

PASIFIKA YOUTH

ONLINE GAMING & GAMBLING RESEARCH:

“Are online video games a gateway to problem gambling among Pasifika youth?”

Funded by the Ministry of Health



Acknowledgment

Thank you to the Pasifika youth throughout New Zealand who generously supported this research dedicating their time and insights to gaming and gambling. We also acknowledge the Ministry of Health, who provided funding to make this project possible.

Citation: Taufu, S., Gentles, D., Berking, G., Siataga, P., Ah-Honi, P., and Fa'alili-Fidow, J. 2021. Pasifika Youth Online Gaming and Gambling Research: Are online video games a gateway to problem gambling among Pasifika youth?.

Published in December by Mapu Maia

Level 1 Kyber Pass Road, New Market, Auckland 1023

ISBN 978-0-473-61296-2

This document is available at moanaresearch.co.nz and mapumaia.nz



Disclaimer: Due to the rapidly evolving nature of gaming and the advancement of related technology, the data - while current at the time of the survey - may no longer be so at time of publication/release.

Executive Summary

Gaming is highly prevalent in modern culture, particularly among young people, and is a healthy hobby for most users. However, in recent years there has been increasing global recognition among public health professionals and academics that particular patterns of gaming may lead to marked impairment in personal, family, social, educational, occupational, or other important areas of functioning and psychological distress for a significant minority of players (The World Health Organisation, 2014).

A global gaming report has estimated that there were 2.69 billion gamers in the world at the end of 2020, with a Video Gaming Industry estimated to be worth \$159.3 billion (Newzoo, 2020) with the impact of COVID-19 lockdowns around the world contributing to the significant increase in 2020. It is reported that two-thirds of New Zealanders play video games, with the highest proportion of gamers between 5 and 34 years (Brand, Jervis, Huggins, and Wilson, 2019). Many researchers have speculated that gaming may be a gateway for gambling and gambling harm, and there have been numerous attempts to test this theory worldwide (Paschke, Austermann, and Thomasius, 2020). While there are both positive and negative impacts of online gaming, there is little information on the link between gaming and gambling, particularly for Pasifika peoples living in New Zealand.

The data collection for this research (conducted via focus groups and online survey) began on the 18th of November 2019 and continued until the 30th of June 2020. The main aim of this study was to examine the links between gaming and gambling for Pasifika youth aged 16 to 30 years and explore the research question “*Are online video games a gateway to problem gambling among Pasifika youth?*”. The researchers utilised a mixed-methods approach, combining focus groups and data from an online survey with Pasifika youth across New Zealand. The findings were analysed separately for each data collection modality and then combined to identify key themes and patterns. Seven focus groups were undertaken across New Zealand with a total of 75 Pasifika participants. The survey had 828 respondents of all ethnicities but oversampled for Pasifika.

In the study, gambling was described by participants as “*the spending of money within a game to leverage one’s chances of winning or any other factor of ‘success’ or getting ahead relative to the game... everything is left to chance.*” In the New Zealand Gambling Act (2003), gambling refers to when participants pay something to participate (directly or indirectly). There must be an element of chance to win money or a prize. Both definitions refer to chance and *spending* something (money).

The research also explored youth engagement in other gambling activities outside of their gaming activities to gauge whether this influenced their gaming and/or gambling behaviour. In the qualitative portion of the study, gaming often introduces young people to of gambling activities such as solitaire and the increased desire to win. While money is often not involved, youth still spend in the form of time invested in gaming. In this study, Pasifika gamers spend significantly more money on loot boxes than their non-Māori, non-Pasifika counterparts.

In this study, while Pasifika youth engage in gaming activities as a form of socialisation, the societal pressures to look good often carry over into the cyber realm. The youth acknowledged that while cosmetic features in online games such as avatar skins do not increase your chances of winning a game, they impact how a character is perceived by peers.

The qualitative and quantitative studies explored Pasifika youths’ views on loot boxes, drawing a link between them and chance, which participants also use to describe gambling. Irrespective of their ethnicity, 44% of gamers played every day. We found an association between regular gaming for long periods and buying a loot box, and secondly, between gaming and gambling, with the adverse characteristics of problem gaming identical to that of problem gambling. The link between gaming and gambling requires further exploration to better understand the association between the two.

During New Zealand’s first COVID-19 lockdown of 2020, this study found that time spent gaming increased, as did the spending on microtransactions, regardless of ethnicity but more so for Pasifika youth. More research is required to further investigate key results arising from this study to understand if peaks in gaming were influenced by the lockdown.

Key Findings Include:

Gaming Behaviour of 16–30-year-olds

- » Two-thirds of Pasifika survey respondents (65%) spent 2-5 hours in one session compared to 74% of non-Māori, non-Pasifika respondents.
- » Approximately 44% game every day regardless of ethnicity.
- » Pasifika males, on average, played online games significantly longer per week than females. Approximately 30% of males played 15+ hours per week compared to 15% of females.

Spending Behaviour of 16-30-year-olds

- » Approximately 66% of Pasifika survey respondents were familiar with 'loot box' purchases compared with 81% of non-Māori, non-Pasifika respondents.
- » Of those who knew what loot boxes were, 27% of Pasifika respondents purchased them compared to 22% of non-Māori, non-Pasifika.
- » Of those who spent on a loot box, Pasifika survey respondents spent more on loot boxes than non-Māori, non-Pasifika with approximately 22% of Pasifika spending more than \$20 per month on loot boxes compared to 10% of non-Māori, non-Pasifika respondents.
- » A higher proportion (30%) of older gamers (21+ years) spent more money on loot boxes than those aged <20 years (11%).

Identified links between gaming and gambling

- » During talanoa with Pasifika youth, they were able to recognise and name characteristics of gaming harm and gambling harm for themselves.
- » All Pasifika youth were able to identify the adverse effects of gaming and gambling separately. This included irritability, isolation, and anger as harmful effects of both gaming and gambling often triggered when a person loses or is asked to pause or take a break from playing activity (in both gaming and gambling).
- » The solutions suggested by Pasifika youth to counter problem gaming included acknowledging that there is a problem and a need to call it out, setting time limits for game time, creating activities/alternative hobbies, and parent and family awareness and support. This aligns with the Ministry of Health's (2019) Practitioner's Guide on Preventing and Minimising Gambling Harm.

Impact of COVID-19 lockdowns

- » During New Zealand's first COVID-19 lockdown of 2020, 42% indicated their playing time for online games had increased, compared to 32% whose spending stayed about the same and 26% who said it decreased yet did not state why.
- » Of those who indicated their time playing games increased, 39% of them played an extra 4 hours per day, 30% played for 2 hours extra, 18% for 3 hours, and 14% for 1 hour.

Finally, this study shows that Pasifika young people who game continuously daily are experiencing some of the things listed in the DSM-5 or ICD-11 criteria (for gaming harm), or they know of peers or family members who tick boxes in the criteria. What is especially concerning is the acknowledgment by participants that family members as young as five years of age show symptoms of gaming harm. Consequently, while the harmful effects of gambling harm on individuals who gamble are seen in adulthood, gaming harm is detected at a much younger age.

Key Recommendations Include:

Build Literacy on Gaming Harm

- » Participants noted the importance of bringing young people together to talk about gaming and gambling so that youth can draw associations for themselves. Using the findings of this report as a basis to deliver workshops and training to Pasifika communities (ECE's, churches, youth groups, parents) on the characteristics of harmful gaming and strategies that would mitigate the risks.
- » Create workshops/training for youth (similar to the focus groups) to allow young people to draw connections between gaming harm and gambling harm.
- » Creating resources like spreadsheets that are easy to access and use so that people can track how long they game per session.

Legislation and Government

- » Stronger regulation on gaming industry products, policed by Department of Internal Affairs is needed.
- » For the Ministry of Health to ensure safeguards are in place to protect underage gamers and monitor the level of violence in games before they are accepted.
- » Online gaming needs to be prioritised by both Ministry of Health and the Department of Internal Affairs. Both need to have a transparent working relationship to ensure that the level of regulation for online gaming, particularly around loot boxes, is aligned with the new Ministry of Health 'Strategy to Minimise and Prevent Gambling Harm' and the New Zealand Gambling Act 2003.

Invest in the development of E-learning – digital tools.

- » This research defines gateway harm as the normalisation of behaviours that create compulsive habits and emotional dysregulation. This can also be facilitated by a lack of evidence-based bylaws and policies to regulate public health and safety appropriately.
- » This research recommends the co-design and development of e-learning/digital tools to raise awareness and to provide adequate support to young gamers to prevent gaming and/or gambling harm. It also recognises the importance of co-collaborations with others who are working in the space.
- » Ensure gender-specific workshops and resources to address differences in gaming and gambling behaviours

Invest in Services

- » Create support services specifically aimed at helping young people with gaming problems. This includes investment in communications and marketing so that our Pasifika communities are aware of such services and services that understand Pasifika ethnic-specific values and context in their engagement with Pasifika peoples.
- » Co-design activities will help Pasifika youth with gaming problems and provide information on ways to mitigate risks online, should there be another lockdown.

Ongoing Research

- » Ensure future research relating to gaming and/or gambling extends to Pasifika families.

Contents

Acknowledgment	i
Executive Summary.....	1
Key Findings Include:.....	2
Gaming Behaviour of 16–30-year-olds	2
Spending Behaviour of 16-30-year-olds	2
Identified links between gaming and gambling	2
Impact of COVID-19 lockdowns	2
Key Recommendations include:.....	3
Build Literacy on Gaming Harm	3
Legislation and Government	3
Invest in the development of E-learning – digital tools.....	3
Invest in Services.....	3
Ongoing Research	3
List of Tables	6
List of Figures.....	7
Glossary.....	8
Introduction	10
Background.....	12
Gaming Problems.....	12
Gaming and Gambling.....	13
Pasifika People in New Zealand	14
Research Approach.....	16
Study 1: Qualitative Study.....	18
Research Approach.....	18
Design and Methods	18
Development of Research Tools & Ethics approval.....	20
Recruitment	20
Data Collection.....	21
Data Analysis.....	23
Study 2: Quantitative Study.....	24
Design and Methods	24
Demography	25
Pasifika vs non-Maori, non-Pasifika Comparison.....	26
Gaming behaviours of young Pasifika people and their views based on financial transactions.....	28
Time spent “gaming”	29
Gaming during the first COVID-19 Lockdown.....	31

Game Preferences (multiplayer vs. single-player)	32
Reasons for Gaming	34
Device of preference	36
Financial Transactions.....	38
Gaming behaviours.....	44
Perceptions of Gaming Harm	45
Summary.....	47
Possible links between gaming and gambling, including problem gambling.....	48
Gambling behaviours	49
Gambling Preferences.....	49
Perceptions of Gambling Harm	50
Perceptions of problem gaming leading to problem gambling.....	52
Summary	53
Support and Prevention for gambling while gaming.....	54
Acknowledgment that there is a problem/calling it out	55
Setting time limits for game time	56
Creating activities/alternative hobbies.....	56
Parent and Family awareness and support.....	57
Summary	57
Summary and Conclusion	58
Discussion	59
Recommendations	62
Summary	63
Conclusion	63
References.....	64
Appendices.....	66
Appendix 1	66
Values-based Exchange	66
Appendix 2	68
Mapu Maia Background	68
‘Va Tagata’ Model	68
Appendix 3	70
Participant Information Sheet	70
Consent Form	73
Appendix 4	74
Ethical Approval	74

List of Tables

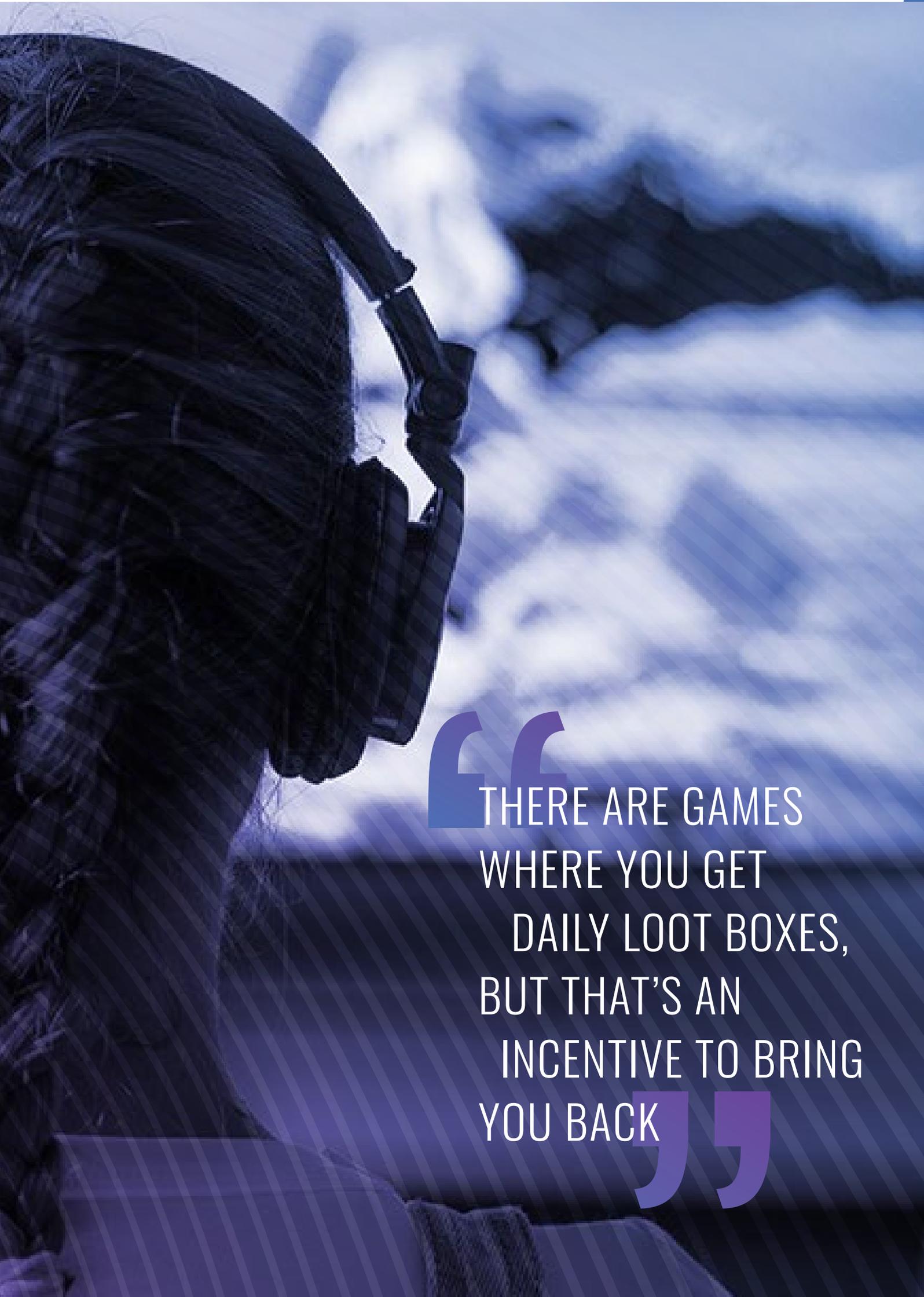
Table 1 Focus Groups.....	21
Table 2 Focus groups - Participant Demographics	22
Table 3 Pasifika vs non-Māori, non-Pasifika (nMnP) demographics.....	26
Table 4 Income per week after tax	27
Table 5 Current Occupation status of gamers by ethnic group.....	27
Table 6 Time spent playing online games in one session.....	29
Table 7 Frequency of playing games	29
Table 8 nMnP Weekly time spent playing online games.....	29
Table 9 Pasifika Weekly time spent playing online games	29
Table 10 Age Group vs Time spent gaming 15+ hours per week	31
Table 11 During Covid-19 lockdown: extra hours spent playing online games per day.	31
Table 12 Most popular games played.	32
Table 13 Three most popular online games	33
Table 14 Money spent buying loot boxes per month	39
Table 15 Pasifika high spending (\$20 or more a month) on loot boxes by age group	40
Table 16 Reasons for buying a loot box.....	40
Table 17 Behaviours or attitudes toward gaming for Pasifika (16-30 years).....	45
Table 18 Money spent weekly on gambling activity	49
Table 19 Types of gambling done by gamers in the last six months.	49
Table 20 Three most popular gambling activities	50

List of Figures

Figure 1 Kakala Research Framework	18
Figure 2 Total response for ethnic breakdown of those who responded to the survey	25
Figure 3 Total response for Pasifika Ethnic-specific breakdown of those who responded to the survey	25
Figure 4 Gaming preference (single player vs multi player) for Pasifika participants	32
Figure 5 Preferred Device by ethnicity.....	36
Figure 6 Console usually used by ethnicity.....	37
Figure 7 Money spent buying loot boxes per month.....	39
Figure 8 PGF Group Interpretation of Ministry of Health (Preventing and Minimising Gambling Harm Practitioner’s Guide 2019) Gambling behaviour and harm: the continuum of prevention and harm reduction.....	60

Glossary

Terms/Abbreviation	Translation/Full Term/Definition
Continuous forms of gambling	Forms of gambling whereby the outcome of the game, or bet, is typically determined with the player still present and who may continue to gamble should they choose to.
DSM-5	The Diagnostic and Statistical Manual of Mental Disorders 5
FG	Focus Group
Gamer	Those who play online digital video games whether by Console, PC, or Mobile phones.
GP	Gaming Problem
GD	Gaming Disorder
ICD-11	11th revision of the International Classification of Diseases
Kakala	A garland. A framework used to describe the approach used in this study was developed by Professor Konai Helu-Thaman.
Microtransactions	Microtransaction commonly refers to a business model, where users can purchase virtual goods via micropayments. Microtransactions (i.e. premium content) may include downloadable content such as story extensions (so-called 'DLCs'), additional play time, levels, new maps, virtual currency, weapons, armor, characters or cosmetic items to customize the player's character or items. The player pays for microtransactions either directly with real-world currency or with some form of fantasy virtual currency (e.g. gold). The latter is typically earned during gameplay or can (often alternatively) be purchased with real-world money.
MOG	Multiplayer Online Games
Non-continuous forms of gambling	Forms of gambling whereby the outcome of the game, or bet, is typically determined after the player has left the gambling environment and is no longer present to place a consecutive bet.
nMnP	Non-Māori, Non-Pasifika
PC	Personal Computer
Problem Gambling	When a person's gambling causes harm or may cause harm (New Zealand Gambling Act 2003)
Talanoa	A term in various Pasifika languages used to describe Informal discussion and conversation. A qualitative methodology was used in focus groups.
WHO	The World Health Organisation
Console	A device specifically designed for gaming, which is neither a smartphone, tablet, or computer.
Loot Box/Loot Crate	A particular type of microtransaction whereby virtual content within an online video game can be won by a person/player staking real or virtual currency. Upon doing so, a loot box will reveal its contents. This outcome is decided by chance. I.e. A person/player has no influence on what virtual content they will receive.
Gaming	The act of a person/player competing against a computer program or user(s) controlled by other people/players in a video game.
Online Gaming	The act of a person/player competing against a computer program or user(s) controlled by other people/players in an online video game. This can include browsing the internet for a video game.
Gambling	Staking an item of value or money on the outcome of a game or event that is decided by chance.
Problem Gaming	When the act of gaming causes harm or may cause harm to an individual.
Pasifika	A person who identifies with an ethnicity from Polynesia, Micronesia or Melanesia.



