



## **OCCASIONAL PAPER**

# **Understanding the Intergenerational Transmission of Criminality in Singapore**

**Ministry of Social and Family Development  
National Council of Social Service**

June 2020

## **Copyright Notice**

Brief extracts from this publication may be reproduced for non-commercial use provided the source is acknowledged.

For extensive reproduction, please write to:

Director

Translational Social Research Division

National Council of Social Service

170 Ghim Moh Road, #01-02, Singapore 279621

Fax: 6259 2163

Email: [CHU\\_Chi\\_Meng@ncss.gov.sg](mailto:CHU_Chi_Meng@ncss.gov.sg)

## Table of Contents

Executive Summary .....	1
Introduction.....	2
Profiles of the Parent and Child Generations.....	3
Association between Parental Criminality and Children’s Criminality.....	4
Gender-specific Effects of Intergenerational Transmission .....	4
Impact of Parents’ Custodial vs. Non-custodial Sentences .....	5
Intergenerational Transmission of Drug Offending.....	5
Frequency of Parental Offending.....	6
Strengthening Support to Break the Cycles of Offending .....	7
Rehabilitating and Reintegrating Offenders, and Supporting Their Families .....	7
A Tough Stance on Drugs.....	9
Conclusion .....	9

## Executive Summary

- Our youth are our future. The Government is committed to giving our youth the best shot in life. The National Committee on Prevention, Rehabilitation and Recidivism (NCPR) was established in 2018, comprising Government and community partners, to coordinate and amplify efforts in preventing crime, helping at-risk and in-risk youth, and ensuring that ex-offenders are provided the support for reintegration into society.
- Prevention and early intervention are critical. It involves disrupting offending cycles that may cut across generations, and minimising the perpetuation of negative outcomes across generations.
- Hence, the Ministry of Social and Family Development (MSF) and the National Council of Social Service (NCSS) embarked on the Intergenerational Transmission of Criminality and Social Disadvantages (INTRACS) research programme, to better understand the impact of parental criminality on child criminality in Singapore. The INTRACS study analyses population-level administrative data of five full birth cohorts (parents born in 1965, 1970, 1975, 1980 and 1985) and their children.
- Based on the study, there is intergenerational transmission of criminality in Singapore. Children exposed to parental criminality are more likely to have contact with the criminal justice system, as compared to children with no parental exposure to criminality.
- The study also found that:
  - a. The impact of paternal and maternal criminality is greater on daughters than sons.
  - b. The impact of parental custodial sentences on children is greater than that of noncustodial sentences.
  - c. Parental drug offending is associated with higher likelihood of child criminality as compared to other types of parental offending.
  - d. A higher frequency of parental offending increases the likelihood of child criminality.
- The findings highlight the importance of supporting families of offenders, to break intergenerational cycles of offending. The study validates various ongoing efforts that support the rehabilitation and reintegration of offenders, and the coordination of social support for their families, including their children.
- Everyone has a role to play in building on existing efforts as we continue to do more upstream work, to break the cycles of offending and achieve better outcomes for our children and youth.

## Introduction

1. Criminal offending can result in disruptions and detours to lives of individuals, which can prevent them from fulfilling their fullest potential. For instance, contact with the criminal justice system can lead to disruptions in education, vocation training, and employment. These disruptions can potentially contribute to longer-term social disadvantages, which may continue across generations.

2. International research has found that crime runs in families<sup>1</sup>. A significant body of research has supported the link between parental and child criminality in Western countries<sup>2,3,4</sup>. A meta-analysis of various studies also found that children of criminal parents are about 2.4 times more likely to exhibit criminal behaviour as compared to children of non-criminal parents, based on the results for approximately three million children<sup>5</sup>.

3. Understanding the intergenerational transmission of criminality in our local context is crucial, to better guide prevention and early intervention efforts. Hence, the Ministry of Social and Family Development (MSF) and the National Council of Social Service (NCSS) embarked on the Intergenerational Transmission of Criminality and Social Disadvantages (INTRACS) research programme. The INTRACS study analyses population-level administrative data of five full birth cohorts of parents (those born in 1965, 1970, 1975, 1980 and 1985) and their children, in Singapore. More information on the choice of the study design is in Box 1 below.

