AUSTRALIAN PAYMENT FRAUD
2023

JANUARY – DECEMBER 2022 DATA

Australian
Payments
Network

FOREWORD

In June 2023, the Government released its Strategic Plan for Australia's Payments System, detailing its policy objectives and priorities to ensure a "modern, world-class and efficient payments system".[1] According to the Plan, one of the four core principles that will guide the future direction of the payments system is trustworthiness. Explaining that principle, it emphasises the public interest in ensuring the resilience, reliability and safety of the system, including strong protection against fraudulent transactions.[2]

Fraudsters continue to target Australian consumers and adapt their illicit activities as payment preferences evolve. In recent years, the popularity of card payments has increased significantly, a trend accelerated during the COVID-19 pandemic. With the surge in the volume of card payments for online transactions, card-not-present (CNP) fraud – mainly affecting online purchases – now accounts for 90 per cent of all fraud on Australian cards.

CNP fraud involves valid card details being stolen by criminals and used to make purchases or other payments – usually online - without physical possession of the card. Criminal groups target online transactions partly because of the growth in card spending, but also because avenues for other types of card fraud have become more difficult to perpetrate since the introduction of EMV chip technology. In this climate, industry-wide efforts to mitigate CNP fraud and organised crime remain crucial.

Combatting payment fraud has long been an area of focus for Australian Payments Network (AusPayNet), the payments industry self-regulatory body. We publish the Australian Payment Fraud Report annually to highlight current fraud trends affecting the payments ecosystem. The data allows us to measure the success of industry mitigants and assists us in developing further response strategies.

> " The work to establish this Framework is a practical illustration of the industry's ongoing commitment to maximising confidence in the payments system

The data indicates that industry collaboration is having an impact on the incidence of CNP fraud. In 2019, AusPayNet introduced the CNP Fraud Mitigation Framework (CNP Framework) to counteract rising rates of this type of fraud. The framework has prompted merchant adoption of technologies to detect and prevent fraudulent transactions and since its introduction, the rate of fraud on Australian card payments has decreased from 75.0 cents per $1,000 spent in 2017 to 57.5 cents in 2022.

> **Perpetrators of fraud are engaging in increasingly sophisticated schemes to maximise their ill-gotten gains**

This year, we are pleased to share more insights around the effectiveness of the CNP Framework. While there may still be a long way to go when it comes to combatting card fraud, the work to establish this Framework is a practical illustration of the industry's ongoing commitment to maximising confidence in the payments system by ensuring its safety, reliability, and resilience to fraud. In fact, this kind of work will become an increasingly important part of AusPayNet's role as we progress on our journey to become an authorised standards-setting body (ASSB) for payments, setting mandatory standards for payments licensees and therefore protecting consumers.

In addition, in the wake of advances in classical computing power and given the future advent of quantum computing, AusPayNet is leading work to upgrade the security standards and encryption methods used in the card payments system. This work will ensure card payment data continues to be secure from cyber-attacks and data breaches, preventing fraudulent harvesting and misuse of card payment data. We have begun planning for an industry-wide migration of the Australian card payments system to the more robust Advanced Encryption Standard (AES), a program which is anticipated to run over several years.

In addition to card fraud data, AusPayNet also collects cheque fraud statistics, covering fraud occurring on Australian-issued cheques in Australia and overseas. According to the Reserve Bank of Australia (RBA), cheque usage has rapidly declined over the past decade, currently making up only 0.2 per cent of non-cash payments.[3] In 2022, fraud losses on cheques totalled $2.44 million, and the fraud rate was 0.8c per $1,000 transacted.

In its Plan, the Government has recognised that greater security in the payments system will be achieved through a transition away from the use of cheques.[4] Not only does this transition eliminate an avenue for fraudsters to exploit, but it also requires remaining cheque users to shift to more secure payment methods. AusPayNet will be working with federal and state governments, and other users on this initiative.

