








# BMJ Open Process evaluation of in-person, news and social media engagement of a community-based programme Brown Buttanean Motivation (BBM): a research protocol

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## ABSTRACT

**Introduction** The community group Brown Buttanean Motivation (BBM) initially began to assist Auckland Pasifika and Māori to manage weight problems, predominantly through community-based exercise sessions and social support. BBM's activities expanded over time to include many other components of healthy living in response to community need. With advent of the COVID-19 pandemic, BBM outreach grew to include a foodbank distributing an increasing amount of donated healthy food to families in need, a community kitchen and influenza and COVID-19 vaccine drives. A strong social media presence has served as the main means of communication with the BBM community as well as use of traditional news media (written, radio, television) to further engage with vulnerable members of the community.

**Methods and analysis** The study aims to conduct mixed method process evaluation of BBM's community engagement through in-person, social and news media outreach activities with respect to the health and well-being of Pasifika and Māori over time. The project is informed by theoretical constructs including Pacific Fa'afaletui and Fonofale and Māori Te Whare Tapa Whā Māori research frameworks and principles of Kaupapa Māori. It is further framed using the concept of community-driven diffusion of knowledge and engagement through social networks. Data sources include in-person community engagement databases, social and news media outreach data from archived documents and online resources. Empirical data will undergo longitudinal and time series statistical analyses. Qualitative text thematic analyses will be conducted using the software NVivo, Leximancer and AntConc. Image and video visual data will be randomly sampled from two social media platforms. The social media dataset contains almost 8000 visual artefacts.

**Ethics and dissemination** Ethics approval obtained from University of Auckland Human Participants Ethics Committee UAHPEC 23456. Findings will be published in peer-reviewed publications, disseminated through community meetings and conferences and via BBM social network platforms.

## STRENGTHS AND LIMITATIONS OF THIS STUDY

- ⇒ A major strength of this study is that the team comprises a range of researchers incorporating community-based experts with different skills, expertise and relevant ethnic backgrounds.
- ⇒ The project combines a mix of research methodologies and uses different theoretical frameworks, weaving together these different perspectives in innovative, novel and holistic ways to answer the research questions.
- ⇒ By combining datasets of in-person, social and news media outreach activities, the study will illustrate community engagement over time and may serve as a model for other research investigating complex community-led interventions.
- ⇒ Sampling strategies for the extensive social media data are required which may introduce some bias despite efforts to minimise these.
- ⇒ The empirical data are collated from a variety of sources and there will be instances of missing data.

**Trial registration number** ACTRN 12621 00093 1875

## INTRODUCTION

Brown Buttanean Motivation (BBM) is an organisation set up in 2014 by Dave Letele, a part-Samoan, part-Māori man with a personal weight loss journey from his peak weight of 210 kg to less than half that amount. He wanted to inspire and support other Pasifika (people from Pacific nations living in Aotearoa New Zealand (NZ)) and Māori to manage their weight problems predominantly through community-based exercise sessions and social support. Despite numerous community and government attempts to address the issue, Pasifika and Māori have much greater rates of obesity and weight-related diseases than non-Pacific, non-Māori.<sup>1</sup> Most interventions

are delivered by ‘experts’ without community leadership and input and may only last the duration of the research grant. After initial weight loss success, weight increases often return.<sup>2</sup>

While physical activity was the entry point, BBM’s activities have expanded over time to include healthy eating and, indeed, all components of healthy living, which are woven into a collective journey towards health and well-being.<sup>3</sup> BBM is still led by its founder, Dave Letele. It is a limited liability company with Letele as sole director and shareholder. It has a diverse funding model including philanthropic funding to cover free boot camps and its fitness facilities, intermittent Ministry of Health contracts, user-pays for online fitness programmes and donations through its Just Move Charitable Health Trust funding arm. The operation involves both paid employees and volunteers.

