





Enhancing the Design Quality of Purpose-Built Student Accommodation

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Executive Summary

Purpose-built student accommodation (PBSA) has emerged as a significant component of residential development in Australia's capital cities. While this new provision is important, there is often an absence of clear design guidelines in planning systems, leading local governments and other stakeholders to identify a number of issues of potential concern.

The purpose of this research is to identify approaches that assist in ensuring that high-quality built outcomes are achieved in the PBSA sector. Design quality in PBSA will support the experience of students living and studying in Australian cities, as well as contribute long-term to the quality and resilience of the built environment more broadly.

This research provides an overview of the factors, beyond state planning regulation, that might influence design quality outcomes in the PBSA property development sector. A particular focus is on those factors that lie within the scope of influence of local governments and education providers. This research therefore provides an initial assessment of the mechanisms through which government and non-government actors can influence the choices made by accommodation providers and by students.

The latter part of the report explores the current state of knowledge regarding how international students source information and make decisions about housing, based on an examination of the available research literature. This section seeks to identify the influence of various information sources, organisations and individuals, including the role of agents, education providers, friends and family, and social media.

Clearly, COVID-19 is having a major impact on the education sector, and on international students in particular. While it is too early to determine the full implications for the student accommodation sector, it is likely that student numbers will in time rebound, considering the global demand for quality education and Australia's strong reputation. In the short term, there may be opportunities for repurposing PBSA for quarantine purposes and emergency accommodation for vulnerable groups, as has occurred in Brisbane (Boucher, 2020).

The research for this report involved a comprehensive review of existing research and data sources. A database of all PBSA properties in central city municipalities was developed in order to better understand the scale and characteristics of the sector in Australian capital cities. This revealed that the municipality of Melbourne has more PBSA than any other central city municipality in Australia, both in terms of number of beds and number of properties, and accounts for over a quarter of PBSA in Australian central city municipality. All occupied, these tenants would account for around ten percent of all residents in the City of Melbourne.

Nearly three quarters of all PBSA beds in the municipality of Melbourne are in commercial PBSA properties and most commercial providers are operating large properties housing 500 to 700 tenants. The three largest providers account for 72% of beds, with Scape holding a 26% market share after its acquisition of Atira and Urbanest in late 2019, the University of Melbourne (owned and affiliated) 26% and UniLodge 20%. Three quarter of all PBSA in the City of Melbourne is commercial, with the remainder being University of Melbourne owned or affiliated.

An initial assessment was made of the use, nationally and internationally, of various non-regulatory mechanisms with potential to influence developers to adopt high standards of PBSA design. Existing published research, data and informed discussion on these mechanisms was investigated for cities with large international student populations, both in Australia and in comparable English-language destinations.

Informal consultations were then undertaken with individuals with relevant, detailed knowledge, from universities, developers, government agencies and other organisations in the sector, such as the International Education Association of Australia (IEAA) which has undertaken similar projects interstate.

Four approaches to influencing development outcomes were investigated:

- Local Government rating systems
- Industry-led accreditation systems
- Quality rating by education providers
- Quality rating by consumers

This section concludes that there is an opportunity for local governments to take a leadership role in developing design standards for PBSA, using mechanisms outside of state planning schemes. There is scope to align these standards with established quality assessment schemes, such as those used by some Australian universities and the UK National Code for PBSA. A summary of these is included in Appendix 1.

The research goes on to scope the current state of knowledge about the information sourcing and decisionmaking of international students when choosing accommodation. This considers both the initial decisions made before arrival in the host country, and subsequent changes in accommodation over the course of study. This section provides an evidence base regarding the key considerations of students in the decision-making process, and the influence of various information sources, organisations and individuals, including agents, education providers, friends and family, and social media.

Recommendations

- Recommendation 1. Governments should consider developing a planning assessment tool in consultation with industry. Following the model of the Built Environment Sustainability Scorecard, such an approach would enable governments in the short term to develop and socialise a set of design standards with key stakeholders. In the medium term, this tool would help to focus pre-application discussions and development assessment negotiations. In the longer term, the use of such a tool may be more broadly adopted and could facilitate the development of more formal design standards for PBSA.
- Recommendation 2. Governments should partner with other international education stakeholder groups in promoting the adoption of PBSA quality standards such as the National Property Accreditation Scheme (NPAS) under development by the SAA.
- Recommendation 3. Governments and international education providers should support the Student Accommodation Association to ensure that the NPAS establishes a national benchmark of tenancy management practices, and once established should adopted these standards in their engagement with PBSA providers.
- Recommendation 4. Governments should partner with the Accreditation Network UK (ANUK) in order to align their work on PBSA design standards with those that are already included in the UK National Code, but which will not be included in the NPAS.
- Recommendation 5. Governments should partner with universities that use robust quality assessment criteria to inform their accommodation advice to students. This will assist in ensuring that their work on design standards is consistent with best practice in the education sector.

- Recommendation 6. International education providers should adopt robust and consistent PBSA quality assessment criteria to inform their accommodation advice to students.
- Recommendation 7. Future research should tap large existing consumer satisfaction data sets, for example by undertaking an analysis of International Student Barometer data on the accommodation experiences of international students in Australia.
- Recommendation 8. Future research should consider undertaking focusgroup research with students in PBSA to better understand their views on criteria that might be included in design standards, and their current levels of satisfaction in relation to these.
- Recommendation 9. Future research should consider working with PBSA providers to undertake focus group research with students to better understand their decision-making in relation to subsequent accommodation choices. Students are more likely to be open with independent researchers than with PBSA staff, so such research might be attractive to accommodation providers in gaining a better understanding of satisfaction levels, preferences and decision-making strategies.

Introduction

Purpose-built student accommodation (PBSA) plays a particularly significant role in ensuring that Australian cities continue to be major destinations for internationally mobile students. International students represent a significant proportion of immigrants coming to Australia and have become economically very important to Australia's higher education sector, as well as major contributors to population and economic growth in Australian cities. Melbourne is ranked the third most desirable study destination globally, behind only London and Tokyo (QS, 2019). In 2018, the sector generated \$11.8 billion in export revenue for the state of Victoria and supported almost 79,000 Victorian jobs. Department of Education and Training data shows that education providers located in the City of Melbourne enrol around half of the Victorian international higher education student population. Design quality in PBSA will support the experience of students studying and living in Australia and can enhance student wellbeing significantly, as well as protecting the long-term quality, resilience and adaptability of the built environment in city centres and university precincts.

The purpose of this research is to explore how governments, education providers and other international education stakeholders can ensure that high-quality built outcomes are achieved in the purpose-built student accommodation (PBSA) sector. The report provides an overview of the factors, other than state planning regulation, that can influence design quality outcomes in the PBSA property development sector.

The latter part of the report aims to provide an evidence base regarding the key considerations of students in the decision-making process, and the influence of various information sources, organisations and individuals, including the role of agents, education providers, friends and family, and social media. It considers students' initial housing choices upon arrival in Australia and decision making about subsequent housing options once they are settled.

Background

There is a growing body of evidence that the design of student accommodation impacts both student well-being and academic outcomes, and this is reflected both in scholarly research (Brown, Volk & Spratto, 2019; Devlin et al. 2008; Wang et al. 2004) and in industry reports on trends in the sector (Jackson et al. 2019). However, this area is not extensively regulated in many jurisdictions and poor design could result in outcomes that are not in the best interests of students, the education sector or the broader community.

The academic literature on the relationship between student accommodation design and social and educational outcomes has highlighted the role of design in creating spaces for informal interaction. Older studies (Brawne et al. 1967, Heilweil 1973) had demonstrated the importance of these spaces, and the interactions they facilitate, for student satisfaction (Davis & Roizen 1970) and wellbeing (Baum & Davis 1980). Subsequent studies have had similar findings. Al-Homoud and Abu-Obied (2003), for instance, found that the spatial layout of outdoor areas can affect university students' perceptions of social interaction and create opportunities for casual exchanges, while Samura (2016) found that building designs which support frequent interactions of various types are linked to improved student wellbeing.

While most social interactions in student residencies are in close proximity to bedrooms, traditional dormitory style accommodation has been found to provide an environment which allows students to meet a greater number of people in a more meaningful way than in suite-style dwellings (Brandon 2007). Students housed in traditional dormitories are also more satisfied with their accommodation due to the social aspects of their living environment, despite suite-style housing types being generally better appointed (Eshaghi & Khozaei 2016).

Another line of inquiry has focused on the detailed design of private spaces (Clemons, Banning & McKelfresh 2005) and opportunities for personalisation. Hansen and Altman (1976) had linked the personalisation of students' private space to academic performance and retention, while more recently Samura (2016) has linked the ability to personalise private space with student wellbeing.

Interviews with government planning and urban design staff, and with student wellbeing staff at universities, revealed views about design quality of commercial PBSA that are broadly consistent with the literature. The main design criticisms relate to the extent of provision, quality and distribution of common areas and spaces for incidental interaction. PBSA that provided 'more generous communal spaces', at a 'range of scales from quite intimate to larger areas' and 'distribution of communal facilities through every level of the building' were viewed as more positive design outcomes. A diversity of room types was also viewed as positive. However, the small size of some individual rooms, and the introduction of a so-called 'Jack and Jill' configuration, where individual room size is less than a car parking space, has raised concerns about student amenity.

Concern was expressed about PBSA that offered only small studio-style accommodation in multi-storey buildings with limited distribution of communal areas, and limited opportunities for incidental meetings around lift lobbies or in communal corridors. Another issue with this type of building is its limited potential for future adaptability to other uses. These often very large buildings have been designed to provide fixed-term accommodation for a specific resident cohort. Generally, PBSA is not covered by the design standards applicable to residential (Class 2) apartment buildings and, if their use were changed, would not conform to these without substantial alteration.

A shortage of high-quality student accommodation has been a longstanding concern of governments, education providers and students. In 2015 Australia's peak body for international education warned that while Australia continues to rank among the world's most popular countries for international students, we do not compare well on the quality and cost of accommodation (Burke, 2015). The concern was that if international student numbers increase as forecast, the shortage of affordable, quality student accommodation would become increasingly acute (Ziguras, 2015). At that time Australia had very low levels of purpose-built student accommodation but it was already clear that investment was beginning to increase.