Perpetrators of fraud are engaging in increasingly sophisticated schemes to maximise their ill-gotten gains, and it is therefore essential that all stakeholders continue to sharpen their focus on addressing this issue. AusPayNet will continue to lead industry efforts to combat payment fraud and play an integral role in realising the Government's vision for a "modern, world-class and efficient payments system that is safe, trusted and accessible, and enables greater competition, innovation and productivity across the economy".[5]

Andy White
Chief Executive Officer, AusPayNet

1. Australian Government (2023) 'A Strategic Plan for Australia's Payments System: Building a modern and resilient payments system', available at: https://treasury.gov.au/sites/default/files/2023-06/p2023-404960.pdf (accessed 1 August, 2023)
2. Australian Government (2023) ref. 1 above
3. Reserve Bank of Australia (2022) 'Payment Systems Board Annual Report 2022', available at: https://www.rba.gov.au/publications/annual-reports/psb/2022/pdf/psb-annual-report-2022.pdf (accessed 1 August, 2023)
4. Australian Government (2023) ref 1. above
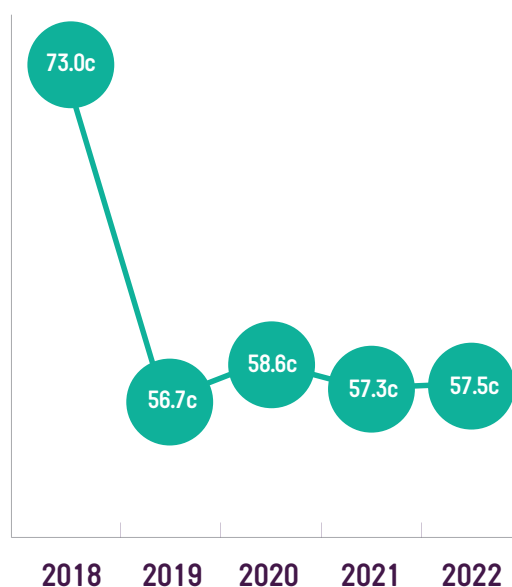5. Australian Government (2023) ref 1. above

PAYMENT FRAUD IN 2022

- Total value of card transactions **increased 16% to over $1t**; following an increase of 7.4% in 2021

- Total value of card fraud **increased by 16.5% to $577m**

- Card-not-present (CNP) fraud **rose 14.4% ($516.8m)** after increasing 7.6% in 2021

- Lost/stolen card fraud was **up by 44.5% to $41.8m,** returning to pre-pandemic levels

- After falling more than 50% in 2021, counterfeit/skimming **increased by 30%** but remains well below pre-pandemic levels

- Fraud involving cards never received **declined 20.9% to $1.6m**

- The use of cheques **continues to decline**. There were **27m** cheques transacted (**-18.2%**) with a value of **$317b** (**-14.5%**). The Government has announced that cheques are to be phased out by 2030 in its 2023 Strategic Plan for Australia's Payments System, and a greater decline in the coming years is anticipated.

- Fraudulent cheque transactions were valued at $2.4m, a **decrease of 24%.**

* Detailed five year statistics (sourced from the Reserve Bank of Australia and AusPayNet) are available from Page 8 in this report.

CARD FRAUD RATE

The rate remained steady at **57.5 fraud cents per $1,000 spent** continuing to reflect a stabilisation of that rate since the CNP Fraud Mitigation Framework's introduction in 2019.

Year	Rate
2018	73.0c
2019	56.7c
2020	58.6c
2021	57.3c
2022	57.5c

SNAPSHOT

CARD USE AND FRAUD

$1T TOTAL CARD TRANSACTIONS

+16%

$577M CARD FRAUD VALUE

+16.5%

$516.8M CARD-NOT-PRESENT

+14.4%

$7.1M COUNTERFEIT/SKIMMING

+30%

$41.8M LOST/STOLEN CARD

+44.5%

$1.6M CARDS NEVER RECEIVED

-20.9%

CHEQUE USE AND FRAUD

27M CHEQUES TRANSACTED

-18.2%

$317B VALUES OF CHEQUES

-14.5%

$2.4M FRAUDULENT CHEQUES

-24%

THE CARD-NOT-PRESENT (CNP) FRAUD MITIGATION FRAMEWORK

WORKING TO PREVENT PAYMENT FRAUD

AusPayNet continues to lead a number of industry-wide initiatives focused on enhancing the security and convenience of payments. Our Card-Not-Present (CNP) Fraud Mitigation Framework (CNP framework) is designed by industry to reduce fraud in online, CNP channels, while enabling the continued growth of online transactions. The framework defines the minimum requirements for an Issuer, Merchant, Acquirer or Payment Gateway to authenticate CNP transactions online, establishing authentication as best practice to reduce fraud in online, CNP channels.

