



# **The MCHP 20<sup>th</sup> Anniversary Conference**

## **CELEBRATING 20 YEARS OF HEALTH SERVICES & POPULATION HEALTH RESEARCH**

**Panel: Using Administrative Data to Study Child Health**

# The Economic Impact of Children in Care with FASD and Parental Alcohol Issues

## Phase II: Costs and Service Utilization of Health Care, Special Education, and Child Care

### Researchers

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The Children with FASD Project involves a series of studies which examined children with disabilities in care of child and family services agencies in Manitoba.

This Particular component of the project is a joint initiative of the Faculty of Social Work (University of Manitoba) and Manitoba Department of Family Services and Housing, Manitoba Centre for Health Policy conducted under the auspices of the Prairie Child Welfare Consortium, funded by the Public Health Agency of Canada (PHAC) through the Centre of Excellence for Child Welfare.

# Prevalence of FASD

Approximately one-third of the children in care in Manitoba have some type of diagnosed disability.

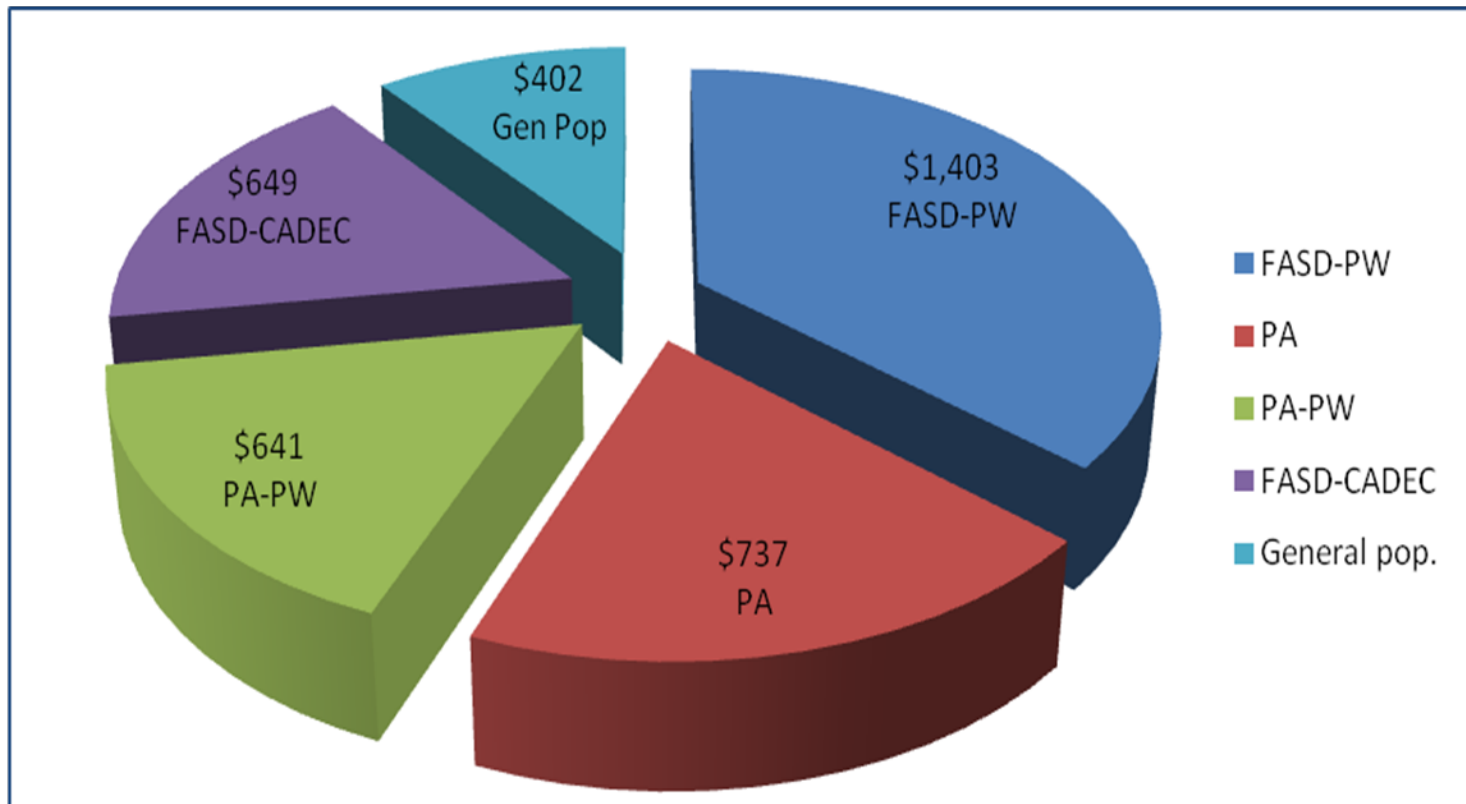
Further, at least 17% of all children in care have been diagnosed with FASD or are in the process of being medically assessed for the condition.