“THERE ARE GAMES
WHERE YOU GET
DAILY LOOT BOXES,
BUT THAT’S AN
INCENTIVE TO BRING
YOU BACK”

Introduction

This study aimed to understand the experiences of Pasifika Youth gamers and whether there is a relationship between gaming and gambling. This report outlines the findings of a Pasifika Youth Gaming and Gambling study conducted by Moana Research and Mapu Maia, who examined the question, "Are online video games a gateway to problem gambling among Pasifika youth."

The research objectives were:

- a. To explore the gaming behaviours of young Pasifika people/adults and financial transactions while gaming.
- b. To identify any possible links between gaming and gambling, including problem gambling.
- c. To identify/understand the needs of young people while gaming to prevent problem gambling.

This report is presented in 5 sections:

- » **Section 1: Research Approach:** Outlining the qualitative (focus group talanoa) and quantitative (online survey) methods, including the demographic characteristics of those who participated in the study.
- » **Section 2: Gaming behaviours of young Pasifika people and their views on financial transactions**
- » **Section 3: Possible links between gaming and gambling, including problem gambling**
- » **Section 4: Support and Prevention for gambling while gaming**
- » **Section 5: Summary and Conclusion:** The report concludes with a discussion of the findings, followed by key recommendations to inform future research and practice relating to Pasifika youth and gaming.

A photograph of two young men sitting on a couch, playing video games. The man in the foreground is wearing a black bucket hat with '1950' on it and a colorful patterned shirt. He is smiling and looking towards the right. The man in the background is wearing a plaid shirt and is also looking towards the right. The entire image has a blue color cast. Large purple quotation marks are overlaid on the bottom left and bottom right of the image.

WE DON'T HAVE MANY
ACTIVITIES FOR THE
YOUTH, SO GAMING IS
WHAT WE DO TOGETHER;
IT'S HOW WE INTERACT

Background

In 2016 Mapu Maia began exploring aspects of gaming and Pasifika youth. In 2018 findings of that preliminary unpublished study were presented to the DAPAANZ addictions sector Cutting Edge Conference (Berking et al (2018)). That initial study highlighted some areas of concern, notably that 35% of participants (n=57) who were active gamers worried about someone else's gaming, 24% of gamers were concerned about their gaming, 17% spent money to continue playing an online game that was initially free, and 45% spent money to obtain more mobile data after exhausting theirs.

In 2019 Mapu Maia contracted Moana Research to explore further gaming involving a larger number of Pasifika youth from across New Zealand.

As a Pasifika counselling provider, Mapu Maia offers clinical services and health promotion prevention programmes grounded in Pasifika models of health and community engagement processes. They also apply a clinical lens and social science-based analysis, which provides insights and perspectives on gaming and gambling with both a therapeutic and educational focus.

Keeping with a positive youth development strengths-based approach, the overarching goal of this research is to add to the knowledge pool which supports, as Muracher (2011) aptly states, 'young people to mature into safe and competent users of digital media.' This should include addressing the challenges this research has identified concerning problem gaming whilst acknowledging that there are benefits of gaming in terms of socialising when gaming activity is not excessive or leads to harm. Nevertheless, central concern should be healthy adaption to digital gaming and a wider social media environment in which children, young people and society are now immersed.

Gaming Problems

It is essential to distinguish the terminology on gaming and gambling from the outset.

The Gaming continuum ranges from non-problem gaming (non-regularly, regularly, and even excessively) to problem and addictive gaming at the other end. This report has utilised the criteria presented in the DSM 5 and ICD 11 but not for the purposes of advocating for a bio-psychiatric diagnostic system to address potential gaming harms. The description of behaviours and symptoms for problematic gaming within DSM-5 and ICD 11 provides some useful descriptive guidelines for assessing potential harm from a clinical perspective. These are also useful for consideration in the development of education prevention of perceived harms. However, considerable caution is needed concerning the potential for diagnostic labelling and over pathologizing (Billeux et al 2015). Billeux et al. research concludes that;

We would like to emphasize that the objective of the current paper was neither to minimize the obvious negative outcomes and psychological distress that can result from the dysfunctional involvement in specific activities, nor to refute the notion that these disorders can in some cases be conceptualized (and treated) as addictive behaviours. Nonetheless, our major aim was first to emphasize how everyday life behaviours tend to be too easily over pathologized and considered as behavioural addictions.

While the term Gaming Disorder is applied in this research, the less-loaded term Problem Gaming is intended. This also follows New Zealand's current approach to referring to Co-existing Problems CEP (Todd 2010) in the addiction sector rather than Co-existing Disorders. The term Gaming Disorder may lead to stigmatisation of those affected, an issue historically experienced by the Pasifika community for other morbidities in which they are highly represented including problem gambling. Poulton et al. (2020) further states;

There is a strong consensus existing among mental health professionals that the time is right for a paradigm shifts away from mental illness towards mental wellbeing and this in congruent with key findings of the He Ara Oranga.

Video gaming is a rapidly growing recreational activity (Peter, Ginley & Pfund, 2020). This can be attributed to the increased availability and accessibility to both devices and different forms of online gaming. For example, approximately 500 games are uploaded daily to the smartphone App Stores (Paschke, Austermann & Thomasius, 2020) with games specifically designed to address young people's interests and incorporate intermittent reward systems (Veissière & Stendel 2018).

Many young people engage in gaming activity in a controlled manner, without signs or symptoms of addiction, craving, or withdrawal (Montag & Reuter, 2015). However, research suggests that there is a growing proportion of young people who exhibit poor control over their desires to play online games (Przybylski, Weinstein, & Murayama, 2017).

In May 2019, GD was included in the 11th revision of the International Classification of Diseases (ICD-11) recognised as a diagnostic code, coming into effect in January 2022 (Paschke, Austermann & Thomasius 2020). Unlike the criteria for the DSM-5, in the ICD-11 the following broad categories concerning the on-/off-line gaming behaviour ("digital gaming" or "video-gaming") must be present for at least 12 months:

1. Impaired control over the behaviour.
2. Increased priority is given to video gaming-related activities to the extent that it takes precedence over other life interests and daily activities; and
3. Continued gaming behaviour despite adverse consequences, which must be associated with significant impairment in personal, familial, social, and/or other important areas of functioning (World Health Organization, 2018).

With an acknowledgment of GD/GP as a legitimate issue, recent literature draws an association between GD/GP with negative consequences, including physical and psychological disorders, social deficits, and/or poor academic performance that should be further explored (King & Delfabbro, 2018; Starcevic & Billieux, 2018)

Gaming and Gambling

Internationally, there is an increase in research based on the relationship between video gaming and certain types of electronic gambling such as slot machines and video lottery terminals due to their similar automated function, immersive experience, and prominent audio-visual elements (Wood et al. 2004).

Literature (Lorains et al. 2011) suggests that individuals with excessive involvement in either gaming or gambling have similar attributes, including higher rates of mental health problems, substance abuse, and executive functioning deficits (Ledgerwood et al., 2012). Research has also explored similarities between personalities between those who meet the criteria for GD and gambling disorder. These include higher rates of hostility and aggression, sensation seeking (Fortune & Goodie 2010), narcissism (Lakey et al. 2008), and propensity for boredom (Fortune & Goodie 2010).

In New Zealand, Abbott et al. (2018) identified a convergence of gaming and gambling and referred to the gambling-like elements in games (loot boxes) and the gaming-like elements in gambling. While research in this area is slowly growing in New Zealand, gaming and gambling are often approached separately, with a paucity of research on the relationship between gaming and gambling and how it is perceived by ethnic minorities such as those who identify as Pasifika.

Pasifika People in New Zealand

In New Zealand, there are over 20 ethnic groups under the umbrella term Pasifika, made up of people of Micronesian, Melanesian, and Polynesian ancestry. Pasifika peoples are the major ethnic group with the highest proportion of children (aged 0–14 years), at 35.7 percent compared to 19.6 percent European. Almost two-thirds of Pasifika people were born in New Zealand, with an increasing number of Pasifika people identifying with more than one ethnic group. Hence, the unique Pasifika cultures and their growing populations contribute to the multicultural fabric that makes up Aotearoa, New Zealand (Statistics New Zealand 2013).

A project that focuses on Pasifika peoples' gaming and gambling behaviours will provide much-needed knowledge and understanding of the issues for future generations and equip policy and practice with information to proactively curb and/or manage potential harm.

In 2016, before the propagation of Fortnite, Mapu Maia conducted focus groups with Pasifika youth aged 15-25. They found 74% of participants were also online gamers who were likely to play games such as "Pokemon Go," "Grand Theft Auto," "Call of Duty," "Candy Crush" or "Clash of Titans." Most of the gamers experienced pop-up notifications (both during and outside of game-play) asking them to either purchase in-game currency to extend their current play-session/avoid waiting for some aspects to time out and allow re-engagement, to purchase loot boxes/crates, or directly purchase DLC and other game-play related or cosmetic elements.

Those who did spend reported experiencing adverse effects afterward. The results also showed that Pasifika youth are constantly engaged with online services and are very aware of the online games available to them.

Given the evidence of Pasifika youth engaging in gaming and gambling at a young age (Bellringer et al., 2016), this report explores the propensity for gambling among Pasifika young people who engage in online gaming. Specifically, it investigates what Pasifika youth know about financial transactions described as loot boxes and micro-transactions and whether they can draw a connection between gaming and gambling. The report raises the question, are online video games a gateway to problem gambling among Pasifika youth? To address this question, a mixed methods research approach was used. This report will explore the qualitative and quantitative studies separately before drawing on similar and unique themes in the discussion section to answer the research question.

“WHEN YOU DON'T WANT TO DO ANYTHING ELSE, AND YOU GET ANNOYED AT BEING ASKED TO DO STUFF LIKE CLEAN YOUR ROOM AND STUFF LIKE THAT”



01

RESEARCH
APPROACH

A person is shown from the side, wearing large, black over-ear headphones. They are looking at a computer monitor which is partially visible in the foreground. The scene is dimly lit, with a blueish-purple color cast. The person's hair is dark and curly. The background is out of focus, showing what appears to be a desk or office environment.

“

STRESS IS OFTEN
CREATED BY
CONSTANTLY
LOSING AND BEING
EMBARRASSED IN
FRONT OF YOUR
FRIENDS.

”

Study 1: Qualitative Study

Research Approach

The study used a mixed-methods approach, made up of qualitative and quantitative research methods, both addressing the research question *“Are online video games a gateway to problem gambling among Pasifika youth?”*.

Eligible participants for both studies were youth:

1. Between the ages of 16 and 30 years inclusive,
2. Who had played video games within the previous 12 months

In the focus groups, participants had to identify with one or more Pasifika ethnicities; however, in the online survey, we allowed non-Pasifika participants for ethnic comparisons.

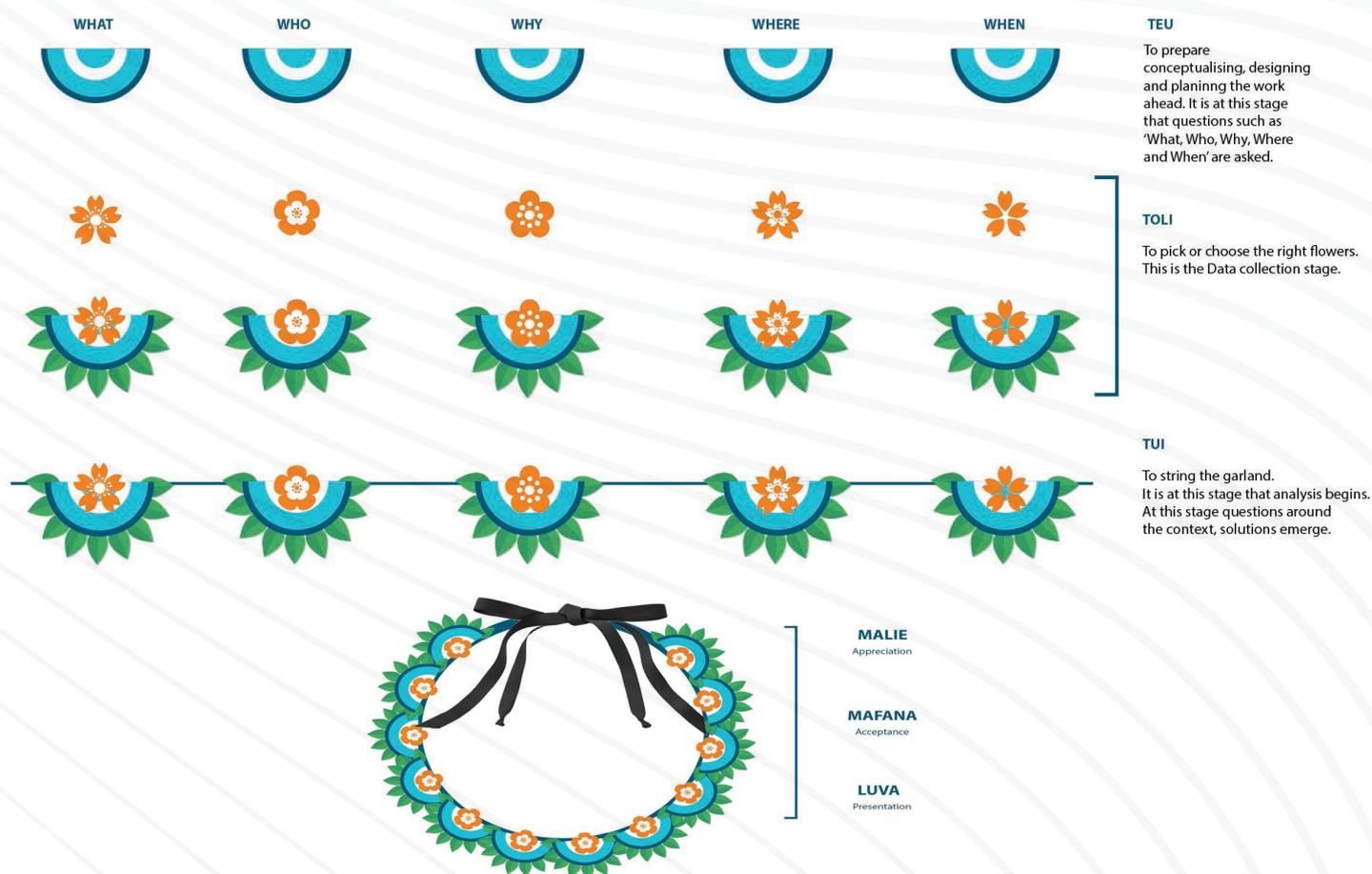
The research objectives of the study were:

- a. To explore the gaming behaviours of young Pasifika people/adults and the financial transactions that take place while gaming;
- b. To identify any possible links between gaming and gambling, including problem gambling; and
- c. To identify/understand the needs of young people while gaming to prevent problem gambling.

Design and Methods:

This project uses the Kakala framework (Figure 1) and talanoa methodologies.

Figure 1 Kakala Research Framework



Study 1 utilised the Kakala (Helu-Thaman 1992; Johansson-Fua, 2014; Taufe'ulungaki et al. 2008) and Talanoa (Vaiotei 2006) Pasifika research methodologies. The Tongan Kakala research framework uses the metaphor of developing a kakala, or a flower garland, for Pasifika research.

When making a garland, the weavers must prepare the designs for their kakala, gather the appropriate materials, complete the kakala as envisaged, then gift the kakala to the intended recipient.

There are five phases in the kakala framework, which include:

- 1. Teu** – to conceptualise what the garland will look like. This phase draws on the literature that currently exists and is where the research approach, methods, and tools are created.
- 2. Toli** – picking of flowers (information). This phase considers the process by which flowers (insights) are picked and gathered in the form of quantitative and qualitative insights.
- 3. Tui** – weaving the flowers together. Once insights have been gathered, analysis is conducted. This phase includes the writing up of progress reports and a final report
- 4. Luva** – gifting back - within Tongan culture, garlands are always made with the intent of gifting them to another. This phase will note the key findings in a report.
- 5. Mālie** - the acceptance of the report and its key recommendations

The Pasifika qualitative methodology of Talanoa was also used for the focus groups. In many Pasifika languages, including Samoan and Tongan, talanoa refers to informal discussion and conversation, with tala meaning to talk, and noa meaning ordinary. Talanoa has been widely used with different Pasifika ethnicities and allows for discussion of ideas, sharing of knowledge, and understanding of Pasifika perspectives in a comfortable, culturally familiar setting. While the purpose of the conversation is always made clear at the beginning of any talanoa, the discussion is encouraged to expand beyond the borders of expected conversation.