BBM has been responsive to other community well-being need. The advent of COVID-19 has seen an acceleration of BBM outreach. Many people lost their livelihoods in the wake of the pandemic and associated lockdowns, with Pasifika and Māori communities being disproportionately affected.<sup>4</sup> This situation has resulted in many people in these communities struggling with food insecurity and physical isolation causing mental health issues.<sup>5</sup> From March 2020, BBM has been running a Food Bank, distributing a growing amount of donated healthy food parcels to families in need. In 2021, they opened a community kitchen providing hot meals at \$2 koha (gift). Other activities include influenza vaccine drives and free health checks in collaboration with the Stroke Foundation of New Zealand. See [table 1](#) for a timeline of events including changes in response to the COVID-19 pandemic.

BBM has always had a strong social media presence with Facebook and Instagram accounts. These social media channels have served as the main means of communication with the BBM community. Letele posts very regularly with motivational tips and videos, and other members also use social media to support and encourage each other. The cessation of face-to-face BBM classes during lockdown led to BBM rapidly running streaming exercise classes on their public Facebook page. The private BBM Facebook page has a 15.1k membership and interaction on this page strongly suggests that BBM’s social engagement with the community, and members with each other, are strong and wide-ranging. Letele’s public Facebook page has 61k followers and the BBM Instagram account has 32.9k followers, with postings on workouts, meal plans and BBM community out-reach. All these social media platforms are very active with regular, usually daily, postings. BBM’s outreach also includes engaging through traditional news media (written, radio, television) to connect with Pasifika and Māori and to engage with the growing number of sponsors and corporate partners who donate money and resources to support BBM and its outreach activities.

BBM can be described as a network of people and organisations who want to improve the health and

**Table 1** BBM timeline

Date	Alert level	Event
1 March 2014		Letele starts BBM
14 November 2014		BBM Facebook group setup
20 February 2017		Facebook name changed to Butterbean Motivation BBM
28 August 2018		Facebook group changed to BBM Motivation
1 June 2019		BBM move into Manukau headquarters
1 August 2019		Hire of administrators, marketing, training development. Diversification of community classes
29 November 2019		Free health checks -BP and diabetes Stroke Foundation of New Zealand
1 January 2020		Mindbody software rollout and BBM launch website
1 February 2020		School programmes to deliver mindset and cultural activities
21 March 2020	2	COVID-19 pandemic begins. Move to Alert level 2. Maximum 100 people can gather
23 March 2020	3	Move to Level 3. Move to online classes
25 March 2020	4	Move to Level 4
25 March 2020	4	BBM Kai—large-scale Food Bank.
28 April 2020	3	Move to Level 3
2 May 2020	3	Drive-through ‘influenza vaccine at BBM HQ
14 May 2020	2	Move to Level 2
9 June 2020	1	Move to Level 1. Class size cap 70
16 May 2020	1	‘Influenza vaccine drive-through >500 in 1 day
19 June 2020	1	BBM-free food parcel drive-through
18 July 2021	1	BBM Foodbank and Community Kitchen
1 August 2020	1	22 leaders accredited via Skills Active Aotearoa
12 August 2020	3	Move to Level 3
31 August 2020	2	Move to Level 2
1 October 2020	1	BBM Kai Nutrition programme for From the Couch cohorts
8 October 2021	1	Move to Level 1. In person classes re-open
1 December 2020	1	Community Kitchen serves 1000 hot meals
1 January 2021	1	Start of 3-year study with University of Auckland
15 February 2021	3	Move to Level 3
18 February 2021	2	Move to Level 2. COVID-19 vaccination begins—border workers initially
23 February 2021	1	Move to Level 1

Continued

**Table 1** Continued

Date	Alert level	Event
12 March 2021	1	Relocation headquarters to Manukau—includes classroom and meeting space
1 April 2021	1	Launch of Youth Programme
1 May 2021	1	>10 000 food parcels to vulnerable families in past year
1 July 2021	1	BBM West Hub opens. 9354 bookings in 90 days. Class size capped at 70
1 August 2021	1	BBM Community kitchen opens with full time chef to cook 250 healthy meals/day, 5 days/week for \$2 koha
18 August 2021	4	Move to Level 4. BBM gives out lunches intended for schools
1 September 2021	4	Increased operations of Foodbank service. Gym turned into foodbank serving community groups of 500 families with sufficient food for a week
23 September 2021	3	Move to Level 3
3 December 2021		Move to COVID-19 Protection Framework. Classes reopen. Gatherings limited to 100 people