4. This occasional paper shares the findings from the INTRACS Study, in terms of (i) profiles of the parent and child generations and (ii) the association between parental and child criminality, by comparing children with exposure to parental criminality with those without exposure, in terms of their likelihood of contact with the criminal justice system. The findings also include findings on how various aspects of parental criminality, including maternal and

---

<sup>1</sup> Farrington, D., Jolliffe, D., Loeber, R., Stouthamer-Loeber, M., & Kalb, L. (2001). The concentration of offenders in families, and family criminality in the prediction of boys' delinquency. *Journal of Adolescence*, 24(5), 579–596. <https://doi.org/10.1006/jado.2001.0424>

<sup>2</sup> Besemer, S., van der Geest, V., Murray, J., Bijleveld, C., & Farrington, D. (2011). The relationship between parental imprisonment and offspring offending in England and the Netherlands. *The British Journal of Criminology*, 51(2), 413–437. <https://doi.org/10.1093/bjc/azq072>

<sup>3</sup> Kendler, K., Ohlsson, H., Morris, N., Sundquist, J., & Sundquist, K. (2015). A Swedish population-based study of the mechanisms of parent–offspring transmission of criminal behaviour. *Psychological Medicine*, 45(5), 1093–1102. <https://doi.org/10.1017/S0033291714002268>

<sup>4</sup> van de Weijer, S. G. A., Augustyn, M. B., & Besemer, S. (2017). Intergenerational transmission of crime: An international, empirical assessment. In A. A. J. Blokland, & V. R. van der Geest (Eds.), *Routledge International Handbook of Life-Course Criminology [IV-16]*. New York, NY: Routledge.

<sup>5</sup> Besemer, S., Ahmad, S., Hinshaw, S., & Farrington, D. (2017). A systematic review and meta-analysis of the intergenerational transmission of criminal behaviour. *Aggression and Violent Behaviour*, 37, 161–178. <https://doi.org/10.1016/j.avb.2017.10.004>

paternal criminality, types of judicial outcomes, and types and frequency of offending influence the extent of intergenerational transmission.

**Box 1. The use of birth-cohort analysis for the INTRACS study**

The INTRACS study uses a birth cohort study design to minimise selection bias, as all individuals in the population are included, regardless of their demographic and socio-economic backgrounds.

In contrast, studies that focus on specific subgroups of the population may be limited in some ways. For instance, many studies analyse the intergenerational transmission of criminality by either (1) focusing on only parents who have offended and then examining whether their children subsequently offend, or (2) focusing on children who have offended, and then examining whether their parents have offending history. The first approach excludes children who offended but without exposure to parental criminality, while the second approach excludes children who did not offend, but with exposure to parental criminality.

**Profiles of the Parent and Child Generations**

5. A total of 93,829 parents were analysed, comprising 41,683 fathers and 52,146 mothers. Overall, approximately 12% of the parent generation had contact with the criminal justice system. As summarised in Table 1 below,

- The rates of paternal and maternal criminality are about 20% and 5%, respectively.
- Among individuals with criminal records, approximately 27% had committed drug-related offences and 47% have custodial history.
- 33% of them have committed only one offence while 67 % have committed two or more offences.

Table 1. Counts and Percentages of Contact with the Criminal Justice System for the Parent Generation

	<i>n</i>	<i>N</i>	%
Parental criminality	11,079	93,829	12%
Maternal criminality	2,577	52,146	5%
Paternal criminality	8,502	41,683	20%
Drug-related offences	3,045	11,079	27%
Custodial sentences	5,261	11,079	47%
One offence only	3,646	11,079	33%
Two or more offences	7,433	11,079	67%

6. A total of 183,015 children were analysed, comprising 94,108 sons and 88,907 daughters. Among them, 4,063 (2%) had official criminal records.

### **Association between Parental Criminality and Children’s Criminality**

7. Broadly, children with exposure to parental criminality tend to have contact with the criminal justice system at an earlier age (*Mean age* = 17.99 years) than children without any exposure (*Mean age* = 18.60 years). As compared to children without parental exposure to the criminal justice system, children with exposure to parental criminality are 2.99 times as likely to have contact with the criminal justice system themselves (*Hazard ratio [HR]*<sup>6</sup> = 2.99).

8. The association between parental and child criminality is observed across the five birth cohorts analysed, spanning across 20 years, as shown in Table 2. It indicates the presence of intergenerational transmission of criminality in Singapore during this period, even with changing economic and social conditions over time.