Cards are by far the most popular retail payment method in Australia. Most in-person card payments are 'contactless', online purchases are growing strongly, and in-app purchases are becoming increasingly popular. CNP fraud now accounts for approximately 90% of all card fraud on Australian-issued cards. In 2022, CNP fraud totalled $577 million.

ENFORCEABILITY

The CNP framework is enforced through AusPayNet's Issuers and Acquirers Community (IAC) Code Set. It defines fraudulent transaction value and volume thresholds that all Merchants and Issuers must remain below. Breaches of these thresholds will trigger obligations for Merchants or Issuers to take corrective action, and if these breaches are not resolved within a specified period, penalties may be imposed.

The IAC is administered by AusPayNet and brings together a wide range of participants in the card payment system. The IAC Code Set establishes the governance framework for card payments and sets out the security and operational rules. These include processes for ATM and eftpos terminal evaluation and certification. To join the IAC, organisations are required to meet membership criteria and are bound by the IAC rules.

SANCTIONS TRIBUNAL PROCESSES

Issuers or Acquirers in breach of the CNP Code can be referred to the Sanctions Tribunal. The Tribunal determines whether a fine should be issued and the size of that fine. The Sanctions Tribunal Rules and Processes were revised in 2022, to simplify and streamline the process.

CONTINUOUS IMPROVEMENT

EFFECTIVENESS

Since the implementation of the CNP framework in 2019, quarterly figures have shown a downward trend in the CNP fraud rate, despite the continued growth of CNP transactions, pointing to the impact of the CNP framework.

The number of merchants in breach of the Merchant Fraud Threshold over four consecutive quarters has declined by 63% from Q1 2021 to Q1 2023, demonstrating that most merchants in breach for one quarter do not remain in breach in subsequent quarters, as a result of implementing improved risk-based analysis and effective fraud controls.

There have been no Issuers in breach of the Issuer Fraud Threshold. This indicates that the Merchant Fraud Threshold and the Issuer Fraud Threshold are set at reasonable levels and that Acquirers and Merchants are using appropriate tools and solutions to lower their CNP Fraud.

The guiding principles of the CNP framework continue to be to:
- leverage global standards and best practices in other jurisdictions
- consistently apply Strong Customer Authentication (SCA)
- technology neutral, to provide choice and ease of implementation
- review the scope and thresholds annually.

CNP FRAMEWORK

AusPayNet members undertake an annual review of the CNP framework with representatives from a diverse range of participants in the payments industry to ensure the framework remains fit for purpose.

Workshops continue to explore and address identified key issues, which broadly fall into two categories:
- ensuring the mitigants are relevant and achievable
- driving the correct behaviour via an appropriate sanctions and fines regime.

Combatting CNP fraud remains a priority for the payments industry, as e-commerce volumes rapidly rise and Australians' use of digital payment methods continues to increase. The CNP framework and other mitigants implemented by the industry continue to assist in achieving a stabilisation of the fraud rate at an acceptable level.

Further details are available at AusPayNet's website.

CARD PRESENT FRAUD

Acquirers often use innovative point-of-sale (POS) technology to differentiate their offering to merchants. The design of POS technology is driven by, among other things, business requirements, technology advancements, costs and security standards.

Manufacturers usually have a relationship with an acquirer who is interested in addressing a market need or adding new functionality.

Manufacturers must comply with AusPayNet certification for all card accepting devices or solutions, including ATMs and POS, PIN-entry devices and unattended devices that accept card transactions in Australia. AusPayNet's process prescribes that the manufacturer must have a device evaluated by an approved evaluation facility before submitting it to AusPayNet for approval.