As discussed further in the Context section below, the five years since 2015 have seen much greater coordination between governments, education providers, developers and other stakeholders, creating an investment surge that has resulted in a rapid increase in the supply of accommodation for students. These new facilities are very different from earlier styles of students' accommodation, in both scale and design, and yet the regulatory frameworks governing new developments across the country are inconsistent and often relatively 'light-touch'.

This research explores the mechanisms through which government and non-government actors are able to influence the choices made by accommodation providers and by students in ways that will support the adoption of design standards that better support the wellbeing of students.

Approach

The research involved a comprehensive review of existing research and data sources, which are listed throughout the report. A database of all PBSA properties in central city municipalities was developed in order to understand better the scale and characteristics of the sector in Australian capitals. This data is presented in the Context section below.

Interviews with individuals with detailed knowledge of the international student accommodation sector were conducted, including representatives of the Asia-Pacific Student Accommodation Association (APSAA), Student Accommodation Association (SAA), International Education Association of Australia (IEAA), RMIT University, the University of Melbourne, and i-Graduate. These identified additional internal and commercial research and data sources.

Recognising the diversity in the international student population, particular attention was given to research that considers the impact of nationality, age, gender, level of study (secondary, ELICOS, undergraduate, postgraduate), and study duration.

The research is presented in two parts:

1. Analysis and Assessment of Non-Regulatory Mechanisms to Influence the Design Quality of Student Accommodation

An initial assessment was made of the use of various non-regulatory mechanisms with potential to influence accommodation providers to adopt high standards of PBSA design. Existing published research, data and informed discussion on these mechanisms was investigated for cities with large international student populations, both in Australia and in comparable English-language destinations.

Informal consultations were then undertaken with individuals with relevant, detailed knowledge, from universities, developers, government agencies and other organisations, such as the IEAA which has undertaken projects in Sydney and Brisbane.

Four approaches to influencing development outcomes were identified and further investigated:

- Local Government rating systems
- Industry-led accreditation systems
- Quality rating by education providers
- Quality rating by consumers

2. Scoping the Current State of Knowledge about the Information Sourcing and Decision Making of International Students

There is extensive research in the public domain concerning consumer decision-making when considering international study options, but less information about how international students choose their accommodation. The second dimension of the research examined what is known about international students' decision making. This was to ensure that engagement by stakeholders was informed by the best available evidence regarding the ways in which accommodation decisions are made.

This considered both the initial decisions made before arrival in the host country, and subsequent changes in accommodation over the course of study. The aim is to provide an evidence base regarding the key considerations of students in the decision-making process, and the influence of various information sources, organisations and individuals, including the role of agents, education providers, friends and family, and social media.

Gaps in the existing evidence base are identified and recommendations made for future research that would be able to provide insights to guide effective engagement by governments and education providers.

Context

Australia is unique among English speaking countries, in having the only higher education system where domestic students primarily study at a local university and hence are much less likely to relocate for the purpose of study. The prevailing student housing model that developed in Australia has therefore been a commuter student model. Prior to 2000, students requiring university accommodation represented a small minority of the overall student population on most Australian campuses, unlike in the UK, USA, Canada and New Zealand, which have had a much higher proportion of students living on or near campuses in PBSA (Burke, 2015; NSW Parliament, 2011).

As international student numbers have grown, to the point where Australia is the most internationalised major university destination globally, the comparative under-supply of PBSA in Australian capital cities has become a focus of governments, education providers and investors (Ziguras, 2015). In the past few years numerous reports on market opportunities, for example by CBRE Australia (Jiong, 2019), Savills (2018) and Urbis (2019a; 2019b), have touted Australia, and Melbourne in particular, as having the world's most attractive conditions for investment in PBSA. Investment in student accommodation is driven by the increasing mobility of students, emergence of multinational PBSA developers, and a desire by investors to diversify portfolios (Urbis, 2019a, p.14). The resulting investment boom is set to see the number of PBSA beds in metropolitan Melbourne grow from around 18,000 in 2016 to over 30,000 by 2021 according to Colliers International (2018, p.12).

As well as dramatic increases in scale, the character of PBSA has changed significantly (Walker, 2016). Early Australian PBSA was relatively small-scale and closely affiliated with universities, religious orders and other not-for-profit organisations. Consequently, regulatory frameworks governing the sector were relatively light. Commercial investment in large-scale properties by for-profit providers poses significantly higher risks. According to City of Melbourne data, between 2011 and 2018, the average height of PBSA projects increased from 5 to 24 storeys and the average number of beds per property increased from 82 to 579! The largest application comprised 901 beds across 49 storeys, while the tallest building is 63 storeys with 740 beds.

While older forms of PBSA cater primarily to domestic students, newer commercial off-campus PBSA is much more focused on international students (McDonald, et al. 2015), who are more vulnerable to social isolation and exploitation due to having fewer local support structures in place. There is concern amongst some in the sector that regulatory frameworks for PBSA have not been strengthened quickly enough to manage the increased risk.

Scale and significance of PBSA in Australia's capital city central municipalities

A database of PBSA in Australia's central city municipalities was developed for use in this research project. This included property details such as ownership, type, location, local government area and bed numbers. The data was gathered through comprehensive searches of the websites of university accommodation services, accommodation providers and commercial accommodation booking sites. This was then checked against published studies, such as University Colleges of Australia's 2014 census (McDonald et al., 2015). Where bed numbers were unavailable in the public domain, data was obtained from providers directly. Both existing properties and those under construction and due for completion in 2020 were included.

Table 1 shows the total number of PBSA beds and properties provided by universities and commercial providers in the central city municipalities of all Australian state and territory capital cities, either complete or due for completion in 2020. Also shown in Table 1 is the national distribution of capital city PBSA beds, and these as a proportion of the total resident population for each central city municipality. The municipality of Melbourne has more PBSA than any other central city municipality in Australia, in terms of both the number of beds and number of properties, and accounts for over a quarter of PBSA in all Australian capital city Council and the ACT (Canberra) is spread over a much larger geographical area than in the other municipalities.

As a share of the resident population of each municipality, it is notable that were PBSA beds in the municipality of Melbourne all occupied, these tenants would account for ten percent of all residents. This proportion is higher still in Adelaide and Perth, which have fewer central city residents overall. For the other municipalities with large numbers of PBSA beds—Brisbane, Sydney and the ACT—these tenants account for a significantly smaller share of the city's residents.

Total	66,870	45,468	21,402	209		100%
City of Darwin	663	303	360	2	0.8%	1%
City of Hobart	2,083	0	2,083	12	3.8%	3.2%
City of Perth	3,477	1,297	2,180	8	11.3%	5.2%
City of Adelaide	5,608	4,166	1,422	23	18.8%	8.4%
ACT (Canberra)	9,171	5,699	3,472	28	2.1%	13.7%
City of Sydney	11,752	7,966	3,786	33	4.5%	17.6%
Brisbane City Council	15,302	12,154	3,148	42	1.2%	22.9%
City of Melbourne	18,907	14,028	4,879	61	9.9%	28.3%
	Total Major PBSA Beds	Commercial PBSA Beds	University Housing Beds	Major PBSA Properties	PBSA Beds as Share of Municipal Resident Population	Share of Australian CCM Major PBSA Beds

Table 1: PBSA in Australian Central City Municipalities

Source: Authors.

While other locations (regional and suburban metropolitan) were not included in the database, it was apparent that across Australia commercial PBSA is very highly concentrated in central city municipalities, while university housing is more widely distributed. Similarly, the vast majority of Victoria's commercial PBSA properties are located within the City of Melbourne (Melbourne CBD), while university owned housing is more widely spread across university campuses in metropolitan Melbourne and in regional centres.

The data in Table 1 makes clear how the growth of PBSA has contributed to dramatic changes in population in central city municipalities, especially the City of Melbourne, which is now much larger, educationally engaged and international than a decade ago, as the Census data in Table 2 demonstrates.

Table 2: Municipality of Melbourne Demographic Profile

	2011	2016
Population Total	93,625	135,969
Attending a Higher Education Institution	22,495 (24.0%)	38,677 (28.5%)
Born Overseas	58.9%	67.3%
Speaking a Language Other Than English at Home	49.3%	59.5%

Data sources: ABS, 2013; ABS, 2017.

Table 3 shows PBSA providers, bed numbers and properties within the municipality of Melbourne. Nearly three quarters of all beds are in commercial PBSA properties.¹ After the acquisition by UK-based Scape Student Living Ltd of both Atira and Urbanest in late 2019, the three largest PBSA providers account for 72% of beds, with Scape holding a 26% market share, The University of Melbourne (owned and affiliated) 26%, and UniLodge 20%.

Most commercial providers are operating many properties, housing 500 to 700 tenants, with the exceptions being some of the smaller properties of The University of Melbourne, several UniLodge sites, Student Housing Australia and Birch Ridge.

Table 3: Major PBSA Providers in the Municipality of Melbourne

Provider	Beds		Properties
Scape	2232		3
Atira (recently acquired by Scape)	1359	4906	2
Urbanest (recently acquired by Scape)	1315		3
University of Melbourne (owned and affiliated)	4879		17
UniLodge	3773		16
Journal Student Living	1391		2
The Student Housing Company (GSA)	1056		3
Student Housing Australia (SHA)	975		11
Campus Living Villages (CLV)	648		1
Dwell Student Living	616		1
Iglu	594		1
Birch Ridge	69		1
Total	18,907		61

Source: Authors.

¹ This distinction is not always clear, since some university-owned properties are managed by a commercial operator. Three of The University of Melbourne's properties, comprising 924 beds (Lisa Bellear House, UniLodge Lincoln House and University Apartments), are operated by UniLodge. These have been included in the University of Melbourne total in our count.

Analysis and Assessment of Non-Regulatory Mechanisms to Influence the Design Quality of Student Accommodation

This section of the paper outlines four potential non-regulatory approaches to improve the quality of student accommodation. These will describe the approach and how it is being used and applied elsewhere, offer an appraisal of its potential applicability and effectiveness, discuss implementation strategies and requirements, and identify any issues of possible concern. These chapters each include several case studies of the most relevant models identified. A consistent and coordinated approach to implementing a range of these mechanisms would send a clear signal to providers and developers. This project will provide insights into the feasibility of consistent ratings based on experience locally, nationally and internationally.