NZ four-tier alert level restrictions system:  
 Level 1 No restrictions on personal movement or gatherings.  
 Level 2 No more than 100 people at indoor or outdoor gatherings; sport and recreation activities allowed, subject to conditions on gatherings, contact tracing and where practical physical distancing.  
 Level 3 Low-risk local recreation activities allowed; public venues closed including gyms, pools, playgrounds. Gatherings up to 10 people allowed for weddings and funerals with physical distancing and public health measures.  
 Level 4 Lockdown. People must stay home other than for essential personal movement. Safe recreational activity allowed in local area. All gatherings cancelled and all public venues closed.

well-being of Pasifika and Māori, especially in the South Auckland region. Networks, in general, are the relationships between entities, and they are conceptualised as the principal means of diffusion of community-level health and well-being innovations like BBM. Across such network flows ‘knowledge’ (characterised as knowing the what, why, who, how, where of actions to address an issue) and ‘engagement’ (dimensions such as influence, energy, confidence, power, trust and leadership).<sup>6</sup> In the context of BBM, the knowledge flows from the BBM team about classes, programmes, events, stories and information as well as between people in the network through the sharing of their stories. The engagement flows from BBM, especially from David Letele’s charismatic leadership, and between people as they share their enthusiasm and boost each other’s commitment to health and well-being. In any community programme which aims to influence health behaviours, the critical indicator of success is the sustained participation and engagement with the programme. We postulate that it is the active BBM network transmitting

high levels of ‘knowledge’ and ‘engagement’ which is at the core of BBM’s high participation and success. The network links to the various BBM outreach activities and programmes which have been developed and provided in an ongoing and organic process in response to perceived community needs towards achieving the goal of their improved health and well-being.

### Aim, research questions and objectives

The aim of this project is to conduct a process evaluation of BBM’s community engagement through its in-person, social and news media outreach activities with respect to the health and well-being of Pasifika and Māori people in their community over time. This paper describes the mixed methods protocol for that evaluation.

The specific research questions are:

*Research question 1:* What is the scope (breadth and depth) of outreach of the in-person programmes and activities, specifically delivery of exercise programmes, vaccination drives, food parcels and health screening events, over time?

Corresponding objectives for research question 1 are:

1. To describe the frequency, number of participants, geographical locations and specific characteristics of BBM exercise programmes from 2015 to the present.
2. To describe the numbers of people vaccinated against influenza and COVID-19 at specific points in time.
3. To describe the numbers of people attending: the Kai nutrition programme for the ‘From the Couch’ (FTC) programme for those with severe obesity, from October 2020; the Community Kitchen (since December 2020, with 1000 hot meals served) and then the updated Community Kitchen (opened July 2021).
4. To describe the number of people, their ethnicities, household composition and geographical location receiving food parcel support over time.
5. To describe the nature of health screening events and numbers screened at specific points in time.

*Research question 2:* How have the social media platforms enabled the BBM community to engage with the organisation and with each other over time?

The corresponding objectives for research question 2 are:

1. To assess the degree and nature of online interaction with posts, and individuals or families receiving services provided by BBM.
2. To analyse video and text data for themes of messaging and how the messages change over time.
3. To analyse how the BBM community engages with each other through social media.

*Research question 3:* How has BBM increased its community engagement through the use of news media (such as newspapers, magazines, radio, television)?

The corresponding objective for research question 3 is:  
 (1) Describe the media outlet, audience, type and topic of the content over time.

## METHODS AND ANALYSIS

### Research design, theoretical frameworks and principles

This mixed methods research project is coproduced by university researchers and BBM team members and is informed by a number of theoretical constructs.