This has allowed Pasifika participants engaged in the Talanoa to take ownership of the discussion, and for the facilitator of the discussion to explore areas of the Talanoa that have become important during the focus group. These methodologies have ensured a culturally appropriate, in-depth approach to data collection and analysis with Pasifika participants.

As facilitators, understanding cultural and social context is pivotal in drawing insights. Moana Research is a Pasifika-owned, Pasifika-governed, and Pasifika-led research company. Moana Research's work approaches are premised on values, and we believe in the importance of these values in achieving positive actions. The three critical steps in our approach are engagement, exchange, and action (Appendix 1). These value-based actions form the premise by which the talanoa takes place.

It was also essential to have a clinician from Mapu Maia on-site during the Talanoa if participants had any questions or sought support based on gaming or gambling harm. Throughout the report, these clinicians were also drawn on for their clinical expertise on the subject matter (gaming and gambling).

This study also incorporated Mapu Maia Va Tagata model (Appendix 2) as a methodological guide to drawing on existing relationships already forged within the community. The Va Tagata model of engagement qualifies the rationale for prevention and talatalanoa- (counselling), demonstrating how culture and care connect. It places great weight and importance on developing and maintaining relationships in the Pasifika context. The cultural reference acknowledges the person/family's position, status, and mana. Maintaining respectful relationships is a fundamental cultural belief that exists throughout Pasifika cultures. Va can literally mean 'space' – not the space that divides, but the space that connects. Va Tagata focuses on the engagement process and incorporating both Pasifika cultural values in all aspects of service delivery. Establishing rapport and trust is vital to building meaningful connections within the dynamic multigenerational social-cultural contexts of our communities which involves significant tacit knowledge of our customary traditional and contemporary cultural lives.

Development of Research Tools & Ethics Approval

Interview questions were developed collaboratively by Moana Research and Mapu Maia (see Appendix 3).

The participant information sheet, consent form, and demographic information sheets (Appendix 3) were submitted for approval by the New Zealand Health and Disability Ethics Committee, which was obtained for this research titled "Are online video games a gateway to problem gambling among Pasifika youth?" (19/NTB/149) on 13 December 2019 (Appendix 4).

All participants were assured of anonymity and informed that a clinician would be on-site during each focus group (FG) if needed. Therefore, the names provided in the interview analysis are not included.

Recruitment

Purposeful sampling from the Mapu Maia community networks was used to identify Pasifika youth and young adults between the ages of 16 and 30 years living in New Zealand who had played online games within the previous 12 months. Mapu Maia and Moana Research were assisted by key contacts within these networks with pre-vetting to ensure all focus groups participants were active online gamers and the correct demographic. This process was used for both the North and South Islands of New Zealand.

Data Collection

From 18 November to 13 February 2020, seven focus groups were conducted in Auckland (x2), Porirua (x1), Levin (x1), Christchurch (x1), Timaru (x1), and Dunedin (x1). During the development phase, the perspective of Pasifika young people in the regions and the South Island needed to be taken into consideration, which is why the specific locations in the Cities and Regions were targeted (Table 1).

Table 1 Focus Groups

Location	Date	Number of Participants
Auckland	18 November 2019	8
Auckland	4 December 2019	12
Porirua	4 February 2020	10
Levin	5 February 2020	10
Christchurch	11 February 2020	12
Timaru	12 February 2020	13
Dunedin	13 February 2020	10
Total		75

“ALL I NEED IS WIFI,
AND THEN WE CAN
CONNECT WITH OUR MATES”

A total of 75 Pasifika young people participated in the focus groups. Of those who attended, 28/75 (37%) were female, and 47/75 (63%) were male (Table 2). The uneven gender distribution was used to reflect international findings, which suggest that male online gamers are more likely to develop GD than female gamers (Borgonovi, 2016) and that male adolescents are more likely to play video games compared to female adolescents (Desai, Krishnan-Sarin, Cavallo, & Potenza, 2010).

Although the recruitment criteria sought Pasifika young people aged 16 to 30 years, the age distribution ranged from 16 to 25 years old, with the median age of participants being 18 years. When broken down by ethnicity, 44 participants (59%) were Samoan, 19 Tongan (25%), 6 Cook Island Māori (8%), 5 Niuean (7%), and 1 Fijian (1%).

At the beginning of each focus group, each participant was asked if they would consent to have their pictures taken (for reporting purposes) and for the talanoa to be audiotaped. Focus groups were undertaken at a location commonly used for community gatherings (e.g., community halls, church halls, and community centres) where young people felt comfortable sharing. To ensure that focus groups were consistent with Pasifika customs/obligations, prayers were offered before and after the focus group and discussion, and food was provided to participants. Attendees received a koha (Pak N Save voucher) in appreciation of their contribution of time and knowledge.

Table 2: Focus groups - Participant Demographics

	Number (=n)	%
Region		
Auckland Region	20	27
Wellington Region	20	27
South Island	35	47
Gender		
Male	47	63
Female	28	37
Ethnicity		
Samoan	44	59
Tongan	19	25
Cook Island Maori	6	8
Niuean	5	7
Fijian	1	1
Age Group		
16-18 years	38	51
19-21	26	35
22-24	10	13
25+ years	1	1

Data Analysis

Data were transcribed verbatim, entered into the NVivo 11 software program, and analysed using a general inductive approach. This approach is used to develop meaningful thematic categories from raw qualitative data, determined by both the research objectives and repeated readings and interpretations of the data. There are thus both deductive and inductive aspects.

This analysis method is advantageous because it establishes clear links between the research objectives and the summary findings derived from the raw data to ensure these links are both transparent (able to demonstrate to others) and defensible (justifiable given the research objectives).

The themes included in this report are those consistently noted across all the seven focus groups and are highlighted in the findings section.

Study 2: Quantitative Study

The quantitative portion of the study came in the form of an online survey that was designed in collaboration between Moana Research and Mapu Maia. The objectives of the quantitative component of the study were:

1. To quantify the gaming behaviours of young Pasifika people/adults and financial transactions that take place while gaming;
2. To identify any possible links between gaming and gambling, including problem gambling; and
3. To understand any needs of young people while gaming to prevent problem gambling from developing.

Design and Methods

The quantitative component of the project was undertaken through an online survey, completed via smartphone, laptop, or other digital devices with access to the internet.

Playing gaming in the past 12 months was a filtering criterion in the online survey, and eligible participants were sampled through existing Pasifika networks with the help of Dioscuri, a digital consultancy group, which were subcontracted to develop and design the online survey in a youth-engaging manner. Young people/adults aged 16 – 30 years were targeted, and those who identified with one or more Pasifika ethnicities were targeted online and invited to participate in the survey. Additionally, online promotions through Facebook and other social media platforms such as Twitter and Instagram were used to recruit young people/adults. Participants were also asked at the start of the online survey to tick the approval box consenting to use their information and were guaranteed anonymity.

The development of the survey began before the completion of the focus groups; however, themes from study 1 (focus groups) were used to inform questions included in study 2 (online survey). Meetings were held to discuss relevant questions mapped to the study's objectives, and once the key themes emerged from the analysis of the qualitative research, these questions were refined.

Questions that were shaped by focus group findings included:

- » In the last 6 months, did you play games to forget about real life?
- » In the last 6 months, have others unsuccessfully tried to reduce your game use?
- » In the last 6 months, did you have fights with others (eg family, friends) over your time spent on games?
- » In the last 6 months, have you neglected other important activities (eg school, work, sports) to play games?

A total of 32 questions were confirmed for the final survey, and demographic and COVID-19-related questions were also included. The survey was piloted with young people internally across Moana Research, and Mapu Maia, and amendments were made in response to feedback. The survey was opened on 21 April and disseminated via social media (Facebook, Instagram) and via email link. The survey closed on 30 June 2020.

Demography

A strength of the survey has been its large overall sample size (n=828), which included Pasifika representation of 402 respondents (Figure 2). The use of a reference group “non-Māori, non-Pasifika” (nMnP) (n=426) allowed for a comparison of variables to test whether there are variations in gaming and gambling behaviour based on ethnicity. As a research team, we chose not to include Māori in the reference group because their socioeconomic characteristics are similar to Pasifika. It was important to use a reference group that reflected mainstream New Zealand.

In New Zealand, over 18 ethnic groups fall under the umbrella term Pasifika (ethnicity at level 1). The number of Pasifika respondents in the study allowed for exploring ethnicity at level 2 (Pasifika-specific ethnicity). When broken down by Pasifika-specific ethnicity, 50% of Pasifika respondents identified as being of Samoan ethnicity, 20% Cook Islands Māori, and 15% Tongan (Figure 3)

Figure 2 Total response for ethnic breakdown of those who responded to the survey

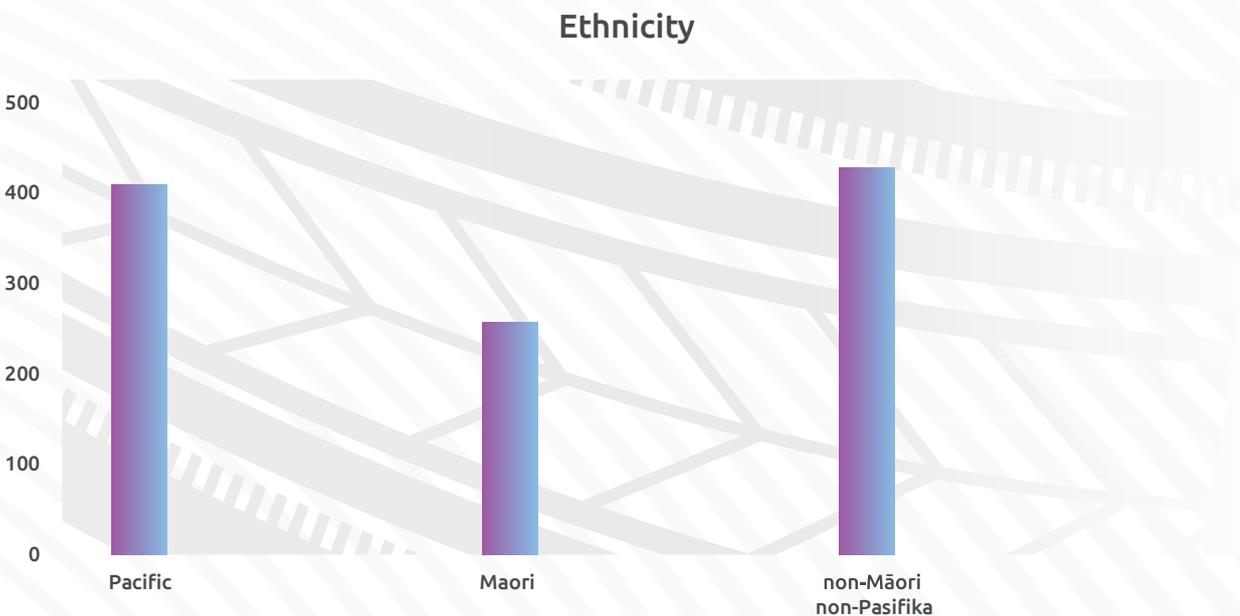
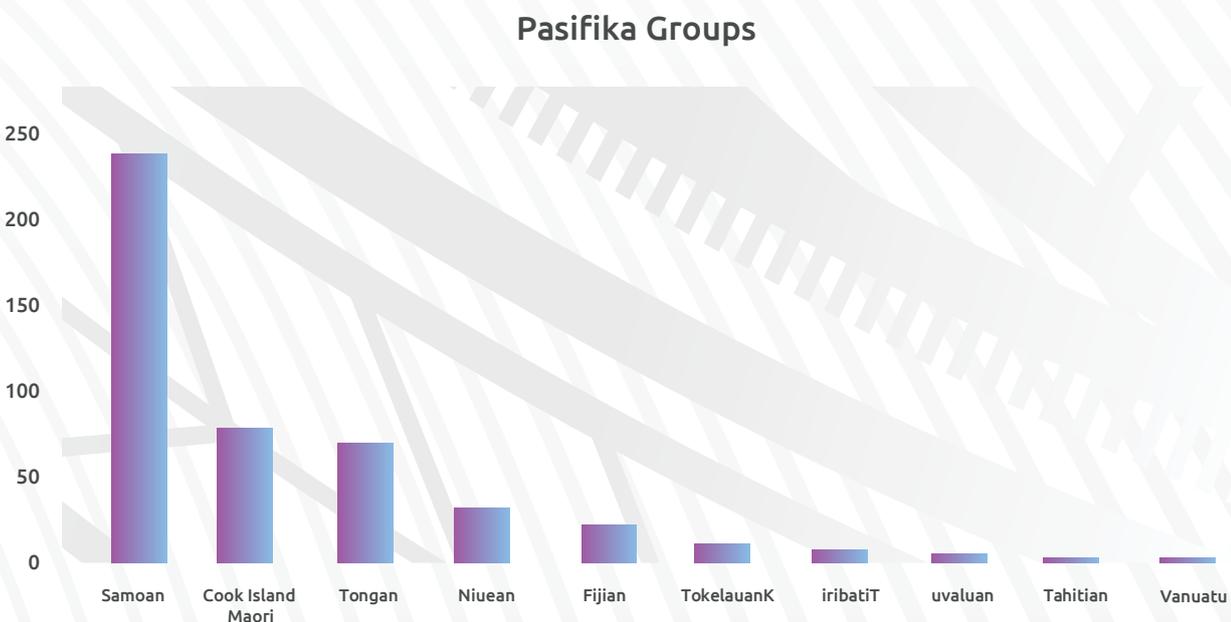


Figure 3 Total response for Pasifika Ethnic-specific breakdown of those who responded to the survey



The demographic breakdown within the survey highlights differences based on gender and age. For example, 653 (78.9%) respondents were male compared to 162 (19.6%) females. The median age of respondents was 20 years, with respondents being between the ages of 16 and 30 years inclusive. The demographic information captured in the survey also included whether they were born in New Zealand, income, and occupation status.

Pasifika vs non-Māori, non-Pasifika Comparison

Table 3 compares the Pasifika group with a reference group of non-Māori, non-Pasifika (nMnP) to gauge whether there were any differences. On average, the Pasifika group was two years older than their non-Māori, non-Pasifika counterparts, and the total numbers for both groups were similar: 402 for Pasifika and 426 for nMnP.

Table 3: Pasifika vs non-Māori, non-Pasifika (nMnP) demographics

Demographic	Pasifika		nMnP		Total		p-value
	N	(%)	N	(%)	N	(%)	
Total	402	(48.6%)	426	(51.4%)	828	(100%)	0.404
Median age in years, (IQR)	21	(18-26)	19	(17-24)	20	(17-25)	N.A.
Gender							
Male	292	(72.6%)	361	(84.7%)	653	(78.9%)	
Female	102	(25.4%)	60	(14.1%)	162	(19.6%)	
Prefer not to say/other	8	(2.0%)	5	(1.2%)	13	(1.6%)	<0.0001
NZ born							
Yes	326	(81.1%)	328	(77.0%)	654	(79.0%)	
No	76	(18.9%)	98	(23.0%)	174	(21.0%)	0.148

NOTES: IQR= inter-quartile range=75% percentile-25% percentile

NA=not applicable, *p-value comparison between Pasifika vs. nMnP

Table 4 Income per week after tax.

	Pasifika (n=402)	nMnP (n=426)	Total (n=828)
Income weekly (NZ\$)	col% (n)	col% (n)	col% (n)
\$0 - \$200	5.5% (22)	10.1% (43)	7.9% (65)
\$200 - \$400	7.0% (28)	8.0% (34)	7.5% (62)
\$400 - \$600	10.2% (41)	8.2% (35)	9.2% (76)
\$600 - \$800	13.9% (56)	9.9% (42)	11.8% (98)
\$800+	11.4% (46)	8.9% (38)	10.1% (84)
Don't know or prefer not to say	15.4% (62)	7.3% (31)	11.2% (93)
Not a student (no income)	11.4% (46)	13.4% (57)	12.4% (103)
Student (no income)	25.1% (101)	34.3% (146)	29.8% (247)

In an exploration of income per week, Pasifika respondents were more likely to earn \$400+ per week (35.5%) compared to nMnP (27.0%), and nMnP (47.7%) were more likely to not have an income compared to Pasifika (36.5%) (Table 4). The percentages are obtained by combining the bottom two rows of Table 4 (not a student, and student).

When examining the employment status of participants in the survey Pasifika (35.9% vs. 26.0%) were more likely to be in full-time employment, whereas nMnP (55.4% vs. 42.0%) were more likely to be studying (Table 5).

Table 5: Occupation of gamers by ethnic group.

	Pasifika (n=393)	nMnP (n=419)	Total (n=812)
Occupation	col% (n)	col% (n)	col% (n)
I'm a student	42.0% (165)	55.4% (232)	48.9% (397)
I'm full-time employed	35.9% (141)	26.0% (109)	30.8% (250)
I'm on a benefit (e.g., disability, unemployment, etc.)	3.6% (14)	4.5% (19)	4.1% (33)
I'm part-time employed	12.5% (49)	9.3% (39)	10.8% (88)
I'm unemployed	4.6% (18)	2.9% (12)	3.7% (30)

02

GAMING BEHAVIOURS OF
YOUNG PASIFIKA PEOPLE
AND THEIR VIEWS
BASED ON FINANCIAL
TRANSACTIONS.