Table 2. Likelihood of Child Criminality for Parents from the Five Birth Cohorts

Birth cohort of parent	<i>Hazard Ratio (HR)</i> for child criminality
1965	2.75 times as likely
1970	3.37 times as likely
1975	3.17 times as likely
1980	2.28 times as likely
1985	3.38 times as likely

*Note:* Children with no exposure to parental criminality as the reference group.

### *Gender-specific Effects of Intergenerational Transmission*

9. When compared to children without exposure to any parental criminality, children with exposure to paternal and maternal criminality are 2.67 times and 3.74 times as likely, respectively, to have contact with the criminal justice system themselves. Notwithstanding changing demography, females continue to play an important role as primary caregivers within a family setting. Hence, in the event that when mothers are incarcerated or subjected to mandatory reporting, such restrictive conditions are therefore more likely to interfere with their caregiving responsibilities, which can then have a larger impact on children’s development and downstream trajectories.

<sup>6</sup> In this paper, the hazard ratio is the ratio of the rates of children’s contact with the criminal justice system corresponding to the two subgroups (e.g., children with exposure to parental criminality and children without exposure), controlling for age.

10. Further analyses were conducted for the four parent-child dyads separately. Based on the *hazard ratio* values reported in Table 3, both maternal and paternal criminality have more salient impact on daughters than sons. It suggests that the effects of maternal and paternal criminality on daughters and sons may be mediated through different pathways<sup>7,8</sup>. For instance, daughters may be more sensitive and affected by parents' criminal behaviour than sons.

Table 3. Intergenerational Transmission of Criminality across the Four Parent-Child Dyads

	<i>HR</i> for sons' criminality	<i>HR</i> for daughters' criminality
Paternal criminality	3.52 times as likely	4.72 times as likely
Maternal criminality	3.15 times as likely	4.75 times as likely

*Note:* Children with no exposure to parental criminality as the reference group. *HR* = Hazard Ratio.

#### *Impact of Parents' Custodial vs. Non-custodial Sentences*

11. Children with parental non-custodial convictions are 2.18 times as likely to have contact with the criminal justice system themselves when compared to children without any parental conviction. Children whose parent had custodial convictions fared worse, being 3.90 times as likely to be in conflict with the law.

12. These findings reflect that children are negatively impacted when parents are convicted, and more so when the parent has a custodial conviction. This could be due to the socioeconomic stress and parent-child separation caused by parental incarceration.

#### *Intergenerational Transmission of Drug Offending*

13. Compared with children without exposure to parental criminality, children whose parents have committed drug offences are 5.18 times as likely to have contact with the criminal justice system. For children whose parents have committed non drug-related offences, they are 2.29 times as likely to engage in criminality compared to children without exposure to parental criminality.

<sup>7</sup> Thornberry, T., Freeman-Gallant, A., Lovegrove, P., Farrington, D., & Bijleveld, C. (2009). Intergenerational linkages in antisocial behaviour. *Criminal Behaviour and Mental Health, 19*(2), 80–93. <https://doi.org/10.1002/cbm.709>

<sup>8</sup> Kim, H., Capaldi, D., Pears, K., Kerr, D., Owen, L., Farrington, D., & Bijleveld, C. (2009). Intergenerational transmission of internalising and externalising behaviours across three generations: Gender-specific pathways. *Criminal Behaviour and Mental Health, 19*(2), 125–141. <https://doi.org/10.1002/cbm.708>

14. It implies that children whose parent had committed drug offences have comparatively worse outcomes than those whose parent had committed non-drug offences. This could be due to the addictive nature of drug use, which can impact an individual's day-to-day functioning and their ability to care for their family. More importantly, this finding indicates that drug offending results in a higher risk of offending for the next generation, and the need for a strong and firm approach in our fight against drugs in Singapore.

#### *Frequency of Parental Offending*

15. Using children whose parents had no criminality as the reference, children whose parent had only one contact with the criminal justice system are about 2.17 times as likely to have contact with the criminal justice system. However, for children whose parent had more than one contact with the criminal justice system, they are 3.40 times as likely as their counterparts to have contact with the criminal justice system.