#### Fa'afaletui

First, the use of a mixed methods approach with a range of different types and sources of data fits with the Pacific Fa'afaletui research framework,<sup>7 8</sup> whereby different perspectives are woven together to create new knowledge (from 'ways of' (fa'a) 'weaving together' (tui) deliberations of different groups or 'houses' (fale)). This is derived from the Pacific philosophy of connectiveness and a collective holistic approach.<sup>9</sup> Our team reflects this research framework as it is led by a Senior Research Fellow of Samoan and Māori descent and includes Māori researchers to advise in Māori research, senior researchers with expertise in codesign and in research aimed at reducing obesity, and researchers from a marketing background bringing experience in social media data analyses, in collaboration with BBM staff as coresearchers. Each person brings a different body of knowledge that is woven together to create this protocol.

#### Kaupapa Māori

Kaupapa Māori research prioritises Māori knowledge, language, customs and practices in research.<sup>10</sup> Its main goal is to ensure that research conducted has positive outcomes for Māori communities.<sup>11</sup> Kaupapa Māori has five key principles; tino rangatiratanga (self-determination), taonga tuku iho (cultural aspirations), ako Māori (Māori world view), 'Kia piki ake i nga raruraru o te kainga' (socioeconomic mediation) and whānau (family).<sup>12 13</sup> This study is aligned with the last two principles. First, 'Kia piki ake i nga raruraru o te kainga' acknowledges that there are socioeconomic disadvantages that Māori face.<sup>11</sup> Kaupapa Māori is often used to challenge the socioeconomic disadvantages, demeaning ideologies and power relations with which Māori are far too familiar.<sup>14</sup> For this study, 'kia piki ake i nga raruraru o te kainga' is embodied by ensuring that care is taken when the data are extracted and analysed to ensure that Māori participants of BBM experience no harm from this study.

Second, whānau is not limited to the people in a family (immediate and extended); it is also how Māori practice whanaungatanga, which is the way a family interacts and be with each other.<sup>13 14</sup> Knowledge is shared within the whānau and guarded by all whānau members from those who may misuse or exploit the body of knowledge. For this study, everyone who is involved is a part of the research whānau. This research whānau is a collective approach that places greater value on the research because of the shared vision and support of all members (researcher, community workers and community members).<sup>9</sup> This principle supports the Pasifika framework in the weaving together of different skills and perspectives within the

research team to work towards a shared goal. Overall, the use of Kaupapa Māori ensures that everyone involved in this study are working towards creating positive health outcomes for Māori communities. Our Māori researcher will oversee these processes using a Kaupapa Māori lens and the non-Māori researchers are aware of the Kaupapa Māori principles and the importance of their implementation.

#### Fonofale and Te Whare Tapa Whā

In line with the WHO declaration that 'health is a state of complete physical, mental and social well-being and not merely the absence of disease or infirmity',<sup>15</sup> the health and well-being of the Pasifika and Māori community are viewed through the lens of the Pacific (Fonofale)<sup>16</sup> and Māori (Te Whare Tapa Whā)<sup>17</sup> holistic frameworks for interpreting people's dimensions of health and well-being. These frameworks use the metaphor of a Samoan or Māori meeting-house. Fonofale has extended family and community as the floor, and cultural practices, beliefs and values that shelter people as the roof. The four house pillars or pou represent physical, mental, spiritual and other components (such as sexuality, age, gender and socioeconomic status) of health and well-being. The meeting house (fonofale) is surrounded by the physical environment, the sociopolitical context and the point in time.

The Māori health Te Whare Tapa Whā model<sup>17</sup> is very similar. The foundation of the house (whare) is the land and place of belonging (taha whenua), and the four posts are physical (taha tinana), mental (taha hinengaro), spiritual (taha wairua) and family (taha whānau) well-being. Māori believe that these four walls must be balanced and in harmony with each other to achieve good health.<sup>18</sup>

#### Consider statement

These dynamic models promote a holistic approach to health and well-being, with interaction between the components. This helps guide our understanding of the different types of outreach BBM develops in response to social need aimed at improving the overall health and well-being of their community. The consolidated criteria for strengthening the reporting of health research involving indigenous peoples (CONSIDER) statement<sup>19</sup> will also guide the conducting of the study.

