occurring disorders. Reentry systems and collaboration with community resources and families should continue to be strengthened to ensure smooth transition of residents to the community. For example, in 2020, DJJ partnered with the Department of Behavioral Health and Developmental Services (DBHDS) to bring the Lead and Seed intervention program into the JCC. Although staff were in the final planning stages of program implementation, postponement was necessary due to the COVID-19 pandemic.

6. An Estimate of the Cost Effectiveness of These Programs.

Due to an inability to calculate per person costs, estimates are not available to address this issue.

7. Recommendations on the Funding of Programs.

Program funding for youth in direct care with substance use disorder treatment needs should continue. Addressing these needs is an important aspect of youth's overall treatment and preparation for reentry to their home communities.

Department of Corrections (DOC)

1. Amount of Funding Spent for the Program in FY 2020.

Treatment services expenditures totaled $8,213,513.16 for FY 2020. The table below displays how these funds were expended across VADOC programs. The significant reduction in spending from FY 2019 is largely attributed to the impact from the COVID-19 pandemic. Contract modifications were required that delayed services, reduced the size of treatment groups and provided teletherapy.

Community Corrections Substance Abuse		$2,320,524
Spectrum Health		$4,772,552
Appalachian CCAP	$505,512	
Brunswick CCAP	$196,020	
Cold Springs CCAP	$588,060	
Deerfield Work Center	$156,315	
Indian Creek/Greenville Work Center	$2,161,104	
State Farm Work Center	$641,357	
VCCW	$524,184	
Facilities (previously RSAT funded)		$977,526.68
RSAT Grant (state match)		$105,379.27
Web Based Substance Abuse Grant (state match)		$37,531.21
Total		***$8,213,513.16***

2. Unduplicated Number of Individuals Who Received Services in FY 2020.

As of June 30, 2020, there were 68,949 individuals who are justice involved under active supervision in the community. This data includes individuals at the Community Corrections Alternative Programs (CCAPs) and those on Shadowtrack Supervision. The VADOC utilizes the Correctional Offender Management Profiling for Alternative Sanctions (COMPAS) assessment tool for risk assessment and service planning. Information collected from this process indicates that approximately 64.6 percent of those under active supervision have some history of substance use disorder according to COMPAS, indicated as probable or highly probably on the Substance Abuse subscale. Treatment services are provided mainly by community services boards (CSB) and private vendors. Individuals on probation or parole also have access to community support groups such as Alcoholics Anonymous (AA) and Narcotics Anonymous (NA) groups.

In institutions, as of June 30, 2020, there were 943 participants in correctional therapeutic communities (CTC) programs. Throughout the VADOC, Cognitive Behavioral Interventions for Substance Abuse (CBI-SA) is being offered as an evidence based cognitive behavioral approach to treatment. This curriculum has six specific components to the program. Group sizes are usually kept to 12 participants. The VADOC continues to phase out the Matrix Model treatment program. Approximately 805 individuals completed sections within CBI-SA program and Matrix Model program in a correctional institution during FY 2019. The number of individuals participating in

support groups such as NA and AA varies. Volunteers generally provide the support services. CCAPs within the VADOC have expanded to offer substance use disorder intense services at four locations. In addition, grant funding has continued to allow for a web-based substance use disorder program and a residential substance use disorder program at a VADOC field unit. The VADOC has initiated a Medication Assisted Treatment (MAT) Program specific to opioid and alcohol use disorder. The MAT Program is supplemented with grant funding that allows for an MAT coordinator, peer recovery specialist initiative and the evolution of an intensive opioid use disorder recovery program. The implementation of these additional services are still in their infancy. It is noted that due to the COVID-19 pandemic, treatment services have been impacted due to limited individuals who are justice involved transfers and modification of services.

3. Extent Program Objectives Have Been Accomplished.

In September 2005, the VADOC submitted the Report on Substance Abuse Treatment Programs that contained research information on the effectiveness of therapeutic communities and contractual residential substance use disorder treatment programs. The findings from these studies suggest that VADOC's substance use disorder treatment programs, when properly funded and implemented, are able to reduce recidivism for individuals who are justice involved and have substance use disorder. Due to a lack of evaluation resources, more up-to-date formal studies are not available. However, a one-year recommitment status check is performed annually for the CTC participants. The check completed for the calendar year 2012 cohort indicated a promising recommitment rate of eight percent. Since this status check is not a formal outcome evaluation, caution should be exercised in the interpretation of the data. In recent years, the VADOC has been working to improve the validity regarding data input within the justice involved population management system. These efforts will result in updated research findings within the coming year.

