



**Fractional ownership - an alternative residential property investment vehicle**

Journal:	<i>Journal of Property Investment &amp; Finance</i>
Manuscript ID	JPIF-02-2018-0013.R1
Manuscript Type:	Academic Paper
Keywords:	property, fractional, investor, online, residential, motivations

SCHOLARONE™  
Manuscripts

## Fractional ownership - an alternative residential property investment vehicle

### Abstract:

**Purpose** – The purpose of this study is to determine the profile of the typical online fractional residential property investor in Australia. This study also seeks to understand the motives for engaging with and investing in alternative residential property investments.

**Design/methodology/approach** – This study employs a survey-based design via an online questionnaire to gather information on investor age, gender, type, education levels, time horizons and investment history and risk and return expectations. It also gathers information regarding investors' financial literacy including tax implications of fractional property investment.

**Findings** – The findings of this study suggest amongst others, that fractional property investors tend to be younger, although the platform also attracts older investors including older females. The study also found that investors do not select alternative investment platforms in anticipation of super-normal investment returns. Return expectations are realistic and are based on a balance between capital growth and income.

**Practical implications** – This study indicates that alternative investment platforms lowers the barriers of entry into residential property for first time investors. It therefore creates opportunities to allow many first time individual investors to invest in property, often as an alternative to bank savings or investing in the stock market.

**Originality/value** – This study enhances our understanding of the influence of alternative investment platforms on investment decision-making. More specifically, it contrasts fractional property investment with more traditional investment opportunities to understand the motives of investors for diversifying into online investment vehicles.

### 1. Introduction

Fractional ownership involving less than a 100% interest in a property is a long-established concept that has raised specific issues regarding valuation, perceived risk and greater liquidity stemming from reduced levels of control and marketability relative to full ownership rights. Various structures, vehicles, partnerships or other legal entities have been used to manage fractional investment interests. Indeed, real estate investment trusts (REITs) constitute a form of fractional investment. However, with new technologies spurring the growth of digital platforms and the FinTech sector, a raft of alternative finance investment products has emerged. Many of these, such as crowdfunding, have enabled individuals for the first time to invest in property (Lowies *et al.*, 2017). Indeed, O'Roarty *et al.* (2016:2), reflecting upon the commercial real estate sector, observe that the industry "has not been immune to the transformative effects of technology, with disruptive forces leading to a re-evaluation of how real estate is bought, sold, leased and priced".

Arguably one of the most comprehensive studies on alternative finance platforms is a series of reports from the Cambridge Centre for Alternative Finance which examines, on a regional basis, the application, update and impact of these platforms. The report for the Asia-Pacific region (Zhang *et al.*, 2016) identifies crowdfunding as the main opportunity for real estate investment while digital-based platforms have opened-up the opportunity to enter into

fractional property ownership. However, to date, there has been an absence of any empirical studies that analyse investor behaviour in terms of the motives for engaging with, and investing in, such vehicles.

This paper, in seeking to address this gap in the literature, focuses on investors in one particular form of fractional investment offered through a residential property platform. This internet-based platform gives an investor the opportunity to purchase a 'brick', representing the fractional interest in a residential property. Such a 'brick' is held in trust which can be sold in an approved secondary market. The internet-based platform is unique in being completely online and available worldwide to invest in high end residential property. Even though the fractional interest is divided rather than undivided, the potentially disruptive nature of this residential property investment vehicle raises the question as to the type of investor that is attracted. The purpose of this paper is to explore the profile of the online fractional residential property investor, analyse motivation and assess the relative contribution of fractional investment.

The paper is structured as follows. Section two examines the relatively limited literature based on fractional property investment, draws upon complementary literature from crowdfunding and explains the structure of fractional ownership in property. Section three provides specific detail on the research methods including the internet-based platform used. Section four presents a detailed analysis of the findings on a thematic basis focussing upon motivations, return/risk expectations and perceptions of risk, and respondents' level of financial literacy. Section five expresses final thoughts on the way forward using fractional investment vehicles and section six draws conclusions from the study and seeks to position where these alternative investment platforms may sit vis-à-vis more traditional forms of investment in property.