AusPayNet also has an evaluation process for new or non-standard technologies that do not meet existing security standards. Its purpose is to ensure new devices have appropriate security protections and to help minimise fraud.

Once AusPayNet clears a new payment terminal, it is added to the list of approved devices.

CARD FRAUD DATA

AUSTRALIAN CARD – FRAUD RATES AND TOTALS

	2018	2019	2020	2021	2022
Value ($m):					
All card transactions	$789,286	$819,583	$800,920	$864,727	$1,003,698
Fraudulent transactions	$576	$465	$469	$495	$577
FRAUD RATE (CENTS PER $1,000):	**73.0c**	**56.7c**	**58.6c**	**57.3c**	**57.5c**
Number:					
All card transactions (m)	9,985	11,000	11,373	12,528	13,989
Fraudulent transactions (k)	4,369	3,796	4,062	4,267	4,597
Fraud rate (as % of total no. of card transactions)	**0.044%**	**0.035%**	**0.036%**	**0.034%**	**0.033%**
Average value of fraudulent transactions	$132	$122	$115	$116	$126

PAYMENTS CARD FRAUD

Fraud	2018	2019	2020	2021	2022
Value ($m)	$576.20	$464.96	$468.98	$495.48	$577.39
Number (m)	4,369	3,796	4,062	4,267	4,597
Average value ($)	$132	$122	$115	$116	$126
All Cards Transactions:					
Value (m)	$789,286	$819,583	$800,920	$864,727	$1,003,698
Number	9,985	11,000	11,373	12,528	13,989
Average value ($)	$0.08	$0.07	$0.07	$0.07	$0.07
FRAUD RATE PER $1,000	**73.0c**	**56.7c**	**58.6c**	**57.3c**	**57.5c**

PERCENTAGE OF TOTAL CARD FRAUD

Percentage of total card fraud	2018	2019	2020	2021	2022
Card-not-present	84.9%	86.8%	89.6%	91.2%	89.5%
Counterfeit/skimming	3.4%	3.6%	2.4%	1.1%	1.2%
Lost/stolen	9.7%	7.5%	5.6%	5.8%	7.2%
Never received	1.1%	0.6%	0.7%	0.4%	0.3%
Fraudulent application	0.4%	0.5%	0.6%	0.2%	0.1%
Other	0.6%	0.9%	1.2%	1.3%	1.6%
TOTAL	**100%**	**100%**	**100%**	**100%**	**100%**

AUSTRALIAN ISSUED CARDS FRAUD

Fraud on all Australian issued scheme credit, debit and charge cards	2018	2019	2020	2021	2022
Value ($m)	$562.81	$450.92	$457.90	$484.72	$565.75
Number (m)	4,317	3,720	3,996	4,202	4,524
Average value ($)	$130	$121	$115	$115	$125

AUSTRALIAN ISSUED CARDS: FRAUD VALUE BY TYPE

Fraud ($m)	2018	2019	2020	2021	2022
Card-not-present	$71.49	$82.59	$71.75	$54.81	$75.57
Counterfeit/skimming	$5.81	$7.29	$4.85	$3.24	$5.21
Lost/stolen	$3.27	$4.55	$3.26	$2.50	$2.84
Never received	$0.11	$0.16	$0.09	$0.11	$0.16
Fraudulent application	$0.15	$0.14	$0.12	$0.05	$0.10
Other	$1.45	$0.91	$0.91	$0.98	$1.45
TOTAL	**$82.27**	**$95.64**	**$80.97**	**$61.71**	**$85.34**

FRAUD LOSSES ON SCHEME CREDIT, DEBIT AND CHARGE CARDS PERPETRATED IN AUSTRALIA ON OVERSEAS-ISSUED CARDS

Fraud ($m)	2018	2019	2020	2021	2022
Card-not-present	$71.49	$82.59	$71.75	$54.81	$75.57
Counterfeit/skimming	$5.81	$7.29	$4.85	$3.24	$5.21
Lost/stolen	$3.27	$4.55	$3.26	$2.50	$2.84
Never received	$0.11	$0.16	$0.09	$0.11	$0.16
Fraudulent application	$0.15	$0.14	$0.12	$0.05	$0.10
Other	$1.45	$0.91	$0.91	$0.98	$1.45
TOTAL	**$82.27**	**$95.64**	**$80.97**	**$61.71**	**$85.34**