Assessment results for the justice involved population have established the need for substance use disorder treatment programs and services. The VADOC has implemented evidence-based substance use disorder treatment programs including CTC for individuals who are justice involved assessed with higher treatment needs and the CBI-SA Program for those with moderate treatment needs. The VADOC has established a fidelity review process that can be used by Community Corrections to assess and monitor the quality of contracted programs and services, although the reviews are restricted by limited staff resources. In addition, the scope of services for Community Corrections vendor contracts to provide treatment services for individuals with substance use disorders have been restructured to require specific evidence-based programs that will allow VADOC to monitor individuals' progress and program fidelity more effectively. The implementation of the Virginia Corrections Information System (CORIS) has improved the collection of data that can be used in future outcome and cost effectiveness studies. The VADOC continually looks for grants to be able to expand substance use disorder treatment; treatment is particularly needed for those with opioid use disorder and for individuals housed in VADOC's minimum custody facilities where treatment resources are lacking. The VADOC will continue to make every effort within its resources to provide substance use disorder services to individuals in need of them.

4. Identifying the Most Effective Substance Use Disorder Treatment.

Although VADOC-specific information is not available at this time, a report from the Washington State Institute for Public Policy indicated that substance use disorder treatment in prison as well as the community has a positive monetary benefit. Of course, in order for evidence-based treatment programs to be cost effective and achieve positive outcomes, they must be implemented as designed, a concept referred to as fidelity. The VADOC has placed an emphasis on implementation fidelity and created program fidelity reviews for this purpose; this is an important first step that is necessary prior to performing any cost effectiveness studies.

5. How Effectiveness Could be Improved.

The VADOC continues to face a number of challenges related to substance use disorder services:

- Limited staff for fidelity reviews of the substance use disorder treatment contract in community corrections;
- Limited resources for supervision of the peer recovery specialist pilot program;
- Limited resources for clinical supervision;
- Limited recovery housing options;
- Limited resources for a designated work center program;
- Limited staff resources for programming, assessment, and data collection activities;
- Limited availability of evidence-based treatment services in community corrections for individuals with substance use disorder;
- Limited special resources for individuals with co-occurring mental health disorders;
- Limited special resources for individuals needing a shorter program;
- Lack of inpatient residential treatment services;
- Limited medication assisted treatment providers in community corrections; and
- Lack of optimal programming space in prisons.

The current pandemic impacts the delivery of programs in congregate settings; virtual services and a hybrid approach to treatment is a necessary modification.

Fully funding the VADOC's substance use disorder treatment services based on the challenges listed above would increase the number of individuals who may receive treatment and enhance the quality of the programs, thereby producing better outcomes.

6. An Estimate of the Cost Effectiveness of These Programs.

In general, successful outcomes of substance use disorder treatment programs include a reduction in drug and alcohol use, which can produce a decrease in criminal activities, and result in improved public safety. The per capita cost of housing individuals for the entire agency was $33,994 in FY 2020. The cost avoidance and benefits to society that are achieved from individuals not returning or not coming into prison offset treatment costs. In addition, effective treatment benefits local communities, as individuals who were formerly incarcerated can become productive citizens by being employed, paying taxes, and supporting families. In addition, when individuals who were formerly incarcerated can interrupt the generational cycle of crime by becoming effective parents and role models, the community is also enhanced.

7. Funding Recommendations.

- Funding for two (2) designated positions to conduct fidelity reviews of the VADOC's contracted outpatient treatment services in probation and parole districts as well as VADOC provided substance use disorder services;
- Funding for one (1) position to supervise the peer recovery specialist pilot program offered in probation and parole districts to enhance the program development;
- Funding for one (1) substance use disorder clinical supervisor to offer technical assistance and enhance professional development of substance use disorder staff certifications;
- Funding for transitional recovery housing to provide a seamless transition of services for persons reentering the community after completing prison intensive treatment programs;
- Funding for two (2) positions to provide substance use specific program for high treatment needs inmates at a VADOC work center.