1. Local Government Rating Systems

There are two different ways that local governments can seek to influence quality outcomes in the PBSA sector through their direct spheres of influence. The first is in their role as a planning and development consent authority, and the second is where they are empowered to act as an enforcement agency for upholding agreed property and tenancy management practices. Only in the first capacity are councils usually able to influence building design outcomes specifically.

Rating tools or systems are sometimes used by local governments in planning application and approval processes to improve outcomes and raise public awareness of what constitutes both good and poor practice in the design of housing or other developments.

The UK's *Building for Life* and Victoria's own *Built Environment Sustainability Scorecard* (BESS) are prominent examples of this strategy. Such tools are intended to foster shared expectations, highlight areas of achievement and concern, and provide a common language for discussions during planning and development assessment negotiations. An approach similar to this could be taken in the assessment of planning applications for PBSA, and in pre-application discussions or development negotiations. This could be achieved either by development of a specific tool or through modification or extension of existing tools.

This section reviews some of the planning assessment tools currently in operation in Victoria, elsewhere in Australia, and internationally. International examples specific to student housing are also identified, although the very different powers of local government and their status within different national governance systems must of course be noted.

Another point to note is that different approaches adopted by local governments also depend upon the intended outcomes of any attempt to influence or intervene in markets. A desire to increase supply of student housing or encourage new entrants to the market would require different policies or approaches to those deployed where higher building design and performance standards are intended.

Finally, any tool adopted to augment a statutory planning process is of course used within the context of that wider regulatory and policy environment and needs to be an appropriate fit with existing regulations and processes.

Planning Assessment Tools

Planning assessment tools are not planning requirements or statutory processes as such, but they can help to facilitate development assessment in the interests of all parties, by articulating preferred outcomes and providing a common framework. This is especially useful in discretionary and performance-based planning systems.

Built Environment Sustainability Scorecard (BESS)

BESS is an assessment tool that was created by local governments in Victoria. It assists proponents to show how proposed development demonstrates sustainable design at the planning permit application stage. BESS was created through the amalgamation and refinement of two previously existing tools, each developed by local governments within the Melbourne metropolitan region:

- STEPS, originally developed by the City of Moreland to assess residential buildings, and
- Sustainable Design Scorecard (SDS), originally developed by the City of Port Phillip to assess non-residential buildings.

These tools supported the Sustainable Design Assessment in the Planning Process (SDAPP) framework, adopted by the Council Alliance for a Sustainable Built Environment (CASBE), a consortium of Victorian local governments auspiced by the Municipal Association of Victoria (MAV). SDAPP existed as a Council-led, non-regulatory initiative to improve sustainable development outcomes before State regulation was in place. CASBE now maintains the BESS tool, which is used by many local Councils.

BESS addresses environmentally sustainable design (ESD) issues affecting energy and water consumption, waste reduction, water and waste management, and indoor environment quality. The latter includes daylight access, natural ventilation and thermal comfort.

Before the introduction of the Better Apartment Design Standards in Victoria in 2017, BESS and its precursor tools played an important role in helping local councils to raise issues of concern with developers during the planning process, in defining the expectations of good practice, and in providing proponents with useful guidance on how to achieve preferred outcomes.

BESS could be used in the assessment of PBSA. A similar tool or additional criteria could also be developed to address any concerns specific to PBSA and not covered presently within the planning system.

Building for Life

Building for Life is a design quality assessment tool in the UK that uses a traffic light system to assess a range of design criteria for new housing developments. Building for Life was developed jointly by the UK Home Builders' Federation and the Commission for Architecture and the Built Environment (CABE) in 2001 and was used initially to audit and benchmark completed housing schemes. From 2003, CABE began to encourage use of the tool as a means to achieve good design during the planning assessment process. Consequently, a growing number of local authorities began to integrate Building for Life into their policy frameworks in different ways, while other government agencies also started to reference Building for Life criteria when developing quality assessment measures and processes.

In 2008, the UK government requested that local authorities use Building for Life to measure progress in improving design quality, and subsequently incorporated this as a key indicator in their reporting requirements. An accreditation program for assessors was developed by CABE to ensure consistency in the application of Building for Life criteria. A rating scheme, based on the assessment criteria, was also introduced, with higher performing schemes being able to achieve a 'silver' or 'gold' Building for Life standard. The program, along with its design criteria, has been through several revisions since it was first broadly adopted, and continues to be used.

The Building for Life model has been emulated widely outside the UK and has influenced some schemes in Australia. The City of Maribyrnong, among other Melbourne councils, has experimented with a traffic light system for design quality assessment in planning processes, and the Liveable Housing Design Guidelines has a silver and gold standard accreditation process based on Universal Design criteria.

Liveable Housing Design Guidelines

The Liveable Housing Design Guidelines were released in 2010 following a national dialogue between industry bodies and the Australian government about Universal Design. Liveable Housing Australia (LHA) is the organisation that emerged from this process and oversees implementation of the guidelines. Buildings can be accredited as Silver, Gold or Platinum standard according to their assessment against fifteen Universal Design criteria. The process is voluntary, and assessments are carried out by registered practitioners.

In 2019 LHA assisted with developing the Specialist Disability Accommodation (SDA) Design Standard to provide national guidance for the design of specialist housing for people living with a disability.

Planning Incentives

Planning processes can sometimes be expedited, or particular planning requirements be relaxed, as an incentive to developers to deliver other, pre-defined outcomes in the public interest. This is unlikely to be a strategy that local governments in Victoria can implement without State sanction, but it has been used elsewhere in Australia for PBSA development.

Brisbane City Council

The large Brisbane City Council has used a planning incentive scheme to encourage increased provision of well-located, affordable student housing in central Brisbane. The Student Accommodation Charges Reduction Procedure, as it is known, reduces the developer levy per apartment for student accommodation by approximately \$4,000 per studio apartment and \$8,000 per two-bedroom apartment, compared to the usual \$12,000 and \$28,000 respectively (Honeywood, 2016, p.7). Alongside this, Queensland Urban Utilities also agreed to reduce their infrastructure charges for approved projects.

In order to access the levy reduction, development was required to meet the following criteria:

- 1. Maintain an on-site management presence to limit the noise impact of students in a neighbourhood
- 2. Comprise a minimum of 20 student bedrooms
- 3. Provide community ancillary spaces (e.g., common lounge, billiard room, etc.)
- 4. Be undertaken by a *bona fide* student accommodation developer (who will build, own and manage the facility and can demonstrate proof of a relationship with at least one university)

If the developer has a poor track record, the levy reduction is not approved. The introduction of the Brisbane City Council's student accommodation priority policy saw a significant increase in additional approvals as a direct result, with approximately 8,000 additional beds in 2014-15 (Honeywood, 2016, p.7).

Accreditation Schemes

In some jurisdictions, governments operate their own provider accreditation schemes in cooperation with universities. These are voluntary for accommodation providers but can have significant impact if universities and other agencies agree to only refer students to accredited providers.

In the UK for example, Sheffield City Council has an accreditation scheme for private student accommodation providers, known as 'Snug'. According to Sheffield City Council, "Snug is a property inspection standard which is awarded when homes meet the required standard of property and tenancy management, and the landlord is considered 'fit and proper'." Property owners pay for registration and the universities only refer students to registered providers.

The Snug program is aimed at improving oversight of private landlords who want to make multiple occupancy dwellings available for student accommodation. This is not the same as PBSA, of which Sheffield City, which hosts two Universities, also has a substantial stock. PBSA does not come under the Snug scheme and Sheffield City Council has elsewhere raised concerns about the quality of PBSA in the city (Sheffield City Council 2014, p.21).

Accommodation Advice for Students

In Australia and comparable international education destinations, various government agencies provide advice and support to international students. The main means of providing accommodation advice to students is through agencies that began as destination marketing initiatives, but over time most have extended their role to also provide student support services and social inclusion activities. The Victorian government's Study Melbourne has been a leader in this space, and the work of its Student Centre has received wide acclaim and is being emulated in other Australian jurisdictions such as Study Perth, Study NSW, Study Adelaide, and Study Gold Coast. These agencies are a key point of contact between governments and international students and appear to have significant untapped potential in relation to accommodation issues.

Nationally, the Study in Australia website is the Australian Government's official resource for international students, includes an <u>accommodation page</u> but its guidance is very limited. The only information on PBSA is as follows:

Purpose-built student accommodation are residences specifically for students. The options range from studio apartments to shared rooms with up to 16 beds, with shared communal areas and facilities. The residences are often centrally located and near public transport, making it convenient for getting around a city. Bills such as electricity and internet are generally included in the advertised cost, so the cost of living should not change from month to month.

Similar statements appear on most government sites, and while they do inform students about some of the pros and cons of different types of accommodation, they do not help students to choose between PBSA providers.

Study Adelaide

The international student destination group Study Adelaide has a unique and dedicated website at <u>www.adelaide</u> <u>studenthousing.com.au</u>. This website contains substantial information about student accommodation providers in Adelaide and links well with information related to all Universities, VET and ELICOS providers, all in one, centralised place. It serves as a potential template for other destination study groups, such as Study Melbourne, in highlighting appropriate student accommodation. It operates on an inclusion/ exclusion model for listings, rather than specifying quality ratings of individual sites.

Study Melbourne

Study Melbourne, which is Melbourne and Victoria's destination marketing and student support brand, has built a very strong reputation amongst the international student community and associated sectors, all on a modest budget considering the great number of international students in Melbourne. Study Melbourne provides only limited commentary and information on housing options and does not comment on quality. There is opportunity to develop more comprehensive and targeted advice to international students about accommodation options in Melbourne using this service.

Conclusion and Recommendations – Government Schemes

Local government has an important place as a manager of decision-making processes in the planning system and in negotiating development outcomes, even where it does not define the statutory process or determine the requirements for development consent. There is scope within the development assessment process for issues to be raised and frameworks used that can incentivise better performance and outcomes without necessarily mandating them. This section of the report has highlighted some examples of this, from both local and overseas jurisdictions, that are not specific to PBSA, but which could be applied to this type of accommodation or else used as a template for a more targeted tool.