## 2. Literature Review

Investment in real estate may take numerous forms, but due to institutional constraints and regulations can be a relatively expensive option compared to alternatives such as the stock market (Ziets *et al.*, 2008). Also, residential property has become increasingly difficult to invest in due to its owner-occupier bias which has priced many out of the market (Beer *et al.*, 2007; Yates and Milligan, 2007; Newell *et al.*, 2015). Furthermore, the various indirect investment vehicles that enable alternative investment paths in real estate for first time investors or for those wishing to diversify, such as REITs or unlisted funds, are generally orientated towards commercial property, though residential REITs exist in a number of countries including the USA and the UK (Newell and Peng Hsu, 2007).

These different vehicle structures, including REITs and listed property companies whereby a property is beneficially owned by more than one investor, are essentially examples of 'fractional' investment (Fife and Newell 1995). While investors may trade some or all of their fractional ownership in these indirect vehicles on a secondary market, there are other fractional interests of an undivided nature such as ownership of real estate through limited liability companies (LLC) and limited partnerships (LP) (Davidson, 1992; Webb, 2001; Lewis, 2014). Combinations of structures are becoming increasingly common, such as two or more REITs investing in a property as a joint venture (Hess and Liang, 2004). A further type of

undivided fractional investment known as a tenancy in common (TIC) has become prominent in the US due to favourable tax rulings from the Income Revenue Service (IRS) (Rose and Brinckman, 2006; Kaschube, 2006; Franklin 2007; Hopson and Hopson, 2008). A TIC is not an entity but rather a direct form of ownership that requires at least two common owners where each investor individually owns a physically undivided part of the entire parcel of real estate and has non-exclusive right of possession of the entire property (Updike, 2007).

The literature on fractional investment has focused predominantly on valuation and taxation issues. In the US, valuation has been required to determine estate and gift tax liability (Hall and Polacek, 1994; Lewis, 2014) and in Australia, the need for valuation has arisen due to the increasing popularity of such investments as a way to manage specific risk (Fife and Newell, 1995; Fife 2003; Hess and Liang, 2004) but neither jurisdiction has developed a suitable approach (Fife and Newell, 1995). REITs use fractional investment at an individual real estate level to spread risk but can lead to control, possible discounting and valuation issues. Furthermore, simply multiplying the value of the underlying asset by the fraction of ownership does not take into account problems with liquidity, the specific ownership structure and potential disagreements with co-owners surrounding the use and misuse of the underlying property and determining appropriate capital and income distributions and expense allocations (Hall and Polacek, 1994; Fife and Newell, 1995; Fife, 2003; Lewis, 2014). Due to these 'burden[s] inherent in joint ownership' (Fife and Newell 1995, p. 467), many argue that fractional interests should be valued at a discount compared to the value of the underlying asset (Davis Sr, Harris and McCormack, 1983; Hall, 1989; Thompson and Dogbjartsson, 1994; Davidson, 1992; Webb, 2001; Lewis, 2014) although a premium may also be appropriate under the right circumstances (Fife and Newell, 1995). In the US, the courts have favoured discounts supported by empirical data rather than expert opinion of valuers (Hall & Polacek, 1994). In Australia, valuation methods involve consideration of a variety of factors including the value of the underlying investment, but the appropriate weighting of these factors has not been settled (Fife 2003).

Much of the literature on the subject predates the advent of alternative investment platforms and the changing concept of fractional investment though issues relating to market liquidity, security of investment and holding period are relevant to the risk that investors are taking when deciding to utilise new digital investment vehicles. Indeed, the recent origin of alternative real estate investment platforms mean that there is little research available on who is investing, their motivation for investing and their expectations from the investment, though some literature is emerging on crowdfunding. From a consumer marketing perspective Ordanini *et al.* (2011) suggest that investors in crowdfunding like engaging in innovative behaviour, are attracted by the novel way of using the underlying platform and by the appeal of interactive tools. Such investors are largely drawn to crowdfunding platforms characterised by low to medium risk/return ratio which appeal to a broader set of potential payoffs including emotional rewards. Kang *et al.* (2016), using a questionnaire survey of a crowdfunding based platform in China and employing trust theory, analysed the factors that influence funders' perceived trust in crowdfunding. It was apparent that crowdfunding users had rich online experience and thus security of online investment was not a concern, though it was found that short-term interaction cannot completely acquaint funders/investors with fundraisers. In Australia, it was shown that property crowdfunding is perceived as having relatively low to medium risk, attracts a mix of investor types with the main appeal being the ease of entry for a potentially relatively small outlay of capital (Lowies *et al.*, 2017).