#### Consumer tribe

The study is further framed using the concept of the community-driven diffusion of knowledge and engagement through social networks.<sup>6</sup> BBM constitutes, at least in part, an online community which can be characterised as a 'consumer tribe'<sup>20 21</sup>—a group of consumers with shared values, passions and beliefs who are linked together by the activities/products of a brand, that is, BBM. Although BBM is not a commercial brand, it is a branded organisation and its charismatic leader, Dave Letele, could be considered a 'human brand'.<sup>22</sup> Researchers have mainly explored consumer tribes from a Western perspective,

however, Māori and indigenous perspectives have much to contribute to understanding consumer tribes.<sup>23</sup>

In summary, this project team comprises a number of researchers with different skills and expertise, combines a mix of research methodologies and uses different theoretical frameworks, weaving together these different perspectives to answer the research questions.

### Patient and public involvement

The evaluation is coproduced with members of the community group BBM, including Letele, the founder, who have been actively involved in the design of this study, and will contribute to data collection, analyses, paper writing and dissemination. BBM members sit on the steering committee and attend all researcher meetings as equal partners in decision-making.

### Timeframe and setting

The aim is to describe the evolution of BBM's networks and outreach activities in Auckland and beyond over time from its inception in 2014 to December 2021.

### Nature and source of data

The data for this study are derived from a number of sources and include datasets derived from BBM's records, social media text, audio and video postings on Facebook and Instagram and written, audio and video news media material. Because all data are from secondary datasets, no consent will be sought. All in-person data will be deidentified prior to extraction from existing datasets. The social media data from the BBM closed group data will be obtained by BBM from Facebook in deidentified form and provided to the researchers for analysis. Data contained in BBM open social media platforms and news media will include identified individuals, as these are already in the public domain. However, the analyses will focus on key themes covered in media stories, not named individuals.

1. *In-person community engagement data* will be collated from existing BBM in-house databases and documents.
  1. Exercise class data include date, type and location of classes, number of attendees.
  2. Vaccination data include date, nature of vaccine, number delivered.
  3. Food parcel distribution data include date, number distributed, household composition, ethnicity, location (suburb).
  4. Health event data include date, type of event, number of recipients.
2. *Social media data* will be provided by BBM staff who are both page administrators and coresearchers from the following sites:
  - ▶ Brown Buttabean, public Facebook page, <https://www.facebook.com/brownbutterbean> 61k followers. Videos, comments.
  - ▶ BBM Motivation, private Facebook group <https://www.facebook.com/groups/Buttabean> 15.1k members (metrics only data).

- ▶ Open BBM website, <https://www.thebbmprogram.com/> Workouts, classes, information about programmes.

- ▶ Buttabean Motivation, <https://www.bbm.fit/Programmes> website.

- ▶ @buttabean\_motivation, public Instagram account. Videos, photos [https://www.instagram.com/buttabean\\_motivation/?hl=en](https://www.instagram.com/buttabean_motivation/?hl=en).

1. Social media metrics of activity and interaction includes audience and page insights to measure size of the audience (eg, Facebook followers) and impact of postings (eg, likes, comments, sharing). Backend traffic data from Facebook and Instagram can be extracted by page administrators without identifiable data of the persons linked to the data. Facebook will provide deidentified metric data from public and closed group pages and will be received by university researchers as numeric data.

2. *Specific postings of particular types* for in-depth (qualitative) analyses. Possible criteria for selection of posts for case studies include evidence of high level of engagement by the community, for example high frequency of posts, page views, responses (comments), reactions (emojis/emojis), shares.

- ▶ The closed group Facebook page (15.1K membership) is the best source for engagement by BBM to its members and between BBM members. We can analyse the data quantitatively but are limited in what we can analyse in terms of the content of the posts for ethical reasons. We will explore whether we can examine key themes of postings without informed consent of members.

- ▶ Testimonials on open Facebook pages - best examples for video case analyses.

- ▶ BBM Healing project.

- ▶ Before-after stories.