16. This finding demonstrates the presence of a “dose-response” relationship: where an increase in parental criminal behaviour increases the likelihood of disruptions to family life, which can in turn affect child criminality. Overseas research also supports the presence of this “dose-response” relationship as the number of parental convictions and incarceration are found to affect the rate or frequency of their children's offending<sup>9,10,11</sup>.

17. As parents are the primary caregivers and social role models, any increase in their anti-social behaviour is therefore likely to impact on their children's development. For instance, the increased disruptions arising from contact with the criminal justice system could result in a more significant impact on a child's ability to form strong bonds and attachment with his/her parent, which could in turn affect the child's trajectory in life<sup>12</sup>. Furthermore, parental criminality can also affect the adult's employment prospects, which can put additional socio-economic stress on the family. This ultimately puts their offspring at higher risk of coming into conflict with the law<sup>13</sup>.

---

<sup>9</sup> Besemer, S. (2014). The impact of timing and frequency of parental criminal behaviour and risk factors on offspring offending. *Psychology, Crime & Law*, 20(1), 78–99. <https://doi.org/10.1080/1068316X.2012.736512>

<sup>10</sup> Murray, J., Janson, C., & Farrington, D. (2007). Crime in adult offspring of prisoners: a cross-national comparison of two longitudinal samples. *Criminal Justice and Behaviour*, 34(1), 133–149. <https://doi.org/10.1177/0093854806289549>

<sup>11</sup> Nijhof, K., de Kemp, R., & Engels, R. (2009). Frequency and seriousness of parental offending and their impact on juvenile offending. *Journal of Adolescence*, 32(4), 893–908. <https://doi.org/10.1016/j.adolescence.2008.10.005>

<sup>12</sup> Sroufe, L. A. (1988). The role of infant-caregiver attachment in development. In J. Belsky & T. Nezworski (Eds.), *Clinical implications of attachment* (pp. 18–38). Hillsdale, NJ: Erlbaum.

<sup>13</sup> Farrington, D. P. (2011). Families and crime. In Wilson, J. Q., & Petersilia, J. (Eds.), *Crime and public policy*, 3<sup>rd</sup> ed (pp. 130–157). New York: Oxford University Press.

18. In addition, the extant research literature has also demonstrated that exposure to parental criminality is associated with increased vulnerability in children across the social competence, emotional maturity, language and cognitive skills, communications skills and general knowledge, as well as physical health and wellbeing<sup>14,15</sup>. In other words, the effects of parental criminality have far-reaching effects in other domains that can impede a child's holistic development.

### **Strengthening Support to Break the Cycles of Offending**

19. The findings highlight the importance of efforts to rehabilitate and reintegrate offenders, and support their families, including their children, so as to break the cycles of offending. The Government has actively stepped up our efforts in these areas, with the support of community partners.

#### *Rehabilitating and Reintegrating Offenders, and Supporting Their Families*

20. Without family, rehabilitation and reintegration can be a lonely struggle. Strong family bonds are an important factor for successful rehabilitation and reintegration. It can serve as a powerful source of motivation for offenders. We hope to help inmates and their children work towards a better life to come, as one family. Structured family programmes are run in the prison, to encourage and equip inmates with skills to strengthen and bond with their families. These programmes help incarcerated offenders gain a better understanding of their roles as parents, as well as learn important parenting and communication skills. Children and caregivers also receive support to help them sustain their family bonds during the period of incarceration as part of these programmes. Joint family sessions are also organised as part of the various family programmes, allowing inmates to interact and bond with their families without physical barriers, and put into practice the communication and interpersonal skills they have learnt.

21. In 2018, the Singapore Prison Service (SPS) introduced the Family Intervention & Reintegration Support Team (FIRST) trial, to better support families impacted by incarceration. FIRST takes the form of case management, where Family Case Managers work with community partners and agencies to engage and help these families. Other programmes such as the Yellow Ribbon Community Project also reach out to inmates' families, linking them up to relevant assistance and support.