# Economic Impact of FASD and Parental Alcohol Abuse

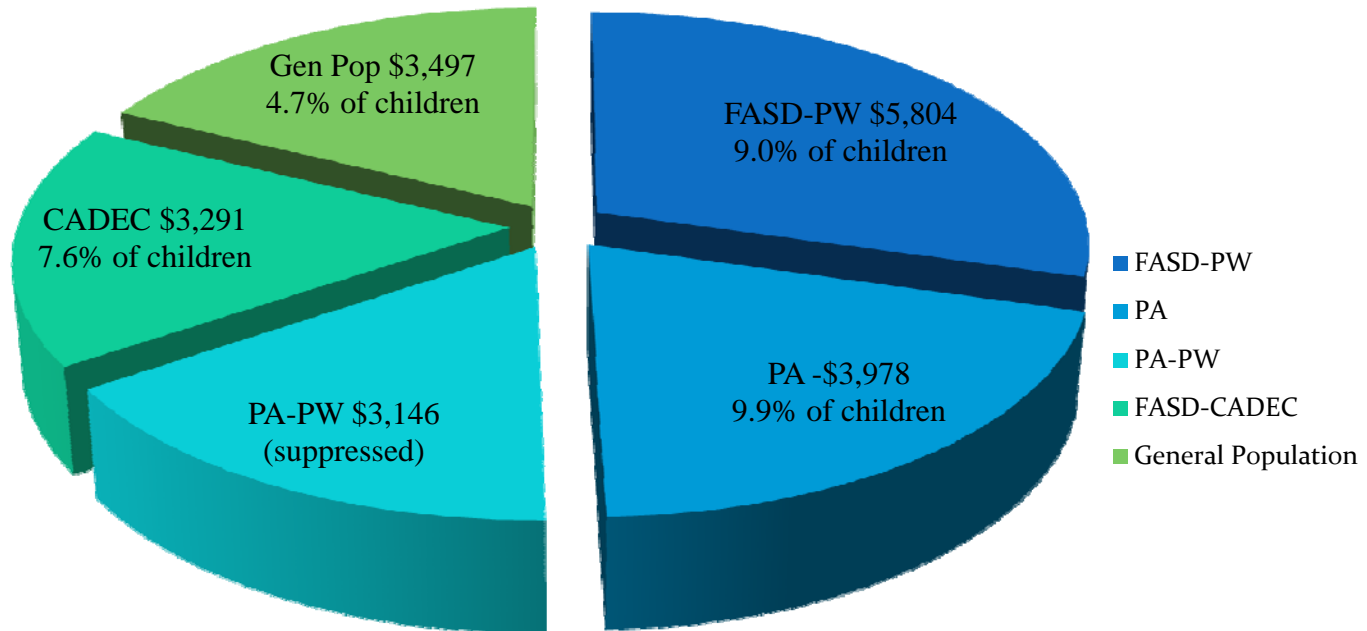
- **FASD-PW:** Permanent Wards with FASD (*N* = 603)
- **PA:** Children in temporary care, parents with alcohol issues (*N* = 587)
- **PA-PW:** Permanent Wards, parents with alcohol issues (*N* = 51)
- **FASD-CADEC:** Children not in care with FASD (diagnosed by Clinic for Alcohol and Drug Exposed Children) (*N* = 119)
- **General Population:** Children without FASD (selected by random matching methodology) (*N* = 4,964)