Department of Medical Assistance Services

The Department of Medical Assistance Services (DMAS), implemented the Addiction and Recovery Treatment Services (ARTS) benefit in April 2017. ARTS expanded coverage of many addiction treatment and recovery services for Medicaid and Children's Health Insurance Program (referred to as Medicaid in this report) members, including Medications for Opioid Use Disorder (MOUD) treatment, outpatient treatment, short-term residential treatment, and inpatient detoxification services. The Centers for Medicare and Medicaid Services (CMS) approved Virginia's application for a Section 1115 Demonstration Waiver for substance use disorder to allow federal Medicaid payment for addiction treatment services provided in short-term residential facilities,. This application was an amendment to an existing Section 1115 Demonstration Waiver originally approved in January 2015. CMS approved a five-year extension of the waiver on December 31, 2019. For the purposes of this first report to the Council, DMAS is reporting outcomes based on calendar year and will report on SFY in future reports. DMAS is reporting funding by SFY.

1. Amount of funding spent for the program in FY 2020

SFY 2020 ARTS Expenditures				
	General Funds	**Special Funds***	**Federal Funds**	**TOTAL**
Base Medicaid	$27,872,688	$0	$31,563,716	$59,436,403
Medicaid Expansion	$0	$8,513,793	$89,492,173	$98,005,966
FAMIS	$31,501	$0	$142,635	$174,136
MCHIP	$30,417	$0	$125,466	$155,883

The Provider Coverage Assessment Fund pursuant to § 3-5.15 of the Virginia Acts of Assembly Appropriations Act

2. Unduplicated number of individuals who received services in FY 2020

In 2019, the second year of ARTS, Virginia Commonwealth University reported about 48,000 members – half of those diagnosed with substance use disorders – received some type of treatment for substance use disorders. About 28,000 members received treatment for an opioid use disorder, comprising 68.9 percent of those with a diagnosed opioid use disorder.

Coverage of substance use disorder services provided by ARTS is based on the American Society of Addiction Medicine (ASAM) National Practice Guidelines, which comprise a continuum of care from Early Intervention/Screening, Brief Intervention, and Referral to Treatment (SBIRT / Level 0.5) to medically managed intensive inpatient services (Level 4). ARTS also emphasizes evidence-based treatment for opioid use disorder, which combines pharmacotherapy and counseling. In July 2017, DMAS added Peer Recovery Support Services to the ARTS benefit, as an additional service to facilitate recovery from substance use disorders. Care coordination services provided by Preferred Office-Based Treatment Services (OBOT) and Opioid Treatment Programs facilitate integration of addiction treatment services with physical health and social

service needs. "Preferred OBOT" means addiction treatment services for members with opioid use disorders provided by buprenorphine-waivered practitioners working in collaboration with licensed behavioral health practitioners providing co-located psychosocial treatment in public and private practice settings.

3. Extent to which program objectives have been accomplished as reflected by an evaluation of outcome measures

CMS requires an independent evaluation for Section 1115 Demonstration Waivers, which includes the ARTS benefit. In July 2017, DMAS contracted with Virginia Commonwealth University School of Medicine to conduct an independent evaluation of the ARTS program. Faculty and staff from the Department of Health Behavior and Policy have led the evaluation, which has focused primarily on how the ARTS benefit affected: (1) the number and type of health care practitioners providing ARTS services; (2) members' access to and utilization of ARTS services; (3) outcomes and quality of care, including hospital emergency department and inpatient visits; and, (4) the performance of new models of care delivery, especially Preferred Office-Based Opioid Treatment (OBOT) programs.

(1) The number and type of health care practitioners providing ARTS services

The supply of providers of substance use disorder treatment and recovery continue to increase. There were 1,133 practitioners authorized to prescribe buprenorphine in Virginia in 2019, including 278 nurse practitioners and physician assistants. While the number of waivered prescribers has more than doubled since 2016, the overall number of prescribers in Virginia is low relative to neighboring states. In addition, only 40 percent of prescribers treated any Medicaid patients in 2019.