Time Spent “Gaming”

On average, 23.5% (n=83) of respondents who identified as Pasifika, spent six hours or more gaming in one session compared to 16.4% (n=61) of nMnP (Table 6). Furthermore, nearly half (44.2%) of all respondents ‘gamed’ daily (Table 7)

Table 6 Time spent playing online games in one session

	Pasifika (n=352)	nMnP (n=373)	Total (n=725)
Time spent playing in one session	col% (n)	col% (n)	col% (n)
15+ hours	2.8% (10)	1.9% (7)	2.3% (17)
11 - 15 hours	2.8% (10)	2.7% (10)	2.8% (20)
6 - 10 hours	17.9% (63)	11.8% (44)	14.8% (107)
2 - 5 hours	65.1% (229)	74.5% (278)	69.9% (507)
Less than 1 hour	11.4% (40)	9.1% (34)	10.2% (74)

Table 7: Frequency of playing games.

	Pasifika (n=319)	nMnP (n=346)	Total (n=665)
Frequency of playing games	col% (n)	col% (n)	col% (n)
Every day	43.3% (138)	45.1% (156)	44.2% (294)
4 or 5 times a week	30.4% (97)	31.8% (110)	31.1% (207)
2 or 3 times a week	19.4% (62)	16.5% (57)	17.9% (119)
Once a week	3.8% (12)	1.7% (6)	2.7% (18)
Less than once a week	3.1% (10)	4.9% (17)	4.1% (27)

Variations were also seen based on time spent playing and gender. For example, for Pasifika, males played online games significantly longer (15+ hrs) per week than females, 29.7% [95% ci, 24.1%-35.3%] versus 14.8% [95% ci, 7.4%-22.2%] respectively (Table 8). In other words, the proportion of males playing 15 or more hours per week was about double that of females. For non-Māori, non-Pasifika, these proportions were similar for males and females (Table 9): males 26.2% [95% ci, 21.4%-30.9%] vs females 20.9% [95% ci, 8.8-33.1%].

Table 8 Pasifika: weekly time spent playing online games

Weekly time spent gaming	Female n (col%)	Male n (col%)	Total n (col%)
15+ hrs per week	13 (14.8%)	76 (29.7%)	89 (25.9%)
<15 hrs per week	75 (85.2%)	180 (70.3%)	255 (74.1%)
Total	88 (100%)	256 (100%)	344 (100%)

Note: Testing the difference between gender (p=0.0058)

Table 9 nMnP: weekly time spent playing online games

Weekly time spent gaming	Female n (col%)	Male n (col%)	Total n (col%)
15+ hrs per week	9 (20.9%)	85 (26.2%)	94 (25.5%)
<15 hrs per week	34 (79.1%)	240 (73.8%)	274 (74.5%)
Total	43 (100%)	325 (100%)	368 (100%)

Note: Testing the difference between gender (p=0.46)

“

YOU EITHER BUY
IT OR YOU CAN
EARN IT.

”



Although there were differences based on gender, there was no association between age and gaming time (Table 10). Nevertheless, around a quarter of gamers spend 15 hours or more gaming per week, irrespective of their age.

Table 10 Age Group vs Time spent gaming

Age Group (years)	Gaming time (%)
≤ 20	27.5%
21-30	24.1%

Gaming During the First COVID-19 Lockdown

Increased time and money spent playing online games

The time in which the survey went live allowed the addition of questions relating to experiences during New Zealand's Covid-19 lockdown. During the first Covid-19 lockdown in March 2020, 42% of survey participants increased their financial spending on online games, 32% stayed about the same, and 26% reduced it.

Of those who indicated they had increased their playing of games, 39% played at least 4 hours extra per day, 18% for 3 hours, 29% playing for 2 extra hours, and 15% for 1 hour (Table 11).

Pasifika respondents indicated that 39.6% of those in lockdown spent more than 4 hours a day extra playing computer games compared to 37.7% for non-Māori, non-Pasifika, though this was not statistically significant.

Table 11 During COVID-19 lockdown: extra hours spent playing online games per day.

	Pasifika*	nMnP	Total
Extra time spent playing games	%	%	%
1 hour	14.6%	15.1%	14.9%
2 hours	25.0%	32.1%	28.7%
3 hours	20.8%	15.1%	17.8%
4+ hours	39.6%	37.7%	38.6%

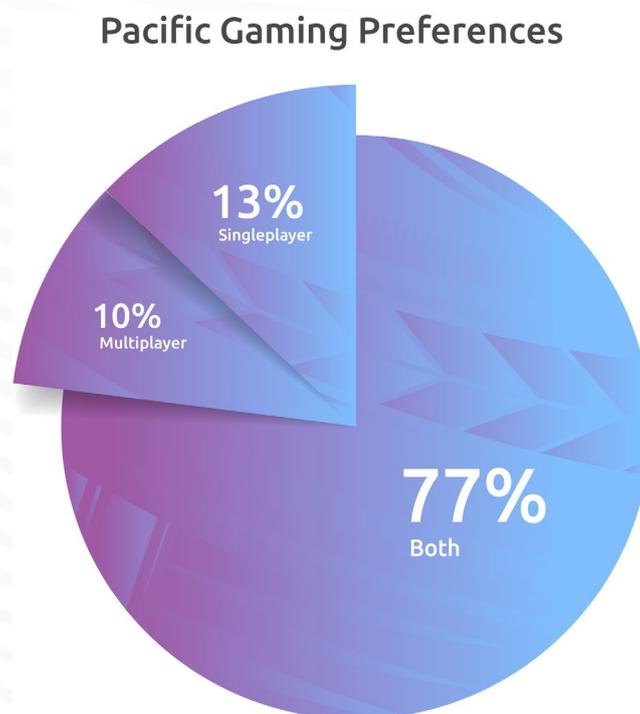
* Pasifika vs nMnP was not statistically significant (p=0.82).

Game Preferences (Multi-player vs Single-player)

Multiplayer Online Games (MOG) are games in which multiple players can simultaneously play in the same online game environment. This differs from single-player Online Games where only one person can play at a time.

In the online survey, participants were asked about their gaming preferences. Most Pasifika respondents (77%) played both single and multiplayer games. This is compared to 13% who played single-player-only games and 10% who played Multiplayer only games (Figure 4). These percentages were nearly identical to nMnP and highlighted the importance of not assuming players only play either single-player or multiplayer games.

Figure 4 Gaming preference (single player vs multi player) for Pasifika participants



In the 'online survey', participants were asked to name their top three favourite games to play. Findings suggest that irrespective of ethnicity, the Call of Duty (COD) franchise was the most popular online game, with Fortnite second and NBA 2K franchise or Grand Theft Auto (GTA) third (Table 10).

Table 12: Most popular games played.

Rank	Pasifika	nMnP	Total
1	Call of Duty (27.9%)	Call of Duty (21.6%)	Call of Duty (24.6%)
2	Fortnite (22.6%)	Fortnite (11.5%)	Fortnite (16.9%)
3	NBA 2K (7.5%)	GTA (7.3%)	GTA (6.2%)
4	GTA (5.0%)	Rainbow Six Siege (4.5%)	NBA 2K (4.6%)
5	PUBG (3.5%)	Apex legends (3.3%)	Apex Legends (3.0%)

During the focus groups, participants worked in small groups and were allocated two minutes to identify all the games they had played regardless of device. They were then asked to rank the games and list the three most popular games played today (Table 11).

Table 13 Three most popular online games

Focus Group Location	Game 1	Game 2	Game 3
Auckland FG 1 (a)	Fortnite	PubG	League of Legends
Auckland FG 1 (b)	Fortnite	PubG	COD
Auckland FG 2 (a)	Fortnite	League of Legends	PubG
Auckland FG 2 (b)	Fortnite	PubG	COD
Porirua (a)	Fortnite	NBA 2K	COD
Porirua Boys (b)	Fortnite	COD	PubG
Levin (a)	Fortnite	PubG	COD
Levin (b)	Fortnite	NBA 2K	COD
Christchurch (a)	Fortnite	NBA 2K	COD
Christchurch (b)	COD	Fortnite	PubG
Timaru (a)	Fortnite	COD	PubG
Timaru (b)	Fortnite	GTA	NBA 2K
Dunedin (a)	COD	Fortnite	Minecraft
Dunedin (b)	COD	NBA 2K	Fortnite
Dunedin (c)	COD	Fortnite	NBA 2K

Overall, the three most popular games were 1. Fortnite, 2. COD and 3. PubG/NBA 2K. These results aligned with the survey results, which identified Call of Duty and Fortnite as the most popular games played. Both Fortnite and COD are of the Battle Royale genre, where multiple people can play simultaneously on different platforms, whether PlayStation, Xbox, phone device, or PC. These games have millions of players, and the battles take place on maps of up to 150 players.

Pasifika young people were then asked why these games were popular. Participants noted that all three games fall into the multiplayer player gaming category.

Reasons for Gaming

During the focus groups, participants were asked why they played. The three most common reasons were a) for social connections, b) for the features in the game, and c) driven by the ease of access via mobile phones. These are three themes that have been widely documented with their ability to motivate young people to game.

In the focus groups, it was essential to probe discussion around the social aspects of gaming, features, and access to gaming and gambling because Pasifika young people were able to draw connections between motives to game and gamble for themselves.

The Social Aspect

For the Pasifika young people who participated in the Focus groups, playing with friends was a common incentive for gaming online and was mentioned by participants throughout the regions and cities. Another social aspect of gaming was being part of a team and/or challenging other people from various places. Consequently, online interactions were considered a form of socialisation and staying connected to peers. Participants noted:

- » You can play with your friends. So, the online factor is huge. Being part of the team (Auckland FG 1).
- » You can play with your mates. That makes it way more fun. You can also play longer (Auckland FG 2).
- » You're playing with your mates, so there's the social part to it that makes it fun (Levin).
- » You can play with heaps of people. Being able to play with your friends is fun (Dunedin).
- » It's fun because you're playing with teams and they're people that you know (Timaru).
- » I think the social aspect definitely, the competitiveness of it and winning is also appealing (Christchurch)
- » There's a social buzz to it. It's more than just yourself, it's you against the computer or you against strangers. It's fun when you can talk to your mates while you're playing, it's a part of socialising for us younger ones (Porirua).
- » It's trendy, so if someone else is playing, you want to (Auckland FG 2).

The features in the game

International research suggests that game realism is used to explain the motivational aspects and attractions of gaming (Shafer, Carbonara, & Popova, 2014). For example, a more realistic game is experienced as more authentic, resulting in higher degrees of immersion (Ribbens & Vanden Abeele, 2008)

In the study, the features in a game were an incentive to game among Pasifika youth. Interestingly, shooting games are prevalent; and having a diverse range of weapons is considered a sign of a good game. Gamers who gamed almost daily noted difficulty levels in which skills are required, usually acquired through time invested in gaming. The speed of play and coming back into a game were also acknowledged, with youth aware that games are developed and marketed by people who have researched youth and know what they want in a game.

- » It's the shooting, the shooting, and playing in teams (Auckland FG 2).
- » I think it's the type of game, shooter games (Timaru).
- » You can kill things and shoot things (Dunedin).
- » The different types of guns you can get (Dunedin).
- » There's the violent element – they're all first-person shooter games (Christchurch).
- » There are different levels of difficulty, so there is a certain skill involved in playing, and you can only test it out if they keep adding new features (Levin).
- » When you can unlock new things, if there is a reward pathway the better you play (Porirua).
- » The speed of play – like you're in the lobby and then back in the game (Levin).
- » It is marketed for us and the designers; they're not stupid; they know exactly what we want (Levin).

Access

Being able to interact with peers both locally and internationally, contributing to a team setting in a forum where the graphics are realistic, and easy access without features lagging were reasons why Pasifika youth continued gaming. They note:

- » They're easy to access, you can download on the phone, console, or any device, and it's free (Auckland).
- » If access isn't an issue it makes it more popular (Christchurch).
- » All we need is wifi, and then we can connect with our mates (Timaru).

Device of Preference

Irrespective of ethnicity, the device of choice was the console, with most (79%) Pasifika gamers preferring to play on a console, followed by a phone/tablet (55%) and lastly, a personal computer (PC) (18%). This pattern (preference for console) was also identified among the other ethnic groups (Figure 5).

Preferred Device by Ethnicity

Figure 5: Preferred Device by ethnicity.

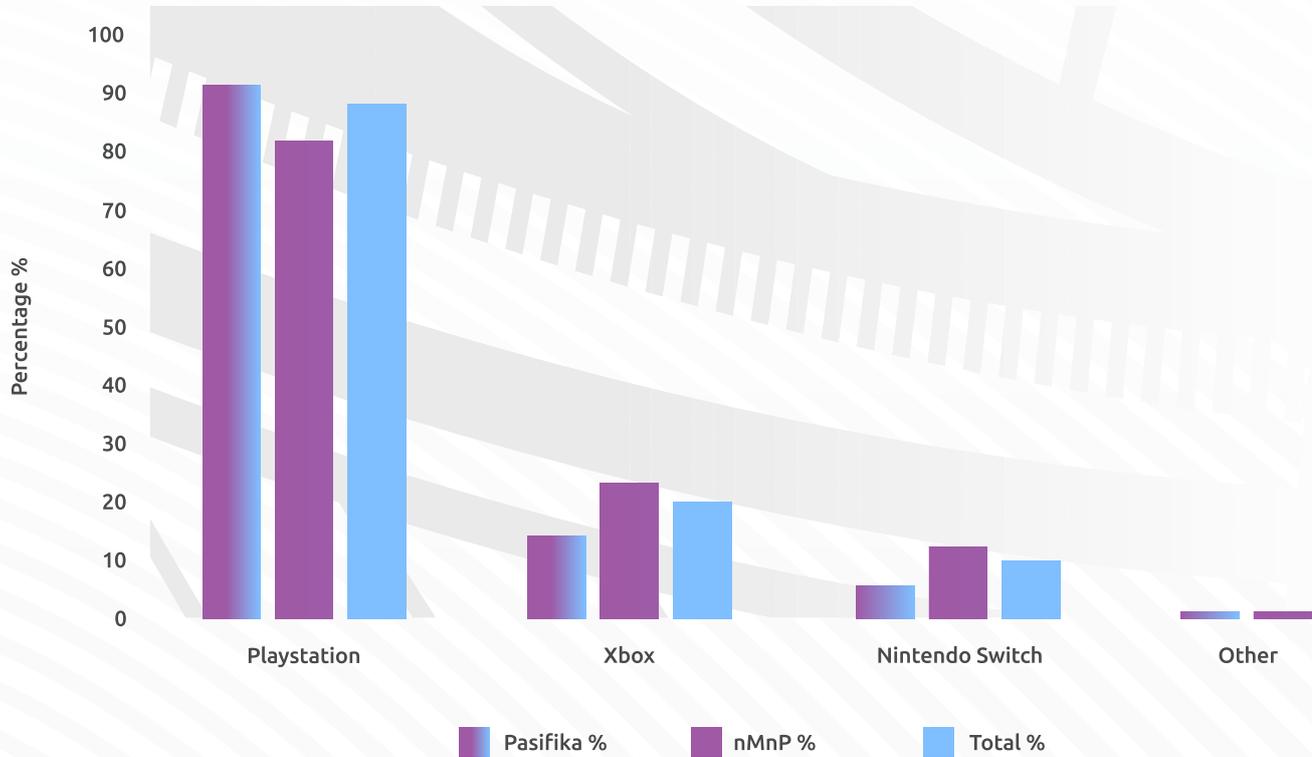


Generally, most gamers who have a console, use a PlayStation (88%), followed by an Xbox (20%) and Nintendo/Other (10%). However, Pasifika gamers use PlayStations more (93%) than non-Māori, non-Pasifika does (83%) and Xbox less (15% for Pasifika) than nMnP (25%) (Figure 6).

During the focus group talanoa, participants were also asked about their device of preference, which showed variations based on region, gender, and game activity. In most of the focus groups (5/7), the device of choice for females was their phones, excluding the focus groups held in Levin and Dunedin, where most of the female participants were still in High School and preferred consoles.

Console by Ethnicity

Figure 6: Console usually used by ethnicity.



The female participants preferred phones, where they noted their mobility, easy access, and availability as being reasons for preference. Participants noted:

- » The phone definitely, because everyone has a phone and wifi is all you need which isn't hard to find. You can just reach into your pocket and play you know (Auckland FG 1).
- » Phones are more popular because nearly everyone has a phone, not everyone has a ps4 (Porirua).
- » I prefer the phone because I don't have a console (Auckland FG 2).
- » It's accessible and you take it everywhere (Timaru).
- » It's always with you like you just reach into your pocket and it's there (Christchurch).

For the male participants, consoles were their preferred device of choice irrespective of age or region. The reasons why consoles were preferred included the larger screen size, which was viewed as making the game more realistic. For regular players, the controller attached to the console was functionally easier to use, and consoles provided the opportunity to have more players on board:

- » It's better looking straight ahead at a large screen rather than looking down (Christchurch).
- » The size of the screen makes it more realistic to play, and you want to play (Porirua).
- » If you look at the tv, it's like you're in the game; it's much bigger, you know (Dunedin).
- » Because it's easier, the controllers for a console are better to use. It makes playing more fun (Levin)
- » Consoles are way more fun – you get to play with heaps more other people and the functions are just better (Auckland FG 2).
- » Console games, you've got more players (Timaru)

For both male and female participants, to be accessible, devices must allow for social interaction in real-time, provide realistic features, and be easily accessible to all.

Financial Transactions

Loot boxes – Survey data

A loot box refers to an in-game reward system that can be purchased repeatedly with real money to obtain a random selection of virtual items. The low probability of obtaining the desired item means that the player will have to purchase an indeterminate number of loot boxes to obtain the item. Studies have noted that loot boxes resemble gambling slot machines because they require no player skill and have a randomly determined outcome (i.e. prize)(Nettleton & Chong K, 2013). In both the online survey and focus groups, participants were asked questions relating to loot boxes.