3. *Traditional news media outreach data* from BBM archived documents and online resources such as Newtext Plus media database. The quantitative news media metrics include date, media type, outlet, numbers of interviews conducted, reported readership (circulation). Text and transcripts of audio recordings will also be analysed.

### Data analyses

This project incorporates different types of data including empirical, narrative text, images and videos. As outlined above, the analyses will be guided by the holistic Pacific and Māori models of health, Fonofale and Te Whare Tapa Whā, with a weaving together of different methodologies in line with Fa'afaletui. The data also be viewed through the lenses of BBM as a 'consumer tribe'.

1. *In-person outreach activity analysis*: A statistical analysis of time series weekly averages will be conducted using the statistics package R to demonstrate the trends over time. These will be analysed using a generalised linear (log-linear) model. For the exercise classes, this will include weekly registrations and attendances at various classes including recording of repeat attendances, and for the

Foodbank, the number of family food parcels distributed weekly will be plotted in a graph over time, with the pertinent COVID-19 events, especially lockdowns, identified in the timeline and differentiated into three time periods: 2014 to 2019 (pre-COVID-19), 2020 (first COVID-19 lockdowns) and 2021. Key activities and changes to BBM will be indicated in the timeline graph.

2. *Social media engagement analysis*: Quantitative data imported from Facebook Insights platform will include:<sup>24</sup>

- ▶ Longitudinal analyses with time series data.
- ▶ Use of Facebook analytics Application Programming Interface (API), a software intermediary that allows two applications to communicate with each other, to identify engagement patterns on Facebook pages and how they've changed over time.<sup>25</sup>
- ▶ Determination of popular posts from which to construct case studies using a qualitative methodology.

We will use the following sampling plan: Visual data in the form of images and videos are posted by both BBM and its community members ('members') on both Facebook and Instagram. Since Instagram is the most popular visual social media platform globally,<sup>26</sup> a critical visual content analysis<sup>20</sup> of a sample of posts from both BBM and from community members will be conducted using the following steps:

Step 1: Sampling plan: As of 12 December 2021, the Instagram site [instagram.com/buttabean\\_motivation](https://www.instagram.com/buttabean_motivation) had 7974 posts and 33.1k followers. Some posts have multiple visual artefacts. These posts largely contain polyphonic data (eg, one or more photographic images, videos and textual comments made by poster and other members of the community). Clearly, it is not feasible to analyse all the visual data as the dataset contains almost 8000 visual artefacts.

Instead, it is suggested that visual artefacts be randomly selected from the following categories: two sources of posts (BBM and members) times two types of visual artefact (images, video) × three time frames (2017, 2019 and 2021). These three time frames were selected because they provide an every-other-year rationale for selecting the visual artefacts, while also spanning the entire period of operation, and include 3 years of particular interest—2017 (first year of Butterbean Motivation BBM Facebook), 2019 (last full year prior to COVID-19) and 2021 (first full year of COVID-19). We intend to randomly select 24 posts from each the two data types (Facebook; Instagram) for each of the 3 years (2017, 2019, 2021), totalling 144 posts in total. This systematically drawn random sample will be drawn from each of the six data subsets by dividing the number of possible posts in each subsets by 24. For example, if there are 480 posts on Instagram in 2021, then every 20th (480/24) post will be selected for analysis.

Step 2: Selecting analytical categories: The coding framework will be holistic to incorporate tenets of the Pasifika and Māori models. Analytical themes will map to the Fonofale and Te Whare Tapa Whā frameworks. A third of the data will be open coded—it will be read closely and

iteratively to identify codes describing, naming or classifying the phenomena under consideration.<sup>27</sup> These open codes will be augmented with insights from the textual comments made in reaction to the posts as well as media, popular culture material and academic literature related to BBM, fitness programmes and relevant theories (eg, consumer tribes). Each analytic category will be clearly explained/defined. For example, a likely initial analytical category might be whether a post is informational or motivational and whether it is about exercise, or nutrition or both. As coding progresses, it is likely that other analytical categories might emerge. For example, one might envisage categories and subcodes such as source (Dave Letele, BBM staff, BBM community members) and valence (positive or negative) of influence on outcomes (fitness, health, nutrition, other support received) to emerge.