# Average Health Care Costs per Child

(Hospital Inpatient and Day Procedures,  
Physician Visits, Prescription Drugs)

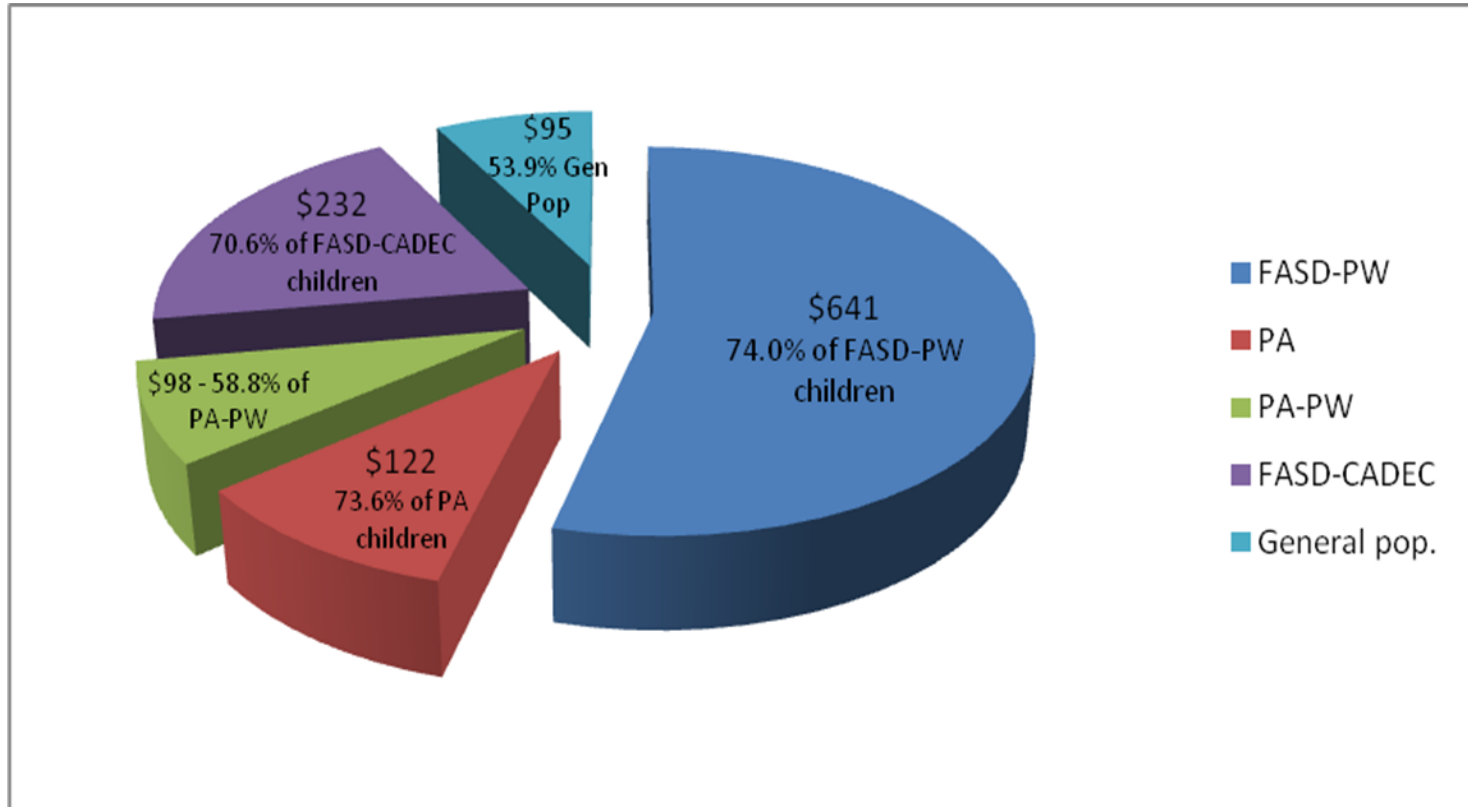


## Average Costs per Child User of Services and Percentage of Children Using Hospital Services



# Prescription Drugs

(Average Cost and Percentage of Children with Prescriptions)