In the online survey, 66% of Pasifika participants (266 persons) knew what loot boxes were compared to 34% (136 persons) who did not. For nMnP the corresponding figures were 81% (343 persons) and 19% (83 persons) respectively. Of the 266 Pasifika participants who were familiar with loot boxes, 72 (27%) purchased loot boxes compared to 99 (22%) nMnP.

It seems that significantly less Pasifika knew what loot boxes were compared to non-Māori, non-Pasifika ($p < 0.0001$). This might be because loot boxes are hard to define and to some gamers there is significant overlap between the terms micro-transactions, in-game purchases, DLC (Downloadable Content), and loot boxes, confusing them as to their real definition.

Pasifika respondents also spent significantly more on loot boxes than nMnP with approximately 22% of Pacific respondents spending more than \$20 per month on loot boxes compared to 10% of nMnP (Table 14).

Lootbox Spend per month

Figure 7: Money spent buying loot boxes per month



Table 14 – Money spent on loot boxes per month by ethnic group

	Pasifika (n=72)	nMnP (n=77)	Total (n=149)
Dollars	n (col%)	n (col%)	n (col%)
0	19 (26.4%)	27 (35.1%)	46 (30.9%)
1-5	6 (8.3%)	11 (14.3%)	17 (11.4%)
5 - 10	9 (12.5%)	16 (20.8%)	25 (16.8%)
10 - 15	13 (18.1%)	8 (10.4%)	21 (14.1%)
15 - 20	9 (12.5%)	7 (9.1%)	16 (10.7%)
20+	16 (22.2%)	8 (10.4%)	24 (16.1%)

To understand if there were variations in spending based on gender, the analysis found that high spending (>\$20 per month) on loot boxes was similar between males (25%) and females (12.5%) (Fisher's Exact $p=0.334$). A higher proportion (30%) of older gamers (20+ years) spent more money on loot boxes than those aged <20 years (11%), as shown in Table 15.

Table 15 Pasifika High spending (\$20 or more a month) on loot boxes by age group.

Age Group (years)	High Spender (%)	Not a High Spender (%)
≤ 20	10.7%	89.3%
20-31	29.6%	70.4

P=0.083 Fisher's Exact test

When examining reasons why participants bought loot boxes, irrespective of ethnicity, the most common reason was wanting a rare item in the game (Table 16). This was followed by having fun, the hopes of progressing further through the game, and getting an advantage in the game were all significant reasons too. This highlights a link between gaming and gambling in that the motives for both gaming and gambling are near identical.

Table 16: Reasons for buying a loot box

	Pacific (n=72) col% (n)	nMnP (n=77) col% (n)	Everyone (n=149) col% (n)
1. Because I wanted a rare item in the game e.g. a weapon, skin, XP	65.3% (47)	70.1% (54)	67.8% (101)
2. Because it would help me get further through the game	22.2% (16)	23.4% (18)	22.8% (34)
3. Because it seemed like fun	25.0% (18)	24.7% (19)	24.8% (37)
4. Because it would give me an advantage in the game	20.8% (15)	16.9% (13)	18.8% (28)
5. No reason, I just wanted to win something	16.7% (12)	11.7% (9)	14.1% (21)
6. Other	2.8% (2)	1.3% (1)	2.0% (3)

* column percentages will sum to greater than 100% because respondents could choose more than one reason.

In the focus groups, facilitators explored how familiar participants were with the term “microtransactions” (see glossary for definition). Microtransactions are a business model where users can purchase virtual goods with micropayments (Nettleton & Chong K, 2013). Microtransactions are often used in free-to-play games to provide a revenue source for the developers.

During the focus groups, participants were shown examples of microtransactions and asked if they knew what they were. In all seven focus groups, participants were aware of skins and loot boxes, and that payment was required to purchase items but were not necessarily familiar with the term microtransactions.

When asked, “what is downloadable content (DLC)?”, participants were not too sure of what they were until they were shown visuals of DLC, shown through PowerPoint. Participants associated downloadable contents with additional features of a game that a gamer must purchase because they are not in the game’s original design, rather are designed to make the game “better.”

- » Can I take a guess? it’s things you can buy to add to a game? (Auckland FG 1)
- » It’s an additional feature to the game; it might be a new level that they’ve added to the game (Auckland FG 2)
- » Things that you can buy to make the game bigger and better, like extra levels that the makers make (Porirua).
- » You pay for it; it’s like extras in a game (Dunedin).
- » It’s like the stuff you can’t get on the actual games, so you pay money to add them onto the game. They’re pretty much add-ons, so levels are always being added on (Porirua).

There was also an awareness that downloadable content could be purchased with money or acquired over time. Participants across the Focus groups acknowledged social pressures for getting the downloadable content to keep up with peers. Consequently, the youth had to spend money or play daily, which created problems for some of those who took part in the study, with one having to give his console away because his family noticed the vast amount of time he was spending on it and changes in his mood and behaviour.

- » You either buy it, or you can earn it. It’s like \$10.00 but if you want to unlock it then you have to earn enough points to get it, and that means winning all the time and spending time, usually hours on end to try and earn the points (Levin).
- » It’s like a battle pass, they introduce one every month and you have to buy it if you want it. You don’t have to buy it, but everyone buys it, and if you don’t want to be the guy being left behind because everyone is moving on to the next level you buy it or you have to earn tiers, but that means you have to play everyday. It’s like \$10 a month, so it’s \$120 a year (Porirua).
- » You can earn stuff, but you’d have to play every day. Like if you’re only playing twice a week, that wouldn’t be enough. You’d have to play to try and get a hundred tiers, and if you’re just an average player like playing twice a week, you’ll only get like 40 max at the end of the month. That’s why I gave my PS4 away because I was spending too much time on it (Dunedin).

Loot boxes – qualitative themes

Across all seven focus groups, loot boxes were seen to be associated with “chance” because no one knew what was inside them. Still, unlike purely cosmetic skins, there was an acknowledgment that loot boxes help players gain an edge while they’re playing. Pasifika youth recognised that some games provide daily loot boxes as an incentive to play daily. They noted:

- » It’s a digital container; you don’t know what you’ll get. It’s decided by chance (Christchurch).
- » It’s a box of goodies. When you open it, you don’t know what you’re going to get, like you can buy it like purchase it for \$100 or something or spend \$2.50, and you might get it. But it’s random (Levin).
- » You’re spending like a couple of dollars and you’re getting something. But yeah, you don’t know what you’re getting, so I guess it is gambling (Dunedin)
- » There are games where you get daily loot boxes, but that’s an incentive to bring you back. It’s to make you bite the hook so that if you want to continue eventually you have to pay for it (Auckland FG 2).
- » Unlike skins, they unlock things that help you win a game. It improves your chances of winning, but it doesn’t guarantee you a win. But it costs real money and once you buy it, it opens. But you can’t control what’s in it, cause it’s random it’s all about chance (Porirua).

When asked, “would you spend money on loot boxes”, answers varied based on gender and perceived level of player skill. There was an even split of numbers between young women and young men in the Porirua Focus Group. All the young male participants said they would spend money on loot boxes, viewing it as an investment, while all the young female participants said they would not. The female participants associated the money spent on loot boxes with a lack of social activities outside of gaming, noting that they had social activities outside of gaming that acted as a barrier to the perceived “need” to purchase.

- » It’s a waste of money, and I’d just go play on my friends’ devices (Porirua, female).
- » If I was to go on and got a “buy this for \$10” I’d be like no, I feel like girls have more activities outside ps4, whereas (male) they don’t (Porirua female).
- » There are a lot of different stages, and if you want to compete, you have to stay on top of the levels. It’s like training; if you don’t invest in it, you’re not going to get better, you know (Porirua male).

Through the Talanoa, for participants who gamed daily, purchasing loot boxes was associated with cheating and often created stigma amongst peers because advancement to the subsequent levels should be based on skill gained by investing in playing time. There was a mutual understanding across the focus groups that purchasing loot boxes was a shortcut that talked more to the gamer's lack of skills. They noted:

- » It's also a "respect" thing if you have to buy something to give you an advantage, then you're not that good. It should be about skill (Auckland FG 2).
- » I've never spent on a loot box, and others who I play with don't because if any of us do it's like you cheated, you took the shortcut (Levin).
- » The maximum I'd spend would be \$50, but that's it, and that's for battle passes new levels but not for boxes because that would be cheating (Dunedin)
- » For gaming, I'd give up time to try to win. I'm down for squeezing in four hours to sleep if it means winning and earning stuff, but I won't pay for it (Timaru).
- » I think if you're playing and people are watching, people will think you're a chump; they'll think you're trash because you didn't do it the right way with skill. Everyone sees each other's boxes (Auckland 1).

One participant attested to the association between purchasing items and "cheating" but saw no problem with it.

- » It depends on how serious it is. Like some people feel like it's cheating, not me. If it's there and it helps me get to the next round, I'll do it (Christchurch).

Participants also noted that while they did not buy loot boxes they were aware of people who did, be it a family member or a peer.

- » I don't but my cousin does but that's because he has money so he can buy it. He just gets the most expensive one because he knows he's guaranteed a really good gun. He does it probably like once a month maybe (Levin).
- » I don't do it, but people at school do (Christchurch).
- » Some people just take debit cards and upload the details, and it takes it out monthly, but they keep doing it until they're snapped – like my brother (Timaru).

Those who said “Yes” they purchased loot boxes; the main reason provided was the social pressure to play well and not let other people down.

- » If I’m playing with 99 other people, and my friends or someone I like is watching or playing on the other side, that does put pressure on me to play well, and if I need an edge or an advantage, I might be tempted to pay for it (Porirua).
- » Yeah, there are different types of loot boxes like standard or deluxe. The deluxe is obviously better. I’ve spent money to try and help my team, but you don’t usually get what you want. And it depends on how competitive the game is for me to spend (Auckland FG 1).
- » Yes, because you don’t want to be the one to let people down (Timaru).
- » Yeah, we all do it, but no one will admit it here. When you’re up at 3 am and you know you have to sleep for school, it’s definitely at the back of your mind (Levin)

Gaming Behaviours

In the online survey, participants were asked a series of seven gaming behaviour questions. For this report, an analysis was conducted based on the response of Pasifika respondents (Table 17).

About 42.1% of respondents thought about spending the entire day gaming either often or very often. When asked about whether they spent more time than usual gaming in the last six months 48.7% answered often and very often and while most Pasifika respondents noted being able to reduce their gaming use, 23.4% noted that others unsuccessfully tried to reduce their game use (either often or very often).

Around 26.3% acknowledged that in the last six months, they played games to forget about real life (either often or very often), 15.5% (often or very often) felt unhappy or negative when they were unable to play, and 12.5% noted fighting with others within the previous six months of taking the survey, as a result of the time they spent on games.

“ IT’S LIKE A BATTLE PASS...”

Table 17: Behaviours or attitudes toward gaming for Pasifika (16-30 years)

	1. Never %	2. Rarely %	3. Sometimes %	4. Often %	5. Very often %
In the last 6 months, did you ever think about spending the entire day gaming?	11.0	15.9	31.1	23.4	18.7
In the last 6 months, did you spend more time than usual gaming?	5.7	13.4	32.1	25.6	23.1
In the last 6 months, did you play games to forget about real life?	28.1	23.9	21.6	13.9	12.4
In the last 6 months, have others unsuccessfully tried to reduce your game use?	34.3	18.7	23.6	11.7	11.7
In the last 6 months, have you felt unhappy or negative when you were unable to play?	43.8	21.6	19.2	8.0	7.5
In the last 6 months, did you have fights with others (e.g. family, friends) over your time spent on games?	60.7	15.4	11.4	9.0	3.5
In the last 6 months, have you neglected other important activities (e.g. school, work, sports) to play games?	47.0	22.1	15.9	7.7	7.2

Perceptions of Gaming Harm

The World Health Organisation (WHO) outlined that GD manifests itself when the pattern of gaming behaviour is so severe that it negatively affects an individual's personal, social, and/or educational/occupational activities in the previous 12-month period (World Health Organisation, 2018).

When asked what harmful gaming looked like, answers provided by Pasifika youth were aligned with the definition provided by the WHO. For example, the most common responses were linked to changes in mood, social interactions, and when it takes the person away from doing day-to-day activities. Participants noted –

When it starts impacting personal wellbeing (the way you feel):

Pasifika young people used words like “mood swings, anxious and depressed” to describe some of the harmful effects of gaming, with an example provided in Dunedin of damages made to private property because of losing a game.

- » When you're feeling anxious or depressed (Auckland FG 1)
- » When you become anxious when you're told to stop playing (Porirua)
- » When you start having mood swings and having a short fuse with people (Auckland FG 2).
- » When you feel depressed when you're not playing (Timaru)
- » Feeling salty because you lost (Christchurch)
- » Quit rage occurs, it's when you rage out because you've either lost or something happened to the connection. I cracked my TV when that happened to me, so mum and dad said I had to give my ps4 to my cousin, and now he's going through the same thing (Levin).
- » When you start having anger issues (Dunedin)

When it affects engagement with others and educational/occupational activities:

Pasifika youth were able to identify the harmful effects of gaming when people start to isolate themselves from others. It leads to truancy and impacts how an individual connects or interacts with others who attempt to break gaming behaviour. They also acknowledged the physical effect of gaming, like poor hygiene and sleep deprivation affecting one's ability to work and concentrate at school:

- » Isolation, you don't want to mix with anyone because they might tell you to stop (Dunedin)
- » When you isolate yourself, it's an issue (Christchurch)
- » When you start blaming people for things, for no reason, like with my older brother, if I walk in and ask him a question, he'll scream at me for distracting him while he's playing (Timaru)
- » When you start swearing at other people or isolating yourself (Porirua).
- » When you don't sleep or eat, or you oversleep or eat (Christchurch).
- » When it affects your hygiene like not showering or holding off going to the toilet (Porirua).
- » When you don't want to do anything else, you get annoyed at being asked to do stuff like clean your room and stuff like that (Dunedin).
- » Not going to school or work or going to school, you don't perform because you're tired (Auckland FG 2).
- » When you wag school because you want to keep playing (Auckland FG 1).

When it takes up too much time:

Finally, a lack of awareness of time was also identified as an adverse effect of gaming.

- » Takes time away from interacting with people in real life because you're always playing (Timaru).
- » When you don't realise what time it is, it's easy for one hour to turn into five (Auckland FG 2).
- » You're on it 24/7 (Porirua).

Summary

In exploring the gaming behaviours of young Pasifika people/adults and the financial transactions occur while gaming, Pasifika awareness of both the benefits and harmful effects of gaming were increased due to directly asking and informing Pasifika young people.

In both, the focus groups and online survey, variations were seen between the experiences of Pasifika young men and Pasifika young women. The male participants were more vocal and provided a greater range of examples when discussing gaming behaviour. The Pasifika young men were more likely to game for social reasons with their peers than Pasifika young women, who provided examples of alternative social activities away from gaming. This reflects playing time, with the online survey findings highlighting that Pasifika young men are twice as likely to spend 15+ hours a week gaming compared to Pasifika young women.

The device of choice also differed based on gender, with Pasifika males preferring consoles that allowed for greater exploration of multi-player games and were considered more realistic. In contrast, while some Pasifika females noted consoles as their preferred mode of gaming, throughout the focus groups, phones were mentioned because of their mobility. The most popular games are multi-player games based on the ability to socialise online, the features of the game, and easy access.

Across all focus groups, participants were not entirely aware of the term 'microtransactions' prior to participating in the group; however, when they were shown pictures of the categories that fell under "microtransactions" (i.e., skins and loot boxes), they were able to describe the functions of microtransactions within games. Participants' understanding of the different types of microtransactions helped them provide more context for the researchers and specify which type of microtransaction they had experiences with.

While all of those who attended the focus groups related loot boxes to chance, the pressure to purchase or not purchase varied between participants based on gender and gaming time. For example, only the male participants considered spending money on loot boxes. Those who played online with their peers noted socially feeling pressured to 'not be the weakest link' and let their team down, which often led to the purchasing of loot boxes. However, for experienced gamers who played daily, purchasing loot boxes was considered cheating, so rather than investing money, investment was made in hours of playing.

In the online survey, Pasifika (22%) respondents were twice as likely to spend more than \$20 per month on loot boxes than nMnP (10%). They were also more likely (23.5%) to spend six hours or more gaming in one session than nMnP (16.4%). From both the qualitative and quantitative parts of the study, this report shows a higher percentage of Pasifika investment in time and money to gaming compared to nMnP.

Participants in the focus groups were able to draw on their own experiences and identify themes (i.e., isolation, changes in mood, disruption to schooling, and employment) common to characteristics noted by the WHO.

03

POSSIBLE LINKS
BETWEEN GAMING AND
GAMBLING, INCLUDING
PROBLEM GAMBLING.

Gambling Behaviours

In both the qualitative and quantitative parts of the study, questions relating to gambling activities were asked. In the online survey, participants were asked how much money they spent weekly on gambling activities. Of the Pasifika participants who gambled, nearly 26% spent \$10-\$20 per week on gambling. (Table 18).