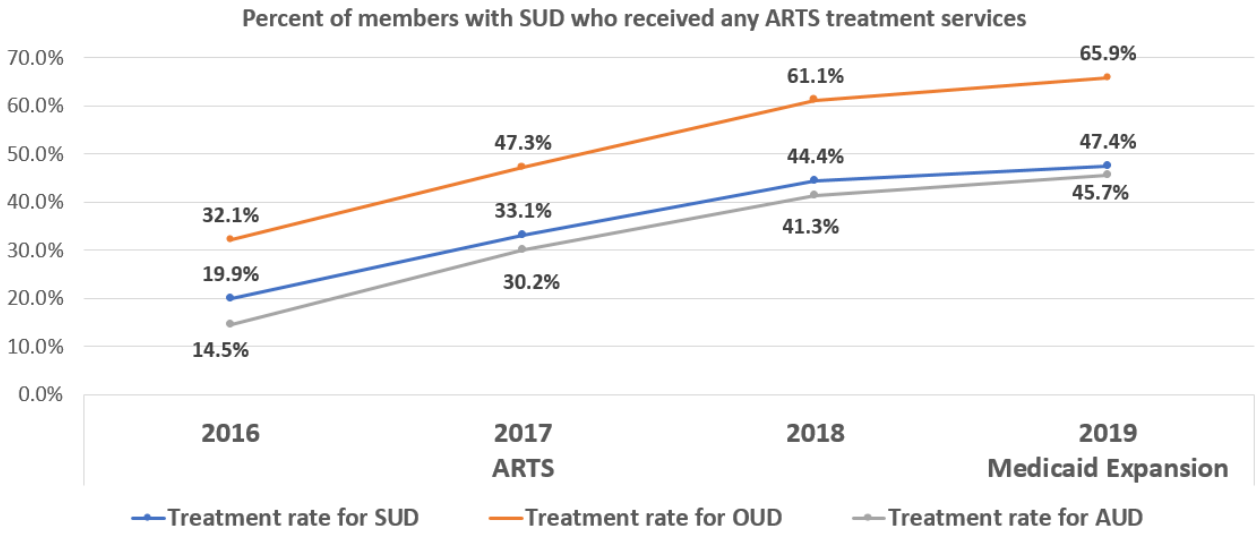
There were almost 4,900 outpatient practitioners of all types who billed for ARTS in 2019, a 31 percent increase from 2018, and quadruple the number of practitioners billing for addiction treatment services in 2016. The number of Preferred OBOT providers increased from 38 sites at the beginning of the ARTS benefit to 153 sites in this reporting period.

(2) Members' access to and utilization of ARTS services

Treatment rates for substance use disorders and opioid use disorders continue to increase for Medicaid eligible individuals. Among base Medicaid members (members not enrolled in Medicaid expansion), 47.4 percent of members with substance use disorder received some type of treatment in 2019, compared to 44.4 percent in 2018 and 19.9 percent in 2016 (the year before ARTS). Among base Medicaid members with opioid use disorder, 65.9 percent received some type of treatment in 2019, compared to 61.1 percent in 2018 and 32.1 percent in 2016.

While utilization of all forms of the three Food and Drug Administration (FDA) approved Medications for Opioid Use Disorder (MOUD) including Methadone, Buprenorphine and Naltrexone, treatment continued to increase in 2019, the use of methadone treatment has increased the most, from 2.4 percent of members with opioid use disorder in 2016 to 18.5 percent in 2019. Increases in MOUD treatment rates based on Medicaid claims analysis

between 2016 and 2019 have been driven primarily by increases in methadone treatment rates.



(3) Outcomes and quality of care, including hospital emergency department and inpatient visits

Emergency department visits for substance use disorders and opioid use disorders increased in 2019, after having decreased following implementation of ARTS in 2017. Opioid use disorder-related emergency department visits decreased by 26 percent between 2016 and 2018, while all substance use disorder related emergency department visits decreased by 4 percent. By contrast, all other emergency department visits increased by 5 percent between 2016 and 2018. Emergency department visits related to substance use disorders and opioid use disorders increased sharply in 2019, even for base Medicaid eligibles. Part of the increase reflects a more general increase in emergency department visits among Medicaid members, but it may also be related to an increase in drug overdoses in Virginia between 2018 and 2019.