- Recommendation 1. Governments should consider developing a planning assessment tool in consultation with industry. Following the model of the Built Environment Sustainability Scorecard, such an approach would enable governments in the short term to develop and socialise a set of design standards with key stakeholders. In the medium term, this tool would help to focus pre-application discussions and development assessment negotiations. In the longer term, the use of such a tool may be more broadly adopted and could facilitate the development of more formal design standards for PBSA.
- Recommendation 2. Governments should partner with other international education stakeholder groups in promoting the adoption of PBSA quality standards such as the National Property Accreditation Scheme (NPAS) under development by the SAA.

2. Industry-Led Schemes

This section explores the role of industry-led and operated quality accreditation schemes for student housing. As the field of suppliers and operators of student accommodation has become more extensive and diverse in recent years, peak body and industry associations have been developing their own codes of practice and accommodation standards to assist member organisations in differentiating quality products and services from 'unofficial', disreputable and poor-quality providers. PBSA providers and the associated industry are in particular trying to clearly differentiate themselves from boarding and rooming houses and alike at the much financially cheaper end of the sector.

The section describes the two main Australian-based industry associations and the moves each has made to articulate an agreed set of accommodation standards, and the impact and outcomes of these processes so far. In other jurisdictions, the UK and NZ in particular, these processes are more advanced and accreditation systems and defined quality standards already exist. An overview of their content and operation is provided, along with a qualified assessment of their effectiveness and success.

The potential for local governments to influence or participate in the development and implementation of industry-led mechanisms to ensure quality is considered. Also discussed is the likelihood of such schemes and systems to influence design decisions during the development process and to promote fruitful negotiations during development assessment in the planning system.

In Australia, there are three main organisations representing the interests of PBSA providers: University Colleges Australia (UCA), Asia-Pacific Student Accommodation Association (APSAA), and the Student Accommodation Association Incorporated (SAA). Below is an overview of each and their involvement (or otherwise) in potential non-regulatory mechanisms that could influence development in the PBSA sector.

University Colleges Australia (UCA)

University colleges have the enviable position of being located on campus and having a well-established reputation. University Colleges Australia does not set any industry design standards or have an agreed code of practice. With the recent growth of competition from commercial PBSA providers, university colleges may be interested in quality ratings and accreditation systems if they judge that these would allow them to differentiate their accommodation offerings and services from lower quality providers in an increasingly competitive market.

Asia-Pacific Student Accommodation Association (APSAA)

The Asia-Pacific Student Accommodation Association was formed around 1990 and has been for years the major peak body for the sector in Australia. The Board of APSAA includes representatives from university colleges, oncampus university housing and universities themselves. UniLodge and Campus Living Villages, which operate the significant share of PBSA in Australia, have been active members of the organisation for some time. Until recently APSAA was the undisputed peak-body for student housing in Australia, but now competes significantly with the SAA (discussed below) for membership and influence.

APSAA works closely with the key international organisation in this space, the US-based Association of College and University Housing Officers - International (ACUHO-I), runs an annual conference, and provides professional development programs. Although APSAA is Asia-Pacific in name, in practice it has an Australian focus with some involvement from New Zealand and lesser in SE Asia.

APSSA has produced a set of Industry Guidelines that are available to members through the APSSA website. Access to the Guidelines is restricted to members, but a copy was provided by APSAA for this study once requested.

APSAA is opposed to further quality assessment schemes for PBSA and believes that additional regulation of their member organisations would create perverse outcomes for the industry. The hotel sector was cited as an example, where providers go to considerable lengths to ensure 'star' ratings, even though some of these measures are apparently of little interest to some consumers.

APSAA advocates that any new regulation should be focused on the bottom of the market, including informal boarding houses and rooming houses targeted at international students, which are comparatively a lot more affordable than PBSA.

APSAA considers that a rating scheme focused on physical building and design characteristics alone would not be effective in assessing overall quality, since social and operational factors are also very important to student occupiers.

Student Accommodation Association Incorporated (SAA)

The Student Accommodation Association Inc. came into being as a national body in Australia in 2018, having begun life in 2016 as the Adelaide-specific South Australian Student Accommodation Association (SASAA). Board members are now representatives from Australian universities, university-affiliated residential colleges, the major PBSA providers, university colleges, universities and the state governments.

The SAA has been developing a National Property Accreditation Scheme (NPAS), independently of the APSAA for years. This process is well advanced, with the NPAS currently slated for a late 2020 release, after delays. It has wide-ranging support, with endorsement by Study Perth, Study NSW, Study Queensland, Study Adelaide, City of Adelaide, multiple universities, many of the large private PBSA providers and the International Education Association of Australia, among others. The largest PBSA provider in Australia Scape joined the SAA in mid-July this year and from early September also sits on its newly elected board.

The details of the NPAS remain confidential but SAA has indicated that it will include indicators clustered under four broad elements:

- Business profile
- Facility and amenity requirements
- Management
- Operational plan

Our understanding is that design characteristics of the property are not included in the NPAS; the second element simply asks only whether the building has approval from the appropriate authority to be used for student accommodation. It appears that student accommodation providers have been opposed to the inclusion of design characteristics into such a system.

Star Ratings for Tourist Accommodation

The longstanding Star Ratings system for tourist accommodation was operated by Australian automotive associations until 2017, when the associations felt that it had become redundant due to the proliferation of consumer feedback platforms such as TripAdvisor and the proliferation of AirBnB. At the time, the CEO of the national body owned by the associations and which ran the system explained that "In a digital world, where consumers can provide online reviews, and with more accommodation providers choosing to self-rate, the Star Ratings scheme has found its independent review model increasingly unsustainable" (Clark, 2017).

The scheme was saved from closure by the Australian Tourism Industry Council which currently runs it. Star Ratings hold the exclusive rights to use the internationally known star rating system for accommodation in Australia, with a sliding scale of one to five stars representing quality of accommodation as a key market signifier to the consumer.

A similar scheme, Qualmark, operates in New Zealand and unlike the Australian Star Ratings, it includes a Student Accommodation category. The criteria for the Student Accommodation Qualmark were developed by Massey University and the University of Auckland in association with the New Zealand Association of Tertiary Education Accommodation Professionals (JLL, 2016, pp.90-1). The Student Accommodation assessment criteria are not publicly available and were not able to be accessed for this research. Currently only 13 properties hold a Student Accommodation Qualmark licence, 12 of which are affiliated with Massey University.

Industry stakeholders point to the limited engagement with such rating schemes in the tourist accommodation sector, arguing that such authoritative and institutional quality assessments are now unnecessary due to the wide availability of consumer ratings (KPMG, 2018).

The United Kingdom National Code

This study has not uncovered any other student accommodation quality assessment schemes in other developed English-speaking countries apart from the UK, where there are several quite developed systems. The UK system has informed the development of the NPAS, with leading figures in the SAA having visited the UK in 2018 to study the framework and its impact on providers.

The UK's highly regarded code of practice for student accommodation, the *National Code for Assured Accommodation* (known as the *National Code*), has established a clear, detailed set of standards and an accreditation process. It has been in place since the beginning of 2005, with the most recent amendments coming into effect in June 2019. The *National Code* is primarily focused on management and operational issues rather than design standards; a list of topics included in the Code is included in Appendix 2.

Currently there are two variants of the UK National Code, covering different types of accommodation:

- ANUK / Unipol Code of Standards for Larger Residential Developments for student accommodation managed
 and controlled by educational establishments, 2019
- The National Code of Standards for Larger Developments for student accommodation NOT managed and controlled by educational establishments, 2020

Interestingly, while National Code accreditation is voluntary, it is 'endorsed' by an Act of Parliament, which provides additional legitimacy for the scheme. It is supported by the higher education peak body Universities UK and Unipol, a not-for-profit student accommodation organisation in the North of England. The Code is administered by the Accreditation Network UK (ANUK), which is a division of Unipol.

Unipol has developed a Star Rating System that is used to rate properties available on its website and points are awarded for desirable attributes. The rating criteria are provided in Appendix 3. The star ratings are not visible in accommodation listings on the Unipol website, so this system may be in development or have been abandoned.

Conclusion and Recommendations – Industry-Led Schemes

There is a shared interest among quality PBSA providers, education providers, and governments for the development and promotion of a shared set of expectations in terms of accommodation. The NPAS scheme by SAA has garnered widespread support, and although the detail has not been made publicly available, it is likely to result in the emergence of some sort of a quality badge that could be reflected in advice provided by government agencies and education providers.

However, the primary focus of industry quality assurance and accreditation schemes is on tenancy management practices. Few, if any, of the factors and issues addressed by such schemes concern the design and physical provision of buildings. Some exceptions to this are expectations around the provision of common spaces and provisions of certain services at the building entrance.

Key building performance and amenity standards are absent from these schemes, including those relating to daylight, ventilation, acoustic and thermal performance, internal space standards, outdoor space requirements, lift provision (i.e. ease and quality of vertical circulation), disposition of common areas in large buildings, provision of laundry services, waste management and overall energy performance.

Strong pushback from industry against quality assessment of the physical design characteristics of buildings mean that such factors are very unlikely to feature in industry self-accreditation schemes. While such schemes may bring other benefits, alternative additional approaches will be needed if built form, building performance, student amenity and wellbeing issues are not addressed.

- Recommendation 3. Governments and international education providers should support the Student Accommodation Association to ensure that the NPAS establishes a national benchmark of tenancy management practices, and once established should adopted these standards in their engagement with PBSA providers.
- Recommendation 4. Governments should partner with the Accreditation Network UK (ANUK) in order to align their work on PBSA design standards with those that are already included in the UK National Code but which will not be included in the NPAS.

3. Quality Rating by Education Providers

Educational institutions have an obligation under the *National Code of Practice for Providers of Education and Training to Overseas Students 2018* to provide commencing international students with details of "accommodation options and indicative costs of living in Australia" (Standard 2.1.11). All large educational institutions provide guidance for students on their websites, send welcome packs to commencing students before arrival in Australia, and provide on-campus support for sourcing accommodation and dealing with potential related problems. International students use the limited university accommodation services at higher rates than local students (Judd, 2013, p.127). Where there is a large number of PBSA providers in proximity to an institution, education institutions must make choices about which to recommend.

