

Methodology change for the MSCI/AREF UK Quarterly Property Fund Index

CONSULTATION ON THE IMPLEMENTATION OF THE TIME-WEIGHTED RETURN METHODOLOGY

March 2021

This consultation may or may not lead to the implementation of any or all of the proposals discussed. Consultation feedback will remain confidential. MSCI may publicly disclose the feedback of a participant if so, requested by any participant. In that case, the relevant feedback would be published at the same time as the final results of the consultation.

Background

- MSCI <u>consulted on the introduction of the time-weighted return methodology</u> including introduction of adjustment for daily-weighted external cash flows in 2020
- UK real estate investment community wanted to see the impact to fund results as well as the aggregated results before implementing this change.
- MSCI reached out to the data providers to provide 3-years of historical data to simulate index results.
 Comparison of the individual fund results has been shared already.
- The proposed change, if implemented, will become effective, including for related sub-indexes and benchmarks, as of the Q1 2022 index results. The new methodology will be applied on a moving forward basis only with no restatement of index history.
- MSCI welcomes feedback from the UK real estate investment community on this consultation on or before May 21, 2021.
- MSCI will announce its decision on this topic on or before June 30, 2021.



Proposal - Methodology change

The following enhancements are proposed to be made for the MSCI/AREF UK Quarterly Property Fund Index compared to the current methodology:

- Returns will be calculated using Time-Weighted Return Methodology (reflecting daily-weighted external cash flows at fund level) instead of the current Unitized Methodology.
- Fund-Level index returns will be made available both on a Net and Gross fee basis.
- Income return calculations to be based on the net investment income.
- Consistent interpolation will be applied when Net Asset Value and the Net Investment Income are not available on a monthly basis and the external cash flows are not available on a day-dated basis.
- Cross-holdings adjustment will be discontinued.



Rationale for Methodology change

The main benefits* of the Time-Weighted Return Methodology with adjustment for daily-weighted external cash flows relative to Unitized methodologies are:

- Better alignment with Global Investment Performance Standards (GIPS) by considering day-dated external cash flows.
- Global standardization¹ would benefit funds having international investors or international fund raising.
- Income return is more comparable amongst funds which are not (or are partly) distributing their income
- A fund level return calculation considers the overall fund level returns while the unitized return calculation considers individual investors returns. It is therefore, more accurate for funds with different share-classes and bid-offer spreads.
- Timing of external cash-flows resulting in a more accurate capital employed calculation both for individual funds, but also for weighting in indexes.

*See for more details on the benefits of the methodology and the simulated results for the market that transition the publication MSCI Property Fund Index Methodology Change – Simulated Results



Although the methodology would be implemented only on a moving forward basis, MSCI has collected and validated performance data (3-years period) to calculate simulated returns.

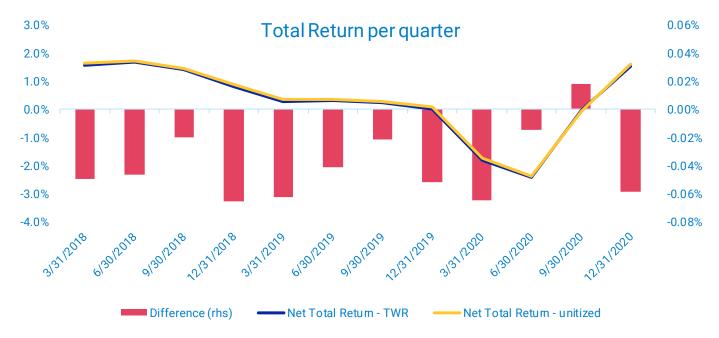
Approximately 72% of the sample (based on NAV) within the MSCI/AREF UK Quarterly Property Fund Index including non-index is used in the simulated results. (see appendix for details on the data provision)

For the remaining funds MSCI engaged with the data providers to get details for the outstanding validation questions and has also discussed the data provision for the funds for which the data was not available, however the data was not available in time to be included in the simulated results.

Not all current index constituents are reflected in the simulated results. Therefore, a like-for-like comparison has been made to simulate the return differences due to the methodology change.