Step 3: Coding: The analytical coding scheme will then be applied to coding the remaining two-thirds of the sample of visual artefacts posted by both BBM and community members.

Step 4: Outputs: To better disseminate our results while also protecting the privacy of community members, we anticipate that our verbal descriptions of the themes elicited by the coding might be augmented by artist-rendered depictions of example posts<sup>21</sup> to preserve privacy and avoid breaching copyright.

Examination of key themes within BBM's highly active virtual environment examining text, video and image-related data will use a combination of content and corpus analysis techniques. Qualitative text analyses will be conducted using the software NVivo, Leximancer and AntConc. NVivo will primarily be used to analyse images. Leximancer will be used to conduct a content analysis of the textual data including the large amount of social media text data to identify key themes develop and change over time.<sup>28 29</sup> These insights are displayed within Leximancer as a visual a map showing the main themes and subconcepts contained within the text as well as information about how they are related.<sup>25</sup> To supplement the insights Leximancer will provide, a corpus analysis of the same data will be conducted using AntConc, a freeware corpus analysis toolkit for concordancing and text analysis.<sup>30</sup> Corpus analysis enables analysis of a large volume of data as a whole and in regard to synchronous variation by carrying out analysis of key word frequencies and collocations within the entire or different subcorpora.<sup>31</sup> The advantage of using content analysis (Leximancer) and corpus analysis (AntConc) for text analysis, as opposed to more interpretive methods such as NVivo, is that the analysis will be less subjective<sup>24</sup> and verbatim comments can be avoided, thereby protecting the identity of posters.

The social media analyses will look at 'Consumer Tribe' and Letele as a 'Human brand'. The focus will be on capturing the context of how BBM has grown, conscious of the power of Dave's personality, to see whether the 'collective' can overcome the 'individual' in BBM's timeline/evolution to become self-sustaining (system). The

analysis will also examine the initial feature of BBM of physical activity being of utmost importance and nutrition secondary, has changed over time.

**3. News media analysis:** A corpus analysis of news media data over time according to three COVID-19 time periods (pre-COVID, 1 year and 2 years after start of COVID-19 pandemic) will be conducted and compared with real world in-person activities. The data will include audio-transcripts. This multimodal approach will facilitate understanding of the evolution of the identity of the tribe/community which is variable and changeable over time. In discourse analysis, there is a social self, which may apply to organisations and its communities, how we want to be seen, in line with identity theory.<sup>32</sup> We will look at the change in themes, such as how the ‘Letele’ brand gets replaced with other important themes. The analysis will use Leximancer software.

Outputs may include multimedia collage of findings (textual themes, videos, media) posted on a timeline or some other mapping metaphor as a visual narrative.

### Ethics and dissemination

Ethics approval has been obtained from the University of Auckland Human Participants Ethics Committee (UAHPEC) UAHPEC 23456 expiry date 04/11/2024.

Fonofale,<sup>16</sup> Te Whare Tapa Whā<sup>17</sup> and the CONSIDER statement<sup>19</sup> will guide the writing and dissemination of the findings. The findings will be published in appropriate peer-reviewed publications as well as disseminated through community fono and hui (meetings) and conferences. BBM will further disseminate the findings via their social network platforms to BBM members and followers. All team members who meet authorship criteria will be eligible for authorship. No professional writers will be used. Publication of the protocol in an open access journal will grant public access to the full protocol.

### DISCUSSION

We are currently conducting a longitudinal cohort study to measure the weight changes in BBM participants over time.<sup>33</sup> However, this current project aims to conduct a process evaluation of BBM’s community engagement over time through its in-person, social and news media outreach activities to investigate the changing nature of BBM’s response to the health and well-being needs of Pasifika and Māori people in their community.

Because far more news and social media data are available than can be fully analysed, decisions will need to be made about where we conduct a ‘deep dive’. The analytical processes will be iterative and initial findings will help direct the progress of our analyses.

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