SCHEME CREDIT, DEBIT AND CHARGE CARDS – FRAUD

Fraud ($m)		2018	2019	2020	2021	2022
Fraud perpetrated in Australia	Card-not-present	$258.59	$224.49	$264.58	$291.02	$276.94
	Counterfeit/skimming	$5.13	$4.52	$3.17	$1.60	$1.99
	Lost/stolen	$33.01	$19.02	$16.56	$19.35	$24.02
	Never received	$4.36	$1.92	$1.89	$1.22	$1.02
	Fraudulent application	$1.91	$1.96	$2.30	$0.81	$0.69
	Other	$1.06	$0.96	$1.17	$1.72	$3.86
	TOTAL	**$304.05**	**$252.86**	**$289.65**	**$315.72**	**$308.51**
Fraud perpetrated overseas	Card-not-present	$230.45	$178.94	$155.51	$160.79	$239.90
	Counterfeit/skimming	$8.14	$6.31	$5.11	$1.46	$1.97
	Lost/stolen	$18.77	$11.54	$5.48	$5.46	$12.76
	Never received	$0.36	$0.12	$0.16	$0.09	$0.06
	Fraudulent application	$0.42	$0.48	$0.34	$0.10	$0.16
	Other	$0.61	$0.67	$1.65	$1.10	$2.39
	TOTAL	**$258.76**	**$198.06**	**$168.25**	**$169.00**	**$257.24**
TOTAL OF ALL AUSTRALIAN ISSUED CARDS		**$562.81**	**$450.92**	**$457.90**	**$484.72**	**$565.75**

OVERVIEW PROPRIETARY DEBIT CARDS FRAUD

Fraud	2018	2019	2020	2021	2022
Value ($m)	$13.39	$14.04	$11.07	$10.75	$11.64
Number	52,398	76,068	66,047	65,235	73,872
Average value ($)	$256	$185	$168	$165	$158

PROPRIETARY DEBIT CARDS – FRAUD BY TYPE

Fraud ($m)	2018	2019	2020	2021	2022
Counterfeit/skimming	$6.34	$6.02	$2.84	$2.40	$3.16
Lost/stolen	$3.85	$4.54	$4.42	$4.09	$4.99
Never received	$1.37	$0.92	$1.01	$0.69	$0.50
Other	$1.82	$2.56	$2.81	$3.57	$2.99
TOTAL	**$13.39**	**$14.04**	**$11.07**	**$10.75**	**$11.64**

FRAUD LOSSES – PROPRIETARY DEBIT CARDS FRAUD (PIN USED AND PIN NOT USED)

Fraud ($m)	2018	2019	2020	2021	2022
Counterfeit/skimming	$6.34	$6.02	$2.84	$2.40	$3.16
Lost/stolen	$3.85	$4.54	$4.42	$4.09	$4.99
Never received	$1.37	$0.92	$1.01	$0.69	$0.50
Other	$1.82	$2.56	$2.81	$3.57	$2.99
TOTAL	**$13.29**	**$14.04**	**$11.07**	**$10.75**	**$11.64**

Fraud ($m)	2018	2019	2020	2021	2022
Whether PIN used:					
PIN used	$12.37	$12.05	$8.98	$8.20	$8.42
PIN not used	$1.02	$1.99	$2.09	$2.56	$3.21

CHEQUE FRAUD

CHEQUE FRAUD VALUES AND TRANSACTIONS

Fraud	2018	2019	2020	2021	2022
Value ($m)	$4.37	$4.83	$4.01	$3.21	$2.44
Number	591	680	652	494	410
Average value ($)	$7,402	$7,106	6,153	$6,503	$5,953
All cheque transactions:					
Value ($m)	$885,147	$602,094	$407,096	$371,479	$317,435
Number	72	57	41	33	27
Average value ($)	$12,342	$10,577	$9,810	$11,391	$11,921
FRAUD RATE PER $1,000	**0.5c**	**0.8c**	**1.0c**	**0.9c**	**0.8c**

CHEQUE FRAUD BY CATEGORY

Fraud ($m)	2018	2019	2020	2021	2022
On us fraud:					
Breach of mandate	$0.43	$0.00	$0.00	$0.20	$0.00
Fraudulently altered	$1.18	$1.47	$1.05	$0.92	$0.47
Stolen blank cheque/book	$1.47	$1.92	$1.22	$1.28	$1.13
Originated counterfeit cheques	$0.21	$0.41	$0.41	$0.44	$0.61
Non originated counterfeit cheques	$0.15	$0.60	$1.16	$0.31	$0.14
Valueless	$0.30	$0.04	$0.02	$0.01	$0.05
ON US TOTAL	**$3.74**	**$4.44**	**$3.86**	**$3.15**	**$2.40**
Deposit fraud	$0.63	$0.39	$0.15	$0.06	$0.04
TOTAL ALL CHEQUES FRAUD	**$4.37**	**$4.83**	**$4.01**	**$3.21**	**$2.44**

GLOSSARY

TYPES OF FRAUD

Card-Not-Present (CNP) fraud: occurs when valid card details are stolen and then used to make purchases or other payments via a remote channel without the physical card being seen by the merchant, mainly online via a web browser or by phone.

Card Present fraud: occurs when a physical card is used fraudulently at ATMs or point-of-sale devices. The various types of card present fraud are:

Counterfeit/skimming fraud: occurs when details from a card's magnetic stripe are skimmed at an ATM, point-of-sale terminal, or through a standalone skimming device, and used to create a counterfeit card. Criminals use the counterfeit card to purchase goods for resale or, if the PIN has also been captured, to withdraw cash from an ATM.

Fraudulent application: transactions made on a card where the account was established using someone else's identity or other false information.

Lost/stolen fraud: refers to unauthorised transactions on cards that have been reported by the cardholder as lost or stolen. Unless the PIN has also been captured, criminals may use these cards – or duplicates of these cards – at point-of-sale by forging the signature where accepted, or for purchases where neither a PIN nor signature is required.

Never received: transactions made on a card that was stolen before it was received by the owner.

On Us: covers fraud that has been detected and reported by the financial institution that the cheque is drawn on. Types of on us fraud include:

- *Breach of mandate* – payment is made without the correct authority; for example, the cheque may require two signatures, but there is only one
- *Fraudulently altered* – payee and/or dollar amount details are altered to be different than originally written
- *Stolen blank cheque/book* – original blank cheques are stolen and passed off as if they were written by the account holder
- *Originated counterfeit cheques* – a counterfeit cheque is produced using the paper of the original cheque
- *Non originated counterfeit cheques* – a counterfeit cheque is produced on new paper using techniques such as laser printing and desktop publishing
- *Valueless* – cheques are deposited into an account knowing full well that they are worthless and will be dishonoured.

Other: covers fraudulent transactions that cannot be categorised under any of the common fraud types above. For example, identity or account takeover.

TYPES OF CARDS

Scheme credit, debit and charge cards: operated by international card schemes – Mastercard, Visa, American Express, and Diners – and domestic debit scheme, eftpos Payments Australia Limited.

KEY TERMS

Payment Card Industry Data Security Standard: PCI DSS is a security standard mandated by the international card schemes to ensure sensitive card data is held securely.

ABOUT US

AusPayNet is the industry association and self-regulatory body for the Australian payments industry. We manage and develop procedures, policies and standards governing payments in Australia. Our purpose is to enable competition and innovation, promote efficiency, and control and manage risk in the Australian payments ecosystem. AusPayNet currently has over 150 members, including financial institutions, payment system operators, major retailers and financial technology companies.

Some figures may have been revised since earlier publication. Full details are available on www.auspaynet.com.au