---

<sup>14</sup> Laurens, K. R., Tzoumakis, S., Kariuki, M., Green, M. J., Hamde, M., Harris, F., Carr, V. J., & Dean, K. (2017). Pervasive influence of maternal and paternal criminal offending on early childhood development: a population data linkage study. *Psychological Medicine*, 47(5), 889-901. doi:10.1017/s0033291716003007

<sup>15</sup> Bell, M., Bayliss, D., Glauert, R., & Ohan, J. (2018). Using linked data to investigate developmental vulnerabilities in children of convicted parents. *Developmental Psychology*, 54(7), 1219-1231. <https://doi.org/10.1037/dev0000521>

22. To support sustainable and lasting change, the SPS helps offenders take ownership of their rehabilitation journey, with the provision of academic programmes and vocational skills training in prison. Yellow Ribbon Singapore (YRSG), previously known as Singapore Corporation of Rehabilitative Enterprises (SCORE) also prepares offenders for employment through skills training and employment assistance. YRSG also applies job profiling tools, to help offenders discover jobs suitable for them, and channel them to appropriate vocational skills training based on potential job fit. These initiatives, coupled with strong partnerships with industries and employers, help to equip offenders with the necessary skills to enhance their employability and re-join the national workforce when they leave prison. In addition, the National Council of Social Service (NCSS) has also been playing an active role in the provision of pro-social support to former offenders. For instance, NCSS provides direct funding to Social Service Agencies (SSAs) to run various programmes to help offenders and their families. To help youth offenders, MSF's Youth Homes (Singapore Boys' Home and Singapore Girls' Home) also provide academic classes and vocational training to meet the learning needs of youth offenders. These will prepare them for returning to schools or engaging in traineeship or employment respectively.

23. MSF has also put in place various measures to better support youth offenders, to break the cycles of offending, ideally from the point of the first offence. MSF set up the Triage system with the Singapore Police Force (SPF) and the Attorney-General's Chambers (AGC), to facilitate early identification and diversion of youth offenders, where appropriate, from being charged in court. The Triage system involves social workers making assessments on the risk (of future offending) and needs of arrested youths and making a recommendation on whether they can benefit from suitable community rehabilitation programmes. This alternative pathway allows them to avoid the associated stigma and consequences of prosecution and more entrenched involvement with the criminal justice system, and better reintegrate into the community. These youths undergo programmes run by SSAs appointed by MSF, aimed at addressing their offending behaviours.

24. MSF also prioritises community-based interventions such as probation and rehabilitation outside of residential facilities, to involve their families, and minimise disruption to the youth's development. Furthermore, in recognition of the importance of both family and community in promoting optimal rehabilitative outcomes, MSF has implemented the Functional Family Therapy® (FFT®) and since 2020 has been piloting the Functional Family Probation® (FFP®) for children and youths who are assessed to be of higher-risk of offending and/or delinquent behaviours, in which the intervention is delivered to the entire family. MSF is also extending the period of post-care support in our Youth Homes to a year, to help our youths reintegrate more smoothly into the community and reduce re-offending.

25. To provide more upstream and coordinated support, MSF is piloting a Localised Community Network (LCN) in Jurong West, for children faced with challenging family circumstances. The pilot involves government agencies, schools, community agencies and

other partners within the locale sharing information to identify needs early, and coordinate the support needed.

### *A Tough Stance on Drugs*

26. To combat drug abuse, Singapore is enhancing its multi-pronged anti-drug efforts. This is increasingly important, in the context of a global movement towards more liberal attitudes on drugs, with more countries legalising drug abuse or considering doing so. We have made recent enhancements to the enforcement framework and drug rehabilitation regime. For instance, those who only abuse drugs and do not commit other penal offences will be channelled into the rehabilitation regime and be placed on post-release supervision for a period of up to five years to allow for longer monitoring and deterrence. Counselling and other assistance are provided to help him stay clean. Other measures include criminalising contaminative behaviours such as facilitation and promotion of drug use. Efforts are also made to intensify preventive drug education by expanding outreach efforts on social media to counter misinformation about drugs and its consequences.

### **Conclusion**

27. This paper has provided supportive evidence on the existence of the intergenerational transmission of criminality in Singapore, with the use of population-level administrative data. Parental criminality affects our children and youth, increasing the likelihood of them offending.

28. Breaking cycles of offending is not an easy task. It requires strong family and community support to complement government efforts. Many community partners have stepped forward, and play important roles in the various efforts mentioned above. Individuals have also come forth to volunteer for initiatives. MSF appreciates these efforts, and will continue to support the social service sector, through funding and capability and capacity building efforts. MSF invites everyone to build upon existing efforts as we continue to do more upstream work, to break the cycles of offending and achieve better outcomes for our children and youth.