Table 18 Money spent weekly on gambling activity

	Pasifika (n=140) % (n)	nMnP (n=129) % (n)	Total (n=269) % (n)
\$1 - \$10	25.0% (35)	26.4% (34)	25.7% (69)
\$10 - \$20	25.7% (36)	20.2% (26)	23.0% (62)
\$20 - \$30	12.9% (18)	4.7% (6)	8.9% (24)
\$30 - \$40	4.3% (6)	2.3% (3)	3.3% (9)
\$40 - \$50	3.6% (5)	4.7% (6)	4.1% (11)
\$50+	3.6% (5)	0.8% (1)	2.2%(6)
lotto huge jackpot only	25.0% (35)	41.1% (53)	32.7% (88)

Gambling Preferences

The online survey also asked questions relating to gambling activity (Table 19). Of the Pasifika respondents, 65.2% (n=262) did not gamble. Of the 140 Pasifika respondents who gambled, the non-continuous forms of gambling were similar for both ethnic classifications used, with 26.6% of Pasifika buying a Lotto ticket in the last six months, and 13.4% on instant and scratch ticket. For continuous forms of gambling, Pasifika had a higher percentage of gambling for pokies (6.7%) compared to nMnP (3.1%) and betting on an online gambling site (3.0% compared to 1.9%). While the numbers are low, further exploration is needed based on gambling activities and preference (non-continuous versus continuous gambling activity).

Table 19: Types of gambling done by gamers in the last six months.

Type of gambling	Pasifika (n=402) %* (n)	nMnP (n=426) % (n)	Total (n=828) % (n)
Lotto	26.6% (107)	21.8% (93)	24.2% (200)
Instant scratch ticket	13.4% (54)	10.8% (46)	12.1% (100)
The horses	1.7% (7)	3.8% (16)	2.8% (23)
Sports betting	5.7% (23)	7.0% (30)	6.4% (53)
Pokies	6.7% (27)	3.1% (13)	4.8% (40)
Casino- in person	4.5% (33)	3.1% (13)	3.7% (31)
Bet online	4.0% (16)	3.3% (14)	3.6% (30)
Bet online on a gambling site	3.0% (12)	1.9% (8)	2.4% (20)
None-I do not gamble	65.2% (262)	69.7% (297)	67.5% (559)

*Note: Percentages in a column will total more than 100% because respondents could choose more than one type of gambling.

During the focus groups, participants were divided into groups and given two minutes to list all the Pasifika people's gambling activities. They were then asked to rank the gambling activities and list the three most popular played today (Table 18). The purpose of the ranking exercise was to compare whether perceived popular gambling activities were continuous or non-continuous.

Table 20 Three most popular gambling activities

	1st	2nd	3rd
Auckland FG 1 (a)	Pokies	Lotto	TAB
Auckland FG 1 (b)	Lotto	Roulette	Pokies
Auckland FG 2 (a)	Pokies	Lotto	TAB
Auckland FG 2 (b)	Pokies	Lotto	TAB
Porirua (a)	Pokies	TAB	Lotto
Porirua Boys (b)	Pokies	TAB	Lotto
Levin (a)	TAB	Lotto	Housie
Levin (b)	Lotto	TAB	Church raffles
Christchurch (a)	Lotto	Pokies	Sports Betting
Christchurch (b)	Lotto	Pokies	TAB
Timaru (a)	TAB	Lotto	Horses
Timaru (b)	Lotto	TAB	Housie
Dunedin (a)	TAB	Blackjack	Pokies
Dunedin (b)	Pokies	TAB	Lotto
Dunedin (c)	Lotto	Pokies	TAB

The most popular gambling activities noted by the participants varied by city and region.

In Levin and Timaru, where there is no Casino, participants noted Housie and Raffles being popular gambling activities. In the major cities (Auckland, Wellington, Christchurch), activities found in casinos (i.e., Pokies), TAB and Lotto were the most popular. Therefore, access and visibility influence young people's perceptions.

Perceptions of Gambling Harm

Participants in the focus groups were also given time to explore what harmful gambling looked like. The most common answers given showed the same themes as those mentioned for when gaming becomes harmful. These included –

When it starts impacting personal wellbeing (the way you feel):

Young people used words like stressed and anxious to describe how harmful gambling impacts one's mood. While the themes are the same, they also mentioned violence (physical and verbal). While there are traces of verbal forms of violence voiced in connection to gaming harm, this was the first time physical violence was mentioned.

- » When you're always stressed and anxious about things (Auckland FG 1)
- » Constantly anxious because you're thinking about how to get money to play again (Christchurch)
- » When you become way too serious (Dunedin)
- » Violence definitely occurs both verbally and physically (Auckland FG 2)

When it affects the way, you engage with others and educational/occupational activities:

While disconnection from loved ones is mentioned under the same themed heading for gaming harm, the severity is intensified when discussing harmful gambling, where signs include lying or stealing from loved ones, losing jobs, hiding gambling behaviour, and relationship breakups.

- » When you start lying to people and asking for IOUs (Porirua)
- » Relationship breakups and when you neglect your family and friends (Christchurch)
- » Stop talking to people, and you don't do what you used to (Auckland FG 1).
- » Spending money that isn't yours, like my brother. He stole from my parents, and now I can't look at him the same (Timaru)
- » When you're hiding – like when you have sneak around, so no one knows that you're gambling (Dunedin)
- » You lose your job, or you get a warning from school (Timaru)
- » When you have no food or petrol because you've spent all your money (Auckland FG 1)
- » Can't pay for necessities because you don't have any money
- » When you don't eat or look after your hygiene because you don't want to miss the action (Porirua)

When it takes up too much time:

Finally, the consumption of time was also a trait of harmful gambling with similar examples provided for harmful gaming. These include:

- » Insomnia is a big one because you don't sleep (Auckland FG 2).
- » Lose track of time (Levin)
- » You just don't sleep (Dunedin)

Perceptions of Problem Gaming Leading to Problem Gambling

As a follow-up question, participants were asked “Can problem gaming lead to problem gambling?” In all seven focus groups, participants were able to draw a connection between gaming and gambling. While gaming does not necessarily lead to a loss of money, investment of time leads to lack of sleep and a lack of awareness of time – a trait seen in both gaming and gambling. Pasifika youth also noted that games often introduce people to gambling activities like Texas Hold ‘em and while age restrictions are monitored through face-to-face interactions at gambling venues, it is harder to police online.

- » I think for games, you’re not likely to spend, but we’re playing constantly, so we’re losing sleep right, so it’s the same thing because sleep is of value, especially when you have to wake up and focus at school (Auckland FG 1).
- » Yeah, definitely. When we look at the harmful effects for both gaming and gambling, you see how they’re pretty much the same. They both provide a certain buzz and can be social, but it’s when you overdo it, on both, I guess. It becomes a problem when it takes over too much of your life (Timaru).
- » On Facebook, they used to have solitaire and stuff, but that’s how you start stuff; you learn it before you’re of age to go into a Casino, so you think you know (Porirua).
- » Yeah, because if you look at the harmful effects, it’s pretty much the same. It’s a bit more dangerous though, for gaming because in gambling, you have to be a certain age before you go into a venue, right? Well you don’t necessarily need that when you’re gaming (Levin).

When probed to discuss if they saw signs of gaming harm in themselves or others, participants noted that they did (i.e., anxiousness, mood swings) and that it affects all ages -

- » With my nephew, he’s like eight, and he stresses when we take the controller off him, so we see it with even the generation after us (Christchurch).
- » My brother is five, and it’s normal for them to show the signs that we’re talking about. But it’s more common for boys, I think (Porirua).
- » My nephews are like 5, 6, and they’ve got that, what we wrote down – it’s scary to think that we’ve allowed that to happen (Timaru).

Summary

Three main themes found when participants were asked to explain when gaming and/or gambling becomes harmful.

The first is that excessive gaming and/or gambling becomes a problem when it alters a person's mood by making an individual more anxious, depressed, and agitated when they lose or are asked to stop playing.

The second theme is when it begins to affect people's relationships and interactions; people begin to isolate themselves or feel upset when they try to break the cycle of play.

The third theme consistently found in both gambling harm and gaming harm was how much time gambling and gaming activities took up. Hiding one's sleep deprivation or lying about gaming and gambling activity were noted by Pasifika youth as characteristics of harm.

In all focus groups, Pasifika young people drew a connection between gaming and gambling and identified characteristics of problems similar to those described in DSM-5 or ICD-11.

Problematic characteristics similar to the DSM-5 criteria include:

1. Preoccupation with gaming,
2. Withdrawal when not playing,
3. Lack of tolerance,
4. Unsuccessful attempts to reduce or stop gaming,
5. Giving up other activities,
6. Continuation of gaming despite problems,
7. Deceiving or covering up gaming,
8. Gaming to escape adverse moods, and
9. Risking or losing relationships or career opportunities due to excessive gaming (Petry, Rehbein, Ko & O'Brien, 2015).

Problematic characteristics similar to the ICD-11 broad categories include:

1. Impaired control over the behaviour;
2. increased priority is given to video gaming-related activities to the extent that it takes precedence over other life interests and daily activities; and
3. Continued gaming behavior despite negative consequences, which must be associated with significant impairment in personal, familial, social, and/or other important areas of functioning (World Health Organization, 2018).

This study shows that Pasifika young people who game continuously daily are experiencing some of the things listed in either the DSM-5 or ICD-11 criteria for gaming harm, or they know of peers or family members who tick boxes in the criteria. What is especially concerning is the acknowledgment by participants that family members as young as five years of age show symptoms of gaming harm. Consequently, while the harmful effects of gambling harm on individuals who gamble are seen in adulthood, gaming harm is detected at a much younger age.

04

SUPPORT AND PREVENTION FOR GAMBLING WHILE GAMING

In this study, Pasifika young people identified the social benefits of gaming to connect and interact with their peers. However, they were also able to identify the harmful effects gaming can cause when it is excessive. To understand whether young people need support as a result of their gaming, participants were asked how they could mitigate the risks of harmful gaming/gambling if they started to see the signs in themselves or others. For each risk identified, young people found solutions among themselves for addressing issues.

Acknowledgment That There is a Problem/Calling it Out

Raising awareness of “gaming behaviour” was seen by Pasifika youth as a step in the right direction. However, there was an acknowledgment that the gamer has to also “realise” that they have a problem. Participants noted that open dialogue could offer solutions to how young people with problem gaming behaviours can be best supported as a family or a collective. They also acknowledged that having someone track the amount of time spent gaming helped.

- » We called it out for my brother because we saw how bad it was; he was stealing, lying, and really angry with everyone. But it wasn't until he acknowledged he had a problem that we were able to help him. It had to come from my older sister who was over to visit because they're really close, and she timed how long he spent playing games and showed him. That was the beginning of him slowly coming back to us (Timaru)
- » I think also telling them it's a problem and taking it off them when they need to. They might get annoyed, but they'll get over it, and it's the best thing for them (Dunedin).
- » I think now it's about recognising the signs and doing something about it. Like if it's my little brother, I'd tell him, before it gets too bad and help him not be so hooked (Christchurch).
- » When I started breaking things after days of non-stop playing, I hit bottom and realised I needed help because it was getting too much. (Levin)

This theme is supported by research findings that suggest that accurate daily tracking of video gaming behaviour is often the first step of treatment because it provides young people with insight into their level of engagement, highlighting patterns in their play, useful for identifying antecedents and consequences of play (Petry, 2019).

Setting Time Limits for Game Time

There was a pattern between excessive time spent gaming and gaming harm in all of the focus groups. As a result, it was suggested that time limits for gaming time be set within homes to mitigate the risk of future gaming harm by turning off the wifi to support. They note:

- » If it's someone from within my house, it could be talking as a family and deciding to have a cut-off time for wifi or boundaries? (Auckland FG 2)
- » It could be making sure the internet is switched off after a certain hour to help them limit the time they play online (Dunedin)
- » Turn the game or the internet off, make sure it's not on all the time that could help (Timaru)

Setting time limits to prevent gaming harm is supported through international studies, by professionals in the field, noting that when behaviour becomes addictive, clinicians might offer the choice to moderate/limit video gaming or abstain (Stea et al., 2015).

Creating Activities/Alternative Hobbies

Participants suggested finding activities or alternative hobbies to counter the time spent gaming. They also mentioned creating distractions, like an invitation to go and eat out or go for a walk to allow for breaks in games.

- » Stress is often created by constantly losing and being embarrassed in front of your friends. This could be countered by connecting with other people, finding another hobby, or doing something else (Auckland FG 1).
- » Here in Levin, we don't have many activities for the youth, so gaming is what we do together, it's how we interact. If there were other options, then that may change (Levin)
- » Having activities like going to the park or something so that we can take them away (Christchurch)
- » I think going for a drive, do something to get them out of the house. That person needs to be in another environment to break it up (Porirua).
- » Just notice that it's a problem and go help them, if you see someone you care about distancing themselves ask them why and offer to take them for a feed (Timaru).
- » Like I think the big one will be interrupting the game, so randomly saying hey let's go have a feed or let's go for a walk (Christchurch).

In Peters et al (2020) publication titled *Assessment and Treatment of Internet Gaming Disorder*, the authors suggest that people at risk of gaming harm be encouraged to identify things they used to enjoy before they were gaming excessively. They note that care must be taken to ensure the range of identified activities includes options that are readily available to the person during their typical times of problematic play, supporting the suggestions provided in the focus groups.

Parent and Family Awareness and Support

As a result of having gone through the focus groups, participants acknowledged the need to have more talanoa based on both gaming and gambling, to allow for a greater understanding of the harmful effects of gaming and how it can lead to future gambling. They noted that it is not enough to target Pasifika young people, and that parents and caregivers also need to know about the harmful effects of gaming to minimise harm.

- » Through this focus group and talking about my little cousins who throw tantrums when they play, I've come to realise that it's not enough to have training about the harmful effects of gaming with our youth; we need our parents and grandparents here too, because they keep us accountable, and if they don't know that it's harmful to us, then the pattern will be harder to break (Timaru).
- » When we were asked to write down the gaming harm and gambling harm and then compare them, that was an eye-opener for me because I clicked, man, I'm writing about me and my niece and younger cousins. To know that some of the characteristics I'm showing is what problem gamblers show is scary and it's something that everyone should know about. For us Pasifika this information needs to go out, especially to parents and people who babysit heaps. We need groups like Mapu Maia going out there and training families, otherwise, there's going to be heaps of us who go through stuff and not see any links (Auckland).

Summary

During the focus groups young people were able to identify gaming and gambling harm characteristics and, within their groups, mitigate risks with solutions. Without the provision of literature or prompting from the facilitators, the Pasifika young people who took part in the focus groups came up with solutions that mitigated the risks of harm, which unbeknownst to them, were supported by international research on the subject matter.

Participants noted that raising "gaming behaviour" as a problem by self or others was a step in the right direction. For participants in the focus groups, tracking the time spent gaming and being told by a loved one helped gamers become more aware of the impact of gaming on their lives. Once this was done, setting time limits on gaming were seen to disrupt the continuation of gaming. Suggestions included turning off the internet at set hours or participating in other local and readily available activities that will allow them to socialise with their peers outside of gaming.

If there are signs of gaming harm, people need others around them who can identify when they are beginning to isolate themselves so that plans can be put in place to help before the signs become problematic. Finally, raising awareness of gaming harm should be extended beyond young people to include parents, caregivers, and extended family members. Mapu Maia was acknowledged as a service that could provide such awareness through workshops that educate families on the shared characteristics of harmful gaming and harmful gambling. This study highlights that Pasifika youth have answers to mitigating the risk of gaming harm; however, they need to be in spaces where they are heard.



05

SUMMARY AND CONCLUSION

Discussion

Discussions with Pasifika participants highlighted the similarities between gaming and gambling through the perspective of Pasifika youth up and down the country. The qualitative findings from the Talanoa suggest that excessive gaming is a gateway to gambling harm. However, the online survey findings are inconclusive, which suggests that further research is needed.

When gaming and gambling are not excessive (i.e., increased times spent on either) both are seen as a positive means of socialising with peers, with gaming itself seen to have benefits for individuals, such as allowing individuals to practice problem-solving and social skills (Petry, 2019). However, when excessive and too much time is spent on either activity, harm may follow.

The first objective of this study was to **explore the gaming behaviours of young Pasifika people/ adults and the financial transactions that take place while gaming**. Through this research, almost half of the Pasifika respondents from the online survey gamed daily, with nearly a quarter of all Pasifika participants spending six or more hours in one gaming session.

In both the online survey and the focus groups, the most popular games were multi-player games such as Fortnite and COD, which allowed multiple players to play simultaneously and were seen as a space to socialise for young people. These games have millions of players, and the battles take place with up to 150 gamers playing at a single time. The social aspect of both gaming and gambling and the accessibility have been noted as incentives to both game and gamble.

The preferred mode of gaming differed among Pasifika males and Pasifika females, with consoles favoured by the young men who noted the realistic graphics seen through bigger screens and the ability to converse with more peers as reasons why consoles were preferred. This was compared to phones which were favoured by the young women who recognised mobility and easy access as an explanation for why phones were preferred. In the online survey, Pasifika young men were twice as likely to spend 15+ hours a week gaming compared to Pasifika young women, a finding that needs to be further explored.

Although young people are generally not familiar with the term microtransactions, they were aware of categories that fall under the definition of microtransactions, such as skins and loot boxes. Skins were acknowledged as being purely cosmetic in function, without providing an edge to the gamer during a gaming session. However, Pasifika young people often felt the social pressure of looking good and the desire to be included. Participants note that those who did not invest in skins were often not chosen because they associated skins with elevated player performance when choosing teams.

In this study, loot boxes were related to chance, with those feeling pressured to win or not to be embarrassed in front of their peers spending either money or time trying to acquire loot boxes. While some refused to spend money on loot boxes, others did, with examples of personal spending or knowing someone who spends. During COVID-19 Lockdown, there was an increase in both gaming and gambling where Pasifika youth spent more money purchasing items online and increased their playing time.