1  
2  
3 Although fractional ownership in property has been prominent in a number of countries  
4 including the United Kingdom (UK), Spain, India and Thailand, it has been a recent addition  
5 to the Australian property market. Furthermore, the digital platform approach to fractional  
6 ownership is a relatively new innovation both globally and in Australia.  
7

8 Fractional ownership in property is very similar to a patent developed by Vicino (2008),  
9 which allows several investors to invest in a high-yielding physical asset, in this case,  
10 residential property. Investors own a fraction, or a share, in a high value residential property  
11 and benefit from the rental income as well as capital appreciation of the asset. Shares are  
12 purchased through the online platform that initially acquires the asset. The online platform  
13 pays all fees, including stamp duty and transfer fees, to buy the asset with investors only  
14 paying a small administration fee in purchasing a fraction of the ownership of the property  
15 asset.  
16  
17

18 In Australia the fractional ownership model functions similar to a property trust. Tax is  
19 payable on rental income (as a dividend) and on the capital gain once an investor sells their  
20 share of the property. In selling their share, investors list their fraction for sale on the  
21 platform site and wait for a willing buyer. The platform therefore also acts an exchange  
22 where investors can buy and sell shares in several residential properties.  
23

24 It is evident that fractional investment through online platforms is in its infancy. This paper, in  
25 addressing investment in fractional property ownership, seeks to add to the emerging  
26 literature on alternative investment platforms and in particular the next section considers the  
27 survey approach based on investors using an Australian fractional residential property  
28 platform.  
29  
30

### 31 **3. Research method**

32  
33 This study employs a survey-based research design and in doing so follows an investigative  
34 approach that has been employed extensively in property research (French, 2001; Gallimore  
35 and Gray, 2002; MacCowan and Orr, 2008 and Gibler *et al.*, 2009). The purpose of the  
36 online questionnaire was to investigate perspectives in fractional property investment as an  
37 investment vehicle. More specifically, the aim was to gather information on key issues  
38 including age, gender, investor type and education demographics; investor time horizons  
39 and investment history; return expectations, risk perceptions and likely holding period of the  
40 fractional investment as well as financial knowledge and tax implications of fractional  
41 property investment.  
42  
43

44 This study adapted an earlier questionnaire developed by Lowies *et al.* (2017), investigating  
45 investors' perspectives on property crowdfunding in Australia, to the current study on  
46 fractional property investment. A pilot study was conducted to ensure the effectiveness and  
47 robustness of the questionnaire.  
48

49 At the time of writing there was only one significant fractional property investment platform  
50 operating in Australia, although smaller start-ups are entering this market. The questionnaire  
51 was initially distributed through the platform to an active investor database of 1700, using  
52 Survey Monkey. This yielded a return of 150 responses, or a 9% response rate, which is in  
53 line with response rates for online surveys (Nulty, 2008). All responses were collected in  
54 exactly the same manner to avoid bias. The analysis identified key patterns in the data with  
55 inferential statistics employed (chi-square and t-tests) to test for sub-group differences.  
56  
57  
58  
59  
60

#### 4. Survey findings and results

The findings of the survey are considered under a number of thematic sub-sections starting with an overview of the respondents' profile which forms a benchmark for further analysis of the dataset. The key thematic issues explored are experience of fractional property investment, return expectations, information on fractional property investment, risk, financial literacy and fractional property investment.