A detailed assessment of the PBSA referral practices of universities with campuses in the Melbourne metropolitan area was undertaken for this study. While most do not have major campuses in the municipality of Melbourne, they are nonetheless significant for this study as they reveal much about the strategies of universities in general. Many of their students are likely to reside in PBSA in the municipality of Melbourne due to the concentration of almost all commercial PBSA providers in the City and the hub-and-spoke character of the city's public transport system.

Universities typically distinguish between 'on-campus' university housing and residential colleges and 'offcampus' commercial PBSA. There are three main approaches to referring students to commercial PBSA, which we will call 'proprietary', 'commercial' and 'quality' approaches. Details of each university's approach are provided in Appendix 4. The three approaches are:

- The proprietary approach involves referring students only to university housing and residential colleges and not providing any information about independent PBSA. This approach is adopted by Deakin, La Trobe and Federation universities.
- The commercial approach does list some independent PBSA, but only those with a commercial relationship with the university. This approach is adopted by the University of Melbourne and Monash, Victoria and Australian Catholic universities.
- The quality approach lists all independent PBSA that have been endorsed through a quality assessment process. This approach has been adopted by RMIT University.

Two universities are difficult to classify. Swinburne University and Central Queensland University's Melbourne campus list some, but not all, independent PBSA providers but it is not clear how the selection has been made.

This analysis suggests that commercial factors dominate universities' advice to students about PBSA options. It is understandable that universities would seek to direct their students to accommodation options that they either own or in which they have a commercial stake. This does not mean that quality is not a focus, since universities may have greater ability to influence and assure the quality of providers that are under their control.

The implication for the quality rating schemes are mixed. One of the reasons for universities not to recommend independent PBSA may be their inability to vouch for the quality of the providers that they recommend, unless they undertake a very involved quality assessment such as RMIT has done. An independent quality assessment such as SAAs' NPAS may lead to universities having the confidence to list a wider range of (accredited) providers, especially if it is expanded to address built form and student wellbeing issues holistically.

Conversely, it could be the case that commercial imperatives will make universities wary of supporting independent quality assessment processes if they feel that the quality ratings may undermine their ability to preference their own preferred university-affiliated providers.

We will now consider the ways in which quality figures in the recommendations of the two largest education providers in the City of Melbourne, the University of Melbourne and RMIT University.

The University of Melbourne

The University of Melbourne has the most PBSA stock of any Australasian university, with approximately 4879 beds, all of which are located within the municipality of Melbourne. This encompasses university-owned residential colleges (411 beds), affiliated residential colleges (2348 beds) and more recent large-scale PBSA developments (2120 beds across five new properties).

The recent expansion of University-owned accommodation, in addition to some private arrangements with commercial PBSA providers, has allowed the University to provide an accommodation guarantee, as several other major Australian universities have done in recent years, as a clear marketing tactic to attract international students. The University of Melbourne states on its website that from Semester 1, 2020 it will:

provide a guaranteed accommodation offer to all undergraduate, full-time equivalent students who apply for Melbourne Accommodation. The University takes into consideration your accommodation preferences; however your preferred choice is not guaranteed. Postgraduate and graduate commencing students can also apply.

It is likely that its accommodation guarantee will be further extended to postgraduate students once it has built up its accommodation capacity, as some of its interstate competitors have done.

The University endeavours to fill its highest priority accommodation options first and then fill lower priority facilities, in a 'champagne tower' fashion, based on the commercial imperatives associated with different types of accommodation. The University's large student population and ability to channel students into its own accommodation allows it to maintain higher occupancy rates than commercial PBSA.

The University is currently not a member of the Student Accommodation Association (SAA) and it is difficult to see how its accommodation operations would be significantly assisted by the introduction of the NPAS, which could have the effect of raising the standing of commercial PBSA competitors in the vicinity. However, quality rating schemes that rate the University's own accommodation more highly than many of its competitors may be welcomed or even strongly encouraged, since its owned and affiliated residential colleges are positioned at the top end of the market, with some charging around \$1,000 per week of residence.

RMIT University

RMIT itself does not own or operate any student accommodation in the municipality of Melbourne, making its situation very distinct to that of the University of Melbourne.² RMIT conducted an extensive tender process for PBSA providers to determine which facilities would be endorsed by the University. Those deemed suitable entered into a formal relationship with the University through a Letter of Agreement, which specifies expected quality standards, as well as reporting and complaint handling processes. RMIT only recommends endorsed PBSA facilities and works with international education agents to encourage them to place RMIT students in these preferred facilities. RMIT's accommodation website includes the following statement vouching for the quality of the accommodation options listed:

These apartment complexes are designed for students and meet RMIT's quality standards. The properties provide a friendly, community environment with strong links to university supports. A variety of furnished rooms are available, from studios to shared apartments, with excellent communal facilities. Rates are all inclusive, which means the cost of utilities, internet and other services are covered by the rent. Rental agreements are clear and transparent.

No other Victorian university's accommodation website has a similar statement outlining the basis on which recommendations are made (see Appendix 3).

RMIT was not involved in the design of the PBSA properties that have sought to be endorsed, but since the establishment of this process some developers of new properties have consulted with RMIT to ensure that their designs will meet the University's requirements. As a result, even though RMIT does not have formal commercial partnerships with property developers that would allow it to have input into design, as is the case with many other universities, its market power, which derives from its large student population at its City campus allows RMIT to set standards that are consequential for the sector as a whole.

² RMIT University does own a property in Bundoora (Walvert House) that is managed by UniLodge.

Elsewhere in Australia

This research was not able to undertake a comprehensive analysis of interstate universities' practices in assessing the quality of PBSA. However, it does seem as though the pattern observed in Victoria is consistent with other states, with most universities recommending only their own accommodation offerings. Some universities do appear to have a process in place for assessing, endorsing and promoting commercial PBSA properties, but more research is needed to better understand the ways in which this is undertaken. For example, the University of Western Australia lists two endorsed commercial PBSA providers in the Perth City Centre in addition to its own residential colleges. Similarly, the University of South Australia promotes just one commercial PBSA property, which refers to as 'UniSA's student accommodation by Urbanest', but the reason for endorsement of this property is not clear.

Conclusion and Recommendations – Education Providers

Melbourne's education providers clearly have an interest in ensuring the scale, quality and affordability of student accommodation. However, they perform a wide range of functions in relation to their own affiliated PBSA—as owner, developer, operator, commercial partner and/or recruitment channel—and are simultaneously in competition with non-affiliated PBSA providers, on whom they nonetheless rely to provide the scale of provision required. The attitude of education providers towards ratings schemes are therefore difficult to predict, and further extensive consultation will be required in order for it to be a utilised success.

- Recommendation 5. Governments should partner with universities that use robust quality assessment criteria to inform their accommodation advice to students. This will assist in ensuring that their work on design standards is consistent with best practice in the education sector.
- Recommendation 6. International education providers should adopt robust and consistent PBSA quality assessment criteria to inform their accommodation advice to students.

4. Quality Rating by Consumers

A quick online search of key terms related to a particular PBSA property will reveal numerous reviews available online, with all of the pros and cons associated with the proliferation of user reviews that has occurred in many consumer markets in recent years. For example, the first page of Google search results for "scape swanston review" includes a score of 4.4/5 based on 139 Google reviews, a Facebook review score of 5/5 based on 19 reviews, a rating of 4.8/5 at universityliving.com based on 788 votes in addition to links to numerous booking sites and a slick promotional video on YouTube. If one uses the same search terms on YouTube, in between the many promotional videos one finds the occasional user review, or 'room tour' vlog, for this property, as well as many user review videos for similar properties in Melbourne, Sydney and Brisbane.

As a result of such reviews, prospective renters have access to a large volume of information about the potential pros and cons of PBSA. As with reviews of any product, many reviews are brief and lack detail, while some are longer and more specific. Some appear honest and fair, while others appear overly gushing or inexplicably strident in their criticisms, raising suspicions about the motivations and interests of the reviewer. Despite these questions of authenticity, it is clear that through such reviews, students can be more informed about many aspects of life in a particular property.

Some of the accommodation websites aimed at international students seeking accommodation allow residents to review properties (KPMG, 2018, p.43). Student.com, for example, allows for consumer reviews but these are only visible for a small minority of properties. Users can rate the property on five criteria (Location, Transportation, Safety, Staff and Value) on a five-star scale and leave comments, many of which are in Mandarin. Bedsii and Study Stays also have similar 5-point rating scales. University accommodation managers were sceptical about the accuracy of much of the information provided on these sites, which they felt was skewed to maximising incomegenerating bookings and referrals through their site. For example, some accommodation options provided by universities but not able to be booked through the sites are listed as 'sold out' on the sites, in order to push commercial traffic to their preferred options. The UK student accommodation portal Hallbookers promotes consumer feedback as a key selling point, stating on its front page:

Rate & Review

Hallbookers is powered by the collective wisdom and experience of current and former students. The platform is here is to empower and inform people like you making accommodation decisions right now - and so your ratings and reviews are vital to its success. So please tell your stories and share your insights and advice with the Hallbookers community. Your feedback literally powers the site. So good, bad, funny or tragic, review and rate the places you've stayed and help people like you make better choices. (https://www.hallbookers.co.uk)

Macquarie University in Sydney provides a private accommodation listing portal that allows students to provide feedback and for users to filter by the property's star rating when searching (https://find.accommodation.mq.edu. au). While this is an interesting way to allow consumer evaluations to inform future students, none of the details of students' reviews are visible to searchers, so it is not at all clear what rating a property has received, why it has received a particular rating, or the number of reviews on which the rating is based. This is likely to be frustrating for students who are used to being able to scroll down through review comments in numerous online platforms to gather more information about what previous consumers liked and disliked.

UK National Student Housing Survey

The most extensive and reliable scheme for eliciting consumer's views about PBSA is the UK's National Student Housing Survey. This has been administered annually since 2007 by Red Brick Research, who state that more than 70 UK and Irish Universities and 30 Private Hall Providers participate and in 2017 over 35,000 students took part. Its primary purpose is to provide accommodation owners with customer satisfaction data. This can be benchmarked against other providers and has been "designed to meet the tenant satisfaction survey requirements of the ANUK/ Unipol National Codes" (p.19).