More Medicaid members are getting treatment following an emergency department visit or stay at a substance use disorder residential treatment center. Most members with opioid use disorder are receiving some type of follow-up treatment within 30 days of being discharged from substance use disorder residential treatment centers (87 percent). MOUD treatment rates within 30 days of discharge increased from 40.1 percent in 2017 to 64.1 percent in 2019. Members receiving treatment within 30 days of an opioid use disorder-related emergency department visit increased from 38.2 percent in 2017 to 53.5 percent in 2019, mostly due to increases in MOUD and outpatient visits.

(4) The performance of new models of care delivery, especially Preferred Office-Based Opioid Treatment (OBOT) programs

Out of almost 20,000 episodes of outpatient treatment for opioid use disorder that were initiated between January 1, 2018 and June 30, 2019, almost half involved Preferred OBOT and Opioid Treatment Program providers, while about half of OUD treatment

episodes occurred entirely at other outpatient providers. Rates of MOUD use were higher during episodes of treatment at Preferred OBOT and Opioid Treatment Program providers (77 percent and 86 percent, respectively), compared to other outpatient providers (40 percent).

While the ASAM recommends that MOUD treatment last at least 6 months, the median length of MOUD treatment during outpatient episodes was only 4 months, with MOUD treatment generally lasting longer at Opioid Treatment Program providers (5 months) compared to Preferred OBOT or other outpatient providers (3 months). The use of urine drug screens, counseling services, and care coordination services were higher at Preferred OBOT and Opioid Treatment Program providers, compared to other outpatient providers.

4. Identifying the most effective substance use disorder treatment

The combination of enhanced benefits through ARTS and expanded eligibility through Medicaid resulted in a dramatic increase in the utilization of addiction treatment services by Virginia Medicaid members between 2016 and 2019. While diagnosed prevalence of substance use disorders and opioid use disorders have also increased, treatment rates among those with a diagnosis of SUD and OUD have steadily increased between 2016 and 2019. MOUD treatment rates in Virginia have outpaced those of other states, providing further evidence of the impact of ARTS on access to MOUD treatment services. The quality of MOUD treatment services continues to improve along with the utilization of Preferred OBOT and Opioid Treatment Program providers for outpatient treatment, and most members receiving ARTS services report positive experiences with treatment.

5. How effectiveness could be improved

Medicaid Expansion

Access to substance use disorder treatment services through the Medicaid program was further expanded on January 1, 2019, when Virginia implemented the Affordable Care Act's expansion of Medicaid eligibility for adults aged 19-64 to include those with family incomes of up to 138 percent of the federal poverty level. For SFY 2020, over 493,000 Virginians had enrolled in Medicaid through the expanded eligibility criteria, which resulted in almost 40,000 individuals receiving an ARTS service, who otherwise would have not had access to this benefit. Medicaid expansion has permitted thousands of Virginians access to treatment.

SUPPORT Act Section 1003

In September 2019, Virginia Medicaid was award a $4.8 million grant from the Centers for Medicare and Medicaid Services (CMS) Section 1003 Substance Use Disorder Prevention that Promotes Opioid Recovery and Treatment for Patients and Communities (SUPPORT) Act Grant. The grant's goal is to increase addiction and recovery treatment provider capacity throughout Virginia that supports DMAS's core values including person-centered, strengths-based, and recovery-oriented care. The Grant focuses on expanding access to treatment for two priority populations, Medicaid members who are pregnant and parenting and members who are justice involved. The Grant time period is September 2019 through September 2021.

Activities of the grant include:

1) Completing a needs assessment to determine current substance use disorder treatment needs and provider treatment capacity in the Commonwealth,
2) Completing a 'Brightspot' assessment to assess community strengths in substance use disorder treatment, and
3) Additional activities such as clinician trainings and pilot programs focusing on expanding substance use disorder treatment access.

One of the major accomplishments of the Grant for this reporting period include an extensive web-based clinical training on various topics related to substance use disorder treatment. Starting in April 2020 DMAS hosted over 100 webinars, reaching over 5,300 participants. Ongoing training and technical assistance is needed to expand provider knowledge and experience for evidence-based treatment and recovery services.

Obtaining feedback from individuals with lived experience can help improve effectiveness of treatment services. The Grant team worked with Virginia Commonwealth University to conduct Medicaid Member Surveys. There were just over 100 surveys completed to learn more from the individual's experience in substance use disorder treatment and recovery. This feedback will be used to determine necessary changes to policies to help increase access to treatment and recovery services.