##### 4.1 Respondent profile

Respondents' gender is strongly skewed towards males perhaps reflecting the perception that men have a greater propensity to explore alternative investments particularly those associated with digital platforms (Table I) In terms of age profile, fractional property investment has greater appeal to a younger profile of investors with two thirds of respondents in the survey aged below 45 years. Thus, only 15% of the sample were aged 55 or above, reflecting the likely perception of risk by older respondents, their more conservative attitudes in terms of investment behaviour and potentially a lower knowledge base of alternative investment platforms. A number of these issues are further addressed in the subsequent analysis, though it is interesting that of the older investor cohort there was a disproportionate representation of female respondents: 26% of all women in the survey were in the older age category compared with 11% of their male counterparts. Indeed, disaggregation of the dataset by gender and age reinforces the younger male profile of the investors.

##### **INSERT HERE – Table I: Respondent demographics**

In relation to gross household income, there is a high representation of respondents in low to middle employment with 33% earning between AU\$50,000 to \$100,000 <sup>[1]</sup> and 31% between AU\$101,000 and \$150,000. Whilst the analysis indicates no significant difference in income bands between female and male respondents, it is apparent that there is a greater percentage (33%) of the female cohort in higher income groups relative to males (15%). Furthermore, there is evidence of a high level of education amongst respondents with 38% holding an undergraduate degree and 27% a postgraduate degree. Thus the survey is composed of a well-educated and informed cohort.

##### 4.2 Experience of fractional property investment

Reflecting the characteristics of the respondent profile, most interviewees (78%, n=93) were existing investors with only 22% indicating that they are new investors and that the investment through a fractional property investment platform was their first financial investment. Some gender differences are apparent with only 16% of females utilising this fractional investment platform as their first investment compared to 27% of the male respondents. Again, such subtle differences, whilst not reaching a statistical confidence level required for scientific analysis, does at least suggest that male respondents are more likely to be responsive to alternative investment platforms and may be more inclined to take higher risk. Ease of access to the fractional investment platform, confirmed by 92% of respondents, was important in attracting investors and assisting in investment decision-making.

Regarding the level of financial exposure, the distribution has a significant positive skewness with individual investments ranging from as low as AU\$70 up to \$40,000. The mean



investment (AU\$2,898) suggests that most investors have a limited exposure to risk and use their investment to test the potential of fractional property investment. For the new investor cohort, as expected, the mean level of exposure is lower (AU\$2,314) than for existing investors (AU\$3,078) and characterised by lower investment spreads AU\$3,845 and AU\$5,559 respectively.

Regarding other asset classes, it is apparent that respondents were otherwise largely exposed to mainstream asset classes. Direct property (37 respondents), stocks (27 respondents) and cash (28 respondents) were predominant investments with females holding a slightly higher percentage in cash (31% relative to 27% for males). In relation to age profile, while there is certain variation in the allocation to different asset classes, the only significant difference is the lower percentage of cash held by those 55 or above (14%) compared to the 18-34 age group with a 35% allocation to cash. Those aged 55 or above had a higher allocation (49%) to direct property as an investment asset.

#### *4.3 Fractional property investment and return expectations*

Most respondents (87%) suggest returns of 10% and lower (Table II), which are broadly realistic compared to general savings products. Certain differences are apparent by gender with 52% of females compared to 41% of males expecting a return of 5% or below, whilst a higher percentage of males (47%) suggested returns in the 6-10% range compared to 32% of female respondents. The younger investor (18-34) had higher return expectations, 50% suggested 6-10% compared to 39% of the investors aged 55 and above, but no statistical significance is evident. New investors had higher return expectation with 21% of this cohort expecting returns of 11% and above, again no statistical significance was found.

#### **INSERT HERE – Table II: Return and risk expectations**

Ownership expectations in relation to fractional property investment are based on continuing future ownership and expected returns that reflect both annualised capital growth and rental income in the form of monthly payments according to the fraction owned. This is the preferred position of the clear majority of investors (70%). In terms of the sustainability of the fractional investment platform, it is interesting that only a minority of respondents were interested in short-term speculation. Female respondents showed a slightly higher tendency for short-term speculation (13% compared to 10% for males) and capital growth only (19% versus 13% for males). Analysis by age group indicates that those aged 55 and above were the strongest (77%) in expecting capital appreciation and rental income as their investment objectives. There was little difference in ownership expectation between new and existing investors.