While such data is likely to raise standards by providing feedback on performance to managers and other stakeholders, the data is not publicly available. There is some public profiling of high-quality providers through annual awards given to the top providers as voted by students in the PBSH (Purpose-Built Student Housing, the UK term for PBSA). Providers with student satisfaction rates above 90% are awarded the International Accommodation Quality Mark.

International Student Barometer

The International Student Barometer (ISB) is a survey that has been used over the past decade by many universities around the world and has been completed by over three million students. It allows universities to track and compare the decision-making, expectations, perceptions and intentions of international students from application to graduation. The survey results are often used by universities to assess the performance of their strategies and services against other aggregated benchmark data.

The survey has around 100 questions, which include the following related to accommodation type and satisfaction:

- Where they are living (this includes a customizable element allowing universities to list key accommodation providers in a drop-down menu)
- Satisfaction with condition of accommodation upon arrival
- Satisfaction with accommodation and living orientation (only for students in PBSA)
- Satisfaction with access to accommodation
- Satisfaction with quality of accommodation
- Satisfaction with cost of accommodation
- Satisfaction with Internet access
- Whether they have used university accommodation services, and if so their satisfaction with those services

Universities are able to use these results to ascertain student satisfaction with accommodation providers, whether these are university-owned or affiliated, or independent commercial PBSA providers.

Previous studies have analysed large International Student Barometer aggregated data sets to examine the relationships between various facets of student experience (Ammigan & Langton, 2018). A similar analysis of accommodation-related questions from the 2018 survey of international students in Australia would be likely to yield valuable insights into accommodation types and satisfaction levels, and how these are related to other characteristics of students and locations.

Conclusions and Recommendations – Consumers

Considering the ready availability of reviews by previous tenants, it seems that students who take the time are able to access quite a lot of information about particular properties. These reviews are timely and tend to focus on the issues which the reviewer believes will be important to students like them. While useful for individual students, such reviews are not sufficiently reliable for informing policy decisions.

- Recommendation 7. Future research should tap large existing consumer satisfaction data sets, for example by undertaking an analysis of International Student Barometer data on the accommodation experiences of international students in Australia.
- Recommendation 8. Future research should consider undertaking focus-group research with students in PBSA to better understand their views on criteria that might be included in design standards, and their current levels of satisfaction in relation to these.

Scoping the Current State of Knowledge About the Information Sourcing and Decision-Making of International Students

To complement the above analysis of rating and accreditation systems, this section provides a comprehensive literature review to reveal what is known about the ways in which international students make decisions about their accommodation. This will consider both the initial decisions made before arrival in the host country, and subsequent changes in accommodation over the course of study. The aim is to provide an evidence base regarding the key considerations of students in the decision-making process, and the influence of various information sources, organisations and individuals, including the role of agents, education providers, friends and family, and social media.

We first consider the decision-making processes of newly arrived international students, who require high levels of support and have limited access to information about accommodation options, and then consider the decision-making of established students, who require comparatively lower levels of support and who have greater access to information about further local options (KPMG, 2018, p.28).

There is extensive research in the public domain concerning consumer decision-making when considering international study options, but very little published research on international students' accommodation choice or their housing pathways from home country to initial and then subsequent accommodation choices as temporary migrants. Our search revealed six key relevant Australian studies:

- Judd's (2013) Master's thesis surveyed over 300 Chinese students at the University of New South Wales (UNSW) about their choice of, and experience of, accommodation in Sydney.
- Yue, Lê, and Terry's (2014) study of the experience of international students in regional Australia included a discussion of the accommodation preferences and experiences of 20 students.
- Duangpracha's (2012) PhD involved a survey of 215 international students living in Melbourne.
- Kuestenmacher's (2014) Master's thesis investigated in depth the accommodation decision-making and experiences of 30 international students at the University of Melbourne and Victoria University.
- Ryan et al. (2016) surveyed 603 international students who studied or lived in the City of Sydney with a small number of follow-up focus groups and individual interviews, including questions on finding accommodation, negative experiences and satisfaction.
- Berg and Farbenblum's (2019) survey of 2,440 international students (mostly from Sydney) focusing on accommodation experiences, considering information sources, satisfaction and help-seeking behaviour.

Newly Arrived Students

The best available data on international students' first accommodation in Australia comes from Berg and Farbenblum's (2019) survey, which found that 18% of students stay in PBSA (11% in university housing and 7% in commercial PBSA). Of the remaining, around 70% stay in independently organised accommodation (36% in share houses, 18% with friends and family and 14% in private rentals). Students from certain countries were more likely to be staying in PBSA, as illustrated in the table below.

Table 4: Proportion of International Students in PBSA, by Nationality

	University Housing	Commercial PBSA	Total PBSA
Singapore	35%	22%	57%
Hong Kong (SAR)	36%	18%	54%
USA	39%	10%	49%
Malaysia	26%	11%	37%
Indonesia	15%	12%	27%
Sri Lanka	20%	5%	25%
Bangladesh	10%	8%	18%
India	12%	5%	17%
China (PRC)	7%	7%	14%
Pakistan	10%	O%	10%
Vietnam	7%	1%	8%
Brazil	O%	7%	7%
The Philippines	4%	2%	6%
Nepal	1%	1%	2%
Colombia	O%	1%	1%

Data source: Berg and Farbenblum, 2019, p. 24.

It is clear that students who are new to Australia often choose PBSA, despite the relative high cost compared with private rental, because it offers a comparatively reliable high-support environment suited to the early stages of their sojourn, when students face significant issues of transition to new living and study environments. The booking process is also less risky than with private rental options, if students choose reputable providers. Students booking private rental accommodation from abroad are especially vulnerable to scams, as they are unfamiliar with the local property market and many have not lived away from home before (Marginson et al., 2010, p.152). Judd (2013) found that over a quarter of Chinese students at UNSW had been the victim of an accommodation scam, meaning "somebody lied to me about accommodation and stole my money" (p.119).

Nearly three quarters of international students organise their first accommodation from their home country, once they know which institution they will be studying at (Kuestenmacher, 2016).³ Nearly all students who stay initially in PBSA organise their accommodation from their home country, 92% of those in university housing and 89% of those in commercial PBSA according to Berg and Farbenblum (2019, p. 25).

³ Berg and Farbenblum (2019) found that 71% of students arranged their first accommodation from abroad before arriving in Australia, but this varied significantly by nationality, with Chinese students (77%) more likely than other students to have arranged accommodation before arrival. Mainland Chinese students are by far the largest nationality of international students studying in Australia, followed by Indian students.

Students typically receive influential advice about their initial accommodation in Australia from two main channels - social networks and international education agents. Students also explore numerous options on the Internet, including their Australian education provider's website, PBSA websites, student accommodation booking websites, and websites that feature rental listings. Surveys of international students find that students typically use all these sources, but there is significant variation between studies in relation to the relative importance of each source, as outlined in Table 5.

Table 5: Sources of Information Informing First Accommodation Choice

	Judd (2013)	Duangpracha (2012)	Kuestenmacher (2014)
Family and Friends	45% ⁴	40%	67%
Education Agent	28%	31%5	30%
Education Provider	42%	Not Specified	100%
Internet	38%	18%	Not Specified

(Respondents were able to select more than one information source, so totals add up to more than 100%).

Family and Friends in Australia

Once students have made the decision to study at a particular institution, they consult their networks of family and friends for advice (Kuestenmacher, 2016). The impact of such networks has likely grown over time, due both to the connections fostered by online social networks and the scale of student mobility. All of the studies considered here involved students studying in Sydney or Melbourne and significant proportions of respondents knew people who had first-hand experience of their host city, either through previous travels or who were currently living in the city (also mainly from now outdated research data collected seven plus years ago before the most recent sustained boom in international students). Both cities clearly benefit from a social network effect whereby their large student populations drive familiarity in source countries and future growth, whereas the situation would be very different in comparatively lower-volume destination cities in which students are less likely to know someone with first-hand experience (such as Perth, Darwin and regional cities).

Students typically place a high level of trust in family and friends (Judd, 2013), and those with knowledgeable contacts often act on the advice they receive with little further investigation (Kuestenmacher, 2016). Recognising the great importance of personal recommendations, commercial PBSA providers often provide a rent credit of several hundred dollars to residents who refer friends, and more for siblings.

Most international students share accommodation with others, and friends become especially important in arranging multiple occupancy accommodation. Relying on trusted social networks is a means of limiting exposure to exploitation from unscrupulous landlords. As well as being a source of advice, friends and family already in Australia sometimes inspect potential premises (Judd, 2013).

There are some negative consequences of relying on social networks for accommodation advice. Gomes (2018) has described 'siloed diversity' as the tendency of international students and other temporary migrants to form online and face-to-face social connections with other transient migrants from similar backgrounds and undertaking similar experiences--also known as the bonding version of social capital over the bridging version of social capital. The cumulative effect is to create dense networks of links between very similar people. These cultural silos come to act as an 'echo chamber' in which most participants have similar experiences and information sources.

⁴ Includes 'family/ friends in Sydney', 'family/ friends in China' and 'classmates/ co-workers in Sydney'.

⁵ Includes 'education agents' and 'IDP centre'.

While it is understandable that students seek housemates with whom they can engage easily, ethnic cohabitation is also commonly cited as a cause of social isolation for international students, limiting their engagement with the broader community (Kuestenmacher, 2016). Around 85% of Chinese students in Judd's (2013) study were living in accommodation where the main language spoken was either Mandarin or Cantonese (p.142). Co-ethnic exploitation appears common in the private rental market, with landlords trying to maximise revenues by crowding in many students recruited through social networks (Judd, 2013, pp.143-4).

International Education Agents

Many international students use education agents to choose and apply for their studies in Australia. Agents also assist students to choose and book accommodation options, and the studies reviewed here suggest around 30% of students find their accommodation through such a specialised education agent. However, the largest-scale survey of international students' accommodation (Berg and Farbenblum, 2019) found that only 12% of students found their accommodation through agents, suggesting that further research is needed.

Agents are much more likely to refer to forms of accommodation that pay them a commission. Kuestenmacher (2016) found that all the students who used agents to find accommodation in his small study were referred to commercial PBSA. Berg and Farbenblum (2019) found that of the students who found their accommodation through agents, 51% were in homestays, 16% were in commercial PBSA, 13% in university housing and 13% in share houses (p.27).