## Number One Leading Cause of Hospitalization By Age Category and Group

Group	Age category	Complications from pregnancy/childbirth	Mental disorders	Diseases of digestive system	Fractures, wounds, injuries and poisoning
		%	%	%	%
FASD-PW	0-5			(s)	
	6-10			25.8%	
	11-15		41.2%		
	16+	34.8%			
PA	0-5			52.4%	
	6-10			(s)	
	11-15		66.7%		
	16+			46.2%	
General population	0-5			28.6%	
	6-10			21.9%	
	11-15				19.7%
	16+			18.0%	

(s) the condition was identified as being the number one cause of hospitalization for the particular age category; however, the count was between 1 and 5, and so the estimate was suppressed

The PA-PW and FASD-CADEC estimates are not included, since they were all suppressed due to low counts

## Frequency of Types of Drugs for Children Prescribed a Medication in 2006

Drug Classification	General Population - %	FASD-PW %	FASD- CADEC - %	PA %	PA-PW %
Nervous System	<b>19.9</b>	<b>69.2</b>	<b>60.0</b>	<b>25.1</b>	<b>31.6</b>
Respiratory System	<b>17.8</b>	<b>7.5</b>	<b>9.3</b>	<b>18.5</b>	<b>17.7</b>
General Antiinfectives for Systemic Use	<b>30.1</b>	<b>6.7</b>	<b>12.8</b>	<b>20.6</b>	<b>21.6</b>
Cardiovascular System	3.3	<b>5.8</b>	<b>2.8</b>	2.8	-
Alimentary Tract and Metabolism	<b>6.3</b>	<b>2.5</b>	1.6	<b>6.3</b>	<b>8.7</b>
Dermatologicals	<b>7.9</b>	<b>2.5</b>	<b>6.3</b>	6.1	<b>4.3</b>
Genito Urinary System and Sex Hormones	3.2	1.7	1.9	-	(s)
Systemic Hormonal Prep. Excluding Sex Hormones	2.5	1.5	-	-	-
Blood and Blood Forming Organs	-	0.9	-	1.6	3.9
Sensory Organs	3.1	0.7	1.1	2.8	(s)
Antiparasitic Products, Insecticides, and Repellants	2.3	-	1.6	<b>10.8</b>	3.9
Musculo-Skeletal System	-	-	1.9	2.2	3.5
Other (including suppressed counts)	3.6	1.0	0.7	3.2	4.8
	<b>100%</b>	<b>100%</b>	<b>100%</b>	<b>100%</b>	<b>100%</b>

# Health Implications

- Permanent wards with FASD have the highest utilization and costs of physician services, hospitalizations, and prescriptions.
- Children with FASD, whether in care or not, are prescribed nervous system drugs at a higher rate (60+%) than the General Population sample (20%).
- Nervous system drugs are increasingly prescribed to children with FASD as they age (30% at age 0 – 5; 60% at age 6 – 10).
- Ritalin and other ADHD drugs account for a large share of these prescriptions, followed by medications for depression.

## Education Implications

The children in care and FASD-CADEC children:

- had a higher chance of accessing level 2 or 3 special rate funding;
- had lower high school graduation rates and have a lower likelihood of completing 8 or more credits in Grade 9 which is a predictor of successful high school completion;
- had lower average marks and are less likely to have ever written standard provincial examinations in language arts or math;
- had a higher chance of being retained in school;
- had a lower likelihood of being enrolled in school after age 15 if FASD-affected;
- had incrementally higher education costs, particular for the FASD-affected children.

# Summary of Findings

- FASD creates significant demands on the resources of child welfare agencies, because of the frequency and length of time that children with FASD are in care.
- Children with FASD are more likely to be permanent wards of child welfare agencies.
- The average cost of child welfare care for a child with FASD is higher than for other children in care.
- Large numbers of children with FASD will be transitioning out of care and will require services in the adult system.

## **All Reports Available At:**

The Centres of Excellence for Children's  
Wellbeing Canadian Child Welfare Research  
Portal:

<http://cecw-cepb.ca/publications/1146>