Aggregated Net Total Return comparison on like-for-like basis



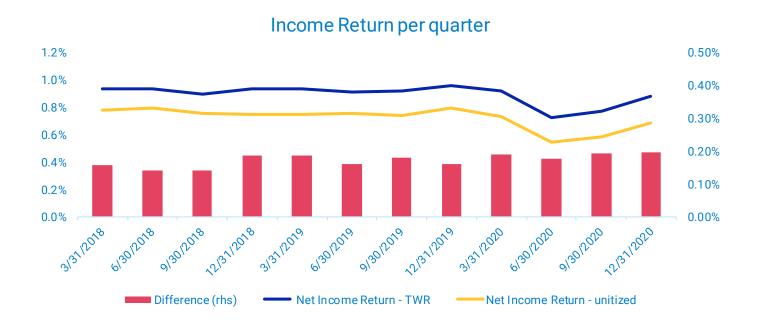


Fund by fund difference of net total return



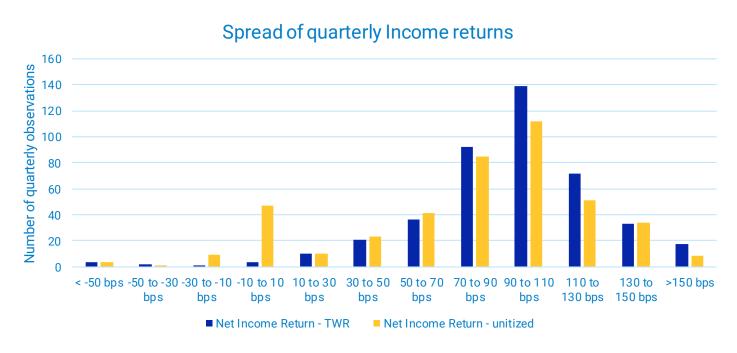


Aggregated Net Return Return comparison on like-for-like basis





Fund by fund comparison of income return





Drivers of return difference between methodologies

Current unitized methodology	Proposed time-weighted methodology	
Return based on individual investors returns for individual units	Based on aggregated investors return including impact of bid-offer spread and aggregated for different share-classes	
Timing of external cash-flows partially monthly but also quarterly	The external cash-flows are day-dated for the calculated of the weighted equity	
Certain funds did provide quarterly while others did provide monthly NAVs	Consistent monthly NAV derivation for funds for which no monthly NAV is available	
Income based on distributed income (for certain non-distributing funds this would be zero or even negative when charging fees)	Based on the net investment income (see appendix for a more detailed definition of the net investment income)	

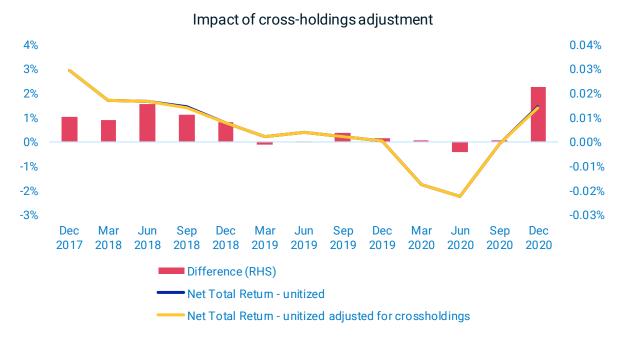
There were some differences in the timing between the net investment income and the distribution and therefore there could be difference in the return on a quarterly basis.



Discontinuation of the adjustment for cross-holdings - Impact

Impact of discontinuation of the adjustment for cross-holdings is based on full sample. No concerns raised during initial consultation, due to small impact.

The amount of cross-holdings within the index is 0.8% of the index NAV as of December 2020.





Discussion points

- 1. Do you prefer the Time-Weighted Return Methodology with adjustment for daily-weighted external cash flows compared to the Unitized Methodology for Property Fund Indexes? If not please provide a reason why not.
- 2. Do you support the proposal there should be a transition period with simulated index results? Would a transition of 6 months be appropriate (implementation with Q1 2022 index release)?
- 3. Do you support splicing the index series based on the current methodology and the proposed methodology to provide longer term index returns? If not do you propose to have two separate time-series or do you propose a different approach?
- 4. Could you (continue to) provide all fund-level external cash flows (New Capital Invested, Capital Returned and Distributions) on a day-dated basis as well as the net investment income both before and after fees on a monthly basis in line with the current data provision deadlines?