Agents may refer students to the accommodation options recommended by their education provider, and some universities (including RMIT) actively encourage their agents to do so. However, agents' recommendations are influenced by the size of the commission they receive from different accommodation providers. One university student accommodation manager observed that, "They will tend to go for the highest bidder. Not all of them, but they are very interested in what kind of commission they are going to get paid." In November 2019 PBSA providers were reportedly paying commissions of around 6% of the annual rent that they would collect from that student, and the rate of commission tends to increase when providers are seeking to quickly increase occupancy rates. University-owned and managed providers tend not to pay commissions to agents, according to interviewees for this research.

It is likely that the level of commission paid will fluctuate over time depending upon the balance between supply and demand of places; while the student demand growth is quite linear (prior to COVID-19), the supply of PBSA is quite lumpy, with around thousands of new beds coming on stream at the same time in Melbourne, and such periods of potential oversupply will lead to higher commissions being paid.

There is currently no regulation of relationships between PBSAs and education agents other than general consumer protection legislation. The relationship between education providers and agents is regulated by the *National Code of Practice for Providers of Education and Training to Overseas Students 2018*, which requires that registered education providers must:

- have a written agreement with each education agent they engage with
- enter and maintain education agent details in the Provider Registration and International Student Management System (PRISMS)
- ensure education agents have appropriate knowledge and understanding of the Australian International Education and Training Agent Code of Ethics
- ensure education agents act honestly and in good faith
- take immediate corrective action, or terminate a relationship if an agent (or an employee or subcontractor) is not complying with the National Code, and
- not accept overseas students from an education agent if it knows or suspects that the education agent is engaging in unethical recruitment processes (Standard 4: Education agents).

Education Providers

The research on the impact of university resources on students' choice of accommodation is mixed. Some studies find that while students do search widely online and encounter many websites, they have a higher level of trust in the education provider's accommodation website. For example, Judd (2013) found that 42% of Chinese students at UNSW in Sydney had consulted the university's accommodation website at some point, with three quarters of those finding the resources useful. Further evidence for the importance of university recommendations in the accommodation search is the keenness of commercial PBSAs to be included in universities' listings, according to the university representatives consulted in this study.

Other studies, however, have found that although a high proportion of students access advice from education providers, it is unlikely to shape their choices significantly. Kuestenmacher (2016) found that all of the 30 participants in the study were familiar with their university's accommodation website but had booked accommodation based on advice from friends and family, and education agents. All reported having already booked accommodation by the time the welcome package from their university arrived, so the print accommodation information provided was inconsequential in those instances (p.95).

Kuestenmacher (2016) observes that universities' housing websites warnings about rental scams direct students away from the private rental market where they are more likely to mix with locals, and "unintentionally pressured international students and their parents into housing options bookable from overseas (purpose-built student accommodation and residential colleges / halls) by drawing a daunting picture of house hunting on Melbourne's housing market" (p.96). For example, Deakin University's accommodation site includes a section on Making good accommodation decisions that begins, "As with many online products and services, rental listings can be susceptible to scamming. Make sure you're aware of the tell-tale signs of a scam so you don't get caught out."

The Internet

Many studies of student choice include an 'Internet' item when asking students about their information sources. This term is not particularly useful, both because of the very wide range of sources that might be included in the category, and because the other information sources (social networks and university resources) are also accessed through the Internet. In the course of searching for accommodation online, students are very likely to encounter information through:

- Social media platforms, such as Facebook, Reddit and YouTube
- Peer to peer market sites, such as Gumtree and Flatmates
- PBSA websites
- Student accommodation booking sites, such as Unilodgers (not to be confused with UniLodge)

None of the studies reviewed here provide detailed insights into the use of each of these types of online platforms, and yet it is clear that these are becoming more important over time. However, we can gauge the significance of each according to the resources devoted to such platforms by PBSAs. It is likely that students' online accommodation research traverses a wide range of sites and platforms, influenced by commercial actors' search engine optimisation strategies as much as by chance and the students' preferences.

As discussed earlier, large PBSAs usually have an active presence across many social media platforms, featuring upcoming photographs, promotional videos, testimonials and other content to appeal to prospective tenants and to engage with existing tenants. Peer to peer sites that allow users to advertise rooms are very common for those subletting apartment rooms and beds but are not as relevant to PBSA, since leases are not transferable from one tenant to another in the same way. PBSA websites provide extensive information for prospective students as well as fielding enquiries and application processes, and many allow agents to establish accounts so that they can manage bookings on behalf of their clients.

Students accommodation booking sites do play a significant role in relation to PBSA. One university accommodation manager reported that they "have now reached the size where they are shaping the dynamics of how students book, especially because they are deep in China and India, and the student might get onto student. com or whatever well before they ever come to our website". The PBSAs "are increasingly at the mercy of how they appear on these aggregating sites", which can in turn be influenced by the commercial interests of the site. When a student fills in an enquiry / contact form for a particular residence the website charges the provider for passing on that enquiry to the provider, and some websites will seek to manage the booking on behalf of the student in return for a commission from the accommodation provider. These sites may therefore include quality ratings or accreditations in a property's listing where it aligns with their commercial interests.

Subsequent Accommodation

Most students will change accommodation during the course of their studies in Australia. Berg and Farbenblum (2019) found that 32% of students who first stayed in commercial PBSA had moved to other housing in their first six months and a further 26% had moved after six months or more. Of those who initially stayed in university housing, 20% had moved to other housing in the first six months, and a further 26% percent had moved after six months or more.

In their search for new accommodation while in Australia, compared with their initial search, students rely more on online resources, their social networks in Australia and real estate agents (Duangpracha, 2012, pp.105-6). Once resident in Australia, other international students (particularly those from the same host country) become a significant source of information about accommodation options (Judd, 2013, pp.124-5). Education agents, which channel students into PBSA and homestays, appear not to play a significant role in students' subsequent accommodation choices (Judd, 2013).

	Used	Considered the Source Useful
Internet	87%	85%
Family or Friends	52%	63%
Real Estate Agents	51%	48%
The University's Notice Boards	37%	38%
The University's Housing Website/Database	32%	22%
Newspaper	24%	26%
The University's Housing Advisory Service	20%	17%

Table 6: Sources of Information Accessed when Searching for Subsequent Accommodation

Data source: Duangpracha, 2012, p.106.

Due to the relatively high cost of PBSA in Australia, students tend to move from high support, high-cost accommodation to lower support and more affordable accommodation once they are settled in their new city and new life. Many students move out of PBSA into lower-cost private rentals, often sharing apartments and houses with other international students.

One surprising finding of Berg and Farbenblum's (2019) study was that students reported experiencing more accommodation problems in subsequent than initial accommodation. This was contrary to their initial expectation that students booking from abroad or in a rush at the beginning of their stay in Australia are at more risk, because they have limited access to information and are unable to inspect premises. They speculate that over time as students gain confidence and move from PBSA to cheaper private rentals and sub-letting alternatives they are more likely to be staying in substandard properties and be more vulnerable to scams and unscrupulous landlords.

Conclusion and Recommendations – International Students' Decision-Making

The available research on how international students found their first accommodation does not typically disaggregate the results based on the type of accommodation students choose. This is a limitation of the existing body of knowledge, since it is likely that the information sources used to find a share house are very different from those used to find a homestay or PBSA.⁶ The proprietary market research undertaken by PBSAs and commercial actors in this space is likely to be much more detailed than the publicly available scholarly research at the moment.

It is clear though, that any accommodation rating scheme is unlikely to be visible to prospective international students. Even if adopted by education providers and featured on their website listings, it appears that a high proportion of students in PBSA are referred through education agents, who are driven by generous commissions as well as some by concern for student welfare.

One key concept that does emerge from the broader literature on housing choice is the notion of a housing 'trajectory' (and related concepts of housing 'career' or 'pathway'). The key insight from this research is that one's choice of future accommodation is framed by prior experience. However, there is little research on the way students' preferences are shaped by norms in their home country, particularly in relation to personal space and the nature of university accommodation at home. In China, for example, undergraduate students are required to live on campus in dormitories that usually comprise between four and eight students in a shared room, usually with a desk under an elevated bed. For students from China, these dormitories provide a key frame of reference against which accommodation options abroad are compared. While Chinese postgraduate students will have had four years' experience living in cramped shared rooms, undergraduate students, who are likely to be living independently for the first time, are likely to see such dormitories as the norm for university students. Students who have grown up in Australia, by contrast, where PBSA has been rarely used, are accustomed to much larger private rooms, whether living with parents or in share houses. There seems to be almost no research on the expectations and preferences of students from different cultural backgrounds.

One key point of shared interest between governments, education providers and PBSA operators is to address the high attrition rate of students leaving once their initial lease has ended. It is clear that students benefit from the higher levels of security and support available in PBSA initially, and that a major reason for leaving is the high cost, but it is not at all clear how the design of PBSA affects residents' levels of satisfaction and willingness to pay. Research in this space would be of great interest to accommodation providers and would identify those aspects of design where there is the most significant need for further engagement with the highly profitable sector.

• Recommendation 9. Future research should consider working with PBSA providers to undertake focus group research with students to better understand their decision-making in relation to subsequent accommodation choices. Students are more likely to be open with independent researchers than with PBSA staff, so such research might be attractive to accommodation providers in gaining a better understanding of satisfaction levels, preferences and decision-making strategies.

⁶ Berg and Farbenblum (2019) provide details of the means by which students found their first accommodation in a share house, but do not provide data for PBSA, which is the focus of this study.

Conclusion

As the data presented early in this research illustrates, after a period of rapid growth PBSA now constitutes a significant part of the housing supply in the municipality of Melbourne. The recent wave of development has mainly involved the construction of properties that have a very different character to earlier forms of student housing. The new developments are designed, built and operated by commercial student accommodation providers rather than universities or not-for-profit organisations. They are much bigger, typically housing 500-700 students, and are not located on a university campus. This transformation of PBSA has occurred across Australia, predominantly in city centres, but nowhere as intensively as in Melbourne, Sydney or Brisbane.

However, regulation of the sector remains relatively light, raising concerns that high-quality built outcomes are sometimes not achieved. In response, this research has provided an overview of the factors, other than state planning regulation, that can influence design quality outcomes in the PBSA property development sector.