The analysis (Table III) indicates, the main motivation for using fractional investment was general saving, possibly indicating an alternative to mainstream banks with the prospect of an added return. However, 23% saw the investment as a deliberate strategy of gaining access to investment in property. This was highest (37%) amongst the 18-34 age group and the new investor group (38%).

#### **INSERT HERE – Table III: Investors' motivation in using fractional investment**

#### *4.4 Information on fractional property investment*

Information concerning fractional property investment appears to be strong, which is to be expected from a survey of actual investors. Equal numbers (46%) considered that they were either well informed, this is highest amongst the 35-54 age group (57%) or had some idea as to how fractional property investment works. Surprisingly for an investor cohort, 8% of respondents did not have any knowledge about fractional property investment. This opinion was paramount in the new investor cohort, 17% of whom seemed to lack a knowledge base on fractional property investment. Importantly, the difference in the information base between new and existing investors is statistically significant (0.05 level).

The internet was the primary source of information (62% of the sample), though printed media (19%) was still important for an appreciable number of respondents (n=23). Surprisingly, for female respondents (68%) the internet was an even stronger source of information than for males (59%). Age differences are also apparent with 69% of the 18-34 group quoting the internet compared to 56% of the 55 plus age group. The age differential is also apparent in the use of printed media, quoted by 10% of those in the 18-34 age group compared to 33% for respondents 55 or over (statistically significant at the 0.05 level).

Information on the tax implications of fractional property investment are varied with 72% of respondents (n=86) claiming to be familiar with tax consequences, though an appreciable number, circa 28% of the sample (34 respondents), were unaware of any taxation issues. Significant differences (at 0.01 level) arise by age group with the percentage of respondents in the 18-34 age group who are unfamiliar with tax implications rising to 40%.

#### *4.5 Risk, financial literacy and fractional property investment*

Table II shows that respondents' willingness to take risk in an investment situation lies between a risk averse/moderate risk-taking position with 44% prepared to take average risk in the expectation of receiving average return, whilst an equal representation showed an appetite for above average (high) risk in seeking above average returns. Female respondents showed a wider spread of risk-taking behaviour with a lower percentage (32%) taking an above average (high) risk position. The spread of risk behaviour on a gender basis is statistically significant (chi-square = 9.861, p=0.05). Likewise, a distinct variation in risk profile is apparent depending on the age of respondents with the 55-plus cohort seeking to minimise their risk positions (56% opting for average risk and a further 11% below average risk). Those new to investment were more cautious, with 52% indicating average risk-taking, though differences are not statistically significant.

Relatively strong appreciation of financial literacy was apparent when respondents were tested across a range of financial concepts. However, as financial concepts become more sophisticated, seemingly, the level of knowledge is declining. Reflecting this variation in knowledge, 81% of female interviewees claimed to have a fair to a lot of knowledge in relation to interest rates, finance charges and credit terms (72% for males) rising to 83% of those aged over 55. For existing investors 81% expressed similar knowledge levels but significantly this decreased to 55% for the new investor cohort (chi-square 13.891, p=0.008).

The expected investment time horizons of respondents, 36% (n=43) medium term and 47% (n=56) long term, reflect the differing levels of risk appetite particularly the tendency to be either risk averse or willingness to accept a modest degree of risk. A minority indicated a desire to invest over a short-term horizon (17%, n=21). In this respect, age differences were



1  
2  
3 significant at the 0.05 level with 21% of the 18-34 cohort taking a short-term perspective  
4 while 68% of the 55 plus age group envisaged a long-term holding period of over five years.  
5

### 6 **5. Residential fractional ownership – the way forward**

7  
8 The paper shows a gender bias towards males in the use of fractional property investment,  
9 similar to that observed by Lowies *et al.* (2017) for property crowdfunding. Researchers and  
10 other groups interested in social inclusion may be particularly keen to determine the reasons  
11 for the gender and age biases found in the investor profile. Even though an investor is more  
12 likely to be female as age increases, the observation that ease of access aided many  
13 respondents in their decision to invest suggests that older females were in general not able  
14 to access the platform as easily. Future research could investigate this and other potential  
15 barriers inhibiting older people and females investing in the platform.  
16