Appendix

RESULTS FOR OTHER MARKETS

Proposed new return calculation – return formula

MSCI proposes the Time-Weighted Return Methodology with adjustment for daily-weighted external cash flows index return calculations as shown below:

$$Total \ Return_t = \left(\frac{Appreciation_t + \sum NII_t}{WtdEq_t}\right) * 100$$

Where:

 $WtdEq_t = NAV_{t-1} + \sum_{i=1}^{n} \left[Days_{i,t} * NCI_{i,t} \right] - \sum_{i=1}^{n} \left[Days_{i,t} * Dist_{i,t} \right]$

And:

Appreciation_t (capital return) is the NAV_t – NAV_{t-1} - \sum NCI_t- \sum Distributions_t)

NII_t is the Net Investment Income in month t;

WtdEq is weighted equity (capital employed);

Days $_{i,t}$ is the number of days as a portion of the number of days in the month;

NCI_{it} is the net capital invested.

Index returns would be calculated on a **monthly basis** although not proposing to increase the frequency of the index release to become monthly although external cash-flows would be collected on a day-dated basis.

MSCI is proposing to change the calculation of other measures that are currently being calculated on a per unit basis into a non-unitized equivalent. (for example the distribution yield).



Proposed new return calculation - Proposed interpolation

MSCI proposed that in the case the NAV is not available on a monthly basis to derive the NAV based on the below interpolation:

- Use the latest available NAV, because the asset and liabilities haven't been revalued.
- Adjust for the day-dated external cash-flows (Capital invested, Capital returned and Distributions)
- Adjust for the non-distributed income (Net Investment Income Distribution)

Equally spread the net investment income amongst the months during the period when provided on a less than monthly basis



Sample of funds for simulated results. In aggregate 72% sample at Dec 2020.

	Unitized # funds*	Unitized NAV (GBP)*	TWR # funds*	TWR NAV (GBP)*	% of NAV
Q1 2018	51	52.5bn	36	36.4bn	69%
Q2 2018	51	53.2bn	36	36.8bn	69%
Q3 2018	51	53.8bn	36	37.3bn	69%
Q4 2018	51	54.6bn	37	40.0bn	73%
Q1 2019	51	55.0bn	37	40.1bn	73%
Q2 2019	51	54.8bn	37	39.9bn	73%
Q3 2019	51	54.6bn	37	39.5bn	72%
Q4 2019	51	53.9bn	37	39.2bn	73%
Q1 2020	51	53.5bn	37	37.8bn	71%
Q2 2020	51	51.7bn	37	36.7bn	71%
Q3 2020	51	50.4bn	36	35.9bn	71%
Q4 2020	51	49.6bn	36	35.9bn	72%

^{*} This includes several of non-index funds

The data for the 3-years history was not provided for 10 funds in time mainly due to lack of resources and/or dependency from third parties for providing the data. For five funds there were outstanding questions.



More detailed definition of the net investment income

Feedback was provided on the lack of clarity on the net investment income as well as during the validation. Based on this feedback MSCI has provided more details on the definition.

Current definition: Total investment income that was reported by the vehicle during the period net of fund operating costs, and net of any fund management and incentive fees (unless the incentive fees are netted off the capital side).

New definition: Total Net Investment Income After Fees that was reported by the vehicle during the period defined as:

- rental income and any other income from direct real estate investments;
- minus all direct real estate related expenses (excluding depreciation);
- minus interest expenses and financing related fees (including early repayment charges);
- plus the net income from other investments including indirect real estate investments and net income from other activities including cash;
- minus administrative expenses and other fund level related expenses;
- minus accrued or paid taxes incurred by the fund during the period (e.g. corporate level tax). Exclude tax incurred by
 investors in the vehicle (withholding tax) or local taxes due on individual properties (captured as part of the direct
 real estate expenses) and recoverable Sales Tax (VAT/GST). Balance sheet items (e.g. deferred tax) should not be
 included;
- Net Investment Income After Fees should be net of management and incentive fees (unless the incentive fees are netted off the capital side).

Net Investment Income should ignore fair value gains or losses both realized and unrealized on all investments including financial instruments.



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