Access to Housing and Housing-related Supports

Addressing the housing needs of individuals with substance use disorder is an opportunity for Virginia to improve the effectiveness of resources available currently through partnerships and coordination. This can be addressed by working within the existing delivery systems in place to support individuals in this population. Significant federal and state funding has been provided to the Commonwealth's Continuum of Care (CoC). The CoCs are designed to promote community-wide commitment to the goal of ending homelessness; provide funding for efforts by nonprofit providers, and State and local governments to quickly rehouse homeless individuals and families while minimizing the trauma and dislocation caused to homeless individuals, families, and communities by homelessness; promote access to and effect utilization of mainstream programs by homeless individuals and families; and optimize self-sufficiency among individuals and families experiencing homelessness.

In 2020, DMAS began working closely with the Department of Housing & Community Development (DHCD), Department of Veteran's Services (DVS) and DBHDS to ensure providers that are working with individuals experiencing homelessness are coordinating with Medicaid Managed Care Organizations (MCOs) to leverage all available support services and housing resources. This partnership will directly benefit individuals with substance use disorders who are served through the CoCs. DHCD noted in a recent presentation[5] that:

• 68 percent of cities reported substance use disorders as a major cause of homelessness for single adults; one of the top three causes of family homelessness in 12 percent of cities.

[5] Report available at https://dhcd.virginiainteractive.org/sites/default/files/Docx/consolidated-plan/homeless-services-input-session.pdf.

• Substance use disorders may have the highest impact on relative risk for homelessness in veterans, even more so than bipolar disorder and schizophrenia.
• Prevalence of homelessness in veterans with opioid use disorder is ten times more than the general veteran population.
• Overdose has surpassed human immunodeficiency virus (HIV) as the leading cause of death among homeless adults, opioids are responsible for more than 80 percent of these deaths.
• Homeless adults, 25-44, were nine times more likely to die from an overdose than their counterparts who were stably housed.

The CoC's coordinated entry process does not screen people out for assistance because of perceived barriers to housing or services, including, but not limited to, lack of employment or income, drug or alcohol use, or having a criminal record. DMAS, DHCD, and the CoCs are exploring opportunities to better serve individuals with SUD. For example, incorporating disability-related questions into a community's coordinated entry system can assist in identifying potential SSI/SSDI Outreach, Access, and Recovery (SOAR) applicants.

Virginia also received approval to implement a supportive housing program through the Medicaid 1115 waiver High Needs Supports program. This program will provide much needed housing support services to help individuals, including those living with a substance use disorders, find and maintain community-based housing while receiving services including treatment and recovery services. The funding source will allow Virginia to expand the available housing options for individuals with a substance use disorders.

6. An estimate of the cost effectiveness of these programs

Health Research and Education Trust performed an analysis of the benefit-cost of substance use disorder treatment. The finding of this research showed a greater than 7:1 ratio of benefits to costs[6]. Treatment rates for substance use disorder and opioid use disorder continued to increase in 2019. While MOUD treatment rates among Medicaid members have been increasing in other states, the increase in Virginia far outpaces that of other states, providing further evidence of the impact of the ARTS benefit. Thus, while MOUD treatment rates for Virginia in 2016 were well below that of many other states, Virginia is now roughly equivalent with other states in terms of MOUD treatment.

DMAS is also monitoring expenditures for ARTS services and measuring quality of care through 36 quality measures reported quarterly to CMS. As part of upcoming program evaluations, VCU, an independent evaluator for the ARTS program, will be including cost analyses into overall program evaluation design.

Funding recommendations based on these analyses.

- Funding for the expansion of the Preferred OBOT model to allow for other primary substance use disorders.
- Funding to support workforce training for evidence-based practices for substance use disorder treatment and recovery.
- Expand eligibility of state rental assistance funding for individuals with substance use

[6] https://onlinelibrary.wiley.com/doi/full/10.1111/j.1475-6773.2005.00466.x

disorders to support their treatment and recovery.

- Coordinate with DHCD and the regionally-based Continuum of Care to prioritize individuals with substance use disorders to identify potential SOAR applicants.
- Fund technical assistance to the Commonwealth's Continuum of Care in Virginia, which includes Community Services Boards, to ensure provider capacity.