The impending introduction of the Student Accommodation Association's National Property Accreditation Scheme (NPAS) will go some way to providing a quality benchmark for student services and tenancy management practices. However, this will not consider building design, and there an opportunity for capital city municipalities to cooperate in developing PBSA design standards.

Our research on the ways in which governments, industry associations, consumers and education providers assess the quality of PBSA revealed some approaches that have proven effective, and which could usefully inform future work in this space.

The development of set of design standards is likely to be effective in assisting governments to articulate design expectations into the development assessment process. The research has identified some precedents for incorporating design criteria in PBSA quality assessments, both in the UK National Code and RMIT provider endorsement processes. Drawing on and extending these established and successful schemes will go some way to overcoming the sector's wariness.

Ongoing consultation between education providers, PBSA providers, destination marketing agencies and municipalities is crucially important, both in shaping the design standards and also in building a shared understanding across the sector of what constitutes high-quality built outcomes that enhance student wellbeing.

While PBSA providers are hesitant about increased government involvement in the sector, the development of quality standards will enhance the reputation of PBSA and in turn their offer to prospective tenants. The research on student choice found a high rate of turnover of tenants, with many students leaving PBSA to rent privately. Further research on students' experience of PBSA generally, and building design in particular, may aid PBSA providers in designing or modifying properties that students want to stay in for longer, as well as providing valuable evidence to inform the development of design standards.

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Appendix 1. Design Criteria Inclusion in Existing Quality Assessment Schemes

The table below presents a draft set of PBSA design criteria and shows which of these are included in five key quality assessment schemes considered in this research. This will aid in the future development of these criteria and allow for more informed consultations with stakeholders.

Scheme	SAA National Property Accreditation Scheme	APSAA Industry Code	RMIT Endorsed Student Accommodation Provider	UK National Code (managed by educational establishments)	UK National Code (Not managed by educational establishments)
Study - Work surface, ergonomic seating, power, storage, natural light and task lighting. All student rooms provide a private study space for each student. Communal areas provide opportunities for individual and group study.	x	×	\checkmark	\checkmark	\checkmark
Cook - Storage (frozen, refrigerated and dry goods, utensils, crockery and cutlery, bins and cleaning) and different forms of cooking. Kitchen areas in student rooms and communal spaces are sized to meet the number of students and can be fully utilised at any time.	x	×	\checkmark	\checkmark	\checkmark
Dine - Dedicated table or bench providing a space to eat. In student rooms a dedicated seat for each student and the ability to seat a guest. Communal spaces provide dining options for small and large groups.	x	x	\checkmark	×	\checkmark
Socialise - Student rooms and communal spaces facilitate positive social interaction. This includes programmed events, the ability for students to initiate their own social activities and opportunities for incidental encounters.	x	x	\checkmark	x	×
Rest & privacy - Student rooms and communal spaces provide opportunities for respite from the demands of study and other pressures.	×	x	\checkmark	x	×
Exercise - Communal spaces provide opportunities for a range of physical activity. These could include a gym or exercise area and games area.	×	x	×	x	×

Scheme	SAA National Property Accreditation Scheme	APSAA Industry Code	RMIT Endorsed Student Accommodation Provider	UK National Code (managed by educational establishments)	UK National Code (Not managed by educational establishments)
Sleep - A comfortable sleep environment is essential for physical and mental health. Student rooms provide a bed, task lighting, bedside storage, the ability to fully block light pollution and appropriate acoustic isolation.	×	×	\checkmark	\checkmark	\checkmark
Wash - Bathrooms provide a shower, sink, toilet and mirror with storage for toiletries and cleaning products and rails for towels. Appropriate ventilation and lighting is essential. Shower design ensures the toilet and sink remain dry. Material finishes are durable and washable.	×	×	×	\checkmark	\checkmark
Storage - Student rooms provide dedicated storage, shelving and hanging space for study items, clothing and other personal effects, large items such as suitcases, cooking, dining, washing, cleaning products and bins. Additional secure storage can be provided in communal areas.	x	×	\checkmark	V	\checkmark
Laundry - Access to washing machines, dryers, laundry tubs with hot and cold water, clotheslines, irons and ironing board.	×	x	\checkmark	\checkmark	\checkmark
Security - Personal access card, on-site staff 24/7 and CCTV. Depending on the type of student room, either the room should be lockable or lockable storage provided.	x	\checkmark	\checkmark	\checkmark	\checkmark
Movement zones - Maximise the efficiency of space in student rooms where possible by overlapping circulation and functional zones, e.g. entrance corridor and functional zone of a kitchen.	x	×	×	×	×
Daylight - The depth of student rooms and communal spaces allows for adequate daylight. Windows are located in an external wall and sized to allow adequate daylight.	x	x	\checkmark	x	×
Outlook - Student rooms and communal spaces are provided with an outlook that creates a reasonable visual connection to the external environment.	x	×	×	×	×
Natural ventilation - Student rooms should allow occupants to effectively manage natural ventilation. Communal spaces should allow occupants to effectively manage natural ventilation where appropriate.	×	×	×	x	×

Scheme	SAA National Property Accreditation Scheme	APSAA Industry Code	RMIT Endorsed Student Accommodation Provider	UK National Code (managed by educational establishments)	UK National Code (Not managed by educational establishments)
Noise impact - Protect students from external and internal noise sources and contain noise sources in developments that may affect the amenity of neighbours.	x	x	\checkmark	x	x
Energy efficiency - Student rooms and communal spaces make appropriate use of daylight and solar energy and achieve adequate thermal efficiency.	x	x	\checkmark	\checkmark	\checkmark
User control - Students are given the opportunity to control and modify aspects of the building environment including daylight, artificial lighting and natural ventilation. Student rooms and communal spaces are accessible 24/7.	×	×	×	×	×
Furniture & fittings - Student rooms and communal spaces have high quality and comfortable furniture and fittings that are easy to clean and maintain. A balance between fixed and movable furniture provides students with the ability to personalise their environment.	x	x	\checkmark	\checkmark	\checkmark

Appendix 2. UK National Code

The National Code of Standards for Larger Developments for student accommodation NOT managed and controlled by educational establishments, 2020

Section 1: General

Section 2: Equality and Diversity

Section 3: Marketing Prior to Letting Property to Tenants

- Rent Liability
- Contact Details for Staff
- State of Repair
- Wi-Fi Provision

Section 4: During the Tenancy

- HMO Licenses
- Ensuring Possession
- Access
- Fines
- Repairs and Maintenance
- Cleaning and Maintenance of Communal Areas
- Furniture and Storage Space
- Kitchen Facilities
- Toilet and Personal Washing Facilities
- Laundry Facilities
- Mail Deliveries

Section 5: Tenant Satisfaction

Section 6: Health and Safety

- Housing Health and Safety Rating System
- Gas Appliances and Supply
- Electrical Installations and Appliances
- Energy Efficiency
- Fire Safety
- Security Measures
- Emergency and Disaster Management
- Lifts
- Legionella
- The Environment
- Communal Lighting

Section 7: At the End of the Tenancy

- Deposits
- References

Section 8: Disputes

Section 9: Complaints

Appendix 3. Unipol Star Rating System

Unipol has a Star Rating System for accredited properties that allocates points for a range of desirable features. 1 star is awarded for 12 points, 3 stars are awarded for 18 points and 5 stars are awarded for 24 points. Amenities that points are awarded for include:

- A burglar alarm and/or upper floor flat (2 points)
- Dedicated secure cycle storage (would not include bedrooms, kitchen or living rooms) (2 points)
- Dedicated living space of at least 10m2 (2 points), with additional points if it is 14m2 or more (3 points)
- Bath/shower ratios of 1:3 (1 point), with additional points where it is better than this (up to 3 points)
- A washing machine fitted (1 point), and an extra point for a dryer or washer/dryer
- Dishwasher (1 point)
- Double beds in at least 75% of bedrooms (1 point)
- Double beds in all rooms (2 points)
- Provision of contents insurance for tenants (1 point)
- Double or secondary glazing fitted throughout (2 points)
- The presence of a combination (1 point) or a condenser boiler (2 points)
- A broadband connection point in the property (1 point)
- A maintained garden/yard area of at least 10m2 (2 points)
- A landlord who has acquired 'golden owner' status, which means they have been a member of the Code for four consecutive years without a complaint being upheld against them (3 points)
- Providing a Smart TV (1 point)

Appendix 4. University Websites' Referral Practices for 'Off Campus' PBSA

University	Referral Logic	Quality Statement
Australian Catholic University	Commercial - refers only to Iglu and St Mary's College	None
Central Queensland University	Unclear - lists eight commercial PBSA providers	None
Deakin University	Proprietary - lists university housing only	None
Federation University	Proprietary - lists university housing only	None
La Trobe University	Proprietary - lists university housing only	None
Monash University	Commercial - links to five 'preferred' commercial PBSA providers, with disclaimers	"Monash University makes no warranties or representations about the accuracy, completeness, reliability or currency of the information on this website or any linked external website and reserves the right to alter, amend, vary or otherwise change any information on this website at any time without notice. The owners of any external websites linked on this website operate independently from Monash University and are not formally affiliated with Monash University in any way. Monash University is not responsible for the information contained on any external linked website and does not endorse or approve of the content of those websites. Monash University specifically does not endorse any form of shared (a room occupied by more than one person) occupancy student accommodation offered by preferred student accommodation providers. To the extent permitted by law, Monash University and its officers, employees, agents and contractors do not accept any liability for any loss, damage or injury resulting from the use of the information on this website or any external linked website or any external linked website."
RMIT University	Quality - lists wide range of endorsed commercial PBSA	"These apartment complexes are designed for students and meet RMIT's quality standards. The properties provide a friendly, community environment with strong links to university supports. A variety of furnished rooms are available, from studios to shared apartments, with excellent communal facilities. Rates are all inclusive, which means the cost of utilities, internet and other services are covered by the rent. Rental agreements are clear and transparent."
Swinburne University	Unclear - lists many PBSA providers	None
The University of Melbourne	Commercial - lists only university-affiliated commercial PBSA	"Access a range of trusted accommodation"
Victoria University	Commercial - lists only university-affiliated commercial PBSA	None



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