The second objective was to **identify any possible links between gaming and gambling, including problem gambling.**

In this report, Pasifika youth highlighted similarities between the characteristics of gaming harm and gambling harm, with insights falling under the following three sub-headings:

- a. When it starts impacting personal wellbeing (the way you feel)
- b. When it affects the way, you engage with others and educational/occupational activities:
- c. When it takes up too much time:

Without showing participants how GD is categorised under the DSM-5 or ICD-11, through their lived experiences and social environments, Pasifika youth recognized and named gaming harm and gambling harm for themselves. Pasifika youth identified mood swings, which included irritability, isolation, and anger, as harmful effects of both gaming and gambling often triggered when a person loses or is asked to pause or take a break from playing activity.

The signs and symptoms of gaming harm were recognised by Pasifika youth in their peers and their family members as young as five and six years old who became distressed and irritable due to the removal of their gaming devices. Consequently, there is a need to acknowledge that the difficulties of policing gaming and the lack of services that provide gaming literacy to our Pasifika families put our Pasifika children at greater risk.

When applying the Ministry of Health’s continuum of gambling behaviour and harm to online gaming (as interpreted by the Problem Gambling Foundation Group’s (PGF) interpretation) (Figure 8), the signs of harmful gaming, identified by participants in the focus group, were similar to those of problem gambling, drawn from the figure 8. Consequently, strategies used to minimise the harm of problem gambling can be used as starting point to address problem gaming.

Figure 8 PGF Group Interpretation of Ministry of Health (Preventing and Minimising Gambling Harm Practitioner’s Guide 2019) Gambling behaviour and harm: the continuum of prevention and harm reduction



The final objective was **to identify/understand the needs of young people while gaming to prevent problem gambling.**

This study acknowledges that Pasifika youth can provide insights on ways to mitigate the risks of harm if given the opportunities. While Pasifika youth did not go into detail based on what services targeted towards gambling harm would look like, they provided suggestions supported by international research on gaming.

Working in groups, the participants throughout this study were able to mitigate the risks of problem gaming and gambling with solutions that include:

- a. Acknowledgment that there is a problem/calling it out
- b. Setting time limits for game time
- c. Creating activities/alternative hobbies
- d. Parent and family awareness and support

Like gambling, the symptoms of gaming can go unnoticed. For example, compared to other addictions such as alcohol and drug use, the physical manifestations are more subtle. However, when others start to verbalise their concerns or a young person acknowledges adverse changes as a result of gaming, often this becomes a trigger for change. Pasifika youth have mentioned monitoring game use and recording the hours spent as a step in the right direction because it allows both the individual and his/her family to begin to set limits on game time.

Solutions that involve providing an alternative activity while steering a problem gamer back to human interaction are currently used by clinicians who work with clients with problem gambling.

Clinicians who were brought on board to comment on findings suggest that a psychosocial education approach to preventing the potential problematic behaviours indicated by the DSM 5 and ICD 11 on gaming is needed. This is aligned with the mental health wellbeing aspirations in He Ara Oranga (2018) and with social policies aimed at strengthening personal resiliency, family well-being, and healthy child development (Siataga 2011). Therefore, creating activities and alternative hobbies or programs that are easily accessible and that break gaming behaviour can help minimise the potential harms of prolonged gaming and raise awareness among parents and families of the signs of gaming harm. From a public health perspective, prevention strategies could include the development of education-based approaches.

Although this is the first research of its kind in that it looks specifically at Pasifika young people, international studies conducted by Billieux, et al (2015) concluded that

Education-based approaches to preventing problematic gaming should be given a more critical role, and there is some evidence of their effectiveness. These measures could take different forms and be implemented by parents, schools, agencies developed to promote safe gaming or even gaming companies. Regardless of who carries out education, its common and key ingredient is the provision of information about safe and responsible gaming. This includes making gamers aware of the potential problems and dangers and teaching them how to avoid these unwanted effects of gaming and what to do if they do occur. Education-based approaches may have an advantage, because they are more likely to empower gamers and foster their sense of ownership of their gaming choices and habits.

We would qualify this in our research and add that who develops and provides Education matters. The researchers (Moana Research and Mapu Maia) were able to engage with participants based on (a) their experience in both research and knowledge of gaming and gambling and (b) their cultural intelligence, being of Pasifika ethnicity and having lived within Pasifika context, where some nuances are hard to understand without cultural insights.

The development of psycho-social education approaches and resources needs to be undertaken by Pasifika peoples who are culturally aware of the specific cultural, social dynamics and communication nuances and already have tacit cultural knowledge relevant to engagement with Pasifika youth and families. This aligns with Pasifika cultural safety and 'cultural competency standards and frameworks across the Education and Mental Health sector (MOE 2021, 2020, 2018, Te Pou 2009, Le Va).

Recommendations

As this is the first study, that has examined whether online video games are a gateway to problem gambling among Pasifika youth, no comparisons with other similar studies can be made. However, this study creates a platform on which we can continue building and offering support for Pasifika young people who are developing gaming harm. Consequently, the following recommendations are given:

Build Literacy on Gaming Harm

- » Using the findings from this report to deliver workshops and training to Pasifika communities (ECE's, churches, youth groups, parents) on the characteristics of harmful gaming and strategies that would mitigate the risks.
- » Create workshops/training for youth (similar to the focus groups) to allow young people to draw connections between gaming harm and gambling harm.
- » Creating resources that are easy to access and use so that people can track how long they game per session.

Invest in Services.

- » Create support services specifically aimed at helping young people with a Gaming Disorder. This includes investment in communications and marketing so that our Pasifika communities are aware of such services and services that understand Pasifika ethnic-specific values and context in their engagement with Pasifika peoples.
- » Co-design activities that will help Pasifika youth with GD's and provide information on ways to mitigate risks online, should there be another lockdown.
- » Draw on the Ministry of Health's (2019) Practitioner's Guide on Preventing and Minimising Gambling Harm to ensure its responsiveness to Pasifika youth.

Invest in the development of E-learning – digital tools.

- » Co-design and develop e-learning/digital tools to raise awareness and provide adequate support to young gamers to prevent gateway harm for gaming and gambling.
- » Ensure gender-specific workshops and resources to address differences in Pasifika male and female gaming and gambling behaviours.

Stronger regulation on gaming industry products, policed by Department of Internal Affairs.

- » Ensure there are safeguards to protect underage gamers and monitor the level of violence in games before they are accepted.

Ongoing Research

- » Ensure future research extends to Pasifika families and provides service response to identify effective strategies to counter gaming and gambling harm.

Summary

Pasifika youth shared their perspectives on their gaming and gambling behaviour with signs of harm mentioned throughout the focus groups.

Pasifika gamers also spend significantly more money on loot boxes than their non-Māori, non-Pasifika counterparts.

Risk factors were similar for gaming and gambling. However, when given the opportunity, Pasifika youth were able to suggest solutions that mitigated the risk of gaming harm.

This report provides recommendations that are aimed to counter the potential adverse effects of problem gaming and, in doing so, prevent the likelihood of future problem gambling.

Conclusion

Pasifika youth throughout New Zealand were able to share their perspectives on their gaming and gambling behaviour, identify signs of harm mentioned, and offer suggestions to prevent and reduce harm throughout the focus groups. Pasifika gamers also spend significantly more money on loot boxes than their non-Māori, non-Pasifika counterparts. Risk factors were similar for gaming and gambling. However, when given the opportunity, Pasifika youth were able to suggest solutions that mitigated the risk of gaming harm. This report highlights the importance of ongoing research into gaming and gambling among young people and support and services led and informed by Pacific youth and their families.

References

- Abbott, M., Bellringer, M., & Garrett, N. (2018). New Zealand National Gambling Study: Wave 4 (2015). Report number 6. Auckland: Auckland University of Technology, Gambling and Addictions Research Centre.
- American Psychiatric Association. (2013) Diagnostic and Statistical Manual of Mental Disorders (DSM-5), 5th ed.; American Psychiatric Association: Washington, DC, USA. <https://doi.org/10.1176/appi.books.9780890425596>.
- Bellringer, M., Taylor, S., Savila, F. & Abbott, M., (2014). Gambling behaviours and associated familial influences among 9-year old Pasifika children in New Zealand. *International Gambling Studies*, 14(3), 457-471. <https://doi.org/10.1080/14459795.2014.937728>
- Berking G., & Siataga,P. (2018) Pasifika youth and online Gaming. DAPAANZ -Cutting Edge Conference & Presentation to Drua National network caucus fono Pre-Cutting Edge Rotorua.
- Billieux,J., Schimmenti,A., Khazaal,Y., Pierre Maurage,P., Alexandre Heeren,A., (2015) Are we overpathologizing everyday life? A tenable blueprint for behavioral addiction research. In *Journal of Behavioral Addictions* 2015 Sep; 4(3): 119–123. Published online 2015 May 27. doi: 10.1556/2006.4.2015.009
- Borgonovi, F. (2016). Video gaming and gender differences in digital and printed reading performance among 15-year-olds students in 26 countries. *Journal of Adolescence*, 48, 45–61. doi:10.1016/j.adolescence.2016.01.004
- Brand, J. E., Jervis, J., Huggins, P. M., & Wilson, T. W. (2019). Digital New Zealand 2020. Eveleigh, NSW: IGEA.
- Decision Making, 21(2), 113–137. <https://doi.org/10.1002/bdm.582> cited from <https://www.digital.govt.nz/digital-government/programmes-and-projects/digital-inclusion/digital-inclusion-research/report-digital-inclusion-and-wellbeing-in-new-zealand/>
- Desai, R. A., Krishnan-Sarin, S., Cavallo, D., & Potenza, M. N. (2010). Video-gaming among high school students: Health correlates, gender differences, and problematic gaming. *Pediatrics*, 126(6), E1414–E1424. doi:10.1542/peds.2009-2706
- Drummond, A., & Sauer, J. D. (2018). Video game loot boxes are psychologically akin to gambling *Nature Human Behaviour*, 2(8), 530-532. <https://doi.org/10.1038/s41562-018-0360-1>.
- Fortune, E. E., & Goodie, A. S. (2010). The relationship between pathological gambling and sensation seeking: The role of subscale scores. *Journal of Gambling Studies*, 26(3), 331–346. doi: 10.1007/s10899-009-9162-8
- Johansson Fua, S. (2014). Kakala Research Framework: a Garland in Celebration of a Decade of Rethinking Education. In M. 'Otunuku, O. Nabobo-Baba, & S. Johansson Fua (Eds.), *Of Waves, Winds and Wonderful Things: a decade of rethinking education* (pp. 50-60). Suva, Fiji: University of the South Pasifika Press.
- King, D. L., & Delfabbro, P. H. (2018). The concept of harm in Internet gaming disorder. *Journal of Behavioral Addictions*, 7(3), 562–564
- Lakey, C. E., Rose, P., Campbell, W. K., & Goodie, A. S. (2008). Probing the link between narcissism and gambling: The mediating role of judgment and decision-making biases. *Journal of Behavioral*
- Le Va. Pasifika-Youth-Participation-guide-A4.pdf <https://www.leva.co.nz/wp-content/uploads/2016/07/>
- Ledgerwood, D. M., Orr, E. S., Kaploun, K. A., Milosevic, A., Frisch, G. R., Rupcich, N., et al. (2012). Executive function in pathological gamblers and healthy controls. *Journal of Gambling Studies*, 28(1), 89–103. <https://doi.org/10.1007/s10899-010-9237-6>.
- Liu, M & Peng, W (2010) Online Gaming Dependency: A Preliminary Study in China. *Cyberpsychology, Behavior, and Social Networking* 13(3):329-33. DOI: 10.1089/cyber.2009.0082
- Lorains, F. K., Cowlshaw, S., & Thomas, S. A. (2011). Prevalence of comorbid disorders in problem and pathological gambling: systematic review and meta-analysis of population surveys. *Addiction*, 106(3), 490–498. DOI: 10.1111/j.1360-0443.2010.03300
- Ministry of Health. (2019). Preventing and Minimising Gambling Harm: Practitioner’s Guide. Wellington: Ministry of Health. Cited from <https://www.health.govt.nz/publication/preventing-and-minimising-gambling-harm-practitioners-guide>
- Ministry of Education. Action Plan for Pasifika Education 2020-2030. <https://www.education.govt.nz/our-work/overall-strategies-and-policies/action-plan-for-Pasifika-education-2020-2030>

- Ministry of Education (2018) Tapasā Cultural competencies framework for teachers of Pasifika learners
- Ministry of Education (2020). Best practice for teaching Pasifika learners: Pasifika Evidence Brief 2019. Ministry of Education, New Zealand
- Montag, C., & Reuter, M. (2015). Internet addiction: Neuroscientific approaches and therapeutical interventions. Cham, Switzerland: Springer Publishing Company, Incorporated.
- Nettleton, J., & Chong, K. (2013). Online social games—The Australian position [Addisons Focus paper]. Mondaq. <https://www.mondaq.com/australia/gaming/270002>
- Newzoo (2020). Newzoo Global Games Market Report 2020. <https://www.newzoo.com/gamesreport>
- Paschke K, Austermann MI, Thomasius R (2020) Assessing ICD-11 gaming disorder in adolescent gamers: development and validation of the gaming disorder scale for adolescents(GADIS-A). *J Clinical Med* 2020, 9:11-22 <http://dx.doi.org/10.3390/jcm9040993>
- Peter, S. C., Ginley, M. K., & Pfund, R. A. (2020). Assessment and Treatment of Internet Gaming Disorder. *Journal of Health Service Psychology*, 46(1), 29–36.
- Petry, N.M.; Rehbein, F.; Ko, C.H.; O'Brien, C.P. (2015) Internet Gaming Disorder in the DSM-5. *Curr. Psychiatry Rep*, 17, 72.
- Poulton,R, Gluckman,P,Menzies,R, Bardsley,A,Mcintosh,T, &Faleafa,M (2020) Protecting and Promoting Mental Wellbeing: Beyond Covid-19 on behalf of the Koi Tū: mental health expert advisory group. The Center for Informed futures. University of Auckland. Cited from <https://informedfutures.org/protecting-and-promoting-mental-wellbeing-beyond-covid-19/>
- Przybylski, A. K., Weinstein, N., & Murayama, K. (2017). Internet gaming disorder: Investigating the clinical relevance of a new phenomenon. *The American Journal of Psychiatry*, 174(3), 230–236. Cited from <https://doi.org/10.1176/appi.ajp.2016.16020224>
- Shafer, D. M., Carbonara, C. P., & Popova, L. (2014). Controller required? the impact of natural mapping on interactivity, realism, presence, and enjoyment in motion-based video games. *Presence: Teleoperators and Virtual Environments*, 23(3), 267e283.
- Starcevic, V., & Billieux, J. (2018). Precise estimates of gaming related harm should guide regulation of gaming. *Journal of Behavioral Addictions*, 7(3), 522–525. DOI: 10.1556/2006.7.2018.54
- Stea, J. N., Hodgins, D. C., & Fung, T. (2015). Abstinence versus moderation goals in brief motivational treatment for pathological gambling. *Journal of Gambling Studies*, 31(3), 1029-1045. DOI: 10.1007/s10899-014-9461-6
- Te Pou (2009). Real Skills Plus Seitapu, Auckland: New Zealand.
- Veissière, S.P.L.; Stendel, M. (2018) Hypernatural Monitoring: A Social Rehearsal Account of Smartphone Addiction. *Front. Psychol.* 2018, 9, 141.
- Wood, R. T. A., Griffiths, M. D., Chappell, D., & Davies, M. N. O. (2004). The structural characteristics of video games: A psycho-structural analysis. *Cyberpsychology & Behavior*, 7(1), 1–10.
- Taufe'ulungaki, A., Johansson, F.,S. Manu., Takapautolo, T. (2008) Sustainable livelihood and education in the Pasifika. Tongan Pilot. Suva Institute of Education. University of the South Pasifika. Cited from <http://repository.usp.ac.fj/5383/>
- Thaman, K. H (1992) Kakala: A Pasifika concept of teaching and learning. Paper presented at the Australian College of Education National Conference, Cairns.
- Todd, F.C. (2010). Te Ariari o te Oranga: the Assessment and Management of People with Co-existing Mental Health and Substance Use Problems. Ministry of Health, Wellington. <https://www.health.govt.nz/publication/te-ariari-o-te-oranga-assessment-and-management-people-co-existing-mental-health-and-drug-problems>
- Veissière, S.P.L.; Stendel, M. (2018) Hypernatural Monitoring: A Social Rehearsal Account of Smartphone Addiction. *Front. Psychol.* 2018, 9, 141. doi: 10.3389/fpsyg.2018.00141

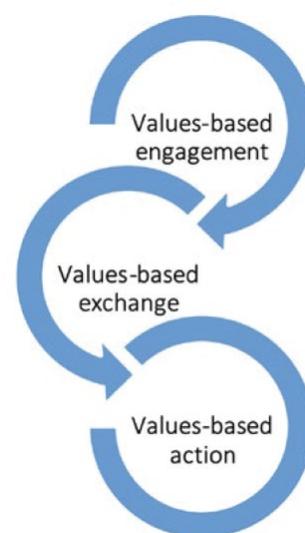
Appendices

Appendix 1: Moana Research Engagement Framework

Values-based Engagement

We believe reaching out to our communities and families requires a meaningful engagement that “involves forming a relationship that is sustained and maintained”. In any of our efforts to reach out and engage with our communities and families, and regardless of the mode of communication, the following values are inherent in our work:

- » Respect (“fa’aaloalo”/ “faka’apa’apa”): As a value respect has universal meanings and interpretation that is commonly understood around the world and is considered by many to be fundamental in any interactions. In Pasifika cultures, respect also takes on various forms and expressions in different contexts and via different relationships. It is important to understand this in our delivery of the programme.
- » Love and Service (“alofa”/ “ofa”): We engage not just out of contractual obligation or desire to achieve outputs and outcomes, but we do so out of a genuine sense of love and service. Some may describe this as social justice, but in Pasifika paradigms, it is borne from a sense of connectedness to our communities³.
- » Valuing culture and language (“fa’aSamoa”/ “anga fakaTonga”): We recognise the importance of language and cultural practices if we are wanting to engage with Pasifika peoples, particularly in ethnic-specific settings. These include formal settings and understanding Pasifika protocols in engagement e.g. formal welcome and acknowledgements and prayer. Even if English is the predominant language spoken in a home, the framing and construction of sentences and spoken words can also lend itself to Pasifika audiences e.g. subtle references to Pasifika practices and values.