17  
18 In addition to the above there is evidence of an over-representation in the younger investor  
19 age group. This might create an opportunity to actively direct marketing to engage with this  
20 cohort. Of particular commercial interest is the finding that many use the platform as a  
21 general savings vehicle rather than a way for those who are otherwise locked out of the  
22 residential property market to gain entry to it, perhaps due to the liquidity offered by the  
23 platform combined with its ease of its use to this younger cohort.  
24

25  
26 The valuation of the fractional interest is a major issue with many arguing that it should be  
27 valued at a discount due to the burdens of co-ownership and the lack of liquidity. Since the  
28 online fractional property investment platforms remove many, if not all, of these burdens and  
29 are more liquid investments, valuing at a discount may not be appropriate. An opportunity for  
30 improvement exists in investigating valuations of the online fractional interests compared to  
31 the proportion of the underlying property to determine the amount of discount, if any, and  
32 explain the reasons for the amount of any discount.  
33

34  
35 Online fractional investment appears to offer a number of advantages over traditional  
36 fractional investment due to greater liquidity and reduced burdens of co-ownership. The  
37 evidence in this paper however suggests that fractional investors have a medium to long-  
38 term investment time horizon providing a clear indication that fractional investment platforms  
39 are not transitory vehicles.  
40

### 41 **6. Conclusion**

42  
43 Disruptive technologies and the growth of digital based alternative finance platforms have  
44 widened the scope for alternative investment vehicles. This paper has shown that the  
45 opportunities available have allowed many first time individual investors to invest in property  
46 often as an alternative to bank savings or investing in the stock market. Of particular  
47 importance are those platforms that enable fractional ownership of property; however, to  
48 date, there has been little research about these vehicles, who is using them and what the  
49 expected investment outcomes are. Webb's (2001) argument that co-ownership attracts a  
50 certain type of investor raises the question as to what type of investor is investing online  
51 in fractional property. In this context, this paper, using a fractional ownership platform, is  
52 breaking new ground with the originality of the study stemming from an analysis of investor  
53 profiles and their decision-making behaviour.  
54  
55  
56  
57  
58  
59  
60

1  
2  
3 The survey captured a wide age-gender-financial literacy spectrum of opinion amongst this  
4 investor group. For a new innovative investment style vehicle this spread is perhaps wider  
5 than might have been anticipated and while investment amounts are generally relatively  
6 modest, reflecting the nature of fractional investment, it is significant that this vehicle has  
7 attracted such a range of investors. The analysis shows different motivations of a largely  
8 risk-averse/modest risk-taking domestic-based <sup>[2]</sup> investors towards the merits of fractional  
9 property investment.  
10

11 The specific contribution of the study is the positioning of fractional investment alongside  
12 more traditional investment opportunities and understanding investors' attributes and  
13 motives for diversifying into online vehicles and the perception of the risk involved. Indeed, it  
14 seems highly probable that fractional investment will become an embedded feature on the  
15 wider investment landscape alongside traditional investment routes with a notable impact on  
16 future investment strategies.  
17  
18

#### 19 **Notes:**

- 20  
21 1. At time of writing the exchange rate between the AU\$ and the US\$ was 1 AUD = 0.79 US dollars  
22  
23 2. Very few of the respondents had investments outside of Australia, for example 6% (n=7) held  
24 investments in the US.  
25  
26  
27

#### 28 **References**

- 29  
30 Beer, A., Kearins, B. and Pieters, H. (2007), "Housing Affordability and Planning in Australia:  
31 The Challenge of Policy under Neo-liberalism", *Housing Studies*, Vol. 22 No. 1, pp.  
32 11-24.  
33  
34 Davidson, B. (1992), "Valuation of Fractional Interests in Real Estate Limited Partnerships –  
35 Another Approach", *The Appraisal Journal*, Vol. 60 No. 2, pp. 184-194.  
36  
37 Davis Sr, W.D., Harris, D.L. and McCormick, P.A. (1983), "The Valuation of Partial Interests  
38 in Real Estate", *Journal of ASFMRA*, Vol. 47 No. 2, pp.17-21.  
39  
40 Fife, A. (2003), "Valuation of Fractional Interests", *Australian Property Journal*, Vol. 37 No. 5,  
41 pp. 360-362.  
42  
43 Fife, A. and Newell, G. (1995), "The Valuation of Fractional Interests", *The Valuer & Land*  
44 *Economist*, Vol. 33 No. 6, pp. 467-469.  
45  
46 Franklin, M. (2007), "Estate Planning and TICs: Utilizing TICs in Estate Planning Can Help  
47 East Tax Woes", *Northeast Real Estate Business*, available at:  
48 <http://northeastrebusiness.com/articles/OCT07/feature1.html> (accessed 19 February  
49 2018).  
50  
51  
52  
53  
54  
55  
56  
57  
58  
59  
60

- 1  
2  
3 French, N. (2001), "Decision theory and real estate investment: an analysis of the decision-  
4 making processes of real estate investment fund managers", *Managerial and*  
5 *Decision Economics*, Vol. 22, pp. 399-410.  
6  
7  
8 Gallimore, P. and Gray, A. (2002), "The role of investor sentiment in property investment  
9 decisions", *Journal of Property Research*, Vol. 19 No. 2, pp. 111-120.  
10  
11  
12 Gibler, K., Taltavull, P., Casado-Diaz, J. M., Casado-Diaz, M. and Rodrigues, V. (2009),  
13 "Examining retirement housing preferences among international retiree migrants",  
14 *International Real Estate Review*, Vol 12 No.1, pp.1-22.  
15  
16  
17 Hall, L.S. (1989), "Valuation of Fractional Interests: A Business Appraiser's Perspective",  
18 *The Appraisal Journal*, Vol. 57 No. 2, pp. 173-179.  
19  
20  
21 Hall, L.S. and Polacek, T.C. (1994), "Higher Discounts in Offing for Real Estate Interests",  
22 *Journal of Financial Planning*, Vol. 7 No. 2, pp. 76-80.  
23  
24 **Hess, R. and Liang, Y. (2004), "Point of View: REIT Joint Venture Use is on the Rise",**  
25 ***Journal of Real Estate Property Management*, Vol. 10 No. 1, pp. 77-84.**  
26  
27 Hopson, J.F. and Hopson, P.D. (2008), "Considerations within sponsored tenants-in-  
28 common like-kind exchange programs", *Journal of Financial Planning*, Vol. 21 No. 2,  
29 p. 48-56.  
30  
31 Kang, M., Gao, Y., Wang, T. and Zheng, H. (2016), "Understanding the determinants of  
32 funders' investment intentions on crowdfunding platforms", *Industrial Management &*  
33 *Data Systems*, Vol. 116 No. 8, pp. 1800-1819.  
34  
35  
36 Kaschube, A. (2006), "Common Interests: Tenancy-in-Common investments create  
37 opportunities for property owners and managers", *Journal of Property Management*,  
38 Vol. 71 No. 2, pp. 42-45.  
39  
40  
41 Lewis, R. (2014), "DLOM for Fractional Interests in Real Estate Partnerships: A Common  
42 Sense Approach", *The Value Examiner*, May/June, pp. 8-13.  
43  
44  
45 Lowies, B., Viljoen, C. and McGreal, S. (2017), "Investor perspectives on property  
46 crowdfunding: evidence from Australia", *Journal of Financial Management of*  
47 *Property and Construction*, Vol. 22, pp. 303-321.  
48  
49  
50 MacCowan, J.R. and Orr, A.M. (2008), "A behavioural study of the decision processes  
51 underpinning disposals by property fund managers", *Journal of Property Investment*  
52 *& Finance*, Vol. 26 No. 4, pp. 342-361.  
53  
54  
55  
56  
57  
58  
59  
60

- 1  
2  
3 Newell, G. and Peng Hsu, W. (2007), "The significance and performance of retail property in  
4 Australia", *Journal of Property Investment & Finance*, Vol. 25 No. 2, pp. 147-165.  
5  
6  
7 Newell, G., Lee, C. and Kupke, V. (2015), "The opportunity of residential property investment  
8 vehicles in enhancing affordable rental housing supply", Positioning Paper No. 166,  
9 Australian Housing and Urban Research Institute Limited, Melbourne.  
10  
11  
12 Nulty, D.D. (2008), "The adequacy of response rates to online and paper surveys: what can  
13 be done?", *Assessment & Evaluation in Higher Education*, Vol. 33 No.3, pp. 301-314.  
14  
15  
16  
17 O'Roarty, B., McMahon, S., Martin, R., Marx, S. and Craddock, P. (2016), "Real estate  
18 crowdfunding: gimmick or game changer?", IPF Research Report, Investment  
19 Property Forum, London.  
20  
21  
22 Ordanini, A., Miceli, L., Pizzetti, M. and Parasursman, A. (2011), "Crowd-funding:  
23 transforming customers into investors through innovative service platforms", *Journal*  
24 *of Service Management*, Vol. 22 No. 4, pp. 443-470.  
25  
26  
27 Rose, C.C. and Brinckman, D.E. (2006), "Using the New Tenancy in Common Interests in  
28 section 1031 Real Estate Exchanges", *Journal of Financial Planning*, Vol. 19 No. 5,  
29 pp. 70-80.  
30  
31  
32 Thompson, M.S. and Dogbjartsson, E. (1994), "Market Discounting of Partial Ownership  
33 Interests", *The Appraisal Journal*, Vol. 62 No. 5, October, pp. 535-541.  
34  
35  
36 Updike, B. (2007), "Exploring the Frontier of Non-Traditional Real Estate Investments: A  
37 Closer Look at 1031 Tenancy-in-Common Arrangements", *Creighton Law Review*,  
38 Vol. 40, pp. 271-342.  
39  
40  
41 Vicino, R.K. (2008), "Method for fractional sale of property", US 2008/0154686 A1.  
42  
43  
44 Webb, D.A. (2001), "Bridging the Gap: Marketability Discounts for Real Estate Interests",  
45 *The Appraisal Journal*, Vol. 69 No. 1, pp. 95-111.  
46  
47  
48 Yates, J. and Milligan, V. (2007), "Housing affordability: a 21st century problem", AHURI  
49 Final Report No. 105, Australian Housing and Urban Research Institute Limited,  
50 Melbourne.  
51  
52  
53 Zhang, B., Deer, L., Wardrop, R., Grant, A., Garve, K., Thorp, S., Ziegler, T., Ying, K.,  
54 Xinwei, Z., Huang, E., Burton, J., Chen, H., Lui, A. and Gray, Y. (2016), "Harnessing  
55  
56  
57  
58  
59  
60

1  
2  
3 potential The Asia-Pacific alternative finance benchmarking report”, Cambridge  
4 Centre for Alternative Finance, Cambridge.  
5

6  
7 Ziets, J., Ziets, E.N. and Sirmans, G.S. (2008), “Determinants of House Prices: A Quantile  
8 Regression Approach”, *The Journal of Real Estate Finance and Economics*, Vol. 37  
9 No. 4, pp. 317-333.  
10  
11  
12  
13  
14  
15  
16  
17  
18  
19  
20  
21  
22  
23  
24  
25  
26  
27  
28  
29  
30  
31  
32  
33  
34  
35  
36  
37  
38  
39  
40  
41  
42  
43  
44  
45  
46  
47  
48  
49  
50  
51  
52  
53  
54  
55  
56  
57  
58  
59  
60



**Table I: Respondent profile**

Gender	Respondents (%)
Male	75
Female	25
Age	
18 – 24	8
25 – 34	37
35 – 44	22
45 - 54	18
55 and above	15
Income distribution (\$)	
Below 50,000	13
50,000 – 100,000	33
101,000 – 150,000	31
Above 150,000	23
Highest qualification	
Secondary school	7
Diploma/certificate	25
Undergraduate degree	38
Postgraduate degree	27

**Table II: Investors' return and risk expectations**

Expected return	Respondents (%)
5% or below	44
6% - 10%	43
11% - 15%	11
Above 15%	2
Expected return	
Very high	11
High	43
Average	44
Below average	2

**Table III: Investors' motivation in using fractional investment**

Motivation	Respondents (%)
Gain access to investment in property for the first time	23
Save for a deposit to buy a house	7
General saving	53
Other	17