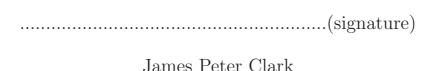
Performance, Performance Persistence and Fund Flows: UK Equity Unit Trusts/Open-Ended Investment Companies vs. UK Equity Unit-Linked Personal Pension Funds

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I certify that all material in this thesis which is not my own work has been identified and that no material has previously been submitted and approved for the award of a degree by this or any other University.



Abstract

This thesis analyses and compares the performance, performance persistence and fund flows for UK equity unit trusts/OEICs and UK equity unit-linked personal pensions over the sample period January 1980 to December 2007. Unit-linked personal pension funds are an illiquid investment from the investor's perspective since any invested capital is inaccessible until retirement whereas for unit trusts/OEICs capital invested can be withdrawn at any time. Since decreasing returns to scale from fund flows are the equilibrating mechanism in Berk and Green (2004) that results in no persistence in performance the illiquid nature of unit-linked personal pension funds should ensure more evidence of performance persistence in comparison to unit trusts/OEICs.

I find significant evidence using performance ranked portfolio strategies that underlying portfolios that are only composed of unit-linked personal pension funds have greater performance persistence than unit-linked personal pension funds that have underlying portfolios that also include at least a unit trust/OEIC. This evidence is consistent with Berk and Green (2004) since the illiquid nature of personal pension funds results in an attenuated performance fund flow relationship restricting the equilibrating mechanism. However, there are anomalies in the performance persistence results in relation to Berk and Green (2004) but it could be due to the differential between the number of non-surviving unit trusts/OEICs and non-surviving unit-linked personal pension funds.

I also find that the performance fund flow relationship based on abnormal returns from a Carhart four factor model for both UK equity unit trusts/OEICs and UK unit-linked personal pensions is convex but the performance fund flow relationship is more attenuated for the unit-linked personal pension funds. For the worst performing unit trusts/OEICs there are outflows on average whereas for unit-linked personal pensions there are fund inflows on average. For performance persistence

tests conditional on underlying portfolio fund flows unit trusts/OEICs that have the worst performance but the lowest net fund flows in the ranking period have significantly greater subsequent performance in comparison to the unit trusts/OEICs that have the worst performance but the highest net fund flows in the ranking period. This empirical evidence provides support for Berk and Green (2004) but for the unit-linked personal pension funds the evidence is less convincing.

There is very little evidence that UK equity unit-trusts/OEICs or UK equity unit-linked personal pensions produce abnormal returns. These results are robust across the single index (CAPM) model, the Fama and French three factor model and the Carhart four factor model for both conditional and unconditional models. There is also no evidence that unit trusts/OEICs or unit-linked personal pension funds can time the market. There is a significantly negative timing effect across unconditional factor models which becomes insignificant for the conditional models. There is also no evidence that unit trusts/OEICs have significantly different performance than unit-linked personal pension funds.

To Mum and Dad

In loving memory

Grandad

Nan

Uncle Walter

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List of Abbreviations

ABI Association of British Insurers

ACD Authorised Corporate Director

APT Arbitrage Pricing Theory

AUTIF Association of Unit Trusts and Investment Funds

CAPM Capital Asset Pricing Model

CRSP Center for Research in Security Prices

EMH Efficient Market Hypothesis

FDR False discovery rate

FMA Fund Managers Association

FSA Financial Services Authority

GP Group pension

IMA Investment Management Association

IPP/PP Individual personal pension/personal pension (unit-

linked)

LF Life fund

LSPD London Share Price Database

OEIC Open ended investment company

NAV Net asset value

PRW Percentage of repeat winners

UT Unit trust

SRI Socially Responsible Investing