Values-based Exchange

Exchange goes further than engagement to recognise the importance of a two- or multi-way communication approach. The opportunity to evolve and improve the programme arises from values-based exchange with our communities and families.

- » Reciprocity: encouraging and listening to the voices of our families and communities, as well as recognising the potential for mobilisation from within our communities. Reciprocity is also about acknowledging and appreciating the time and contributions of our stakeholders and families who play a pivotal role in the development and rollout of the programme activities. In our work we extend reciprocity in various ways including hospitality and catering, remuneration of time e.g. advisory group fees and koha for consultation, payment of Pasifika talent in design and production work, and grants for those who are in a position to meaningfully engage and work with our target groups.
- » Respecting and nurturing relationships (“Tausi le va”/ “Tauhi e vā”): Forging relationships is fundamental in exchange, however nurturing relationships with stakeholders and communities is crucial in effecting positive change. The ‘va’ has richer connotations in Pasifika contexts and can be the difference between doors opening and gates closing – the latter more likely to occur if there is a breach of trust and respect in the relationships.
- » Empathy and positivity: Bringing positive energy and enthusiasm to the work we do and identifying the strengths of our stakeholders and communities is a value we strive to uphold. We cannot underestimate the impact of encouragement and positive narratives in our exchanges. Even when identifying and exchanging stories of struggles and negative experiences, we advocate from a position of empathy and the desire to respond accordingly.

Values-based Action:

To increase the likelihood of intended actions and goals, we look to weave the following values throughout our programme:

- » Purpose: e.g. Family (“aiga”/ “kainga”), God/spirituality, Sense of duty to community, country: We recognise that for change to occur, programmes need to align with Pasifika peoples’ sense of purpose. Simply telling and giving instructions will elicit less of a response compared with actions that resonate with people’s sense of responsibility and purpose to others.

Appendix 2: Mapu Maia's 'Va Tagata' Model

Mapu Maia Background

Mapu Maia was established in 2009 as a subsidiary of the Problem Gambling Foundation of NZ (PGF Group) to provide Pasifika counselling and public health service in the area of problem gambling. Since its set up in 2009, Mapu Maia services has evolved and expanded to include public health and health promotion, counselling in co-existing issues and other addictions, community advocacy, delivering psychoeducation and psychosocial programs on addictive behaviours in prisons, community settings, and within external alcohol and other drugs rehabilitation providers.

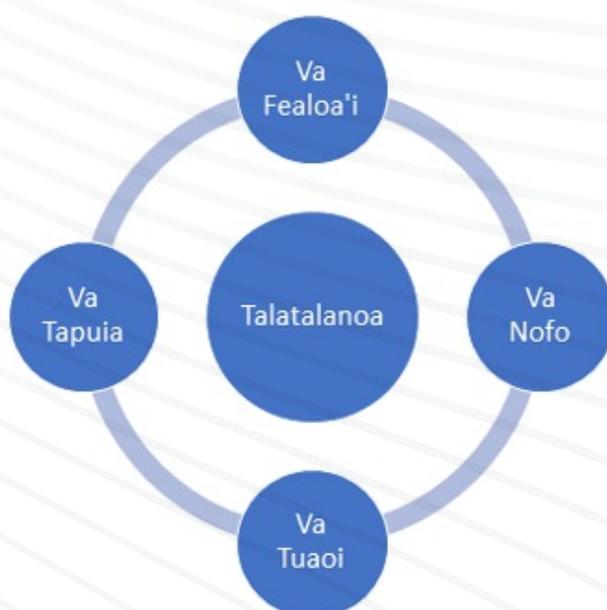
Mapu Maia provides high quality, culturally appropriate and in-language services to individuals, families and communities that are affected by gambling harm, co-existing issues, family violence and other mental health issues. Mapu Maia uses its experience and expertise when integrating clinical intervention with public health activities in communities that have been identified by the Ministry of Health as a priority population.

National Reach

With our staff located nationally and its business systems to support this, Mapu Maia offers services anywhere in New Zealand via telephone or online technology, with face-to-face services being offered around its physical locations of Auckland, Wellington City, Lower Hutt, Upper Hutt, Levin and Christchurch. Mapu Maia is staffed and managed by Pasifika and to ensure it stays on the mission and remains culturally relevant, is governed by a Pasifika Board.

Currently funded by the Ministry of Health (through PGF Group), Mapu Maia has successfully supported thousands of clients and communities and is often called upon by the Ministry of Health to provide leadership and consultation to other Pasifika gambling harm minimisation service providers.

'Va Tagata' Model



Culturally Responsive and Relevant Pasifika Approach -Va Tagata model of engagement

The Va Tagata model of engagement qualifies the rationale for prevention and talatalanoa- (counselling) demonstrating how culture and care connect. It places great weight and importance on developing and maintaining relationships in the Pasifika context.

The cultural reference acknowledges the person/family's position, status, and mana. Maintaining respectful relationships is a very important cultural belief that exists throughout Pasifika cultures. Va can mean 'space' – not the space that divides, but the space that connects. Va Tagata focuses on the engagement process and incorporating both Pasifika cultural values in all aspects of service delivery.

Establishing rapport and trust with a person/community is vital to building a connection. Acknowledging those we serve through the appropriate engagement and cultural reference in line with Pasifika best practice as outlined in Let's get Real, Real Skills plus Seitapu- Working with Pasifika Peoples, Le Va cultural competencies.

We know how to work with Pasifika people and leaders, understanding the challenges faced inside communities for second and third-generation Pasifika and for those who have recently migrated. In many instances, church and elder leadership are key change agents whose support often a vital part of successful recovery. We work within the dynamic multigenerational social-cultural contexts of our communities which involves significant tacit knowledge of our customary traditional and contemporary cultural lives.

The strands of Pasifika engagement are depicted in the four elements of Va – Va Feloai, Va Nofo, Va Tuaoi and Va Tapuia. Talatalanoa is the center or the overarching strand that is infused in all the elements of Va.

Mapu Maia's cultural approach and relevancy is underpinned by Va Tagata and our cultural values framework. These values guide how we work externally when engaging with stakeholders and how we work internally with each other. Our values are:

Relationships - We believe in placing people first in everything we do and remain focused on who we are reaching out to in our work. We believe relationships are the foundation of who we are.

Culture - Our cultures, language, identity, spiritual beliefs, physical and mental-being is central to who we are. Our well-being is obtained when all these are in balance.

Respect - We believe that respect is shown in all aspects of our work; in our language and behaviour towards each other and the communities we serve.

Collectivity - I am not one, I am us. We belong to a collective; we value that as Pasifika, we belong to a family, to a community, interacting towards a shared purpose.

The development of high-quality, culturally appropriate, frameworks, services, and staff have cemented engagement with key stakeholders, families, and communities. In particular, Pasifika families and communities have been affected by gambling harm, addictions, and mental health and trauma.

Appendix 3: Research Tools

Participant Information Sheet

Title: **“Are online video games a gateway to problem gambling among Pacific youth?”**

If you have any questions, concerns, or complaints about the project, you can call, text, or email us:

Seini Taufu | Research Lead Phone: 021750187 | Email: seini@moanaresearch.co.nz

Pesio Ah-Honi | National Director Pacific Services Mapu Maia

You are invited to take part in a project exploring the convergence of online video gaming with gambling among Pasifika youth. This project provides an opportunity for you to share your views and experiences on whether online video games are a gateway to problem gambling among Pasifika youth. The purpose of the research is to examine whether there is an association between youth gaming and problem gambling and if so, what the similarities may be.

It is your choice whether or not you participate. If you choose to take part in this project, but change your mind anytime up to the start of the interview you may withdraw.

This Participant Information Sheet will help you decide if you would like to take part. It explains the project, what your participation involves and what happens after the focus group. We will go through this information with you at the start of the workshop and answer any questions you have.

Please make sure you have read and understood this information sheet. If you agree to participate, you will be asked to sign the Consent Form on page 4. This copy of the Participant Information Sheet is yours to keep.

Who can participate?

We are looking for youth between the ages of 16 and 30 years who identify with one or more Pasifika ethnicities, and who have played video games within the previous 12 months. The focus groups will be facilitated in English across urban and rural areas.

What will my participation in the project involve?

Your involvement in the project will be to attend one focus group of approximately 9 to 12 people. The focus group will be approximately 60-90 minutes long which will be audio recorded. Participation in this study is entirely voluntary: it is your choice. If you choose not to take part, you will not be affected in any way. But if you agree to take part, you will be free to withdraw at any time without giving a reason. Also, you are free not to answer questions or not to participate in certain discussions.

All information collected from the questionnaire and the focus group meeting will be stored in strict confidence in a locked filing cabinet in a locked office. No material will allow us to personally identify participants. However, please note that any data collected during the focus group cannot be withdrawn once the analysis is complete. During the focus group, light refreshments will be provided, and the time and location will be focus group will be at a place and during a time that is convenient to you.

What are the risks?

Please note that as focus groups consist of a number of people, your participation and contributions is not anonymous or confidential to the other participants in the same focus group. However, all participants will be asked to “agree to respect and treat as confidential the contribution of other focus group participants” when they sign their consent form. . Under no circumstances will your personal details be made known to the community, family members or any other peoples.

The only risk involved for participants taking part in a focus group is the possibility that the discussion could touch on personally sensitive matters. In the event you feel uncomfortable at any time during the focus group meeting, you will be completely free to leave, with no questions asked.

If the discussions trigger uncomfortable feelings (such as guilt), you are welcome to talk to any of the researchers or a clinician who will be on site during the focus group, and who will be happy to listen to your concerns and/or refer you to specialist services that could help.

What happens after the focus group?

Audio will be electronically recorded and then securely stored in computers protected by passwords. Audio recording will be transcribed by the researchers.

None of the anonymous information from audio recordings will be made publicly available. All information obtained for this project is of great value and will be stored indefinitely in a secure manner in password-protected computers. No third parties other than the researchers and those conducting the focus groups will be involved.

What happens if I change my mind?

Participation in this project is entirely voluntary, and you will be free to withdraw at any time. However, the focus group session will be audio recorded, and we will not be able to turn the audio recorder off once the session has started.

Please note that once the focus group has occurred, we will be unable to separate the comments made by individual participants and it will not be possible for you to edit the transcripts. However, this information will not be personally identifiable in any material stored in writing or in audio.

Please note that we will always be accessible if you have any questions about this project.

Who do I contact if I have more questions or if I have concerns?

If you have any questions, concerns, or complaints about the project, you can call, text, or email us:

Seini Taufu | Research Lead

Phone: 021750187 | Email: seini@moanaresearch.co.nz

Pesio Ah-Honi | National Director Pacific Services Mapu Maia

Phone: 027 497 0021 | Email: pesio.ah-honi@mapumaia.nz

If you want to talk to someone who isn't involved with the study, you can contact an independent health and disability advocate on:

Phone: 0800 555 050

Email: advocacy@advocacy.org.nz

If you have and further ethical concerns about this project, please feel free to contact

Phone: 0800 4 38442 (0800 4 Ethic)

(from outside New Zealand: +64 4 819 6877)

Email: hdecs@health.govt.nz

Consent Form

This form will be held for a period of 6 years.

Please tick to indicate you consent to the following:

I have read and I understand the Participant Information Sheet.	Yes
I have been given sufficient time to consider my participation in this project.	Yes
I am satisfied with the answers I have been given regarding the project and I have a copy of this consent form and information sheet.	Yes
I understand that my participation in this study is voluntary (my choice) and that I may withdraw from the project at any time without this affecting me in any way.	Yes
I consent to the research staff collecting and processing the information I give in the questionnaire (such as age, address, ethnicity, and level of education).	Yes
I consent to the research staff audio recording the focus group meeting.	Yes
If I decide to withdraw from the project, I agree that the information collected from me to the point when I withdraw may continue to be processed.	Yes
I understand that my participation in this study is confidential and that no material that could identify me personally will be used in any reports on this project.	Yes
I know who to contact if I have any questions about the project in general.	Yes
I agree to respect, treat as confidential, and not disclose the contribution of other focus group participants.	Yes

Declaration by participant:

I hereby consent to take part in this study.

Participant's name: _____

Signature: _____

Date: _____

Appendix 4: Ethics Approval Documents

HDEC Ethics Approval Letter



Health and Disability Ethics Committees

Ministry of Health
133 Molesworth Street
PO Box 5013
Wellington 6011

0800 4 ETHICS
hdec@health.govt.nz

13 December 2019

Dr Seini Taufa
7 Nissan Place
Onehunga, Auckland FG 1061

Dear Dr Taufa,

Re:	Ethics ref:	19/NTB/149
	Study title:	Are online video games a gateway to problem gambling among Pacific youth?"

I am pleased to advise that this application has been *approved* by the Northern B Health and Disability Ethics Committee. This decision was made through the HDEC-Expedited Review pathway.

Conditions of HDEC approval

HDEC approval for this study is subject to the following conditions being met prior to the commencement of the study in New Zealand. It is your responsibility, and that of the study's sponsor, to ensure that these conditions are met. No further review by the Northern B Health and Disability Ethics Committee is required.

Standard conditions:

1. Before the study commences at any locality in New Zealand, all relevant regulatory approvals must be obtained.
2. Before the study commences at each given locality in New Zealand, it must be authorised by that locality in Online Forms. Locality authorisation confirms that the locality is suitable for the safe and effective conduct of the study, and that local research governance issues have been addressed.

Non-standard conditions:

- » In addition to the Committees request above - Please upload recruitment advertisements for HDEC approval via the amendment pathway prior to their use.
- » Non-standard conditions must be completed before commencing your study, however, they do not need to be submitted to or reviewed by HDEC.
- » Please add the name and contact details on the PI to p.1 of the PISC
- » Please use the correct email for the HDC independent advocate service which is :
advocacy @advocacy.org.nz

If you would like an acknowledgment of completion of your non-standard conditions you may submit a post-approval form amendment through Online Forms. Please clearly identify in the amendment form that the changes relate to non-standard conditions and ensure that supporting documents (if requested) are tracked/highlighted with changes.

For information on non-standard conditions please see section 128 and 129 of the *Standard Operating Procedures for Health and Disability Ethics Committees* (available on www.ethics.health.govt.nz)

After HDEC review

Please refer to the *Standard Operating Procedures for Health and Disability Ethics Committees* (available on www.ethics.health.govt.nz) for HDEC requirements relating to amendments and other post-approval processes.

Your next progress report is due by 13 December 2020.

Participant access to ACC

The Northern B Health and Disability Ethics Committee is satisfied that your study is not a clinical trial that is to be conducted principally for the benefit of the manufacturer or distributor of the medicine or item being trialled. Participants injured as a result of treatment received as part of your study may therefore be eligible for publicly-funded compensation through the Accident Compensation Corporation (ACC).

Please don't hesitate to contact the HDEC secretariat for further information. We wish you all the best for your study.

Yours sincerely,



Ms Kate O'Connor
Chairperson
Northern B Health and Disability Ethics Committee

Encl: appendix A: documents submitted appendix B: statement of compliance and list of members

Documents submitted

Document	Version	Date
PIS/CF: An updated version of the Participation Information Sheet and Consent form based on recommendations provided by the HDEC committee	2	09 November 2019
CV for CI: CV for CI	1	03 September 2019
CVs for other Investigators: CV for other investigator	1	03 September 2019
Protocol: Protocol for the study	1	03 September 2019
Survey/questionnaire: Survey questions updated with information at the beginning, based on recommendations by HDEC committee	2	08 December 2019
Evidence of scientific review: evidence that it has been reviewed by MOH	1	03 September 2019
CVs for other Investigators: CV for other investigator	1	04 September 2019
Application		05 September 2019
Response to Request for Further Information		

Appendix B

Statement of compliance and list of members

Statement of compliance

The Northern B Health and Disability Ethics Committee:

- » is constituted in accordance with its Terms of Reference
- » operates in accordance with the *Standard Operating Procedures for Health and Disability Ethics Committees*, and with the principles of international good clinical practice (GCP)
- » is approved by the Health Research Council of New Zealand's Ethics Committee for the purposes of section 25(1)(c) of the Health Research Council Act 1990
- » is registered (number 00008715) with the US Department of Health and Human Services' Office for Human Research Protection (OHRP).

List of members

Name	Category	Appointed	Term Expires
Mr John Hancock	Lay (the law)	14/12/2015	14/12/2018
Dr Nora Lynch	Non-lay (health/disability service provision)	19/03/2015	19/03/2022
Miss Tangihaere Macfarlane	Lay (consumer/community perspectives)	20/05/2017	20/05/2020
Mrs Kate O'Connor	Lay (ethical/moral reasoning)	14/12/2015	14/12/2018
Mrs Stephanie Pollard	Non-lay (intervention studies)	01/07/2015	01/07/2018
Mrs Leesa Russell	Non-lay (intervention studies), Nonlay (observational studies)	14/12/2015	14/12/2018
Ms Susan Sherrard	Lay (consumer/community perspectives)	19/03/2019	19/03/2022
Mrs Jane Wylie	Non-lay (intervention studies)	20/05/2017	20/05/2020

Unless members resign, vacate or are removed from their office, every member of HDEC shall continue in office until their successor comes into office (HDEC Terms of Reference)



PASIFIKA YOUTH

GAMING & GAMBLING RESEARCH: